

**Instagram:
Technology and Democracy in the Age of
“Pics or it Didn’t Happen”**

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Abstract

Rund zwei Milliarden Menschen weltweit nutzen Instagram. Was 2010 als Foto-Sharing-App begann, hat sich zur viertgrößten Social-Media-Plattform nach Facebook, YouTube und WhatsApp entwickelt (Statista, 2023). Instagram ist überall: im Design von Restaurants, Läden und Hotels, wie wir aussehen, uns kleiden, die Welt wahrnehmen, wohin wir reisen, wie wir die Natur behandeln, miteinander in diskursiven, öffentlichen Sphären interagieren und den öffentlichen Raum nutzen.

„Pics or it didn’t happen!“ – das Pramat perfekter Bilder und instantaner visueller Kommunikation hat die Welt verändert. Instagram hat neue Berufszweige hervorgebracht und ihnen eine Plattform gegeben. Die App war und ist Sprungbrett für künstlerische, kreative und unternehmerische Ambitionen, für bildliche Kommunikation und Austausch mit der Welt. Gleichzeitig ist Instagram Phänomen und Ausdruck eines digitalen Business-Modells, das gerne auf Regeln, Regulierung und Wahrung von (Grund-)Rechten verzichtet, frei nach Mark Zuckerbergs Diktum „move fast and break things“¹ (Taneja, 2019). Die Instagram-Welt bietet schönen Schein zu einem hohen Preis für Individuen und Gesellschaft; mentale Gesundheit, Privatsphäre und Autonomie über unsere Daten sind davon betroffen, um nur einige zu nennen. Instagram ist Ausdruck von Modellen im digitalen Kapitalismus, die Plattformen genannt werden – Unternehmen die eine marktbeherrschende Basis von Hard- und Software bilden, auf der andere Unternehmen oder Individuen ihre Aktivitäten aufbauen (Srnicek, 2017).

Was vermeintlich oberflächlich und frivol begann – Influencer an allen Ecken, Traumwelten auf Reisen, scheinbar perfekte Körper und vermutlich viele erkaltete Mahlzeiten, geopfert auf dem Altar des perfekten Bildes – hat sich zu einem globalen Phänomen entwickelt. Instagram ist Sinnbild für ein Business-Modell im digitalen Kapitalismus, das keine Schranken kennt.

Trotz dieser weitreichenden Konsequenzen gibt es keine politikwissenschaftliche Theoretisierung von Instagram über partikuläre Studien hinaus. Auch wenn Instagram das viertgrößte soziale Netzwerk weltweit ist, wurde es bisher schwerpunktmäßig nur in Studien zu sozialen Medien behandelt. Der Fokus auf singuläre Ereignisse oder Nutzungsweisen von Instagram in Zusammenhang mit anderen sozialen Medien führt dazu, dass es zwar eine Vielzahl von Studien mit Erkenntnisgehalt zu partikulären Aspekten wie bildliche Darstellungsstrategien von Populisten auf Instagram (Bast, 2021a; Kissas, 2022; Pallarés-Navarro und Zugasti, 2022) oder länderspezifische Studien zur Nutzung von Instagram bei Wahlen durch Parteien und Kandidaten (Boulianne und Larsson, 2023; Grusell und Nord,

¹ Eine interne Anweisung von Mark Zuckerberg an seine Mitarbeiter bei Facebook, die zum Modus Operandi der Technologie-Industrie wurde.

2020; Larsson, 2017b; Mohamed, 2019; Russmann und Svensson, 2017) gibt, gleichzeitig der Blick für größere Zusammenhänge, die die Epoche, das Instagram-Age, bestimmen, verloren.

Dieses Dissertationsprojekt füllt die politikwissenschaftliche Forschungslücke zu Instagram mit einem interdisziplinären Ansatz. Im Kern erkundet es, was an Instagram über politische Inhalte hinaus politisch ist. Ebenso beschäftigt es sich damit, welche Rückschlüsse sich über das Modell Instagram auf die Beziehung von Technologie und Demokratie machen lassen. Ich hypothetisiere, dass es bei Instagram durch das Zusammenspiel von der Wirkmacht der Bilder mit den Bedingungen von Plattformen im digitalen Kapitalismus zu entscheidenden Verschiebungen im Kommunikations- und Interaktionsverhalten von Menschen kommt, die tiefgehende Auswirkungen auf die politische und demokratische Sphäre haben. Instagram ist dabei ein Sinnbild für die profunden Verschiebungen im Machtverhältnis von Technologie und demokratischen Staaten, die eine Aktualisierung von politischen Normen und Demokratietheorien erfordern. Ich nehme einen Vorschlag für eine solche Aktualisierung im letzten Abschnitt der Dissertation vor.

Instagram prägt unser Leben durch eine starke Präsenz von Bildern in Kombination mit ihrer Algorithmus-gestützten Verteilung im Rahmen des digitalen Wirtschaftsmodells der Plattformen. Instagram berührt dabei alle Bereiche menschlicher und gesellschaftlicher Existenz. Politikwissenschaftliche Forschung zu Instagram hat sich, wie erwähnt, bisher verstärkt auf Darstellungsstrategien politischer Akteure auf der Plattform fokussiert. Wenn eine Plattform jedoch ausreichend großen Einfluss hat, um beispielsweise Massenbewegungsmuster im Tourismus hervorzurufen (Hentsch, 2021), lässt dies die Annahme zu, dass es hier um mehr geht, als nur schöne, bunte Bilder.

Meine Arbeit klärt diese Frage durch die Betrachtung von zwei Ebenen: der Ebene der Inhalte auf Instagram und der Ebene von Instagram als Plattform oder Medium. Im Fall von Instagram, wie auch anderen sozialen Netzwerken, ist das eine nicht ohne das andere denkbar: Inhalt und Medium sind miteinander verschränkt. Instagram ist eine Plattform zum Teilen und Ansehen von Bildern und visuellen Materialien. Gleichzeitig sind dieses Teilen und Konsumieren stark von den Mechanismen komplexer Algorithmen, kognitivem Hacking und dem Weltbild von Technologiekonzernen geprägt. Instagram ist gleichzeitig eine Technologie, ein Medium, sowie ein durchlaufender, scrollbarer Dauer-Bildakt².

Als genuine Foto-App genießt Instagram ein Alleinstellungsmerkmal unter den Social-Media-Plattformen. Hier kommt die Wirkung von Bildern, insbesondere Fotografien, auf andere Weise

² Bildakt im Sinne von Bredekamp (2021)

im Feed zum Tragen als in sozialen Netzwerken, die eine Kombination aus Text und Bildern (z.B. Facebook) bzw. primär Text (z.B. Twitter) favorisieren. Instagram wurde als Fotografie-App konzipiert, was sich im UI-Design und den Nutzungsmöglichkeiten zeigt³. Die Macht der Bilder auch im Sinne des Bildakts entfaltet hier ihre volle Wirkung. Durch dauerhaftes Scrollen durch Bildwelten über Jahre hinweg entstehen Weltbilder, insbesondere durch die mediatisierende Einflussnahme von Algorithmen. Wer wann welche Bilder sieht, bestimmt seit Mitte der 2010er-Jahre nicht mehr die chronologische Reihenfolge der Bilder im Feed sondern der Algorithmus von Instagram. Dieses Prinzip algorithmischer Kuratierung von Inhalten ist allen großen Social-Media-Plattformen gemein.

Eine Analyse der Bildinhalte von Instagram mittels Theorisierungen von Bildern, Fotografie und visueller Kultur ist allein schon aussagekräftig, nachdem sich attestieren lässt, dass durch die Kultur sozialer Medien eine Verschiebung von der Logik der Repräsentation zur Präsentation stattgefunden hat (Marshall, 2020). Dies ist insbesondere bedeutsam, da Repräsentation die Grundlage existierender politischer, kultureller und ökonomischer Systeme ist (ebd.). Fotografie auf Instagram ist hier ein Vehikel zur Kommodifizierung des Selbst durch Self-Branding in der Attention Economy. Fotografie erfüllt hier zwar weiterhin einige ihrer prä-digitalen Funktionen wie z.B. der Erinnerung, allerdings kommt es zu einer Unterwanderung fotografischer Praktiken durch die marktorientierte Logik des Selbst als Profil auf der Plattform. Fotografie wird hier zum Werkzeug zur Sammlung von sozialem und kulturellem Kapital mit wachsenden Followerzahlen, was schließlich auch zu ökonomischem Kapital durch Werbung, Produktplatzierung und eigenen Unternehmungen von Nutzern mit großen Publikum führt. Instagram demokratisiert einerseits das Konzept von Celebrity, nachdem jeder Nutzer theoretisch die Aufmerksamkeit der digitalen Öffentlichkeit durch geschickte Nutzung von Fotografie und Bildinhalten (später auch Videos) auf sich ziehen kann, andererseits findet hier eine Kommodifizierung von kommunikativen Interaktionen statt. Letztlich führen Fotografie und Self-Branding zur Entstehung dessen was Reckwitz (2020) Singularitäten nennt, soziale Atomisierung und Vereinzelung die über soziale Netzwerke hinaus in unsere Lebenswelten eintritt. Die Macht der Bilder, auch durch Bildakte, wirkt hier wie ein Katalysator.

Hinzu kommt der Erklärungsgehalt des zweiten Teils der Arbeit, der Instagram als Medium erforscht. Wie der Algorithmus agiert, wie Instagram aussieht und funktioniert, wird letztlich

³ Im vergangenen Jahr, 2022, hat Instagram deutliche Veränderungen im Bereich seiner Content-Architektur vorgenommen und priorisiert nun Videos stärker – auch im Kampf um Marktanteile gegen den Konkurrenten TikTok, eine Video-App. Meine Betrachtung von Instagram fokussiert sich vor allem auf die Epoche, in der Bilder und Bildmaterialien der Schwerpunkt des Angebots von Instagram waren, auch um den Fokus dieser breit und interdisziplinär aufgestellten Arbeit zu wahren. Theorien zu Video und Film würden den Rahmen dieser Dissertation überdehnen. Gleichzeitig besteht hierin kein Widerspruch zum Erkenntnisinteresse, was an Instagram über politische Inhalte hinaus politisch ist und ob und welche Auswirkungen digitale Technologien auf die Demokratie haben.

durch das Geschäftsmodell und die Philosophie hinter Technologie-Produkten bestimmt. Instagram ist ein menschengemachtes Artefakt und als solches sind die Entstehungs- und Wirkungsbedingungen der Plattform von Bedeutung. Was wir unter welchen Bedingungen in unseren Feeds sehen, wirkt sich auf die Demokratie aus; denn durch den Algorithmus als Mediator hat das im Feed geformte Weltbild aus Bildakten Konsequenzen sowohl für den öffentlichen Raum als auch für die politische Kommunikation und mentale Autonomie von Nutzern sozialer Medien. Es ist das Gegenteil dessen, was wir für funktionierende Demokratien brauchen.

Gängige politikwissenschaftliche Erklärungsansätze, wie zum Beispiel, dass soziale Medien eine neue Form der Habermas'schen Öffentlichkeit oder eine Erweiterung der Kritik in Horkheimer und Adornos Kulturindustrie sind, greifen hier zu kurz. Zwar ist die Kulturindustrie ein hinreichender Ansatz, um visuellen Kulturen und der Nutzung von Fotografie auf Instagram gerecht zu werden, doch ist hier auch Habermas' Theorie von essenzieller Bedeutung, um die Verschiebungen in der öffentlichen Sphäre und Kommunikation durch Instagram zu erklären. Gleichzeitig finden hier tiefergreifende Verschiebungen durch digitale kognitive Manipulation und algorithmische Eingriffe in die mentale Autonomie von Nutzern statt, denen beide Theorien nur in Teilen gerecht werden. Vielmehr handelt es sich hierbei um ein anti-aufklärerisches Projekt, das grundlegende Prinzipien der Demokratie unterhöhlt. Die skizzierten Wirkungsweisen finden sich auch in anderen Plattformen und Technologieprodukten wieder und lassen den Schluss zu, dass die derzeitigen Bedingungen von Technologie und technologischer Produktion demokratischen Prinzipien und Demokratie diametral gegenüberstehen. Es findet eine Verschiebung von Macht- und Vermögensverhältnissen in der digitalen Landschaft statt, die neo-feudale Züge trägt (Dean, 2020b; Jensen, 2020a; Varoufakis, 2022a).

Meine Intention ist, mit dieser Arbeit einen entscheidenden Beitrag zum Verständnis von digitaler Technologie mit ihren Auswirkungen auf menschliches Zusammenleben und Demokratie zu leisten. Nichts davon ist so trivial, wie es noch vor einigen Jahren schien, als der Siegeszug von Selfies, Influencern und ubiquitären Fotos von Cappuccinos auf Holztischen begann. Die Frage des Umgangs mit der digitalen Technologie ist eine - wenn nicht die entscheidende Frage - für die Menschheit.

Wir stehen am Übergang zu einer neuen technologischen Ära: Web 3.0, künstliche Intelligenz und Software wie ChatGPT bringen grundlegende Veränderungen unserer digitalen Lebenswelt mit sich, die alle Sphären vom Individuum bis hin zum Nationalstaat betreffen. Die Politikwissenschaft hat bisher zu wenige Antworten zum Verhältnis von digitalen Technologien

und Demokratie. Debattenbeiträge hierzu kommen vor allem aus den Medien- und Kulturwissenschaften.

Dieses Dissertationsprojekt schließt Forschungslücken und eröffnet neue Forschungsfelder auf zwei Ebenen: Zum einen bietet es einen ganzheitlichen Blick auf das Phänomen Instagram über die Silo-Perspektiven politischer Akteure auf Instagram hinaus, zum anderen leistet es einen entscheidenden Beitrag zur Eröffnung des Debattenraums zu Technologie in der Politikwissenschaft. Insbesondere politische Theorie und ihre qualitativen Ansätze bieten hier einen komplementären Rahmen zur quantifizierenden Tendenz im Fachbereich. Instagram und digitale Technologien werfen nicht nur Fragen zu ihrer Funktionsweise auf, welche sich wunderbar über quantitative Ansätze erforschen lässt - unsere Aufmerksamkeit wird auch zurück zur Metaebene gelenkt, die notwendiger ist denn je.

Inhaltsverzeichnis

1. Democracy in the Age of “Pics or it Didn’t Happen”	10
2. The State of Research on Instagram, Social Media, and Politics	18
2.1. The Internet and Democracy	21
2.2. Social Media and Politics	33
2.3. Instagram and Politics	42
3. Images on Instagram: From Representation to Presentation	54
3.1. The Power of the Image	57
3.1.1. What Is an Image?.....	60
3.1.2. The Relationship Between the Observer and Creator	70
3.1.3. Seeing on the Internet: From Gazing to Glancing in the Digital Age.....	76
3.1.4. The Image Act: On the Agency of Images	83
3.2. Politics and Photography.....	88
3.2.1. Photography: The Mechanical Eye.....	90
3.2.2. Photography and Politics	108
3.3. Visual Culture in the Present	123
3.3.1. Visual Cultures on Instagram: On Selfies, Overtourism, and Remembrance	125
3.3.2. Self-Branding, Celebrity, and the Presentational Turn	135
3.4. The Political Meaning of Images on Instagram.....	142
4. Instagram as a Medium: The Logic of the Platform.....	146
4.1. Genesis and Conditions of Digital Business Models.....	149
4.1.1. From Counterculture to Technocracy: The Evolution of Silicon Valley.....	150
4.1.2. Venture Capital: The Role of Finance in the Creation of Tech Companies	156
4.2. Platform Capitalism.....	159
4.2.1. Platforms: Key Players in the Digital Economy	160
4.2.2. The Effects of Platforms	166
4.3. The Digital Dilemma: Algorithms, Persuasive Technology, and Surveillance Capitalism	173
4.3.1. Algorithms: The Invisible Hand	174
4.3.2. Pandora’s Box: Persuasive Technologies	182
4.3.3. Surveillance Capitalism	192
4.4. Instagram as a Medium: The Political Meaning of the Platform	197

5. Instagram and Political Theories	202
5.1. Instagram and the Culture Industry	204
5.2. Instagram and the Public Sphere	217
6. The Anti-Enlightenment and Neo-Feudal System of Technology.....	229
6.1. Mental Autonomy, Algorithms, and Neurorights	234
6.2. Technofeudalism: The Neo-Medieval Turn of the Internet.....	244
7. Democratic Principles for Technology	251
7.1. The Temporalities of Democracy and Technology.....	254
7.2. Democratic Principles for Technology.....	256
8. Instagram’s Lessons on the Relationship of Technology and Democracy.....	276
9. Conclusion: Technology and Democracy at the Dawn of a New Era.....	282
10. Acknowledgements	286
11. Literature	287

1. Democracy in the Age of “Pics or it Didn’t Happen”

To be alive in the present is to take photos. Nearly 200 years after the invention of photography (Grundberg, 2023), cameras are mobile and ubiquitous. Every smartphone comes with the ability to create images – at ever-increasing levels of technological quality. Nary a meal, outing with friends and family, or vacation goes without the requisite documentation of real life on a phone and Instagram. The modus operandi of the present is: “Pics or it didn’t happen!”. Human existence in the present is mediated by image-taking practices⁴. How and when we take or make photos has changed significantly since the advent of digital photography and especially since we began to share photographs online.

With two billion users, Instagram is the fourth largest social media network in the world (Statista, 2023). It is also the only one exclusively dedicated to and optimized for images⁵. Co-founders Kevin Systrom and Mike Krieger released Instagram in 2010 with a feature that hooked users: it made photos you captured through your phone more beautiful (Frier, 2020). In the still early days of smartphone photography this was an important selling point: finally, you could make your smartphone photos look decent, even great. Among the other social media platforms at the time, Instagram stood out. Whereas Twitter was for sharing your thoughts and opinions with the world, YouTube for watching an endless sea of videos and Facebook for staying in touch with high school classmates (even the ones you did not like), Instagram was fun, engaging, and simple: Take a photo, edit it with a filter, and share it with the world with a witty caption – all in an instant. Instagram was a sea change in smartphone and online photography. Not only did it make pictures appear more appealing, beautiful, and satisfying for its users, but it also enabled instant sharing of your best shots with the world. Through sharing photos and following other accounts, you could gain a window into the life of another person – famous or not – all while scrolling through a feed of beautiful square images.

With its filter functions, Instagram offered a highly curated version of reality. What was appealing in the beginning – improved aesthetics for online and smartphone photography – over time turned into a nuisance and liability. As Instagram became more professionalized, the pressure to perform and share perfect images began to grow. With this highly visual and aestheticized platform, commercial usage rose, as well. Paid partnerships and product

⁴ And increasingly video, as well.

⁵ One might argue that the scope of Instagram has changed since the company began pushing video content in a bid to compete with its rival TikTok. However, for the longest time in its existence, Instagram was and continues to be an app for sharing photographs, images, and visual material.

placements on popular accounts created an entirely new profession: the Instagram influencer⁶. Paid by companies and brands for access to their loyal followings, influencers tread a fine line between the aspirational and authentic, personhood and brand, and privacy and publicity. Instagram gave way to a new breed of entrepreneurs: those who were able to leverage their work or brand through photography could find success on the platform, as evidenced by influencer careers, Instagram fashion brands, and countless creatives who built their careers through the visual platform. Instagram’s rise to popularity in the first half of the 2010s coincided with the age of the “Girlboss” (Amoruso, 2014) and charted the path for the entrepreneurial ambitions of (millennial) women. It made business seem easy, less stuffy than traditional role models in the field, and more accessible than ever before: all an Instagram user had to do was build a following and then create a product or service to sell. Entry barriers to markets based on business or marketing expertise seemingly evaporated overnight – with many advantages and challenges in the process. For politicians, on the other hand, Instagram was the perfect tool to project a more personal image and allow followers and voters a glimpse into their everyday lives. Photography has always been a great tool for political iconography: savvy politicians used Instagram’s visual potential early on, increasingly blurring the lines between the iconography of politics, influencers, and celebrity.

As Instagram’s popularity began to rise, it caught the eye of other social media companies. In 2012, Facebook acquired Instagram for a record-setting \$1 billion (Ghaffary & Heath, 2022). In 2012, the acquisition of a company this young for a sum this high was primarily an unusual, if not unprecedented, business decision. However, together with Facebook’s subsequent acquisition of WhatsApp, this acquisition would later on raise many questions on the company’s monopolistic power in the social media market.

As Instagram grew and the social media landscape began to evolve, cracks in its aesthetically pleasing surface began to show. Instagram’s perfect worlds had a negative effect on mental health and body image in young women (Cohen et al., 2017; Fardouly et al., 2017; Holland & Tiggemann, 2016), stunning nature shots on Instagram led to overcrowding and spoiling of natural sites (Hentsch, 2021; Moczek et al., 2020; Šmelhausová et al., 2022, p. 1), and Instagram contributed to overtourism (Dodds & Butler, 2019, p. 14), among other effects. In 2016, the Cambridge Analytica scandal shook up the public perception of social media, especially Instagram’s parent company, Facebook. The US tech company has repeatedly come under public scrutiny in the past years. Leaks by a whistleblower in 2021 illuminated

⁶ Marketers have been using the term influencer since about 2007 (Nymoen and Schmitt, 2021, p. 8). Instagram’s easy to use interface and visual appeal further accelerated the development and proliferation of this profession.

Facebook’s numerous oversights as well as that the company was well aware of the mental health effects of Instagram on teen girls (WSJ, 2021).

At the outset of this dissertation lies the question of what political theory is to make of a platform like Instagram. Is there anything political about this frivolous-seeming photo platform aside from images with political subject matter?

When I began working on this dissertation in 2015, I intended to engage further with Instagram and photographic material with the aim of formulating a political theorization of photography in the digital age. Little did I know that my professional path while writing this dissertation would intertwine with art, media, technology, and finance over the subsequent years to reveal a different, substantially more urgent analysis of Instagram. Like so many of us, I watched influencers take photos of their meals, line up to pose in front of natural sites or the infamous hot pink wall at the Paul Smith store in Los Angeles (Mau, 2017). Over the years, I observed these changes in public spaces, wondering whether they could be attributed to changing social norms or something more profound altogether.

As time went on and the public began to learn more about the individual, cultural, and political effects of social media companies, my research interest shifted. Instagram began to show itself as a multi-layered, complex product of technological imagination, social and cultural practices, and financial and economic motifs. I spent ten months in a venture capital fellowship program where my co-fellows and I were taught startup investing by seasoned venture capitalists. My participation in this program was a catalyst for my changing focus on Instagram. With everything I had learnt and seen on startup investing and financing of the tech of tomorrow, it became evident that the social media platform itself was a worthy subject of inquiry for political theory beyond images with political subject matter.

Instagram is a product of the long 2010s, a cultural and socio-political era that was bookended by the financial crisis in 2008 and the pandemic between 2020-2022. One cannot think of Instagram without considering the impact the 2008 financial crisis had on financial markets and society. Financial factors have contributed to making Instagram the way it is today, as much as the pore-free, filtered aesthetic of Instagram face. Equally, the rapid advance of digitalization during the COVID-19 pandemic marked the end of this era that catapulted our lives online and digitalized them in more profound ways than the previous decade.

Instagram operates at the intersection of a complex interplay of economic, financial, cultural, and visual factors. Among social media platforms, it stands out because of the impact of its visual material. Anecdotally, the trend in plastic surgery to align one’s face with the aesthetics

of Instagram filters is called Instagram face (S. Smith, 2021; Tolentino, 2019) – not Facebook, YouTube, or Twitter face, reflecting the power of images in a quotidian realm. Yet, there is more to consider, since the carefully curated and filtered images on Instagram are distributed by an algorithm that primarily serves the business objectives of Instagram and its parent company, Meta (formerly Facebook).

These tentative explorations on Instagram indicate that there is much to uncover when analyzing the platform. Instagram's many layers make it a fascinating subject for research – and a challenging one. Occupying several perspectives, Instagram can be analyzed from an economic, financial, cultural, iconographic, political, sociological, and media perspective - just to name a few. Yet, what exactly is Instagram when it is all that?

The current state of research on Instagram reflects the conceptual and epistemic challenges of its multivariate nature. Painting in broad strokes, research on Instagram follows the following categories: 1) political science and communication research on how political figures use Instagram (Kissas, 2022; Larsson, 2017a, 2021; Muñoz & Towner, 2017; Názaro et al., 2019), 2) media and cultural theory research on Instagram use-cases from influencers, age-specific considerations, and digital labor to self-branding and celebrification (Abidin, 2017; Arnesson, 2022; Brooks et al., 2021; Farinosi, 2022; Leaver et al., 2019; Macdowall & Budge, 2022; Manovich, 2017), 3) marketing studies on influencers, brand positioning and attitude, and marketing efficacy in the attention economy (Ahmadi et al., 2022; De Veirman et al., 2017; Kubler, 2023), 4) psychological studies on the impact of Instagram (Foroughi et al., 2022; Lee et al., 2022), and 5) Instagram as part of broader social media studies (Bengtsson & Johansson, 2022; Gil de Zúñiga et al., 2017; Mitchelstein et al., 2021).

Despite its size as the world's fourth largest social media platform, Instagram gets less scholarly attention in political science than Twitter and Facebook (Boulianne & Larsson, 2023, p. 120). Despite all the attention on political usage and effects of Instagram, there is, as of yet, no comprehensive study in political science on the platform. At present and as a reflection of the econometric turn of the discipline, a significant portion of political science research engages in interpretation of singular practices or usage of Instagram (and social media, for that matter), while deprioritizing broader theorizations. Qualitative work and especially perspectives of political theory can serve the discipline by engaging in broader, more comprehensive approaches that review and expand on the existing theoretical corpus.

This dissertation examines Instagram from an interdisciplinary point of view to explore the political nature of Instagram including and beyond political subject matter. This thesis is built

on the position that firstly, Instagram is relevant for political science research beyond political content. There is more to Instagram that is relevant for political theory other than campaign photos, for example. Furthermore, this thesis explores the relationship of technology and democracy with Instagram as an epistemic conduit. I hypothesize that Instagram presents a significant change in human communication and interactions with deep effects on the political sphere and democracy due to the interplay of the affective power of images with the conditions of platforms in digital capitalism. Instagram is a manifestation of the profound changes in the power architecture between technology and democratic states that require an update of political norms and democratic theories.

In this thesis, I formulate a proposal for the renewal of democracy’s relationship with technology. To do so, I follow the subsequent path of inquiry: Instagram shapes our life through a strong presence of images together with their algorithmic distribution within the framework of the digital business models of platform companies. Instagram touches on many different areas of human and social existence. Political science research on Instagram has focused on presentational strategies of political actors on the platform (Larsson, 2021; Muñoz & Towner, 2017; Názaro et al., 2019; Peng, 2021; Quevedo-Redondo & Portalés-Oliva, 2017; Selva-Ruiz & Caro-Castaño, 2017). Yet, if a platform has enough influence to, for example, motivate patterns of mass movement in tourism (Dodds & Butler, 2019; Hentsch, 2021), this allows for the assumption that there is more to Instagram than pretty pictures.

My thesis explores the question of Instagram’s political nature on two levels: the contents posted on Instagram, as well as Instagram as a medium or platform. In the case of Instagram, as well as all other social media networks, these two levels are intertwined. One cannot conceptualize one without the other; the content and its medium for dissemination are linked. Instagram is a platform to share and look at photographs and other visual material. At the same time, the processes of sharing and consuming images on a scrollable feed or in Instagram Stories are shaped by the mechanisms of complex algorithms, cognitive hacking, and the worldview of technologists in Silicon Valley. Instagram is a technology, a medium, and a scrollable, constant image act (Bredekamp, 2021) – all at the same time.

As a genuine photo app, Instagram stands out among the existing pantheon of social media platforms. On Instagram, the effect of images (photographs, diagrams, etc.) becomes evident in a different manner than on other social media platforms that favor a combination of texts and images (for example Facebook) or focus on text primarily (for example Twitter). Instagram was created as a photo sharing app, which is reflected in its technological affordances and UI

design⁷. The power of the image in the sense of Bredekamp’s (2021) image act can fully unfold on Instagram. Scrolling through digitally mediated pictorial worlds over the course of years creates changing world views, especially through algorithmic distribution of images, where users do not choose what to see anymore, but the algorithm frequently selects it for them. Since 2016, these algorithms have been deciding who sees which photos and when on Instagram (Hunt, 2016) in a switch the company made from a chronological feed that shows all posts of accounts a user follows in order of publication on the platform. Today, all big social media platforms distribute content in algorithmically curated feeds.

Analyzing image contents on Instagram holds explanatory power by itself, because the culture of social media has created a shift in the logic of a representational to a presentational media and cultural regime (Marshall, 2020, p. 95). In the present, images on Instagram are used in the context of personal branding and the bid to attract attention in what is called the attention economy. Celebrity is an important driving force in this, reflected for example in the role of the influencer, a type of new digital celebrity. The new fame apparatus online is producing a different manifestation of power and influence catering to fame (*ibid.*). This is meaningful, because representation has been at the heart of our existing political, cultural, and economic systems for centuries. Understanding images and pictorial use cultures on Instagram is a key steppingstone in the analysis this dissertation presents.

Yet, this study on Instagram reaches its full conceptual power through its second section that explores the conditions of Instagram as a medium. How the algorithm works and what the app looks like are determined by the business model and philosophy behind technological products like Instagram. Instagram is a human-made artefact and as such the conditions of its creation and functions are meaningful factors in this analysis. What we see in our feeds and under which conditions influences democracy: the algorithm shapes our worldview through a sequence of image acts in the feed, that in turn affect the public sphere, political communication, and the mental autonomy of users of social media. It is the opposite of what is required for functioning democracies.

Existing political science theorizations of the above, for example that social media are a new form of Habermas’ (1991) public sphere or an extension of the criticism in Horkheimer and

⁷In 2022, Instagram made profound changes to its content architecture and shifted its focus to prioritizing video in a bid to secure market shares against its main competitor TikTok. The company backtracked somewhat toward the end of the year to create more balance between video and photo content (Welch, 2023). My analysis of Instagram focuses on photos and other image material. I forgo an analysis of video material on Instagram to maintain a conceptual focus in this dissertation that is already quite broad. I do not see an inherent contradiction to the epistemic interest of this thesis on the effects of digital technologies on democracy, when choosing to omit video.

Adorno's (2006) *Culture Industry*, only suffice as partial explanations. Due to digital cognitive manipulation and algorithmic interference with the mental autonomy of users, Instagram as a medium or platform is an anti-enlightenment project that undermines foundational principles of democracy. These tendencies do not just apply to Instagram but are also found in other platforms and technology products, giving way to the conclusion that current conditions of technology and technological production are diametrically opposed to democracy and democratic principles. Furthermore, the concepts of surveillance capitalism (Zuboff, 2019a) and technofeudalism (Dean, 2020b; Harris, 2022; Varoufakis, 2022a) suggest that deeper, more meaningful changes are underway. They theorize that the internet and digital ecosystems are moving to an economic environment of cascading hierarchies of dependencies in the closed market system of platforms that are built on data-harvesting and commercial surveillance practices.

Following the proposed argument above, this dissertation will unfold as follows: Chapter 2 highlights existing research on the relationship of the internet, social media, and Instagram with democracy to contextualize this project. Chapter 3 explores the role of images on Instagram following Marshall's (2020) proposal of the presentational turn and Reckwitz' (2020) concept of singularities in the digital age. In doing so, I first explore theories of the image to determine the role of images in culture and thus the special position of Instagram in the social media universe. I then go on to sketch political functions of photography in the past and present to contextualize political usages of photography on Instagram. Lastly, I describe larger cultural, image-mediated shifts in personal branding, celebrification, and societies that are evident in Instagram and hinge on the power of images discussed earlier in the chapter. This concludes the study of the contents on Instagram.

Chapter 4 homes in on Instagram as a medium and platform, exploring the genesis of tech products in Silicon Valley culture, the effect of platforms and platform capitalism, and how algorithms and persuasive technology shape user interactions on and with digital platforms within the economic operating principle of surveillance capitalism. Here, I take a more abstract look at technology and the conditions of its production to be able to arrive at meta-level insights into the relationship of technology and democracy. All phenomena debated in chapter 4 relate to Instagram, as Instagram is deeply embedded in the functional logic of the current technology industry. In chapter 5, I contextualize and evaluate the findings from previous chapters with democratic theories on the public sphere (Habermas, 1991) and culture industry (Horkheimer & Adorno, 2006). I arrive at the conclusion that these theories can offer partial explanations on the effect of technology on democracy, yet do not sufficiently account for the more profound societal changes catalyzed through incumbent digital technologies. In chapter 6, I explore the

anti-enlightenment element of current technologies that undermine the well-being of democracies. I first investigate the role of mental autonomy and how it is affected by algorithmic recommendation systems and further explicate the technofeudal proposal that detects a profoundly anti-democratic and anti-enlightenment momentum in the underlying structure of current technologies. Drawing on these learnings, I formulate five democratic principles for technology in chapter 7. They are ex-ante conditions for the creation of technology to align with democracy and its conceptual requirements. I hypothesize that present developments in technology, as well as emerging future tendencies, such as AI, require a change in the relationship of technology and democracy that far exceeds regulatory approaches. Regulation can be a helpful policy tool. However, the key challenge of regulation is that it is an ex-post concern. With rapid changes in technology on the horizon through AI and neurotechnologies, protecting the health of democracies requires a proactive theoretical framework that works as a set of meta norms from which regulatory approaches can be derived, where necessary. These principles can be thought of like axioms; they are universal and foundational, can be combined and stand on their own. In evaluating technology, they form baseline criteria upon which regulatory approaches and market interventions can be based. Chapters 8 and 9 conclude this thesis with a summary of my findings and a proposal for civic reinvigoration to imagine a positive relationship of technology and democracy. Furthermore, I conducted interviews with domain experts in technology, political photography on Instagram, photography and its cultural role, and the effects of Instagram on nature and remembrance.

In this dissertation, I have decided to move my research focus away from misinformation and instead focus on the conditions that create flows of information on digital platforms. I view misinformation as a consequence of the present conditions of information distribution of tech companies. To resolve it, I propose to look further upstream and formulate norms for the relationship of technology and democracy that lower the threat of the spread of misinformation by balancing the relationship of technology and democracy.

Furthermore, I also intend to capture the present Janus-faced moment of technological evolution in the post-pandemic world. On the precipice of the AI revolution, this dissertation provides a look back to look forward. My intention in these pages is to foster further understanding on the technological conditions of the present, so we may learn from our past mistakes and create a more supportive, democracy-aligned vision of technology for the future.

2. The State of Research on Instagram, Social Media, and Politics

20 years after the introduction of social media to the public and about 30 years since the broad dissemination of internet technologies, academics, critics, and media alike are grappling with the meaning of these paradigm-changing technologies. There is a life before and after the internet and social media. However, what they have meant for us and how they have affected us in the long term is the subject of much ongoing scholarly exploration. At the time of writing this dissertation in 2022 and early 2023, internet technology and social media have reached a point of maturity and wide dissemination that they invite a retrospective – within the discipline as well as with an eye on the technological developments that have occurred since.

At the heart of current political science research on social media lies the question of whether and how social media affects the political process. Do existing theoretical constructs suffice to anchor the effect of social media within the theoretical corpus of the field? What is the evolving relationship between technology and politics like? What are adequate methods to study these new platforms and media through the lens of political science? There seem to be more questions than answers at present. In a way, this process seems typical for the advent of a new life- and generation-changing technology. Before any type of networked and structural knowledge can arise, scholars navigate a chaotic unknown. Fortunately, the days of chaos in social media research are somewhat behind us. Yet, clarity on even foundational matters remains to be found. Alternatively, maybe the objective of research into an ever-changing and rapidly evolving field is not clarity, but momentary insights. This is a fundamental challenge of doing research on social media and technology: the field is advancing so fast that scholarly attention to it is always a little behind.

For example: Ever since Eli Pariser (2011) introduced the concept of filter bubbles to the scholarly and public discourse on the internet, there has been a contentious, ongoing debate on whether filter bubbles⁸ exist or not. Filter bubbles or echo chambers on social media – and online, in general – are “a metaphor for technology that only serves us information that is consistent with what we already know and feel about our world” (Davies, 2018, p. 637). This filtering and aggregation of information can lead to the creation of echo chambers where we only see what we already know and like. This is thought to eventually contribute to political fragmentation. Dahlgren (2021, p. 16) argues that filter bubbles may exist at an individual level, yet that it is a large leap still to apply the concept of filter bubbles at a societal level as Pariser

⁸ Filter bubbles and echo chambers are often used interchangeably in the literature, as do I in this dissertation.

(2011) imagined. Bruns (2019, p. 1) points out that there is little evidence for the existence of echo chambers and attributes the prominence of the idea to a discursive reality of its own that was created through the use of the term in political debates and in the media. Zuiderveen Borgesius et al. (2016, p. 1) find little evidence in support of the theory of the filter bubble and no reason for concern about their existence. Amusingly, Terren and Borge-Bravo's (2021, p. 99) meta study of 55 studies on the existence of echo chambers on social media comes to the conclusion that whether evidence for filter bubbles can be found, depends on the methods used to investigate them – pointing to the risk of biases in methodology and the adequate choice thereof. Whether one wants to find filter bubbles or not then depends on the bias inherent to studying the phenomenon – that is, the bias in the scholar's mind. Then again, the overwhelming number of studies on this subject concludes that it depends: on the network or platform, social influences, political party, or the methodology applied to describe filter bubbles, among other things (Berman & Katona, 2020; Boulianne et al., 2020; Cinelli et al., 2021; Dubois & Blank, 2018; Dubois et al., 2020; Geiß et al., 2021). It is curious to see how this concept is so widely used, yet so contested.

Intuitively, this also reflects the overarching current of positions on technology from alarmism to negotiating, downplaying, and embracing as well as supporting technological developments. While differing positions are great and necessary for any type of discourse, the question of technology is so pervasive in modern society that the fault lines of danger-benefit (technology is useful or dangerous), determinism-social construction (technology follows its own logic or it is a social construct), and luddite-technologist (we should distance ourselves from technology or embrace it) seemingly cannot be extracted from debate or scholarly research.

What further complicates any research on social media is that it is a multi-layered and complex issue. As stated in the introduction, I am a proponent of interdisciplinary research – especially with a research subject as multifaceted as a social media platform. Political science alone cannot provide for effective, thorough theorization of social media. This is best achieved in conjunction with other disciplines. As an example: to understand the effect of an algorithmically curated media environment, an understanding of the neurological component of dopamine pathways is essential to achieve an informed understanding of the functionality of social media. If the business models of tech companies exploit dopamine pathways in the brain to foster more permanent and longer engagement (Gripenstraw, 2022), it is illusory to believe that studies on misinformation will resolve the challenge of how we can maintain pathways for political communication in democratic societies and keep them filled with sensible information without taking this into account. This is especially the case, as dopamine not only relates to reward but also belief signals in the brain (Nour et al., 2018, p. E10174). Thus, the extent to

which somebody chooses to believe in misinformation, especially in relation to whether it confirms or refutes a belief they already hold, may have to do with dopamine signaling. This is especially important as social media companies tap into dopamine feedback loops to hook users to their apps and habituate their usage (Haynes, 2018). This is only one example of how interdisciplinary perspectives can enrich political science research.

My intention with this dissertation is also to bridge a perceived shortcoming in most political science research on social media, such as Instagram. Current approaches focus on granular issues, for example social media’s role in campaigning (Dimitrova & Matthes, 2018; Klinger & Russmann, 2017) or its impact on polarization (Yarchi et al., 2021). All these studies, of which I only chose three as an example, provide helpful insights and further the understanding of social media in the present age. However, meta-level considerations that weave together all the different layers of meaning of social media in the present are necessary to truly understand its political impact. In the case of Instagram, that means that it is not just a platform for personal branding and visual communication for politicians and parties. Instagram is a relevant subject of inquiry on numerous levels: the content of its images, the functions of the app and site, visual culture practices that reflect meta-level trends, as well as its operational logic as a tech platform. Researching the nuance of the above-mentioned issues matters. So does exploring the bigger picture and looking for hypotheses and an understanding of the many layers of digital technologies’ impact on democracy.

This chapter on (political science) research on Instagram and its environment will move from the general to the granular. First, I will explore the current state of research on internet technology and politics and democracy, followed by an overview of considerations on politics with regards to social media, and finally the state of research on Instagram and politics. Instagram needs to be understood in its overall context of social media and internet communication technology, hence both sections on social media and the internet and how they relate to politics need to be included in this exploration of the state of research on Instagram.

2.1. The Internet and Democracy

Instagram and social media are part of and a result of the revolution in internet and digital technologies. They are also an evolution of the first wave of internet technology that created emails, web browsers, and the internet as we know it. This was Web 1.0. Social media and smartphones are emblematic of Web 2.0, where digital and internet technologies evolved and sparked an unprecedented level of global connectivity and content production. Now, we are on the brink of Web, 3.0 that so far is characterized by decentralized structures and the emergence of artificial intelligence⁹.

When “the internet”¹⁰ first arrived, it sparked great hopes for democracy and the democratization of the world (Miller & Vaccari, 2020, p. 333; Quadri, 2019, p. 144; Turner, 2008, p. 1). At the time, popular and scholarly optimism expressed hope that these technologies would inevitably democratize all levels of society from local organizations to political institutions – and the world itself (Ess, 2018, p. 93). This optimism impacted research on the subject:

“[...] researchers and practitioners alike have asked if the Internet acts as a positive force in the development of democratic systems and ideals. Often, the question has been asked with great expectations for an affirmative answer” (Best & Keegan, 2009, p. 255).

To date, digital media are ascribed potential for democratizing political communication and processes (Kneuer, 2016, p. 666). From the 1990s until the early 2010s, a sense of utopianism prevailed in internet scholarship. That changed with the reckoning of post-2016 at the very latest, shifting research questions toward exploring the threats, rather than the benefits of the internet (Miller & Vaccari, 2020, p. 333). The passage of time since the arrival of the commercial internet offers a chance for a more evolved perspective. After all, it is important to keep in mind that the impacts of technology only “[...] become apparent slowly over many years, and they are often small and unanticipated” (Weare, 2002, p. 659).

⁹ There is also web 5.0, cleverly termed by skipping web 4.0 altogether because of the supposed technological leap it signifies. Web 5.0 is an infrastructure for a decentralized, intelligent internet.

¹⁰ “The internet” to me is a quotidian notion of internet and communication technologies. Different platforms and aspects of technology merge in this term applied to the technologies that have emerged since the 1990s, especially in the sphere of consumers. “The internet” may refer to browsers, email, online platforms and communities, social media, the concept of increased connectivity through digital technology, etc. While it is my task as a researcher to delineate these differences as clearly as possible, it is important to note that that it is not always possible, because the revolutions in digital and internet technology since the 1990s have been intertwined and far-reaching. One merit of this dissertation is to clarify the effect one of the platforms has had on the bigger picture of our relationship with technology.

Two decades ago, at the onset of the proliferation of the internet, Gotlieb (2002, p. 21) considered three different trajectories for internet technology and democracy:

- 1) the internet is the most important instrument for promoting democracy ever created
- 2) the internet will be similar in its effect on democracy to television, as it was already being captured by commercial interests at the time
- 3) the internet is one more addition to newspapers, documentaries, etc. and may enhance democracy under certain conditions, yet one should not place too much hope in it.

A fourth option that is not part of the considerations above is that the internet may harm or destroy democracy. Certainly, this perspective is informed by looking back at the past two decades of internet and social media use in relation to democracy that I can benefit from at the point of writing this dissertation. With the advent of social media, a second wave of democratic optimism on the internet swept through academia and society. The internet and social media in particular appeared like an apt tool to further deliberative democracy¹¹ (Mančić, 2012, p. 168), while hindsight – again! – clarifies that these hopes were not warranted. Social media's relationship with democracy is more complex.

Research on democracy and the internet touches upon several subject areas that I will highlight in the following sections: 1) the internet as a democratizing force, 2) the internet's impact on the public sphere and the actors in it, 3) the internet's possibility to enhance democratic governing.

The Internet as a Democratizing Force

Despite all high hopes for the democratizing potential at the beginning of the internet age, it is still unclear whether the internet or internet technology promote democracy. In a study using panel data on 125 countries over 22 consecutive years (1993-2014), Zang et al. (2019, p. 309) detect an inverted U-shaped relationship between the dissemination of the internet and democratization: at first, as the internet spreads, its role in promoting democracy increases until a turning point marks a path into gradual decline. In other words: the internet can help promote democracy in the beginning, yet it appears that a saturation point is reached after which its democratizing effect diminishes. The authors (*ibid.*) also find that the internet's effect

¹¹ I remember distinctly discussing the potential of social media in enhancing deliberative democracy in an undergraduate seminar on deliberative democracy in the early 2010s. The Arab Spring had just swept through the Middle East, raising hopes for democratization in the region and Barack Obama had won his historic presidential bid with the help of social media a few years prior. There was great optimism and enthusiasm in the *Zeitgeist* at the time that debates on social media and in the comment sections of online publication would enrich the democratic fabric and finally provide a means to disseminate the principles of deliberative democracy to the masses – aided by technology.

on less advanced democracies is more significant than on advanced ones. Pirannejad (2017, p. 281) finds a significantly positive effect of the internet on democracy promotion in a panel of 122 countries for the years between 2000 and 2014. Conversely, Rød and Weidmann (2015, p. 338) find no effect on the internet’s contribution to democracy in the first two decades of its existence.

A study on democracy and the internet in Africa by Evans (2019, p. 169) also finds a U-shaped pattern in their relationship, however with a different outcome: democracy decreases with internet usage, stabilizes, and then increases again. When democracy decreases, internet usage increases until a turning point is reached and the situation inverses. The author of the study (*ibid.*) points out that African governments have frequently imposed restrictions on social media and the internet. This raises the question of which comes first: a crackdown on internet access or a weakening of democracy? Less optimistic theorists point out that the internet can have an effect opposite to democratization and instead be a tool of repression in the hands of autocrats (Rød & Weidmann, 2015, p. 338). Rød and Weidman (*ibid.*) find that autocratic regimes that intend to prevent any independent public sphere are more likely to introduce the internet. Another perspective on the revolutionary capacity of the internet in non-democratic countries draws a two-level perspective: internet technology can help explain why people participate in protests against governments in non-democratic countries, but organizational networks (real-life connections) remain crucial to mobilize protesters (Anderson, 2021, p. 1037).

The internet does not automatically create a chain reaction that leads to more democratization, instead it is a complex, context-dependent process (Bailard, 2014, p. 4). Best and Keegan (2009, p. 255) point out that due to the sheer number of variables that may be involved in this process, it is complicated to determine whether the internet as a technology supports democracy or not. They cite variables such as government regime type, degree of internet diffusion, and the social roles of the internet as factors that may or may not affect democracy. Equally, they point out that defining and measuring these variables is as complex as conceptualizing democracy (*ibid.*). Additionally, internet and digital technologies are constantly evolving as is the technical infrastructure behind them. Describing and approximating their effect on democracy is like hitting a moving target. It can feel like research and any attempts of theorizing the phenomenon are lagging a step behind real-world developments. Research on digital technologies is also challenging because it depends on the availability of data (*ibid.*) and access to programs and software through API integrations, for example. It is one thing to

analyze user data from outside the black box that tech companies present, it is another to get access to the companies’ own data sets through integrations and authorizations¹².

New forms of media beckon the question of the nature of their impact on democracy, the public, and political participation. In the late 1990s, Chaffee and Kanihan (1997, p. 421) found that television news was becoming a major source of political information, rivaling newspapers in some respects. They (*ibid.*) also noted that these different media were serving different needs in the citizenry. New media that the internet creates might exacerbate existing trends in media democracies, which fail to engage citizens sufficiently (Davis, 2010, p. 745). A study on the effect of a social media platform and technology on democracy, then, might reveal more of the same. It is possible that social media – with Instagram among them – continue this trend. Best and Keegan (2009, p. 256) explore how the internet may affect democracy along three spheres: “[...] how the Internet interacts with democratically relevant information and communication flows, as well as with social capital and the public sphere.” All three of these dimensions are present when evaluating social media platforms and Instagram in particular.

Research from preceding epochs of the internet demonstrates that despite all the enthusiasm for the democratic potential of the internet, scholars early on recognized the thrust of the challenges that are evident today. Donath (2001, p. 14) referred to internet and information technologies as techniques for organization and power¹³. These technologies control the flow of information and knowledge – in the present also data; key resources for societies (*ibid.*). Knowledge, information, and data are power. Who controls them has social and political leverage and power. Hence, the democratic potential of the internet also depends on regulatory and commercial questions (Shearer & Maurer, 2002, p. 396). Even at the outset of the internet age, there was a sense of awareness that the internet’s democratic potential would need to coexist with, or even be walled off from, commercial interests. We have come to see this conflict play out at first gradually and now very visibly in the age of social media.

The Internet’s Impact on the Public Sphere and the Actors in it

The key question in democracy and the public sphere in large-scale and – by now – online populations is how to reconcile democracy and deliberation (Fishkin, 1991, p. 1). We are tasked with adapting the democratic idea that originated in Greek city-states to populations with many millions for a modern mega state (*ibid.*). In 1991, when Fishkin published his work on deliberation and democracy, a key challenge was how to bring some of the “[...] favorable

¹² Access to data via API connections, for example, can be extremely helpful in social media research.

¹³ In the German original: „Die modernen Iul-Medien aber sind Organisations- und Machttechniken und leiten gerade hier neue Entwicklungen ein.“ (*ibid.*).

characteristics of small-group, face-to-face democracy to the large-scale nation-state” (ibid.). Fishkin, as well as Habermas (1992/2014) published their works before the revolutions of the internet, smartphones, and social media took hold. When we raise, yet again, the initial question of how we can adapt the ancient idea of democracy to modern life in the age of social media, the conditions for asking this question have fundamentally changed. Now, this question is in two parts: how can we adapt democracy, and will we need boundaries around emergent technologies, to protect its existence, values, and the tangible and intangible goods and services it provides to its citizenry? Dahlgren (2005, p. 147) offers a perspective that aligns with the ambiguities of the internet: while the internet may contribute to the destabilization of democracy, destabilization can also entail a positive momentum in dispersing older patterns that might have outlived their usefulness.

At the outset of the internet age, there were great hopes for its participatory potential, similar to the enthusiasm for the democratizing potential of the internet, overall. Enthusiasm for technology’s potential for participation continued with the development of social media:

“Early conceptions of digital democracy as a virtual public sphere or civic commons have been replaced by a new technological optimism for democratic renewal based upon the open and collaborative networking characteristics of social media” (Loader & Mercea, 2011, p. 757).

Digital technologies have yet to realize their potential for deliberative transformation (Gastil & Davies, 2020, p. 1). Technologies have become more powerful. However, they have been used for undemocratic purposes or in ways that do not add meaningfully to democratic discourse:

“The undemocratic exploitation of massive social media systems continued this trend, but it only worsened an existing problem of modern democracies, which were already struggling to develop deliberative infrastructure independent of digital technologies” (ibid.).

In line with this, DiMaggio et al. (2001, p. 307) found that the internet tends to complement instead of displace existing media and patterns of behavior.

Dahlgren (2005, p. 148 f.) conceptualizes three dimensions of the public sphere that are a helpful frame of reference to better understand the impact internet technology has on it: structures, representation, and interaction. The internet affects the structural dimension of the public sphere through its technical changes, for example through changes in how traditional media companies finance themselves in an age of declining subscriptions and pressure to generate ad revenue (ibid.). It affects the representational dimension of the public sphere because its technologies change dimensions such as output, agenda setting, and pluralism of views (ibid.). And lastly, the interactional dimension relates to how citizens interact with the

media and amongst each other (ibid.). As a practical example: changes in internet technology have created the structural prerequisites for blogging (structural dimension). On a blog, a person may voice their political opinion and add to the pluralism of available views online (representational dimension). Readers of the blog can then interact with it by reading or commenting on it (interactional dimension). On a positive note, changes in these dimensions can add to a broadening of the public sphere, giving voice to people previously unheard, and act as catalysts for activism. On a less positive note, the sprawling media landscape online may create a cacophony of voices that is increasingly challenging to navigate for an individual, while economic incentives and the fight for attention in a crowded media landscape may affect the ethical imperatives and quality standards of journalistic work. This challenges the efficacy of the key purpose of the public sphere: to connect rational actors with an epistemic interest on a certain issue. Speaking in the public sphere is not enough, you also need to be heard and enter into an interaction to fulfil the purpose of the public sphere. Getting heard might become harder and harder in an age of ubiquitous outward communication.

The democratic potential of the internet does not emerge of its own accord – it is upon citizens to engage with and shape it (Joint, 2005, p. 80). Internet access alone does not increase political interest, efficacy, or knowledge (Shandler et al., 2019, p. 620). A meta-study by Boulianne (2009, p. 193) demonstrated that the internet does not have a negative impact on civic and political engagement, however it also does not demonstrate any substantial positive momentum. Early attempts to test the democratic potential of the internet demonstrated that adoption and intentional involvement of citizens is key for debates to take place and – as we have come to see since the early 2000s – produce any meaningful outcomes (Ranerup, 1998, p. 55). While internet access alone is no guarantee for political interest, internet deprivation has a negative effect on participation in political expression and association (Shandler et al., 2019, p. 627). Not having access to the internet hampers a citizen’s ability for political participation, however they are not impacted in acquiring political information due to a still-existent analog media and governance landscape (ibid.).

It is also important to note that the democratic potential of the internet does not just lie in reshaping the relationship of a government and its electorate (Joint, 2005, p. 80). The potential or threat of the internet for democracy also involves the relationships of citizens amongst each other, as the public sphere is interactional. In order to harness the political power of the internet that may enhance democracy, one also needs to know how to use it and the tools it provides (Donath, 2001, p. 14).

The internet can be a useful tool for lodging democratic challenges through three features:

“(a) it provides a free space for challengers to form oppositional points of view away from dominant groups; (b) it allows individuals to participate anonymously and, thus, buffers challengers from the high costs of activism; and (c) it moves challenges from the virtual to the real world by engaging citizens in intermediary forms of activism.” (Rohlinger & Brown, 2009, p. 133)

Thus, the internet can aid in the development of a significant impetus in refining political opinions and agenda-setting between the online and real world. A decade after these findings, these dynamics can still be observed, even though agenda-setting in a cluttered online world and anonymization of communication can, but do not need to, come with challenges of their own: fragmented discourses and cyber-trolling.

In that vein, internet technologies raised great hopes for activism – especially that marginalized people could make their voices heard online (Pierri, 2022, p. 1). In reality, this is more nuanced than the initial enthusiasm may have suggested. In her study, Pierri (ibid., p. 1) found that while the internet and social media may be a great tool for activism, it is not guaranteed that marginalized voices will be heard more in the internet age. Online activism reflects the material conditions of the offline world; in short: one still must be able to afford spending time, energy, and resources on civic engagement (ibid.). Online tools may lower the threshold to expressing political opinions in the digital public sphere. Whether they are heard and received is a wholly different matter.

The Internet’s Potential to Enhance Democratic Governing

Internet technologies affect how people interact in the public sphere as well as on the dissemination of democracy – or lack thereof. Internet technologies can also be used in democratic governing and to enhance the procedural nature of democracy. Digital processes and online tools not only hold the potential to transform deliberation in the public sphere but can also change how we vote or interact with governments. While e-government or e-voting are still in their infancy, any developments in this direction will raise questions on equal access, transparency, the safety of data storage, as well as the legality of elections¹⁴. Political, technical, and security concerns still prevail in the field of e-voting (Pendarovski et al., 2015, p. 133).

Digital processes can enhance democracy and democratic governing (Kneuer, 2016, p. 666). This is especially the case for democratic responsiveness and boosting the belief that

¹⁴ If a voter casts a digital vote outside of the traditional structures of voting locales, how can we verify the identity of a voter as well as their vote being free, secret, and personal?

government is effective (West, 2004, p. 15). Effective delivery of services in a democracy, especially in relation to everyday life, can demonstrate a government’s effectiveness. Aided by digital technologies, this can contribute to building trust in institutions.

As technologies continue to develop and an increasing number of government services are digitized, internet deprivation, or a lack of access to the internet, may in the future impact an individual’s ability to participate in governance and political processes (Shandler et al., 2019, p. 127). A proliferation of digitally enhanced democracy will heighten the need to consider how to maintain equality and equal access among people connected to the internet and those who are not, for example the elderly. E-governance measures thus need to come hand in hand with assurance of different modes of participation (on- and offline) and support of internet access.

Technological Determinism Versus Technology as a Social Construct

The early days of the commercial internet were accompanied by a great measure of enthusiasm for the utopian vision the internet might deliver on. The late 1980s and early 1990s were a pivotal time with the dissolution of the Soviet Union. The arrival of the internet fit well within the *zeitgeist* of change and an opening of the world: Technological progress would march onward and bring with it profound effects on society. This is, in a nutshell, a determinist position – that technology changes society¹⁵. Writings on technology, the internet, and social media can be divided between these two conceptual camps: those who are of the opinion that technology marches on, inevitably, and those who view technology as a social construct. “Unfortunately, much of the writing on electronic democracy treats technological advance as a *deus ex machina* [sic!] inextricably leading to a certain final outcome” (Weare, 2002, p. 659). Whether this is unfortunate or not is in the eye of the beholder. However, it reflects a position that is also common in current discourses shaped by tech companies.

On the other side of that coin is the position that all internet and digital technologies are created by humans. Instagram, social media platforms, as well as other defining technologies of the online and digital world such as Google, Apple, Facebook, Uber, Airbnb, or Amazon (among many others) have emerged in Silicon Valley. These technologies are shaped by the economic incentives (potential hypergrowth with access to outsized earnings) and financial structures (venture capital investment), as well as the intellectual bedrock of Silicon Valley and other technology hubs. Silicon Valley and the US technology industry have shaped concepts of technology and investing in technology in Western nations. There are other technology hubs

¹⁵ There are two meanings of technological determinism: “(a) an internal, technical logic determines the design of technological artifacts and systems; and (b) the development of technological artifacts and systems determines broad social changes” (Kline, 2001). The latter is more commonly used (*ibid.*).

such as Paris, London, Berlin, or Tel Aviv. However, the structures of and incentives beneath these ecosystems are greatly inspired by their US counterpart. For the sake of simplicity in this study, I will focus on the US tech ecosystem and its influence on the technologies produced there, because Instagram emerged from it. Instagram, the other social media platforms, as well as behemoths such as Google are global actors and yet they are based in the US. Through their reach, Silicon Valley thought and the technologies it creates, become a matter of global interest.

When evaluating technology, one needs to keep in mind its affordances.

“In the language of design, affordances are defined as an object’s properties that show the possible actions that users can (or cannot) take with that object. Therefore, it may suggest how a user wants to interact with that object [...]” (Pierrri, 2022, p. 3).

Technologies, user interfaces, the buttons we use, and the functions we access are all an outcome of design processes. Technology, the internet, and social media platforms alike are created intentionally to serve business or other interests. Their appearance and function are not a coincidence. They are products of intentional creation and – depending on the product – subject to an evolutionary dynamic of their own. In the case of internet technology this means that there were and are conscious design and development choices throughout, even though social adoption and mass usage dynamics take on a life of their own that is impossible to predict at the beginning of a technology. Oftentimes, the consequences of technologies are subtle and only visible in hindsight, after several years.

I will focus on the role of thought and ideology in connection with technology development in depth in chapter 4. Here, I want to point out two key ideas that are necessary for the understanding of social media platforms, as well as the structure of the internet as it is and how it may impact democracy: 1) the internet as an agent of individual freedom and 2) free exchange of information as a catalyst for democracy.

The Internet as an Agent for Individual Freedom

As mentioned above, the advent of the internet came with widespread enthusiasm about its potential for democratization of the world. The world witnessed the same tendency with social media during the Arab spring. However, the tell-tale heart beating underneath the floorboards of the internet may be less communitarian and more libertarian:

“Silicon Valley has long held a more-or-less [sic] libertarian view that the Internet [sic] would defeat state controls on individual freedoms. The mistake is in thinking that this was about mass politics rather than individual freedom, and then perhaps only for those who could leverage the technical aspects of the Internet [sic] systems and sets of protocols.” (Petrie, 2017, p. 102)

Are individual liberties and mass politics mutually exclusive? It depends. At this point in the dissertation, it is important to note that there is a chasm between the ideology and thought system behind the internet and digital technologies and the collective hopes around it. These two are not alike.

Petrie’s (*ibid.*) perspective is also illustrative of another key component that is often undervalued in any considerations on what the internet and social media can do for democracy: competence. To use the technologies available to us, one must be competent enough to appropriately leverage them. However, can one ever be fully competent in using a technology that may have different motives and foundational principles than public optimism for them perceives? I doubt it, especially in a technological environment that is fueled by persuasive techniques and cognitive manipulation. Tristan Harris (2017), a prominent critic of current technology practices, states that it is hard for people to truly know their own goals, when tech companies use persuasive behaviors. At best, the persuader’s goal aligns with the goals of the user (*ibid.*). Yet, this is hardly an environment of truly competent technology use and aligns neither with the notion of the internet as a catalyst for individual nor collective freedom. Hence, the internet cannot be considered an inherent vehicle for freedom.

Free Exchange of Information as a Catalyst for Democracy

When internet and communication technologies became available on a mass scale in the 1990s and early 2000s, it created a revolution for the flow of information that was as profound – or even more profound – as the invention of the printing press. With an internet connection, information was ubiquitous and easier to come by than ever before. The arrival of smartphones further accelerated this. We now have all information in the history of the world available to us in the palm of our hands. And yet, as the studies on internet and democracy mentioned above have shown, we do not know if this proliferation of information has increased the spread of democracy in the world.

Free exchange of information alone did not change the political fabric of the world. “[...] the Internet [sic] isn’t going to free the masses politically via the free exchange of information, the Arab Spring notwithstanding. However, the Internet offers escapes from a central authority for individuals” (Petrie, 2017, p. 102). The internet’s failure to deliver on the assumption that the free exchange of information is a catalyst for democratization may be rooted in a misconception: the “[...] largely unquestioned assumption that underlies popular and scholarly studies of digital culture: that the immeasurably increasing power of data processing will be accompanied by the publicity and transparency of information” (Beyes, 2022, p. 112). This

points to a conceptual challenge that lies further upstream than producing information: the assumption that because data processing exists, information must flow ubiquitously and publicly. Recent developments in contested informational spaces online point to this dynamic: greater technological possibilities for the creation of information have not led to better or more sensibly distributed information that may support the democratic process.

Lastly, despite the global nature of the internet, it is not a monolithic construct. There are great geographic differences in internet and digital technologies, due to infrastructure, culture, and regional economic hegemonies. Western platforms and technology differ from the internet structures in China, for example. Davis and Xiao (2021, p. 103) find that the bulk of platform studies focus on Western companies and exclude platforms in China, for example. Steinberg and Li (2017, p. 178) state:

“The theory of platforms has for too long been built upon generalizations from exemplars most familiar to the predominantly US-based writers – Facebook and YouTube being the central platforms of note. These US-based platforms are subsequently taken as models to describe a seemingly place-less intermediary of global (and universal) experiences.”

This is a valid and important consideration. Social media, online technology, and digital platforms have been shaped by a US-centric discourse. In part, this is since Silicon Valley, long the center of technological innovation for the internet, is based in the US. The tech industry is perceived as autochthonous to the United States. And while this perception is partially valid, as the tech industry has been heavily shaped through Silicon Valley for some decades now, other technological centers have emerged across the globe, as well, for example in Berlin, London, and Tel Aviv.

When studying platforms, the internet, digital technology, or the like, it is important to keep in mind that one cannot assume uniform spread, existence, and adoption across the globe. Steinberg and Li (ibid., p. 174 f.) point out that while tech platforms have global ambitions and reach, they require a more differentiated point of view:

“In other words, along with platforms comes a form of regionalization, a localization to a particular milieu, country, or region, through a deliberate exclusion of other countries and regions [...]. Platforms are regional entities, and it behooves us to pay attention to how platforms construct regions and, indeed, often presume regions. [...] Platforms are inherently regional, somewhere between local, national, supranational, and global, depending on the platform in question.”

This dissertation needs to be understood and read in the context of the above. Instagram is not a uniform phenomenon – neither in reference to structure, nor content. Adaptation of Instagram may vary in different geographies, alongside content filters, community rules, and hurdles to access. Local and regional use may vary, just as much as use along age groups or

interests. There are virtual localities grouped around hashtags and content themes or worlds. For example, there is a fitness world, a beauty world, and a fashion world on the internet as well as on Instagram and they all act according to a different set of social expectations. What remains constant are the logic and functioning of the platforms. The purpose of this dissertation is to, among other objectives, abstract the logic and functioning of the platform to arrive at a systematic look at it. This dissertation is rooted in a Western perspective and Western discourse on technology.

2.2. Social Media and Politics

Even though social media has proliferated human existence and academic theorizations on the subject abound, its mercurial nature is hard to capture (Carr & Hayes, 2015, p. 46). When studying social media – whether in the political sphere or elsewhere – platforms are often lumped together. This is a conceptual problem.

Each of these platforms has its own logic and culture. This is due to the purpose of a platform, its user interface design, and behavioral architecture, as well as the culture that is built around a social media network. Instagram, with its lifestyle and aesthetic focus, differs from Reddit with its many sub-forums, which in turn differs from Twitter and Facebook. Each of these platforms also differs from another when considering the respective advertising infrastructure that shapes them. YouTube’s, Twitter’s, Facebook’s, and Instagram’s ad systems have the same underlying principle – collecting data to optimize selling ad space to businesses. However, their subsequent delivery of content and ads, as well as the design of their algorithms differ. This difference also informs the user experience on a social media platform.

Thus, even though we like to speak of social media in aggregate, “[...] there is no such thing as ‘social media’ [sic]” (Voorveld et al., 2018, p. 38). Users have recognized this – consciously or intuitively. Politicians, for example, use Facebook and Twitter for different purposes (Stier et al., 2018, p. 50). The same can be said for Instagram and Twitter, whose wholly different functionalities – a focus on images versus concise texts – create the foundation for differing quotidian and professional use cases.

Social media are different from the internet technologies that came before them with characteristics such as low barriers to entry and user-generated content (Zhuravskaya et al., 2020, p. 415). Whereas web 1.0 was about the proliferation of information, web 2.0 with its social media companies made the internet interactive and provided the technological infrastructure for individual participation and self-expression. With web 1.0 one needed significantly more know-how to own and operate a website to share your views, but with web 2.0 all one had to do was create a profile on a social media platform or a blogging site like Tumblr or Blogger/Blogspot and start writing.

“[...] the political roles of the Internet [sic] and social media are not yet fully understood. There is some evidence that so far in democracies, populist parties—on both the extreme right and the extreme left of the political spectrum—benefit more than actors in the center from social media’s and the Internet’s [sic] amplification of existing grievances. However, there are more open questions than answers.” (Zhuravskaya et al., 2020, p. 433)

Social media platforms are not neutral. They have changed the conditions and rules of social interaction (van Dijck & Poell, 2013, p. 2). Van Dijck and Poell (*ibid.*) identify four grounding principles or logics of social media – programmability, popularity, connectivity, and datafication – that increasingly inform mass media practices. Mapping social media is challenging because of the complex connections surrounding the platforms that distribute the logic and experience of social media: “[...] users that employ them, technologies that drive them, economic structures that scaffold them, and institutional bodies that incorporate them” (*ibid.*). This dissertation explores all four of these components.

Political Usage of Social Media

Several billion people use social media platforms in their everyday lives. As of January 2023, Facebook has nearly 3 billion active users, YouTube 2.5 billion, WhatsApp 2 billion, Instagram 2 billion, WeChat (a chatting app used primarily in China) 1.3 billion, and TikTok roughly 1 billion users (Statista, 2023). Even though Twitter receives much scholarly attention for its political and media usages, it has a much smaller user base than the aforementioned apps with 556 million users (*ibid.*). Out of the top six social media apps, four originated in the US and three are owned by the same company: Meta. This company, formerly Facebook, owns Facebook, Instagram, and WhatsApp.

Astoundingly, Meta only employs about 86,000 people to manage this communication network (Dixon, 2023). This excludes freelancers, workers on content moderation farms, and other forms of employment that may not be listed in this number I retrieved from Statista (*ibid.*)¹⁶. Yet, the relation of employees to the number of active users in the service is staggering. It turns out that it takes relatively few people to operate and control a communication system that reaches billions. To illustrate this: Overall, 3.74 billion people were using one of Meta’s core products (Facebook, WhatsApp, Instagram, Messenger) at least once a month in the 4th quarter of 2022 (*ibid.*). Based on the pre-layoff employee count at meta of 86,000, this means that there is an employee to user ratio of 1:43,488. This does not take into account that only a proportion of Meta’s employees works on the actual software for the product that users use, but in supporting functions like compliance, PR, marketing, or business development, for example.

¹⁶ Whether Statista’s number is accurate or will remain so in the coming weeks and months is unclear. In March of 2023, Meta announced plans to lay off 10,000 employees after announcing another wave of redundancies with planned cuts of 11,000 employees six months before that (Hern, 2023). Considering these significant reductions to Meta’s staff, the relation of employees to users is even more staggering.

Meta's, as well as the other networks', magnitude has an inherently political element, even before delving deeper into political aspects of social media. Never in history has communication infrastructure existed that not only connects billions of people, but also offers direct forms of control of the distribution of content and the content itself. Meta is an empire that spans the globe and a dominant player in the oligopoly that is the social media ecosystem. If companies this large and with a significant reach like YouTube and Twitter¹⁷, as well as Meta, connect billions across the globe, their structural influence on communication invariably points to a political effect or element of their existence. Furthermore, none of these companies are infrastructure or utility companies. They provide more than the structural underbelly of these operations. Especially with the pervasive ad-based revenue models in social media, they have an interest to steer user interactions on a site in their favor. This is at odds with the type of free and open communication required for democracy. It is also a departure from the logic of traditional media.

Social media are a double-edged sword. On the one hand they can provide an important platform that people can use to inform, coordinate, and mobilize themselves and others, on the other hand they affect the socio-political condition and raise concern over misinformation, information divides, and political polarization (Gil de Zúñiga & Chen, 2019, p. 365). On the positive side, social media can be a place of debate and spark deliberation, thus creating a positive influence on democracy (Jennings et al., 2021, p. 147).

The political power of social media first came to the world's attention in the 2008 presidential election. In this campaign, the internet and technology were a major factor in the Obama campaign (Wattal et al., 2010, p. 669). The 2008 campaign was the first time that the majority of American adults were online; the Obama campaign was especially adept at encouraging online activism in its supporters (Smith, 2009) and leveraged technology and social media (Aaker & Chang, 2009) most efficiently. Social media were a key factor in Obama's success. Overall, social media have changed how political campaigns are run (Dimitrova & Matthes, 2018, p. 333). In the present, a political campaign without social media is unimaginable.

Social media can be an important factor in political agenda setting. Traditional media agendas, social media agendas of political parties, and the social media agenda of politicians all influence each other without one leading more than it is being led by the others (Gilardi et al., 2022, p. 39). Agenda-setting on social media is especially interesting because some platforms like Twitter are more frequently used by people involved in setting media agendas than others.

¹⁷ I include Twitter here, because even though it is smaller than the other social media networks mentioned, it has considerable influence on political debates, because it is the platform of choice for journalists and an arena for political debate.

For example, Twitter is the preferred social media site of US journalists, with 69% of all journalists using Twitter most for their work (Jurkowitz & Gottfried, 2022). 94% of journalists in the US use social media for their occupation, overall. Whether these statistics apply to other democracies worldwide is unclear. However, similar tendencies can be observed. For example: 87% of journalists in the UK have a Twitter account (NUJ, 2020). The high prevalence of Twitter among media workers suggests the risk of creating a self-referential bubble in agenda-setting through peer-based network effects.

Social media can be a democratizing or mobilizing factor with their increased flow of information (which can also be a detriment through misinformation campaigns) (Oser et al., 2022, p. 611). Yet, there are varying studies with differing results on how and whether social media contribute to political mobilization and participation (*ibid.*). Terminology like clicktivism or slacktivism raises concerns that online activity may be a lazy, convenient way to outsource one's political participation to a few mere clicks while forgoing deeper, more transformative work (*ibid.*). However, there may be numerous motivations behind participating in political acts online, for example also using online participation as a pressure valve (*ibid.*).

Some findings as an example: Accidental exposure to political information on social media correlates with online participation, meaning that in someone less interested in politics, who stumbles upon political information in their feed, their political interest increases (Valeriani & Vaccari, 2016, p. 1857). Furthermore, there is a correlation between an individual's political engagement on social media and their likelihood to engage politically or socially offline: the more active somebody's engagement on social media, the more likely they will be active offline (Piatak & Mikkelsen, 2021, p. 1079). There may be intervening or mediating variables relating to political engagement and online activity such as age, prior political socialization, or socioeconomic factors. In a meta study, Oser et al. (2022, p. 623 f.) found that “[...] believing in one's ability to participate in and impact political processes is as strongly related to online as to offline forms of political participation.”

This mobilizing effect creates challenges when social media is used to spread falsehoods, for example by obscuring the source of information, facilitating deception about authorship, and providing manipulation of social signals (Bimber & Gil de Zúñiga, 2020, p. 700). In the case of the above, social media's mobilizing and politicizing effects can be misused with detrimental effects.

At the same time, this raises two questions: the nature of free speech on the internet, especially on social media, and whether social media's mobilizing effects are truly as grand as our

quotidian understandings of them. An investigation of different meta-studies paints no clear picture. Some find positive effects on different aspects of political engagement (with little clarity on the causal or transformative nature of these effects) (Boulianne, 2015, p. 524), while others only draw up limited effects (Dimitrova & Matthes, 2018, p. 333). Studying social media is complicated, because of their multivariate inputs and diverse strands of political engagement and communication. What do we study, when we study social media, and how can we study them comprehensively?

Furthermore, political usage of social media occurs during everyday overall usage of social media and the cultural environment of and on these platforms. A study on young adults aged 18-26 finds that they use social media in three distinct ways: to fill empty slots, for everyday transformations (for example habitual social media use in bed), and to manage one's mood (Bengtsson & Johansson, 2022, p. 1 and 7). Political uses of social media occur within overall use habits, irrespective of the age group of a user. That is, even though a user might specifically seek out political information on social media, this still occurs within the framework of social media's technological affordances, the overall culture of a social media platform, and an individual's habits. It is absolutely possible to scroll on a news site like The Guardian to fill time or manage one's emotions.

Furthermore, Theocharis and Quintelier (2016, p. 817) find that Facebook use is positively related to civic and entertainment-oriented participation but not online or offline political activity for adolescents. Here, pre-existing levels of civic participation have a stronger effect on Facebook use than the other way around (*ibid.*). In the case of young people, it is also important to note that their consumption of traditional media is decreasing in favor of friends and followers as the main nodes of their political online networks (Marquart et al., 2020, p. 197). Thus, it appears that for young people, their friends and social networks have replaced the news as their main source of political information. Digital literacy matters for political participation of young people online, as well. Spending more time online is no guarantee for civic engagement of adolescents, while factors such as information usage, creation, and communication positively relate with engagement (Moon & Bai, 2020, p. 458). Thus, it appears that the kids will be alright, if they receive guidance on how to use social media and digital tools well.

Despite early hopes about social media's democratizing effects, especially at the time of the Arab Spring, there is no clear case for social media platforms' ability to spread and support democracy. Where main public grievances relate to corruption, subversion of power, and control of traditional media by autocrats, free internet and social media improve accountability

because they support public information and the organization of protests (Zhuravskaya et al., 2020, p. 433).

Social media can also have a geopolitical aspect, uniting people across national borders to engage on a political or social issue (Kamruzzaman, 2022, p. 1). On one hand, this can have a positive effect through spread of information and an increase in transparency. On the other hand, social media can be used as a tool for election interference and the spread of politically harmful information, as the Cambridge Analytica scandal demonstrated.

Concerns About Social Media

One of the most prevalent criticisms and concerns around social media is the existence – or lack thereof – of filter bubbles and echo chambers. Introduced by Eli Pariser (2011), filter bubbles and echo chambers have had a strong hold on political debates and research with little clarity on whether or not they are real and the extent of their power. On the one hand, algorithmically curated news feeds may lead to a creation of entirely self-contained political news realities, showing users more of what they like, potentially leading to polarization, at least exclusion of information from alternative sources. Yet, not even the assumption of polarization on social media is a given: “In fact, it is likely that the widespread perception of polarization on social media is due to a minority of highly active and visible partisan individuals” (Barberá, 2020, p. 38).

Studies on echo chambers often use the term “echo chamber” as a conceptual anchor for various phenomena such as selective exposure, cognitive dissonance, or political polarization (Geiß et al., 2021, p. 662). It is not always clear what exactly is being studied. Furthermore, differences across empirical studies may be attributed to heterogeneous effects of social media on different groups (Barberá, 2020, p. 46). Rather than speaking in absolutes about echo chambers, Geiß et al. (2021, p. 682) suggest to consider echo chambers as a continuum. They are neither an entirely closed nor an entirely open informational system but have different degrees of delimitation of informational environments (*ibid.*). The authors also suggest using the term ‘algorithmically amplified selectivity’ to account for different informational environments (*ibid.*). Echo chambers may be too vague of a concept, because while we consider echo chambers informational environments that do harm due to excluding information, one also needs to take into account that a degree of closing off information that may be detrimental for one person may be fine for another (*ibid.*). The concept of echo chambers is thus too vague and too differentiated to be applied as broadly in discourses on social media and politics as it currently is. Furman (2022, p. 1) suggests using the term

‘epistemic bunkers’ to better account for a central property of echo chambers, that “[...] exclusionary social epistemic structures are often constructed to offer their members safety, either actual or perceived” (*ibid.*). Epistemic bunkers are not only an outcome of algorithmic filtering but also a social choice.

Polarization research finds itself in an equally challenging environment. Media in alignment with one’s own convictions has consistently shown to exacerbate polarization (Kubin & von Sikorski, 2021, p. 188). Polarization research in the past decade has focused on the US and Twitter with little attention on how social media can support depolarization (*ibid.*). This limits studies on polarization, because not all democratic nations have an opinion climate like the one in the US with its two-party system. Furthermore, studies need to account for different functionalities of algorithms on different social media platforms. The Twitter algorithm might not yield the same results as YouTube’s, for example. To wit: in a study by Yarchi et al. (2021, p. 98), Twitter interactions contributed to polarization, while WhatsApp has a depolarizing effect over time. Getting one’s news on sites with socially or user-driven algorithms to generate content correspond with higher levels of political polarization than getting news from sources that do not use algorithms (Feezell et al., 2021, p. 1). Yet, the choice of media sources does not predict increased political polarization (*ibid.*, p. 9).

In recent years, especially after the pivotal events of 2016, criticism and concerns on the individual, social, and political effects of social media have emerged. Deibert (2019) identifies four critical points: 1) social media businesses are built around personal data-surveillance designed to spy on us as the foundation of an ad-based revenue model, 2) users have consented to this, not entirely out of their own volition, because social media are designed to be addictive, 3) attention-grabbing algorithms of social media propel authoritarian practices that sow confusion, ignorance, and prejudice, and facilitate manipulation and undermine accountability, and 4) fine-grained surveillance practices that social media companies perform for business reasons may be considered a proxy for authoritarian control.

These four points are common among critics of social media. They invite a closer inspection. Data-collection is now becoming a wide-spread practice in digital capitalism that Zuboff (2019a) termed ‘surveillance capitalism’. I discuss this, as well as the claim that social media are designed to be addictive in depth in separate sections of this dissertation. Data collection and behavior modification through persuasive technologies can form a threat to democracy. However, the third claim requires more nuance. Algorithmic content distribution can be highly problematic, especially with a lack of insight into their functional logic, as well as a lack of

oversight. It is not clear, though, whether the attention-grabbing nature of algorithms is at the heart of the challenges to democracy that social media may pose.

Furthermore, all the above point to a distinctly anti- or non-democratic element of social media. Certainly, there is no measure of collective or individual control on how a social media platform interacts with users; there is no governing mechanism (Magalhaes & Yu, 2022, p. 553). Users can only choose from a very limited number of settings: Muting an account’s post in a news feed is not the same as having access to a range of tools that let a user set not only which posts they want to see, but how the algorithm curates their feed and interacts with them. Yet, I am not certain whether authoritarian is a suitable label for this. Macro-level analysis of the anti-democratic thrust points in two directions: an authoritarian momentum as Deibert (2019) describes it or a feudal momentum that extends beyond social media to the digital economy as a whole, aptly termed technofeudalism (Dean, 2020a; Harris, 2022; Varoufakis, 2022a). I will also discuss this in more detail in a different section of this dissertation.

In addition, the influence of social media companies on individual behavior and emotional states is uncharted. This is partly due to a lack of access to algorithms and internal company data. Social media companies are somewhat of a black box. Scholars can evaluate their outcomes and might infer on the causal dynamics behind the outcomes yet have very little access to what is going on behind the scenes. An internal experiment at Facebook that was made public in an academic journal shows that it is possible to influence the emotions of users through the emotional quality of posts on the newsfeed (Kramer et al., 2014, p. 8788). If a user was shown fewer positive posts, they went on to publish fewer positive and more negative posts – and vice versa (ibid.). Thus, the content users see in their newsfeed influences their emotional state. It is also very concerning that the company was exploring and is aware of this.

Social Media and Culture: Influencers and Self-Promotion

The culture of social media can have a mediating effect on political processes and self-presentation. Present social media culture is shaped by self-branding and performed intimacies (Porter, 2020; Whitmer, 2021). The influence of celebrity culture is palpable; the logic of presentation of the self as a brand (Johnston, 2020, p. 508), especially as cultures of influencing, have spread from the macro- to the meso-, and microlevel.

This may impact the political process on two levels: politicians on social media may feel pressure to adapt their communication style to the existing culture, creating hybrid roles of

politicians as influencers/celebrities. For political communication and debate among citizens, current cultural dynamics on social media can cause a commodification of political expression as a consequence of performative or branding attitudes. When political communication becomes an element of a branding routine or strategy, this creates a shift in how people deliberate with each other – deprioritizing epistemic interest in favor of participating in regimes of public self-presentation and perception.

Research on social media and their relationship with politics shows some correlations between social media and the political fabric. The studies and observations in this chapter face considerable conceptual challenges, though. The greatest one is that social media companies' algorithms are black boxes and scholars can only make assumptions or attempt to reverse-engineer processes with limited success rates. Furthermore, social media are often treated as a conceptual monolith, when their functions and design significantly differ, creating significant difficulties for accurate determination of their effects.

2.3. Instagram and Politics

Instagram is less understood than the other social media platforms, owing in part to challenges in access to data due to API restrictions and methodological challenges (Bast, 2021b, p. 214). Instagram is a rich and deeply interesting research subject. Equally, its multi-layered and multimedia nature pose challenges in understanding the subject: there are images, captions beneath them, hashtags, ephemeral content types such as Instagram Stories – but then also the opportunity to save them in so-called Highlights – short videos called Reels, direct messages, and live streaming. All this creates difficulty in choosing adequate approaches to understanding the platform. In addition, all the aforementioned functions may be used for political content or by political figures and entities. There is no function that is more or less suitable for political communication on Instagram. Furthermore, it is also a challenge to delineate what exactly constitutes a political science interest in the platform and whether this should also include the politics of the platform and social media itself.

For the sake of manageability of the scope of exploration, this section mainly focuses on Instagram use of political actors such as heads of state, leaders, candidates, and parties. Extended political fields such as activism or the politics of x (= the body, gender, etc.) on Instagram receive less attention in this evaluation for the sake of parsimony and because they do not directly relate to political systems and the actors therein. Furthermore, I seek to explore how changes in communications attitudes mediated through Instagram may have influenced the behavior of political figures on Instagram.

Research on the nexus of Instagram, democracy, political science, and politics has two big foci: how political parties or political figures use this visual platform for political communication and how the electorate uses the platform to share information and for political self-expression. First and foremost, when investigated on its own, Instagram is perceived as a tool of visual political communication. Oftentimes, research on Instagram is also combined or lumped together with other social media platforms. Some examples: Bossetta and Schmøkel (2023, p. 48) compare Instagram and Facebook images of candidates in the 2020 U.S. election and find diverging patterns for emotional responses between the platforms¹⁸. Boulianne and Larsson (2023) evaluate engagement with candidate posts in the 2019 election in Canada on Twitter, Facebook, and Instagram. Literat and Kligler-Vilenchik (2021) examine youth political expression on several platforms popular with young people (i.e. YouTube, TikTok, and Instagram). Research design matters in choosing which platforms to evaluate. However,

¹⁸ Happy images on Instagram perform better than calm ones in their study.

conceptually it is not always clear which platforms researchers refer to when they speak about social media.

When Instagram is studied by itself, the above-mentioned themes of political self-representation strategies emerge, together with how individuals or the electorate use Instagram. There also are sub-fields and streams that investigate the celebrification of politics and how celebrities, thought leaders, or other public figures use Instagram for political endorsement or mobilization for social causes or activism. Albeit this is not an exhaustive list, this section presents an overview of findings and research tendencies on Instagram in a political context.

Studies on Political Usage of Instagram

Overall, a significant part of political science or political communication research on Instagram follows the scheme of *Instagram use by x politician or x party in x country*. This produces a body of research that on the one hand creates in-depth studies on an isolated country or politician, but on the other hand fails to connect these findings to form a bigger picture.

There are all but a few meta-studies that theorize Instagram from a more removed, more conceptual perspective such as an investigation by Parmelee and Roman (2020) on echo chambers on Instagram that “indicates a high level of selective avoidance behavior on Instagram, especially by users who are conservative, Republican, very ideological, and female” (ibid.). Bast’s (2021b) meta-study of 37 studies on Instagram use by politicians stands out here. Her main findings are that:

“Overall, political actors seem to use Instagram to create a favorable, positive image rather than to reflect on policy issues, engage in direct interaction with citizens, or mobilize voters. The majority of political actors’ posts depict themselves, or—in the case of posts published on accounts of political parties—images of their top candidate. Portrayals emphasizing a statesmanlike or professional image dominate” (ibid., 213).

Private images also abound on the platform. What stands out in the context of this study is that there is a lack of reliability in indications about who stages themselves in a more personal and in a more professional way (ibid.). Contrary to initial hopes of social media platforms fostering discursive and deliberative spaces (when the advent of these technologies coincided with major political upheavals and efforts for democratization in the middle in the late 2000s and early 2010s), it seems that Instagram does not foster a dialogue between political actors and citizens (ibid.). There is great variation in activity between actors and, based on these findings, no clear patterns on this have been established, yet (ibid.). As stated previously, the field is

lacking a clear, cohesive picture or an attempt at theorizing Instagram from a perspective of democracy or theoretic scholarship in political science.

Election-time use of Instagram has been studied for Sweden (Grusell & Nord, 2020; Russmann & Svensson, 2017), Norway (Larsson, 2017b), Italy (Trevisan et al., 2019), Hungary (Farkas & Bene, 2020), Malaysia (Mohamed, 2019), Indonesia (Prihatini, 2020), Argentina (García-Beaudoux & Slimovich, 2021), and Latin American presidential candidates (Cabrera-Méndez et al., 2021). These studies all investigate how political actors used Instagram during election processes.

Here are some exemplary findings: Grusell and Nord (2020, p. 1), detect no increased level of personalization in how politicians present themselves on Instagram, while Larsson (2017, p. 1) finds that larger actors are more successful in gaining traction on Instagram. In the Indonesian context, female politicians are more likely to use Instagram than Twitter (Prihatini, 2020). In their analysis of Instagram use among political leaders in Spain, Pineda et al. (2021, p. 80) conclude that there are no significant differences in Instagram use between the non-electoral and electoral period, but that there is an increase of personalization and propaganda of affirmation during election periods. On Instagram, images are often used to personalize communication in a political context (Farkas & Bene, 2020, p. 119), to manage the public perception and convey a specific image of a politician, in the case of Justin Trudeau also by employing celebrity youth codes (Lalancette & Raynauld, 2019, p. 888), present personal and political narratives (Mohamed, 2019), or closeness and access to private lives of politicians, as well as showing them as ordinary people (Selva-Ruiz & Caro-Castaño, 2017, p. 903). Conversely, Russmann and Svensson (2017, p. 50) find no major differences between Instagram and other social networks. Here, the photo-sharing platform behaves just like the other ones. This may be attributed to the fact that their study was conducted during the 2014 elections in Sweden, when Instagram was still a comparatively recent phenomenon.

Overall, profiles of politicians attract more different interactions than other accounts, among them longer comments, longer debates and a large number of replies (Trevisan et al., 2019, p. 247). O’Connell’s (2020, p. 995) study on Instagram use and popularity in the US congress reveals that follower count follows time in office (the longer, the more followers) and that personal photos attract more responses than text-based photos. Nazaro et al.’s (2019, p. 5) evaluation of images used by two Argentinian political leaders also supports the importance of political communication on Instagram through images that is more direct and human. Lindholm et al. (2021, p. 167), in turn, find that photos of leaders in professional settings were more attention-grabbing than in a private context. They conducted their study on Finnish political

leaders. Grusell and Nord (2020, p. 1) do not confirm greater personalization in their study on Instagram use of Swedish party leaders. The Scandinavian studies and the difference in engagement between O’Connell’s (2020) study on the US and Nazaro et al.’s (2019) on Argentina beckon the question whether and to what extent national political culture and differences in visual culture contribute to different perceptions of candidate image and images online.

While the above-mentioned studies have explanatory power for country-specific Instagram use and many of them share the conclusion that Instagram is a great place to promote yourself as a politician and that politicians use the platform strategically, often deploying several narratives, abstractability of their studies varies. As the above has shown, cultural context, visual culture, and the pre-existing local political culture in a country may affect Instagram use by politicians in manifold ways. It is helpful to know, for example, that in Hungarian politics, a private dimension of content-sharing prevails above other dimensions (Farkas & Bene, 2020, p. 119). Yet, whether this is the case across Western democracies is uncertain. Given the findings of the above studies, it may be likely. Yet, so far, there have been few cross-country studies, save for Bast’s (2021a, 2021b) inquiries.

Canadian prime minister Justin Trudeau has been the subject of several studies. Lalancette and Raynauld (2019) and Vossen (2019) each study the Instagram account of Justin Trudeau. Both studies find strategies based on celebrity politics, where politicians take on visual and presentational logics from the field of celebrity. Vossen (*ibid.*, p. 1) also finds that Trudeau is presented through heroic and positive storytelling. It is also important to note that heads of state now post photos on social media almost daily to capture attention in a political environment where visual storytelling is becoming ever more important and that is moving into an always-campaigning mode in some democracies (Lalancette & Raynauld, 2019, p. 888). Instagram as a visual platform is the prime tool for visual political PR and communication campaigns for politicians. Images that depicted politicians in private, non-political settings, showed faces, and displayed emotions generally increased engagement from followers on Instagram (Peng, 2021, p. 143). Instagram may also contribute to spectacularizing politics through tactics such as showing emotional appeal or using expressive filters in political images on the platform (López-Rabadán & Doménech-Fabregat, 2018, p. 1013; 2021, p. 1).

Furthermore, there is a substantial body of research investigating right-wing politicians and parties on Instagram in Spain (Bernardez-Rodal et al., 2022; del Castillo Aira & Iturbe Tolosa, 2021; López-Rabadán & Doménech-Fabregat, 2021; Pallarés-Navarro & Zugasti, 2022), the United States (Dobkiewicz, 2019), Brazil (Mendonça & Duarte, 2021), and Hungary (Szebeni

& Salojärvi, 2022). Bast (2021a, p. 1) studies eight leading European right-wing politicians and their Instagram use and finds that the two most common messages they share on the platform are a professional image and messages of closeness to their citizens. The messages these politicians emphasize differ at an individual level (ibid.).

On a more extreme end of the exploration of political self-presentation strategies of political leaders, Mendonça and Duarte (2021) study the Instagram account of Brazilian president Jair Bolsonaro. Their work has two interesting key findings: one, that there seems to be a gap in understanding the visual media strategy of populist leaders and two, that a populist leader like Bolsonaro, too, employs visual media to present himself to his electorate and the public and that the result of that may look comical in its over-the-top representation of masculinity while his lack of sophistication in embodying his position creates a visual of his leadership that is parody-like (ibid., p. 210). They conclude that Bolsonaro’s Instagram account “construct[s] an image that he is just an ordinary man, extraordinarily occupying the presidency” (ibid., p. 210).

These dichotomies, *private-public* and *extraordinary-ordinary*, also appear in the visual language of Spanish populist, right-wing politician Santiago Abascal’s Instagram (del Castillo Aira & Iturbe Tolosa, 2021, p. 84). Instagram’s design and culture enable, necessitate that they be embraced by politicians. After all, Instagram is a platform for the visual curation of the everyday and publication of a mixture of content at the intersection of authenticity and perfection. Aira and Tolosa’s (ibid.) study of Santiago Abascal, a member of populist party Vox, and the visual language on his Instagram account in 2020 share findings with the study on Bolsonaro. Here, too, the goal is to show Abascal the politician as “one of us” (ibid.).

For completeness’ sake, I also want to include two studies on Instagram use in authoritarian or autocratic contexts: one examining the Instagram posts by Chechen leader Ramzan Kadyrov and how they aid in constructing an image as a charismatic leader (Rodina & Dligach, 2019, p. 95) and the other on gendered presentations in the Syrian presidency on Instagram (Stanton, 2022). Rodina and Dilgach’s (2019) findings stand out in so far as that they suggest that digitally mediated construction of a populist image online, a “flirting populist”¹⁹ (ibid., p. 95) that is a “[...] new, online technology-enhanced type of political figure” (ibid.). This may be an interesting takeaway outside of autocracy-related Instagram strategies. It may be possible that online communication technologies and their affordances are also creating a new type of political figure in the sphere of democratic governance.

¹⁹ The authors are referencing a term that originated on a blog by Boris Vejzak. The post has since been taken offline. The term is cited in the publication by the authors.

In a sense, the visual nature of Instagram and the logic of the platform that supports capturing and sharing everyday moments play into the hands of populists, as well as that they support ordinary politicians in drawing back the curtain on public life and crafting a favorable visual strategy for themselves. Leaders and politicians may share images to humanize themselves (Quevedo-Redondo & Portalés-Oliva, 2017, p. 916). This is similar to how celebrities may be using the platform, allowing glimpses at lives that we normally only see through the lens of the media. Instagram is a platform where you can make the distant proximate and the emotionally removed closer.

Celebrification on Instagram

There is also a stream of research that investigates how the logic of celebrity on the platform has spilled over into the sphere of politics. Quevedo-Redondo and Portales-Oliva (*ibid.*) refer to a process of celebrification of politicians. Celebrification²⁰ is when the logic of celebrity moves from traditionally celebrity-centric fields like entertainment, music, or sports into the sphere of politics. A celebrity may turn into a politician or a politician into a celebrity in the public perception and how they present themselves online (Ahmad, 2020, p. 63). Oliva et al. (2015, p. 1) further state that celebrification of politics applies when “using elements of celebrity culture to build candidates’ public image” (*ibid.*). Guthey (2016) homes in on the role of celebrification in relation to Donald Trump and finds that “the industrialized process of celebrification [...] has functioned to elevate, and not diminish, the significance of the particular set of reactionary and narcissistic pathologies Trump embodies” (*ibid.*, p. 667). Among other factors like cultural anxieties and economic disparities, celebrification against the backdrop of the relatively new social media here is a significant aspect in building a politician’s career and public image. Instagram as the prime visual platform and social network of the 2010s then provides the technological, communicative, and cultural means to make this happen.

Journalism is also affected by the dynamic of celebrification. Here, the lines between self-branding, commercial content creation, activism, being an influencer, and a working member of the media are equally becoming blurred (Usher, 2021, p. 2836). This is especially challenging for democracy, as the control-of-power-function of journalism is affected by what Usher so aptly refers to as “opinion spectacle” (*ibid.*). If celebrification and professional brand-building on social media take precedence over journalistic inquiry, the role of journalism in democracy is significantly downgraded and less effective. That is not to say that leaders or journalists should renounce the signs of the times and retreat from social media in a luddite approach to technology. However, where the logic of celebrity takes over or brand-building has

²⁰ Alternatively, the term *celebritisation* is also used to describe this concept.

a higher priority than actual journalistic work, there may be a conflict of roles that the audience should at least be aware of.

A special form of celebrification or effect of celebrity on the platform can be observed in activism by public figures or celebrities. Statements by celebrities after major political events or around elections have become commonplace. You may find actors advocating on behalf of a political candidate, sharing petitions, or urging their followers to donate to certain causes. This type of activism can become a part of the brand of a public figure or celebrity or can even be expected. For example: US-singer Taylor Swift had her political “coming-out” (Driessen, 2022, p. 1060) on Instagram in 2018. Before, she had not ever spoken about politics, creating some friction with her fandom and public perception. Fans “[...] consider it a ‘must’ [sic] for pop stars in today’s political climate to express where they stand politically” (*ibid.*). Activism and political communication are expected. Furthermore, Driessen states that this move turned Swift into a “[...] celebrity politician (CP): a celebrity who is fighting for a particular interest or certain political outcome, while holding a certain political influence over an audience” (*ibid.*). There are two kinds of celebrity politicians:

“The first is the elected politician or candidate who uses elements of ‘celebrityhood’ [sic] to establish their claim to represent a group or cause. The second is the celebrity—the star of popular culture—who uses their popularity to speak for popular opinion” (Street, 2004, p. 435).

Celebrities and politicians are “[...] conceptually and practically connected by their shared relationship to the popular and its articulation through the various mediated forms of popular culture” (Marshall, 2020, p. 89).

Considering that this phenomenon was first described by Street in 2004, celebrity endorsements or activism are not new phenomena. Yet, the political commitment of celebrities has grown in scope and significance (Partzsch, 2015, p. 178). It has become normalized, almost expected, for celebrities to be involved in politics and current events and social media are providing an adequate platform for this, especially the show-and-tell nature of Instagram. The engagement of singer Bono, for example, is lauded for tripling the US budget for Africa (*ibid.*, p. 178). Whether or not celebrities have influence on voting decisions is not fully clear. O'Regan (2014, p. 469) found that young adults are more likely to listen to individuals than celebrities in their decisions but do believe that famous people influence how people think.

In the age of social media, everyone with a large enough following can turn themselves into the second category: a type of celebrity politician or activist. Instagram is the perfect platform to create a visual narrative around this, as it already favors personal branding and an aestheticization of everyday life and the self. Activism or the role of the celebrity politician slot

into this well. Conceptually, this may pose challenges when linked to democracy theory: when politicians begin to act more like celebrities on Instagram and social media and celebrities are on social media taking on politicians’ roles, the lines are getting increasingly blurred. Celebrity activism can also take on a form of everyday populism on social media (Kissas, 2022, p. 1). This does not necessarily invite pessimism on the state of democracy²¹. It is more important to inquire into this more profoundly and understand its effects before making any statements on the positive or negative value of this phenomenon.

Beyond the blurring of celebrity and politics in the modern era of media, ordinary people have also been affected. Marshall (2020) contends that there has been a “[...] significant shift in the fame/politics nexus. The key element of this shift is the way in which digital media has reconfigured our political-popular cultural landscape” (*ibid.*, p. 89). The COVID-19 pandemic has further shifted this dynamic:

“[...] via the communicative structures of social media and its avenues of sharing and connecting, there has developed a pandemic will-to-public identity by the billions of users of online culture—what is identified as pandemic persona—that resembles the patterns with which celebrity and politicians have operated over the previous century” (*ibid.*, 89).

Yet, this shift was ongoing even in the years preceding the pandemic. Before COVID-19, user behavior evolved for over a decade of social media use. Fame wove its way into it, especially on Instagram, a platform whose growth can also be attributed to being shrewd with engaging and supporting celebrities as a growth lever (Frier, 2020, p. 129). For Marshall (2020, p. 98), the shift to an era of the presentation of the self, together with a changed media dynamic that is moving from a representational to a presentational regime, is producing a shift in how power and influence manifest, shaking at the bedrocks of the foundations of political, cultural, and economic spheres, as those have been built and accompanied by the representational regime. Hence, the question of Instagram and how it relates to celebrity is not trivial, at all.

The above-mentioned dynamics of self-representation also apply to voters. Mahoney et al. (2016) conducted a study on the Instagram use of the Scottish electorate during major elections in 2014 and 2015. Through a qualitative analysis of images, they found that individuals used “image-sharing for political self-expression” (*ibid.*, p. 3339). Instagram then is a platform that enables individuals to present their “political selves” (*ibid.*). This is consistent with wider societal shifts towards personal branding and an increase in presentation of the self online (Duffy & Pooley, 2019; Marshall, 2020; Reckwitz, 2020).

²¹ This is a critical inquiry into the role and effect of tech on democracies. Yet, as the author of this dissertation, I am firmly in favor of refraining from blanket-statements on the “detrimental” effects of tech on every aspect in our lives. It is not helpful to do so and at this point in the dissertation, there is not enough information available to evaluate any such notions.

Furthermore, activism is not just in the domain of celebrities.

“The active spread of Internet [sic] activism is evidenced by the growth in the number of volunteer movements ‘on demand’ [sic] actions, environmental actions and protest actions, which are also carried out in social networks.” (Ushanova et al., 2021, p. 289)

Activists may share information, petitions, political statements, or the like on Instagram. The visual nature of the platform can aid this process through visually pleasing graphics, attention-capturing photos, and sharing functions in direct messaging or through Instagram Stories. Haq et al. (2022, p. 3728) find in a study on Instagram activism that while Instagram has limited options for sharing protest or activism content, offline activists are more active politically on Instagram, too, and see more protest-related posts than other users. Activism on Instagram has been studied in different contexts, for example how Russian youth use Instagram for activism (Ushanova et al., 2021), campaigns for abortion rights on Instagram (Acosta, 2020; Kim & Lee, 2022), feminist activism (Mahoney, 2022; Suárez-Carballo et al., 2021), environmental activism (Ardèvol et al., 2021; San Cornelio et al., 2021), activism around racial equity (Li, 2022; Wellman, 2022), and queer activism and visibility (Duguay, 2016; Edwards, 2022; Gras-Velázquez & Maestre-Brotóns, 2021), among others.

So far, little attention has been given to why people follow political leaders on Instagram. In the case of the celebrity turned politician following Street’s (2004) typology, this seems more obvious. An Instagram user is a fan of the celebrity or interested in their life and decides to follow them. But why do people follow politicians on a platform that prizes visual sleekness, aesthetic pleasantness, and that is often derided as a pool of shallowness? People follow political leaders on Instagram for information and guidance, as well as for social utility (Parmelee & Roman, 2019, p. 1). Why people follow political leaders online is also linked with demographic factors such as age and gender, with younger people following with an interest in entertainment and men most for reasons of social utility (*ibid.*, p.1). Further, following for information and guidance may suggest, according to the authors (*ibid.*, p.10), that Instagram may be an important place for political information.

Lacuna in the Research on Instagram

In conclusion, the state of research on Instagram reveals several interesting tendencies. Most of the studies have been undertaken in the second half of the 2010s and early 2020s. Instagram is still a recent subject of investigation, and great gaps remain in the theorization of Instagram from a perspective of political science. Findings on Instagram use show some consistencies, especially with respect to the detection of intentional visual strategies employed by political leaders, parties, and their communications teams. This is hardly surprising.

Carefully crafting a narrative around a candidate or politician is an essential part of political PR and political communication. Unlike tools of the past, Instagram is different in this respect, because it allows politicians and parties to craft a public image according to their own taste, befitting their own strategies – and in direct communication with their audience, followers, and potential voters. Political profiles attract markedly different interactions than normal profiles (Trevisan et al., 2019, p. 247). This may include trolling or a spoiler-type of communication that floods a profile of a politician with opposing views with comments. A casual look at comment sections on politicians’ profiles shows that this may be happening even without bot activity. The direct communication aspect of social media – including Instagram – works in both directions. Politicians can share their messages and image, creating content on there, while their followers or people online can interact with them. Who interacts with them and due to which motives varies vastly: from followers to (human and machine) trolls, everything and anything is possible.

Otherwise, as political scientists we know little about the platform except in isolated instances or country-, party-, or situation-specific contexts such as elections, campaigning, leadership depictions, populism, or the like on Instagram. There are a great number of specific and situational inquiries, some of which have been cited above. While they contribute to an increased understanding of Instagram and how it relates to politics and political communication, such research designs can only take the field so far, as stated in the beginning. They are valid, valuable, and important. And yet, the largest gap in research is an overall attempt to theorize Instagram in the context of democracy or political theory. It is not enough to ask which images politicians show, how they craft visual narratives, and whether voters or followers engage with their visual content. The intent behind this matters greatly, as do the bigger-picture implications of this change in political iconography and its mediated usage.

After the introduction of photography, digital photography, and photography online, the shift towards social media – and especially a visuals-first platform such as Instagram – is of tremendous importance in theorizing larger evolutionary dynamics in political iconography and how the changes in media may affect democracies. At the time of writing and finalizing this dissertation, in the winter of late 2022 and early 2023, we are on the brink of yet another technological disruption in digital and online communications technology, as the advent of AI looms. To increase digital political literacy and prepare the field for the changes to come and how to anchor and explore them based on the existing body of theory and research, it is necessary and important to look back and see what can be learnt from past changes in political iconography and its evolutions until now.

All the above yields an awareness of research gaps in the current understanding of Instagram in political science. To address and remedy them, this dissertation explores the following questions thereafter.

What is the effect of visual material?

Why does it even matter that we look at visual material? The above has shown that there appears to be a special power of images that can be tremendously helpful for creating a visual narrative and public image for politicians when they use Instagram. Yet, images are more than flat surfaces we imbue with meaning. They have agency and act on their own (see Bredekamp (2021)).

What determines visual strategies of politicians?

In the above, I discussed and detected differences in perception of a politician’s visual material that may be attributed to a difference in visual culture. They appear to be shaped by the logic of the platform and contemporary visual culture on Instagram. Politicians, it appears, are not immune to what is happening on these platforms and are adapting to how their constituents and followers may be using the platform. An exploration of the visual culture of Instagram, as well as different use cases and tendencies outside of political science, may further illuminate to what extent the use of Instagram in a political context differs or aligns with overall use cases for the platform.

How does celebrity culture inform Instagram use by politicians?

In the above, I documented the convergence of celebrity and politician roles online and in democratic societies. The issue of celebrity and how it relates to politics may initially seem trivial, given how far the fields are from each other in a quotidian conception. However, the research cited above shows that the different figures are becoming initially blurred and two types of roles are emerging as per Street (2004): celebrities as politicians and politicians as celebrities. This matter is a subset of the question of visual culture on Instagram. At the same time, it merits a question of its own, because of its potential far-reaching consequences and effects. If politicians are starting to behave like celebrities, also owed to the functions and functioning of a visual platform like Instagram, and vice versa, what does this entail for the roles especially politicians have in democratic society? If a large platform on social media or celebrity in the traditional sense, for example in entertainment, music, or sports, grants individuals with the power and influence to become celebrity politicians, how do these newly

created roles slot into a democratic system? If superb visual management of self-branding activities on a visual platform like Instagram grants an individual with enough capital (in the sense of Bourdieu (1986)) to influence and sway societal and democratic processes, democracy scholarship needs to take into account this unchecked form of political proto-representation.

Who gets to see which content and why?

It is not enough to ask how politicians create their image on Instagram and how. In an algorithmic world, it is not guaranteed that a follower or potential voter will see a politician's posts on Instagram or any social media platform for that matter. Algorithms determine the dissemination of content. Without understanding them, one cannot make a sensible statement on political content on social media – irrespective of the platform. An exploration of algorithms furthermore necessitates an exploration of platform capitalism and the attention economy at the root of the dynamics that we see play out in content distribution, as well as the neurological effects of dopamine and the exploitation of dopaminergic pathways for growth and attention hacking by tech companies.

How does all this relate to democracy theory?

Democracy theories like deliberative democracy (Habermas, 1992/2014) rely on concepts of the public sphere and communication therein. While social media may initially have appeared as spaces of deliberation, their theoretic reception now ranges from mixed to negative. With the role of celebrity and celebrity politics, another concept in democracy theory may offer more promising explanations: the culture industry (Horkheimer & Adorno, 2006). Beyond exploring the relationship of Instagram with existing politics, this dissertation will formulate an original contribution to political theory that addresses digital principles for technology.

As Marshall (2020, p. 98) points out, social media may have created a shift from representational to presentational regimes that produce a shift in how power and influence manifest. This shakes at the bedrocks of the foundations of political, cultural, and economic spheres as those have been built and accompanied by the representational regime. If representation as a concept is on the way out and presentation is on the way in – promoted and supercharged by self-presentational dynamics on social media – democracy theory needs to explore and account for this, as the concept of representation is at the heart of the tenets of a democratic state. An inquiry into this must also consider whether there are spillover effects from the sphere of culture into political culture and politics.

3. Images on Instagram: From Representation to Presentation

Instagram stands out among the other social media apps because it is the only commercially successful social media app that focuses on images. With two billion active users monthly as of January 2023, Instagram is also the fourth most popular social media app worldwide (Statista, 2023). Of course, there are other apps for visual media like Glass, Vero, or VSCO, but none of them have Instagram's market reach and cultural clout. Its visual focus makes Instagram stand out from the other social media platforms.

In a little over a decade since its launch to the world in 2010, Instagram has changed how we present ourselves to the world, what we deem private and public, how we dress, travel, what restaurants, businesses, and product design look like, and even how we may choose to surgically alter our faces. Bluntly put, there is a reason plastic surgery clients ask for “Instagram face” and not Twitter or Facebook face (S. Smith, 2021; Tolentino, 2019). And that reason is the power of images.

How do images relate to political science? First and foremost, they can be political because of political subject matter or political usage. Images have been used to create the image of politicians even before the advent of the medium of photography – and certainly long before the creation of Instagram. Royal portraiture, numismatics, graphics, statues, and etchings have all been part of the wider practice of political iconography – making power visible and telling visual stories about the sovereign or president. The medium of photography complements this nicely with its implied notion of showing “true” images or reality. Secondly, images can be political due to context: for example, news or documentary photographs that spark public debates and political action. Thirdly, and in the case of Instagram this is most interesting, there are those images who are not inherently political because of their subject matter or usage, but over time or in larger numbers attain social and thus political meaning. For example: an individual influencer’s photo by the pool might not seem a political consideration. When hundreds or thousands of people turn public spaces into backdrops for self-branding performances, this communicates something about culture, social norms, and how we come together in the political sphere. Photos of food shared on Instagram in their immanent meaning are not as outrightly political as an image of a politician. The subtle changes they indicate in greater societal, cultural, and economic transformations, however, do offer themselves up for a political reading.

At the heart of Instagram lies the medium of photography that has changed so immensely since its invention in the first half of the 19th century. To understand the visual contents of

Instagram, it is sensible to take two points of reference: theories of the image as a first and concepts of photography as a second step. A third layer of visual culture studies in the present complements these two sections. Beyond the study of images and photographs themselves, visual culture can provide us with clues about their usages.

This section of the dissertation aligns with the premise of the pictorial or iconic turn, a turn to images as focal points of inquiry. The iconic or pictorial turn promotes visual material over the logocentric trends in philosophy that were shaped by Plato’s hesitance towards images as well as religiously motivated iconoclasm (Baader, 2003, p. 144; Bachmann-Medick, 2016, p. 245). The pictorial and iconic turn emerged at about the same time in the US, where the pictorial turn was first introduced by the cultural theorist William J.T. Mitchell as well as in Germany, where art historian Gottfried Boehm proclaimed an iconic turn and the return of the image (Bachmann-Medick, 2016, p. 245). Both turns usurped the dominance of language and text after the linguistic turn (*ibid.*). Instead, they established the image as a subject of inquiry with a power of its own (*ibid.*).

Three decades after the iconic turn, our realities are awash in visual material. We are living in a pictorial, image-centric, and increasingly video-driven present. And while the contemporary world is increasingly determined by visual artefacts, our tools in assessing images still lag behind the complexity of image meanings (Alloa, 2016, p. 228). In this dissertation, I cannot encompass all debates around images and the debates around the reception of the iconic or pictorial turn. It would simply surpass the scope of this project. Rather, I apply concepts of the image and visual culture as epistemological tools on the nature of the visual material and culture on Instagram. I follow Flusser’s (2000, p. 9) concept of images as representations or abstractions of things, scenes, or occurrences in a multi-dimensional space and mediators between the world and human beings.

Lastly, the title of this section is from representation to presentation. Representation and presentation are categories encoded in the reception of images:

Representation is:

“[...] a visual construct that betrays the ideological agenda of its makers and whose content is susceptible to manipulation by its receivers.” (Moxey, 2008, p. 132)

On the other hand, presentation is:

“[...] the contemporary focus on the presence of the visual object, how it engages with the viewer in ways that stray from the cultural agendas for which it was conceived and which may indeed affect us in a manner that sign systems fail to regulate.” (*ibid.*)

One is – in broad strokes – about what an image stands for while the other reflects the presence of the image and how it may affect us. However, the chapter title refers to Marshall’s (2020, p. 98) findings that our culture is moving from a representational to a presentational regime through self-branding tactics, for example. It is possible to see, however, how these two concepts of representation and presentation connect, considering the affective and cultural power of images presented on Instagram.

With social media and Instagram, there has been a profound shift in the use and nature of images that may upend basic dynamics in perception, behavior, and societal construction (Marshall, 2020, p. 98). The present is an era of the presentation of the self, coupled with a media dynamic that supports this (*ibid.*). In short: we have gone from a visual regime of “look at this, I made or felt this” to “look at me”. Albeit a seemingly subtle shift, this has immense effects. It shakes up the communicative foundations of political, cultural, and economic spheres that have been built on and accompanied by the representational regime (*ibid.*). When I refer to a shift from a representational to a presentational reality as the overall epistemic framework of this chapter, I refer to it in the sense of the changing communicative cultures that Marshall (*ibid.*) describes that occur on social media.

As a brief overview of the section, I will explore my initial question about what is political about images on Instagram even if no political subject matter is present. To do so, I will explore theories of images, the relationships images create between the creator and the spectator, as well as account for changing practices of seeing in the digital age. Lastly, an exploration of Bredekamp’s (2021) theory of the image act will draw up a connection between the agency of images and their political impetus. Further, approaching Instagram as a photo platform and a nexus of visual culture, two separate sections will explore political iconography and the connection of photography and politics, as well as changing visual practices in contemporary society that decisively affect the use and reception of images.

3.1. The Power of the Image

It is one of the truisms of our time that we live with a deluge of visual material. Never in history has it been so cheap and easy to produce images on a continuous basis. To live in the present is to engage in visual production and consumption schemes, be it forwarding memes on WhatsApp, taking a selfie, or scrolling through the endless pictorial spectacle of the Instagram feed. Oftentimes, notions of the visuality of the present are accompanied by cultural pessimism. Images may be ubiquitous but their value and meaning has deteriorated. Everyone may be a photographer now, yet that does not guarantee visual literacy or aesthetic pleasures in regarding their images. At first glance, it may not matter. Instagram is a highly visual platform with an aesthetic of its own. This aesthetic is predictable, as evidenced by the global spread of a bland, hipsteresque aesthetic – aptly termed AirSpace – that took over Airbnbs, Instagram feeds, and coffee shops all over the world in the 2010s (Chayka, 2016).

Images matter. Shared on Instagram, they shape how we live, create interiors, move around the world, and communicate with each other: a meme can say more than a thousand words.

“[...] traffic in images [...] has become the definitive mode of exchange in contemporary society. Intense visual presence, clamorous competition, and incessant diversification leading to massive overproduction are the most evident features of contemporary commodities. Social media is simply the most obvious and widespread vehicle of this saturation. Images seem to have become the primary commodities produced and consumed in contemporary economies. Images, too, are its primary currency.” (Smith, 2022, p. 3)

Three decades after the iconic and pictorial turn, political science still only occasionally broaches the subject. Usually, images become relevant in political science research when they show political subject matter or are used in political contexts, like in studies on political iconography, visual political communication, or photojournalism. Beyond that, political science scarcely concerns itself with questions of the image, especially with the quantitative turn of the subject. Images are hard to quantify and open to broad interpretation. Hence, art history, cultural studies, and philosophy are more helpful companion sciences than political science when it comes to the question of images.

Yet, images are a fascinating and insightful subject of study for political scientists, especially considering the visual tendencies of contemporary culture. Images enable the perception of complex realities and can make them visible (Baader, 2003, p. 144). Our sense of perception, how we view the world is ultimately co-shaped by the images we consume, create, and share. Images have the power to aid us perceive and make visible what may have been concealed or outside of our perception. They can help bring any subject matter to the forefront of our awareness in an instant.

Bredekamp (2021, pp. 1-3) states five reasons that underscore the importance of studying images in the present: the ubiquity of images, the usage of images in politics, images as weapons in the military sphere, scientific usage of images where diagrams become autonomous analytical tools, and the increasingly prominent legal status of images. Images proliferate every part of our life. In an age, where technological means facilitate the production and sharing of images, the above only increases.

At the outset of this section, one fundamental distinction must be made. An image is not inherently a work of art. One can be the other: an image a work of art and a work of art can take the form, shape, or medium of an image. However, this is not a conceptual requirement. It is important to note this before I embark on an exploration on the concept of image – especially with a platform as awash in images as Instagram in mind. When I refer to images (or pictures) in this dissertation, I refer to what conceptually casts a wider net than images as works of art. When I write image, it may encompass the realm of art but does not require it. I will explore what makes an image in depth in the following. In the meantime, I would like to note that art and images share a commonality: that artist and artwork, image and creator are interrelated. In the *Origin of the Work of Art* Heidegger (2002, p. 1) states that in the relationship between work and artist “neither is without the other”. This certainly applies to images, be they digital or analog, as well.

Leaving the conceptual plane, the relationship between political science and images becomes more tangible in an example that Horst Bredekamp references in the updated English edition of *Image Acts* (Bredekamp, 2021, p. IX). In it, he writes about the imagery produced during the storming of the US capitol on January 6th of 2022. He notes that the images, the visual record of this event achieved greater significance than the event itself. Bredekamp (ibid.) states that:

“[...] the availability of this record [...] was in real danger of provoking a far greater state of emergency than that which had already come about. This incident shows how easily, in our age of digital media, bodies and images may merge; but it also reveals how necessary it is to comprehend this type of substitution – of the image for the body, and of the body for the image – as a categorical form of the history of images, and in turn, how essential it is to analyse [sic] this phenomenon [...]. It is in the name of enlightenment adequate to an era in thrall to the visual that we need take these dimensions into account. A failure to acknowledge the autonomous surplus of images not fully absorbed within the conscious awareness of the observer means surrendering to its power.”

In the above, Bredekamp (ibid.) ascribes images with three planes of power: the image act (here in what he calls its substitutive form), the media reception of the image, and the power of the surplus of images and the effect this may have on the observer. It is especially important to note this third aspect. Ever since images have become digital and instantly shareable through social media and smartphones, the truism of the flood of images applies with certainty.

We are awash in images every day and their sheer flood in our lives is an aspect of the power of the image in and of itself. It is necessary to comprehend them for the sake of democracy and the political fabric – with their inherent layers of meaning, agency, and through their potency in sheer numbers.

There are two fundamental turning points in human culture: the invention of writing and the invention of technical images (Flusser, 2000, p. 7). In the age of the internet and technology, one can add or anticipate two more: instantaneous, global transmission of information, and the production of cultural artifacts (or anything, for that matter) through artificial intelligence.

With Instagram, all four come together. There are images with captions of various lengths on the platform, shared globally in an instant, and mediated through artificial intelligence. From an evolutionary perspective on human consciousness, the invention of writing was a significant disruption. Flusser (2000, p. 10) describes images as magical and the invention of linear writing as the beginning of what he calls “historical consciousness” (*ibid.*), creating a struggle between historical consciousness and magical consciousness that is ongoing. Writing was a deep inception and significant turning point. It is also the younger of these two cultural techniques.

Studying images occurs against the backdrop of these fundamental shifts Flusser (*ibid.*) describes. I will not revert to magical thinking in this dissertation. However, it is important to note the paradigm shifts that tend to entail significant changes in human culture: there was writing, technical images, and now there is instantaneous global transmission of information, as well as machine-created cultural artefacts. On the precipice of a new shift in machine-created visual material, it is also sensible to look back to look forward. Image-making has prevailed over millennia. But what about the (political) power of the image?

3.1.1. What Is an Image?

In art production, art history, and visual culture, image is normally taken as a given term (Elkins, 2012, p. 2). But what do we talk about when talk about images? Instagram is a visual platform, full of images like photographs, diagrams, and memes. Photography, Instagram's principal purpose, is a form of image. To discuss the effect of photographs on Instagram, first we need to understand the image.

Despite our intuitive understanding images, they are conceptually vast. Elkins (ibid., p. 3-5) shares a potentially infinite list of theories on the image, for example: images as the very skins of things, reminders, kisses, models, the touch of flowers, sign systems, or genus, composed of individual species. It appears that you can make of the image what you want it to be. What is an image may seem obvious on an intuitive level. Yet, casting into words what one perceives or makes of an image, is challenging. It is no surprise that the field of theories of the image abounds with options and at the same time appears disorganized (ibid., p. 1). This chapter cannot categorize the different theories of the image, given the overall framework of this dissertation. What I will do instead is to contextualize the image along conceptual fault lines, for example the dichotomous relationship between images and texts or the presence and absence in images, to attain a clearer understanding of the properties of images.

Images depict, show something. Unlike words, which require reading and comprehension, images allow us to see something in an instant. We process images faster than words (Pellegrino et al., 1977, p. 383). Berger (1972, p. 9) defines images as:

“[...] a sight which has been recreated or reproduced. It is an appearance or a set of appearances, which has been detached from place and time in which it first made its appearance and preserved. [...] Images were first made to conjure up the appearance of something that was absent. Gradually it became evident that an image could outlast what it represented.”

An image captures or reproduces something, makes things visible, and endure longer than what it represents. Images have a reproduction, visualization, and temporal aspect. Another definition of the image is a “[...] presentation, a source of power whose nature as an object endowed with being requires that its analysts pay careful attention to the way in which it works its magic on its viewer” (Moxey, 2008, p. 140). Here, the implied power of the image that extends beyond its vernacular notion is already evident. I will discuss its sources of power in depth in the fourth section of this chapter and the capacity of images to take on agency of their own, for example as per Bredekamp's (2021) *Bildakt* or *Image Act*. Alternatively, the image can also be conceived as “[...] a cultural representation whose importance lies as much in the content with which it is invested as in its intrinsic nature. Depiction is to be studied not only for

its own sake but for the spectrum of social effects it is capable of producing” (Moxey, 2008, p. 140). Here, Moxey (*ibid.*) delineates two differing scholarly positions on the image – images as a cultural representation or a presentation of something. Images are infused with a life of their own and inorganic at the same time (Bredekamp, 2021, p. 8).

In yet another approach, Flusser (2000, p. 9 f.) suggests that images mediate between the world and human beings – with far-reaching consequences on how we experience the world:

“Human beings 'ex-ist' [sic], i.e. the world is not immediately accessible to them and therefore images are needed to make it comprehensible. However, as soon as this happens, images come between the world and human beings. They are supposed to be maps but they turn into screens: Instead of representing the world, they obscure it until human beings' lives finally become a function of the images they create. Human beings cease to decode the images and instead project them, still encoded, into the world 'out there' [sic], which meanwhile itself becomes like an image - a context of scenes, of states of things.” (Flusser, 2000, pp. 9-10)

To study images is also to study their intervention in how we perceive and move through the world. Without pictorial knowledge, images, once helpful tools, can turn into screens as Flusser (*ibid.*) mentions above – blank surfaces that obscure the world. When images are projected out into the world, which becomes more like an image, we can detect phenomena of present-day cultural life that is saturated in images online and on social media, including Instagram. The flood of images in life creates what could be the world-picture, an assemblage of contexts of scenes. “Human beings forget they created the images to orientate themselves in the world. Since they are no longer able to decode them, their lives become a function of their own images: Imagination has turned into hallucination” (*ibid.*, p. 10). Images can be disorienting and overwhelming.

Images have been a central element in human history (Mitchell, 2005, p. xiv). “There is no getting beyond pictures [...] to a more authentic relationship with Being [sic], with the Real [sic], or with the World [sic]” (*ibid.*). Looking at and understanding images is imperative for understanding ourselves and life – certainly an impetus for this dissertation.

Pictures are peculiar and paradox, at once concrete and abstract, specific individual things and symbolic forms that embrace totality (*ibid.*, p. xvii). Image-making for Mitchell (*ibid.*) is intrinsically linked with us. Any picture is more than just the thing, it establishes relationships, reflects cultural and often historical information in hindsight; images can mediate a layering of complex interconnections between creator, viewer, space and time, presence and absence. Mitchell (*ibid.*) refers to photographs, when he writes the following, but I think it is also very applicable to making images in general when he denotes them as “[...] the establishment of a cliché or stereotype, the institution of a system, or the opening of a poetic world (or perhaps

all three.” Images are fascinating subjects of research, because of their multi-modality and multilayered nature.

Semantically, we need to make an important distinction. Even though image and picture are often used interchangeably in the vernacular, they do not necessarily mean the same thing. There is an inherent ambiguity when it comes to images: the visual that is the subject matter inside the frame and the object that holds the frame. Semantically, there are differences across languages. German, the native and publication language of some of the authors I cite like Boehm (2007), for example, only knows the word ‘Bild’ to describe an image. As this dissertation is written in English, it is important to notice semantic differences in the words that describe image. In English, the words picture and image ask for a preliminary distinction to narrow down the object of inquiry.

“The English-language distinction between ‘image’ [sic] and ‘picture’ [sic] is pertinent, but only in the sense that it clarifies the distinction between the ‘image’ [sic] that is the subject of our quest and the ‘picture’ [sic] in which that image may reside.” (Belting, 2011, p. 2).

Due to its digital, ephemeral nature, it is somewhat more nuanced to apply the definition above to images on Instagram. On Instagram, the image is what the square in the feed shows and the picture is the square frame within which it is shown.

In *Picture Theory*, W. J. T. Mitchell proposes three distinctions between images and picture: 1) the difference between a constructed, concrete object or ensemble (for example a frame, the materials of an image) and the virtual appearance it provides for a beholder, 2) the difference between a deliberate act of representation (for example to picture something) and the less voluntary or even automatic act (for example imagining), and 3) the difference between a specific kind of visual representation (for example the pictorial image, as opposed to a statue), and the whole realm of iconicity, likeness, and resemblance we mean when we use the word ‘image’ (McNamara, 1996)²². Images in Mitchell’s view can be “[...] mental images provoked by a set of verbal signs” (ibid.). From a more practical point of view, I have seen image used more broadly and occasionally also interchangeably with picture. In the following, when I refer to image, I mean the conceptual term that can but does not have to be a picture.

Image, Body, and Medium

When humans interact with images, Belting (2011, p. 5) contends that three parameters are involved: the body, external images, and a medium in the sense of an agent. He states that the medium is a host or a tool for an image “proposing a close and fundamental interrelation

²² McNamara interviews Mitchell.

(and even interaction) of image, body, and medium as components in every attempt at picture-making” (ibid., p. 3). His reading applies to statues, paintings, photographic prints, as well as social media image sharing. Online, the medium for interacting with an image is the photo stream of algorithmically curated feeds as is the case with Instagram.

Belting’s connection between the image, body, and medium emerged from his studies of funereal images. There, images make a body’s absence visible and transform it into an iconic presence (ibid.). The dead have passed, however their bodies captured in the image remain, retaining a presence.

“The mediality of images is thus rooted in a body analogy. Our bodies function as media themselves, living media as opposed to fabricated media. Images rely on two symbolic acts which both involve our living body: the act of *fabrication* [sic] and the act of *perception* [sic], the one being the purpose of the other.” (ibid., p. 3)

Furthermore, Belting (ibid., p. 5) negates the existence of images as media and instead postulates that images need media for their transmission and to become visible for us. In his reading of images, images can even migrate between media and accumulate traces and features of several media (ibid.). The latter is especially interesting in the context of sharing pre-digital images on social media. If a user is aware of the historic and/or cultural context of a medium, they will likely perceive a black and white image by Henri Cartier Bresson on several levels. For example: These classic photographs should, then, to a viewer carry some of the traces or features of the original analog photography as a medium, as well as the digital platforms they are being shared with. Assuming a user’s visual literacy or awareness, this creates a convergence of contexts and timelines through the consumption of a historic image in a new medium. Conversely, if a user did not have visual literacy or knowledge about the historic context of a black and white image by Cartier Bresson in this example, they would still have access to the layer of features delivered by the algorithmic feed as a medium.

Belting’s (2011) position above is a different reading of images in relationship to the concept of medium versus Marshall McLuhan’s (1964, p. 1) reading of medium where the medium becoming the message itself: “For the ‘message’ [sic] of any medium or technology is the change of scale or pace or pattern that it introduces into human affairs.” This points to Instagram’s cultural and social effect. Furthermore, McLuhan (ibid.) also states that the content of any medium is always another medium. Without going too far into media studies and the reception of McLuhan’s work, the marked difference between Belting and McLuhan’s conception of medium is that Belting perceives medium as an intermediary to connect the body and an external image, while McLuhan assigns transformative power to media. Belting’s conception of medium is more descriptive or connective rather than McLuhan’s, which has an in-built evaluation.

“I would contend that our bodies themselves operate as a living medium by processing, receiving, and transmitting images. It is on account of this in-born capacity of our bodies (our minds as part of our bodies) that we are able to distinguish media from images, so that we understand an image to be neither a simple object (a photographic print, for example) nor a real body (the body of the loved one in the photograph). The evolution of pictorial media, in other words, is one thing (the invention of photography, say) and mental disposition (the memory of earlier media or the memory of older images in newer media) another thing. The distinction between image and medium also explains our deliberate, intentional shifts of focus from the one to the other. The role of the human user in choosing what to consider often remains forgotten in the theory of media [...]” (Belting, 2011, p. 5)

Two things are noteworthy in Belting’s above concept of bodies as a living medium and the relationship between objects/images and the mental dispositions underwriting them: human minds can shift and distinguish between one and the other and both categories (the thing and the thought, to keep it simple) he describes are on different evolutionary paths. When evaluating Instagram and images presented and consumed on the platform, we run into potential pitfalls: the thing and the thought of the image are on vastly different trajectories in this context. The thing has evolved rapidly, while the thought and the mechanism behind it are essentially the same. Seeing and imagining images – biologically speaking – are still the exact same mechanism as they were when photographs were analog or in ages of previous media.

This poses no real challenge to Belting’s conception of images. Yet, conceptual friction arises in the age of social media and algorithms when he refers to the role of the human user and our ability to choose to shift focus. In the age of digital technology, we are confronted with a previously unseen organizing force (the algorithm) that leads to a scrambling of the clear boundaries between the thing and the thought in the above and our agency over our own choices. If images are ephemeral and exposure is mediated through algorithms based on past preferences and data points, what happens to the intentional shifts in focus Belting describes above and the users’ agency in what to choose?

The Image Versus Works of Art

An image is not necessarily a picture and is not necessarily a work of art. It can be, but it is not a given. In this dissertation, I make a distinction between the image as a concept and the work of art. Heidegger’s conception of the origins of works of art comes to mind here. “In the art work, he said, he the creator discloses the truth-of-all-being within a design and illuminates a new, unfamiliar world beyond the existing realm” (Stulberg, 1973, p. 257). Images can be but are not always employed in such a manner.

For Belting (2011, p. 2) images are distinct from works of art which he sees as tangible objects with a history that can be classified and exhibited. In turn, an image is conceptually more ephemeral, as it

“[...] defies such attempts of reification, even to the extent that it often straddles the boundary between physical and mental existence. It may live in a work of art, but the image does not necessarily coincide with the work of art.” (Belting, 2011, p. 2)

In this concept of images, there are two layers of meaning of an image: the physical and the mental, the image as it lives in our minds and as we can see it. Images are a way of making visible and manifesting the mental and intangible. Reading images for political science, then, matters because they help us see what might otherwise only exist in the mind’s eye or imagination. What is in the mental, ephemeral plane individually and collectively manifests in the images we produce and consume – especially through the heightened collective connectivity of social media. Works of art can be important sources of political science insights or vehicles for analysis, but images take on a different, more varied, and nuanced role. As with pictures, an image can be a work of art but does not have to. In the context of Instagram, this is a very helpful framework to avoid a de-facto attitude of cultural criticism for a supposedly apparent lack of artistic value in images on Instagram. They do not have to be works of art to suffice the definition of image. Thus, this thesis views what is being shared on Instagram through the lens of the image with an additional marker of the artwork, where it applies.

Belting’s work on images is especially interesting in the context of Instagram and digital images, where the lines between the object, its permanence and impermanence, and the image are becoming increasingly blurry. In Instagram photography, we are rarely dealing with objects of art. More often, images on Instagram describe the everyday and a plethora of experiences and subject matter. It is interesting to note here that the fleeting nature of images in a feed connects with Belting’s idea that images are located in between the boundary of physical and mental existence. If an image is not physically tangible and ephemeral, like it is on an Instagram feed, can it still be considered a thing or does it live closer to the sphere of the mental existence on the scale between physical and mental? Is this a dichotomy characterized by either or are there intermediary states where the physical meshes with the mental and vice versa to certain degrees? Digital and online images, especially on scrollable feeds, can possibly unite characteristics of both.

Presence and Absence in Images

As mentioned above in relation to Belting’s studies on funereal images, images can make the absent present. At the same time, the inverse is also possible: images can make absences

tangible. The depiction of a scene or a person in an image shows what was once present to the creator of the image. For the spectator, its presence is retained through the image. However, when we look at an image, we also notice absence: that which is shown to us is not there. Thus, “[...] memory is a body experience, as it generates images of absent events or people remembered from another time or place.” (ibid, p. 6)

Images testify the absence of whatever they make present (ibid.). Through whichever medium they are produced, they own the presence of what they are meant to transmit (ibid.). A photograph, painting, lithography, or statue comes to own the only presence that is possible of whatever it shows or embodies (ibid.). This, in turn, highlights the absence of the object or person (ibid.). Images are the presence of an absence and the reason we can compute and understand this is – in Belting’s view – our capacity to make a distinction between image and medium, that which it shows and how it is being shown (ibid.). Images “[...] need a presence of medium in order to symbolize the absence of what they represent” (ibid.).

Another, related factor is the absence of that which is not shown in an image. Images as social or cultural constructs shape visual sensibilities and image-making practices. What is not shown can be an individual or socially and culturally mediated choice – or something that occurs on the subconscious level. However, it is important to note that for everything that is in an image, there is something that is not. When we turn to Instagram, this can be something as simple as a crop that edits out something we do not want to be seen in the backdrop or the framing of a still live painting that shows a table with fruit but not the chair or the rest of the room. Presence and absence in images can be a choice.

Words Versus Images

At the heart of definitions and explorations of images lies the quest to distinguish, delineate them from words. The conflict between images and texts goes back to almost as long as they have existed. Throughout the ages, there were ongoing philosophical debates on the merits and detriments of visual matter. Images predate writing and the invention of writing was a disruption in human cultural practice and consciousness. As previously stated, Flusser (2000, p. 10) describes images as magical and the invention of linear writing as the beginning of what he calls “historical consciousness” (ibid.). The establishment of writing and historical consciousness created a challenge to the a-linear, magic-like consciousness of images. Debray (1995, p. 531) stipulates three mediological cesuras of civilization: writing, printing, and audio-visuality. Each of them has its distinct form: the idol, art, and the visual (ibid.). Even if concepts around the paradigm changes in writing and image-making differ between Flusser

and Debray, a common denominator still emerges: images and writing are two different steps in our imagination.

After millennia of scholarly inquiry into language, images began to receive scholarly attention at the end of the 20th century. That does not mean that there had never been academic or philosophical works on images before. However, the iconic and pictorial turn in the early 1990s repositioned images as objects of inquiry and established them as valid and necessary research subjects. It may be no coincidence that both the iconic and pictorial turn emerged in an era when technological developments like the internet and the first commercially available digital cameras produced new means of creating and disseminating images.

Iconoclasts throughout the ages have argued that images are deceptive and destructive and that spectators must be protected – thus implying their power (Bredekamp, 2021, p. 19 f.). Bredekamp (ibid., p. 3) attributes this conflict between words and images to a contradiction between the following assumptions: 1) that knowledge is only securely established when sensorial impressions have ceded to abstract notions versus 2), that sensorial impressions, especially through the visual input of images, that thought is stimulated. Meaning: written abstractions are not driven by sensory input; hence they are more suitable for recording knowledge or that images spark the mind and help us engage with certain thoughts or subject matter. This attitudinal dichotomy contributes to the notion that images are a somewhat silly or less valuable subject of inquiry. There is no philosophical justification that words are more powerful forms of signification than images (Moxey, 2008, p. 137). “Words are no more a medium of epistemological certainty than are pictures” (ibid.).

The relationship between images and texts is not exclusionary, as one might assume. Rather, they are two discrete spheres, they feed off each other: “Texts admittedly explain images in order to explain them away, but images also illustrate texts in order to make them comprehensible” (Flusser, 2000, p.11 f.). Writing can mediate between humans and the images they make, but it can also obscure images and insinuate itself between the two (ibid., p. 12). This can have challenging consequences:

“If this happens, human beings become unable to decode their texts and reconstruct the images signified in them. If the texts, however, become incomprehensible as images, human beings' lives become a function of their texts. There arises a state of 'textolatry' [sic] that is no less hallucinatory than idolatry.” (ibid.)

In this context, Instagram's caption function comes to mind. From the beginning, users were able to upload images to Instagram together with captions to describe the scene, share thoughts, or deliver a quip of an image caption. It is less likely that Instagram devolves into a

state of textolatry, however images and captions on Instagram can be complementary or confusing, when they misalign in content or emotionality.

Mental Pictures and Imagination

Where do the images we create come from? Mental imagination, our mind’s eye, is a precursor to the creation of images through whichever medium. There is a relationship between inner images that we imagine and outer ones we create. Yet, Belting (2011, p. 4 f.) cautions against a rigid dualism that the two areas have nothing to do with each other. On the contrary, inner images react to outer images (ibid.). Outer images are more dominant for Belting (ibid.). In the age of Instagram and an overall increase in pictorial media through smartphone photography and messaging apps where we can share images, for example, the dominance of outer images is also a function of technologies we have available to us and the sheer flood of images we are surrounded by. Images do not only exist on the wall, TV, or phone screen and neither do they exist only in our heads (ibid.). Rather, the process of inner and outer images, imagination and picture, is one of mutual reactions and cross-pollination. Scrolling for hours on Instagram or seeing repetitive trendy aesthetics can affect our inner imagination and in turn the images we create from that. It is thus not surprising, that aesthetic hegemonies emerge on Instagram, as “[...] mental images are inscribed into external ones and vice versa” (ibid., p. 5).

Belting (2011, p. 10) cautions that it is important to distinguish between the social practice of image-making that is a cultural universalism and the visual perception or generation of inner, mental pictures.

“An ‘image’ [sic] is more than a product of perception. It is created as the result of personal or collective knowledge and intention. We live with images, we comprehend the world in images. And this living repertory of our internal images connects with the physical production of external pictures that we stage in the social realm.” (ibid., p. 9)

Images are fueled by the relationship with the viewer and creator. An image is more than a flat, two-dimensional or digital surface. It is “[...] defined not by its mere visibility but by its being invested, by the beholder, with a symbolic meaning and a kind of mental ‘frame’ [sic]” (Belting, 2011, p. 9).

“Images are mediations between the world and human beings” (Flusser, 2000, p. 9) and images exist to make the world comprehensible to humans (ibid). Flusser (ibid., p. 8) furthermore states that images are significant surfaces; they make abstractions comprehensible to us. Here, an abstraction is the process of reducing something that is in a multi-dimensional space into the two dimensions of a flat surface (ibid.). This process remains the same for digitally generated images, even though the question of dimension may be

contested. Are images on Instagram still projected onto a flat, two-dimensional surface, or does the smartphone or computer screen interfere as another dimension or necessary medium for the display of these digital images?

At any rate, imagination is central to the creation of images. It is the

“[...] ability to abstract surfaces out of space and time and to project them back into space and time [...]. It is the pre-condition for the production and decoding of images. In other words: the ability to encode phenomena into two-dimensional symbols and to read these symbols.” (Flusser, 2000, p. 8).

To create images, humans need imagination. Even if it is just a photo of lunch arranged in a visually pleasing manner on a table: to capture it and share it with the world on Instagram, imagination is a necessary component to this. Even quotidian or seemingly irrelevant, trite subject matters require the process Flusser (*ibid.*) refers to above: reducing the multi-dimensional into the two-dimensional surface of a photo or digital screen. One must imagine the photo one wants to create for Instagram before taking it.

Furthermore, images live at a curious intersection of physical media and the ephemeral planes of our imagination. Images are also personal, because they are a product that emerges from us, from ourselves, from our mental structures, and lastly that which is so hard to grasp, that we call imagination or creativity:

“At a fundamental level, the question of what an image is requires a two-fold answer. We must address the image not only as a product of a given medium, be it photography, painting, or video, but also a product of our selves, for we generate images of our own (dreams, imaginings, personal perceptions) that we play out against other images in the visible world.” (Belting, 2011, p. 2).

3.1.2. The Relationship Between the Observer and Creator

What is an image if there is nobody to see it? Images can exist on their own, they do not need the observer to validate their existence. Seeing an image is not a precondition to its existence. However, images fulfill an important role in mediating between the author or creator of an image and the spectator or observer²³. Images have a communicative value that inserts them into human relationships. The reception of visual artifacts matters – that they are seen, as well as how we interpret and interact with them (Moxey, 2008, p. 140).

As noted in the previous section, images are conveyed through a medium, however also live in the mind, the mind’s eye, or in mental pictures. Beyond this relationship between mind, imagination, or medium lies another relational dynamic that is inherent to images: the triangulation between observer, subject matter, and the creator of the image. When an image is conveyed through a medium like photography, for example, somebody is creating it to transmit a certain idea or subject matter, or in Belting’s (2011) sense a mental image that lives in the body. Somebody else receives it.

Art history has recognized active observers as a constituting part of the image (Bredekamp, 2021, p. 30). Like the quotidian philosophical truism on whether a tree has truly fallen, if nobody has been in the forest to hear it falling, this relationship between images and observers asks whether an image is truly an image if nobody sees it. Images are created to be seen, observed, and glanced at by somebody. Sometimes, they have specified observers, at other times, they are more general in purpose. The former is especially evident in the case of social media, where images are shared to engage with followers or encourage them to make a purchase. However, this intentional production of images for consumption is scarcely an effect of the present. Culturally, there have always been reasons to intentionally produce images.

If images exist to be seen, they establish a relationship between the creator and spectator by way of the medium of the image, as well. The creator of an image produces it for a variety of reasons, for example commissions, self-expression, to capture a moment, or for inner exploration. Yet, in almost all cases²⁴, the creator knows that the image will be seen by somebody at some point of its existence. And even though the creator may forgo any desires to please or entertain aesthetic notions of the spectator, the figure or role of observer is present in creation, simply through the concept that a constituting element of images is to be looked at

²³ I use the terms spectator, observer, and viewer interchangeably throughout.

²⁴ There may be works of art that get lost or destroyed – whether for conceptual or other reasons – before anybody but the creator of the image can look at them. In this case, they are still images because a spectator is not the only constitutive element of the existence of an image.

by somebody. Likewise, when viewing an image, its creator is inherently present through this three-way relationship between image, creator, and spectator. It is a bi-directional relationship. If producing an image conceptually involves a spectator, then viewing an image conceptually involves the creator; at least because without the creator the image could not exist. Viewing and creating images is thus a relational activity.

This intricate relationship between the observer and creator is further exemplified when we speak of presence and absence in images. Images make the absent present (Belting 2011, p. 6). They show to the spectator what the creator might have witnessed as present at the time of creation of the images. In the image, as the object shown is not present, the now-absent becomes visible. Inherently, images create a relationship between spectator and creator through what they represent. Flusser (2000, p. 8) states that a gaze over an image follows the structure of the image and the intention of the spectator. An image can be so powerful that it even arrests the gaze of the observer, suspending their freedom for a moment, because they are locked into the moment of seeing.

In this three-way relationship between spectator, creator, and image, the image itself can also influence how it is being perceived by the spectator. For example, their relationship can be affected by the medium used for an image (Moxey, 2008, p. 140). This can also include its material, the color used, or how it is situated in a room. The image itself does not make these choices, of course. However, with their agency, images can take on a role of their own in the relationship between the creator and spectator.

There is no one singular conception of the relationship between the creator and spectator of an image. Moxey (*ibid.*) identifies two ways to look at the relationship between observer and creator: Those who put less priority on the identity of the recipient in favor of the artifact's inherent properties, and those who emphasize the identity of the recipient and creator over the structure of the image. In the former case, the experience, the moment is more meaningful, in the latter the role of the image within the social, cultural, or political context is assigned a higher priority (*ibid.*).

Moxey (*ibid.*) sees a potential for exaggeration in the interpretation of the relationships mentioned. When overly focusing on the contemporaneity of the experience of viewing an image, the encounter with the artifact, this may collapse the distinction between subject and object. When overly investing into the idea of the identity of the recipient and creator, this may cause an exaggerating of the focus of the image as a communicative bridge. The relationship of a creator and spectator of an image is thus relative and depends on which perspective one

chooses – that of focusing on the immediate experience of encountering an image or that which places spectator and creator above the image itself.

In addition, images can elicit reactions in the spectator or recipient. When we engage with them, we may experience emotional, intellectual, and physical responses (Bredekamp, 2021, p. 31). As mentioned, images can wield power over us. They can do so to the extent that "[...] the observer is indeed the object of the object's own gaze" (ibid., p. 28).

Iconoclasm

In this multi-layered relationship between image, creator, and spectator, one needs to also consider interventions that interrupt their encounter. Practices of hiding or shrouding images or even iconoclasm can momentarily or permanently disrupt the relationship between the creator of an image and its viewer. In previous eras, the catholic church shrouded images under veils to uncover them only on the most important days in the religious calendar (Bredekamp, 2021, p. 8). If images act and have innate power, then it makes also sense that there are attempts to dim their power as much as possible.

However, iconoclasm is only so efficient in interrupting this relationship:

"Iconoclasm [...] only succeeds in destroying the medium or medium-support of an image; i.e. its tangible and material or technical aspect. It leaves untouched the image itself, for the image remains with the viewer – and this is so even though it was the destruction of the image that was intended by the act of iconoclasm. (Belting, 2011, p. 5 f.)

Iconoclasm only addresses the materiality of an image. Once seen, the image remains in the memory and consciousness of the viewer, as well in that of its creator. The immediate connection in the three-way relationship between creator, observer, and image may be interrupted. However, it is impossible to erase the effect an image has on those who have seen it and the intentions of the person who created it even long after the image is gone. The image lingers in the mind and thus, the relationship is not entirely severed.

"Iconoclasm, by depriving an image of its physical presence, aims also to deprive it of its public presence, its existence in the public sphere. Destruction in such a case is as symbolic as the original installation or introduction of the image into the public sphere. The destruction is directed against the image (an icon of the enemy in the public imagination, for example), but in fact it damages only the stone or bronze of the medium." (Belting, 2011, p. 5 f.)

This underscores the point that even though the physical presence of an image may be gone, it lingers. Destroying the image only destroys the manifestation of the image. It continues to exist in the mind of the creator and mind of the viewer who has already seen it. There, it can

live on for the individual – and can be spread through tales, descriptions, recreations, or sketches. The relationship between observer and creator thus also takes on an ephemeral, almost transcendental quality.

Returning to the arguments above: in viewing or making an image, it is as if the creator or observer are in the room, as well – if only by means of the triangular relationship between image, creator, and observer. Without the image in the equation, the relationship between creator and observer can scarcely be created. However, if the image was briefly there, seen by some observers and then shrouded or destroyed, it lives on even after it is made invisible. It lives in the mind of the creator and observer and its story can be told in a manner that even transcends the now non-existence of the image.

AI and the Relationship Between Creator and Observer

Historically, the roles of observer, recipient, or spectator and that of the creator or artist have been the domain of humans. In the age of rapidly accelerating technological advances, artificial intelligence is becoming a tool for creation or a co-creator in making images. When an AI-generated image won an art competition at a US state fair (Harwell, 2022), it raised numerous questions: Is AI a tool like a brush? Is it a co-creator?

Humans still create and receive the visual materials AI programs produce. Yet, the process in doing so has shifted and in that raises new questions for long-held conceptual schemes and distinctions. Furthermore, images or visual material exist and more genres and tools for them may be created in the future that communicate images from machine to machine, machine to human, or human to machine. QR codes may be an early example for that, as they are machine-created and meant for machine consumption (albeit a code is not necessarily an image).

AI applications such as NightCafe, “an AI Art Generator app with multiple methods of AI art generation [where] using neural style transfer you can turn your photo into a masterpiece [with] text-to-image AI, [and] create an artwork from nothing but a text prompt” (NightCafe, 2023), Midjourney, an “independent research lab exploring new mediums of thought and expanding the imaginative powers of the human species” (Midjourney, 2023), or DALL·E, “a new AI system that can create realistic images and art from a description in natural language” (OpenAI, 2023) all extend the realm of pictorial creation to machines²⁵. I chose to include their

²⁵ Machines in the broader sense, that is. Strictly speaking, software is not a machine; the devices users run them on are, however.

own descriptions because the wording chosen on the websites best reflect the vision by the creators behind the AI. It is interesting to observe that while NightCafe’s website text focuses more on the program’s functionality, Midjourney’s and DALL·E’s center the vision and evolutionary context of the artificial intelligence more. They are three examples for a plethora of AI art generators. None of these systems have authorship over the works created with them, yet. Their existence has brought about a more complex situation regarding the question on what constitutes human creativity and where does the boundary lie between a work of art or image created by a tool wielded by humans or something else entirely.

AI applications like the ones above also raise questions on creative authorship and copyright. To generate images, these applications first need to be trained on existing image materials. These materials may either be historical or contemporary works of art. But, if an algorithm is trained on billions of works of art, who is the creator: the person entering the prompts or the algorithm that delivers an image as an outcome of its predictive calculations? Do any of the other creators who contributed to image-making with their works of art that fed an algorithm serve as co-creators, even if conceptually? The case of Greg Rutkowski, an artist with a distinctive style in the fantasy genre, illustrates why this is a complex matter. His name has been used in an art generator around 93,000 times, dwarfing the demand for Michelangelo, Picasso, or da Vinci who were each called up around 2,000 times (Heikkilä, 2022). This means that over 90,000 prompts were entered into an AI generator to create an image in the style of the artwork by Greg Rutkowski. Strictly, this does not make him a co-creator but conceptually it is a more nuanced question. What is an artwork created by an AI that has been trained on the qualities and stylistic characteristics of an artist and where the AI being prompted by a human user to create an artwork in the style of the artist in question? Rutkowski initially welcomed seeing images in his style on the internet, yet quickly became concerned about standing out with his own work from a set of digitally created images in the likeness of his style (*ibid.*). The existence and emergence of these AI-powered tools has raised concerns in creative communities about copyright and protection of works of art (and images). The website “Have I been trained?” (Spawning, 2023) helps artists and creatives verify whether their artwork has been used to train a visual or image-creation algorithm to address this.

AI art generators not only challenge the relationship between image and creator, but they also rattle at the dichotomy between words and images long held in the humanities: Now words entered at random into a text box similar to Google’s search bar can create images. “Unicorn farm Iceland abstract”, for example, is a valid prompt for the AI generator NightCafe and creates a bucolic looking pastoral scene with verdantly green grass, red barns in the Scandinavian style, and light falling through clouds reminiscent of romantic painting in the vein

of Turner. Irrespective of this fun experiment, this marks a turning point in the relationship between words and images. These are not instructions such as ‘take the paint brush, dip it in red, and gently dab it on the top right corner of the canvas’, they are verbal prompts creating visual material. They do not even need to be coherent to produce some form of an outcome.

Yet, the AI as a creator or generator of images is still very limited at present and may remain so. Algorithms are trained based on existing data sets and can make predictions based on them. However, they lack the ability to be truly creative and formulate stories (Fletcher, 2022), a domain that may be connected with Belting’s (2011) assertion that images have a mental, bodily component. They live in the mind first, before they are being cast into form through whichever medium of choice of the artist or creator. Following Fletcher’s (2022) thesis, human minds have the capacity to create stories and experience the world along the principle of narrative, while AI can only create based on what it has been fed. The models they are based on “[...] are capturing a lot of correlations in the datasets they are trained on, but they are not actually capturing the underlying causal mechanisms of the world” (Gordon, 2022). Meaning, meaning-making, creation, and creativity live in the nuances of navigating the underlying causal (or irrational, emotional) mechanisms of the world. In that vein, AI generators can be considered tools like paintbrushes rather than co-creators.

3.1.3. Seeing on the Internet: From Gazing to Glancing in the Digital Age

The study of images is inextricably linked with the physiology of seeing. Seeing is so innately connected to our existence that we often do not even think about it. Maybe the best way to conceptualize seeing is by referring to the title of the biography of artist Robert Irwin, a quote by Paul Valéry: *Seeing is Forgetting the Name of the Thing One Sees* (Weschler, 1982). Unless we consciously train our eye on something, seeing often happens at a level below our consciousness, where we may indeed not think about the name of the thing we see – when we see it.

Seeing is pre-verbal, pre-language: “Seeing comes before words. The child looks and recognizes before it can speak” (Berger, 1972, p. 7). Following Berger (ibid.), seeing is pre-verbal on two levels, our own experience of the world and our place in the world:

“It is seeing which establishes our place in the surrounding world; we explain that world with words, but words can never undo the fact that we are surrounded by it. The relation between what we see and what we know is never settled. Each evening we see [sic] the sun set. We *know* [sic] that the earth is turning away from it. Yet, the knowledge, the explanation never quite fits the sight.” Berger (ibid.)

When we see and at the same time are establishing our place in the world, we are open to it and equally embedded in it (Carman, 2012, p. xii). In the above, Berger evokes the tension between words and images that seemingly occupy different realms of our awareness and cognition. Perception is supra or outside of language. The difference between seeing and language Berger establishes in the quote above is also reflective of the impetus behind the iconic turn. While language had been the subject of European philosophy for well over two thousand years, the academic study of images became a focus of inquiry only in the second half of the 20th century (Boehm, 2007, p. 34). Even though seeing and perception have a profound, primary role in structuring and mediating our experience, that which we see was a lesser concern to academia.

Visual experience is a puzzle. Generally, it is thought that “somewhere in the brain an internal representation of the outside world must be set up which, when it is activated, gives us the experience that we all share of the rich, three-dimensional, colorful world” (O'Regan & Noë, 2001, p. 939). To the authors, no pictures in the mind are required for things to appear pictorial to us (ibid., p. 947). From a biological point of view, this is nonsense: “When we look at something, the pattern of neural activity represents the object and to the brain *is* [sic] the object” (Gregory, 1966, p. 9).

Mechanically, we may know how seeing works, yet perception eludes us. To resolve this, O'Regan and Noë (ibid., p. 940) propose that "vision is a mode of exploration of the world that is mediated by knowledge, on the part of the perceiver." Vision extends far beyond just a reflection of an outside image at the back of the retina. Visual experience involves practical knowledge about currently possible behaviors and sensory consequences associated with them (ibid., p. 946). Seeing requires know-how and methods for probing the outside world (ibid.).

Additionally, our perception is limited to what we currently process as being seen (ibid.). We may be seeing the whole scene but only consciously process a part of it – which also makes us aware of immediate changes to it (ibid., p. 946 f.). O'Regan and Noë (ibid., p. 963) further explore two modes of visual consciousness: transitive visual consciousness, one's awareness of an aspect of a scene, and general visual consciousness, our general capacity to become aware of different features of a scene. Thus, visual consciousness is something we do, understanding vision is to understand the things people do when they see (ibid., p. 970).

Yet, is seeing always an active act? When we stare holes into walls, we are nary engaging in an active act of visual consciousness, with our visual awareness on autopilot. On a more abstract level perception, of which seeing is a part, includes the "[...] (relative) passivity [sic] of sense experience and the relative activity [sic] of bodily skills" (Carman, 2012, p. xiii). Hence, seeing – despite the important distinction in modes of visual consciousness, also can involve a passive momentum on our part, where our awareness and our seeing are not guided by neither our attentions and intentions nor our general capacity to be aware. However, vision is not passive. Ernst Gombrich states that pure passive reception is impossible for the human mind as seeing is never merely registering (Mitrovic, 2013, p. 72). Instead, perception can be more aptly described as an active process, conditioned by our expectations (ibid.). Visual experience is dynamic; perceiving is an interplay of directed tensions (Arnheim, 1974a, p. 11). Arnheim states that "these tensions are as inherent in any percept as size, shape, location, or color" (ibid.).

Furthermore, seeing is a bodily experience, involving the eye, where the mechanics of seeing occur and the brain, where seeing is processed are part of the body. In our perception of the world through vision, the body is one's perspective on the world (Arnheim, 1974, p. xv). Seeing is inextricably linked with our physiology.

The Relational Nature of Seeing

Berger (1972, p. 8) emphasizes the relational, intentional nature of seeing. Firstly, seeing is an act of choice, by choosing what we look at (*ibid.*). As a result of that, what we see is brought within our reach, though not necessarily within reach in a manner so that we can touch it (*ibid.*). Berger's closeness is more relational than it is necessarily physical. We create a connection with what we see and thus it is within our reach:

“We never look at just one thing; we are always looking at the relation between things and ourself. Our vision is continually active, continually moving, continually holding things in a circle around itself, constituting what is present to us as we are.” (*ibid.*, p. 9)

Seeing is an activity shaped by perceptual relativity. We look at the relation of things and we also look at how objects, for example, look in relationship to us due to factors such as distance, angle of view, and lighting (Hill, 2009, p. 128).

This relational aspect is also found in our ability to conceptualize what we see. It is not just that we see but that we build mental models and categories around it:

“Gombrich's thesis that there is no innocent eye thus implies that all of our visual experience is always determined by our capacity to conceptualise [sic] the contents of our perception - otherwise he would have to admit that human visuality is at least sometimes capable of passive reception.” (Mitrovic, 2013, p. 72)

Classification of vision aligns with our perceptual system's tendency to group things into simple units or detect objects and patterns (Gregory, 1966, p. 10 ff.). Arguing for the conceptualization and classification in seeing and perception gives way to another thesis, that of seeing as acculturation. If seeing is indeed related to classifying, conceptualizing our reality, then we cannot divorce the concept of ordering from the innate nature of seeing (*ibid.*, p. 75). We can acquire conceptualizations through acculturation, thus opening an argument for vision as a construct. This would turn vision, seeing into a relativist activity, a social convention – a concept that is contested (*ibid.*).

Seeing is bi-directional. We can see. And we can be seen. “The eye of the other combines with our own eye to make it fully credible that we are a part of the visible world. [...] The reciprocal nature of vision is more fundamental than that of spoken dialogue.” (Berger, 1972, p. 9)

Seeing images carries two levels of meaning: the image's reception by a spectator and the making manifest of what the creator was seeing at the time of creation of the image (Berger, 1972, p. 9). Our perception of an image depends on our own way of seeing (*ibid.*). During reception, any image is set into a relationship with the body of the spectator; a process during

which haptic and visual components become active at the same time (Rath et al., 2013, p. X). Perception and reception of images are not a visual process, exclusively. They are based on physical and haptic input and perceptions of the senses, as well (ibid., p. VII). Receiving an image or being a spectator, then, is more than the process of just looking at an image. It involves the other senses, as well – even in the case of digital media, where the glow of the blue light of the screen, the feeling of a finger on the cold, glassy surface of a phone, or the dimensions of a smartphone in the spectator’s hand while scrolling form a part of the sensory perception of an image, as well. Or, as Berger (1972, p. 11) puts it: “When we ‘see’ [sic] a landscape, we put ourselves in it.” Rath et al. (2013, p. XI) furthermore point out that the physical perception of an image is not a cognitive but performative process.

Images are also a reflection of what their creator was seeing at the time of producing it:

“Every image embodies a way of seeing. [...] Every time we look at a photograph, we are aware, however slightly, of the photographer selecting that sight from an infinity of other possible sights. [...] The photographer’s way of seeing is reflected in his choice of subject. The painter’s way of seeing is reconstituted by the marks he makes on the canvas or paper.” (Berger, 1972, p. 10).

An image can show how a subject had been seen by other people (ibid.). Later, the vision of the image-maker was recognized as part of the record, turning images into how x had seen y (ibid.). Berger (ibid.) attributes this to the rise of a consciousness of individuality (ibid.).

Seeing can also be a process that is forced onto the viewer. Images can be pushed onto the viewer, especially in a highly visual age. “Ours is a visual age. We are bombarded with pictures from morning till night” (Gombrich, 1972, p. 82). The notion of bombardment Gombrich describes here exemplifies the pushy nature of images: seeing can feel like an intrusion, as images can be foisted onto us.

Bredenkamp (2021, p. 29) mentions (in reference to Lacan) that images exert a sense of control over the viewer by controlling their gaze. For example: if an image is very flashy or draws us in because of some detail we are interested in, this happens in a setting where there is a relationship with power and that power is directional. We cannot help ourselves but to look (even if we might know it is a bad idea). If an image has the potential to center and focus our attention, to grip it so that to the best of our abilities it takes intentional, conscious extrication of our senses from the object we are observing, there is power in the image. This is distinctly – and has been in the pre-digital age, as well – evident with attention- and now click-baiting media tactics. This occurs, for example, when news sites or newspaper editors choose particularly eye-catching photos to drive attention to a web article or encourage sales of a publication. In the age of social media, the evidence of this power is also visible in flashy cover

images of Instagram Reels or YouTube videos whose subject matter might not even be half as scandalous as the cover image implies. One may call this advertising in the age of digital and social media. The foundations of it are in the power images have over guiding and controlling our gaze that has been evident and persisted through all ages and forms of media. In the context of seeing and glancing, this relationship is especially interesting when it comes to a person’s, company’s, brand’s, or institution’s ability to produce images that are like a magnet for viewing. In the case of influencers two planes of power in relationship to seeing collapse: their ability to command glances and attention and their ability to produce the images that do so on social media. Successful fashion influencers, for example, have mastered this ability, as they themselves command the gaze and attention and are photographed outside of fashion shows or events (this is similar to what the red carpet for public events was before the takeover of social media) and they are equally skilled at creating images that command the glance and attention of social media users and followers online. They are the subject matter of images they create themselves and that are created using their likeness, even though both originate from their ability to command the glance in relationship to images and image production.

Before the digital age, seeing and observing, the relationship between the object and a spectator was two-dimensional. There was the image and the viewer. Implicitly, the creator of an image was present in this relationship, as well, having created the work. Now, in the digital age, this relationship expands and includes data-harvesting and observations of the viewer, as well. One does not simply view an image on Instagram. The software that organizes the appearance of the news feed tracks closely how long we look at a photo, which subject matter garners our attention, and where we scroll away. There is another party present in our act of seeing, gazing, and glancing – measuring our actions covertly.

Changing Ways of Seeing in the Digital Age

In the digital age more than just the relationship between the image and viewer changes. Zulli (2018, p. 138) theorizes that the digital age changes our mode of seeing and that the glance has become the dominant mode of seeing in the attention economy as opposed to the practice of gazing:

“To gaze suggests that one lingers on the subject or object, looking for depth within the visual field. Gazing implies duration, time spent, an unhurried look. To gaze is to be intentional about looking and to consciously stare at an individual or object.”

Gazing is what we may conventionally think of as seeing. Focusing our perception on something to consciously look at it. The glance, in turn, is a “[...] quick, fleeting, and indiscriminate type of seeing” (ibid., p. 137). While the gaze objectifies, the glance liberates

individuals from the hegemony of the gaze (ibid., p. 138 f.). The glance is always in motion and its emphasis is on the connectivity of the look, not the depth of it as with the gaze (ibid., p. 139). Yet, the glance is not superficial in Zulli’s reading, because it connects surfaces and does not cling to them like the gaze. The glance is “[...] primarily informative and the main mechanism through which we come to know the world” (ibid.).

In the age of the attention economy, attention is at the core of activity. It is a limited resource, as exposure to content consumes attention, while notifications and our numerous social media apps and other digital tools vie for it, as well. Those who know how to garner attention have mastered the media and economic logic of the present. To know how to get and keep attention is an economic advantage. Social media sites like Instagram rank users according to visibility through follower counts (ibid., p. 140). The more followers, likes, and comments one has, the more valuable they can be to advertisers (ibid.). On social media platforms like Instagram, “[...] the attention economy transforms the glance from an orientation mechanism to a dominant, desirable, and profitable way of seeing” (ibid.). On Instagram, there are a plethora of mechanisms that invite the viewers’ glance, for example bottom-less feeds or an explore function that allows you to see miniature preview photos of content you might enjoy (ibid., p. 142 f.). To scroll through the explore function is an endless array of glancing at the accounts of people you do not know.

Attention on Instagram is mediated by one’s ability to garner glances through actions such as strategic posting, creative self-expression, and self-branding (ibid., p. 142). In this context, Zulli introduces the concept of the transactional glance: “[...] users strategically structure their posting habits to receive attention and giving attention can result in a more extensive Instagram network” (ibid.). To glance on Instagram is to intend to get glances in return. This can happen, for example, when somebody sees a post by another account, likes it, and then starts following said account. The holder of this account then may explore the profile of the person who just followed them and equally follow back, glance through their feed, or like some of their posts. To post on Instagram here means to not only hope but take intentional action to garner glances. As a glance-magnet, one can parlay the glances into social (clout and having a digital network) and economic capital (brand partnerships or selling something to one’s audience).

The amount and number of glances one can garner can translate to a form of attentional capital or even power. One of the most valuable skills of the present day, as mastered by Kim Kardashian, for example, is to cultivate the ability to continue to attract other people’s glances in an oversaturated media market, where everyone else, including big brands is competing for the glance, as well. In the creator economy, this can propel one’s work and digital output, or

rather content, into plenty of feeds to be parlayed into influencer or content creator careers. On the one hand, can interpret this as a momentum of self-empowerment, of deciding to make oneself visible to the world and engage in the market of glance-attraction. On the other hand, it reduces any visual output on Instagram (or online, in general) to a vehicle for garnering attention, irrespective of its content. When attention is the main currency, we also stand much to lose: depth, slowness, and the unhurried experience of studying something in detail through the gaze. Andy Adams, an independent photo curator I interviewed for this dissertation suggests countering this with an intentional practice of observing that is like slow food: slow looking (Adams, interview, 2022). Albeit the glance may be an increasingly dominant mode of looking in the digital age, as spectators we can also intentionally cultivate how we want to interact with images.

Three things stand out from this section on vision that offer insight into the nature of Instagram in the present: 1) seeing is closely related with authorship, 2) seeing is relational, and 3) seeing is changing in the digital age. What we see on Instagram reflects what the creator of a photo saw at the time. When we see, we enter a relationship with what we are perceiving, looking at the relationship of the thing and ourselves. When viewing an Instagram post, we establish a connection between what we see and ourselves. And lastly, in the digital age the practice of the glance is on the rise due to the attention economy. Being able to garner glances is a currency in the digital age that can be translated to forms of social and economic capital. Glancing can be transactional and thus shapes our experience of engaging in seeing on Instagram. There, we glance to be glanced at.

3.1.4. The Image Act: On the Agency of Images

Thinking about images, one might be able to draw up a familiar memory of an image that was so vivid or left such a searing impression while viewing it, that it felt like it was leaping off the wall, screen, or paper. Images can be powerful. They can capture us, move us, and astound. In the present, the most intriguing ones go viral. All this might encompass the power and agency of images. Yet, this chapter is dedicated to another, more thorough conceptualization on how images can attain agency, a life of their own.

Mitchell (2005, p. 2) suggests that images have a peculiar tendency “[...] to absorb and be absorbed by human subjects in processes that look suspiciously like those of living things.” Following this line of thinking, images can attain not only agency but behave with a logic of their own. They can be seen as an inanimate object that embodies qualities of the animate. Images are not “[...] inert vehicles for the transport of ideas, but rather beings possessed of agency” (Moxey, 2008, p. 142).

Images have agency, they have “[...] the capacity to outrun the meanings attributed to them by generations of interpreters [...]” (ibid., p.135). This invites a sense of humility in analyses of images that are seemingly uncontrollable with this agency of their own. Moxey’s (ibid.) terminology, that images have a capacity to outrun meanings, feels especially pertinent for the digital age with its emphasis of virality and instant sharing capacity. On Instagram, for example, images can go viral through the forward function that either lets a user send them to one or several contacts in a private message or share them with the world through the ephemeral Instagram Stories. Stories are a vehicle for virality, because a shared image in a story can be easily re-shared from Story to Story in just two clicks. What Moxey (ibid.) refers to also encompasses the reception of images in scholarly or critical discourses. Loosely spoken, images have a mind of their own that eludes exacting categorizations and analyses. At the same time, the semantics of outrunning meanings is fitting for digital images on social media that can be forwarded, shared, remixed, decontextualized, and altered. Once an image enters the realm of virality, its meanings may change through attribution and a dynamic of its own that Moxey hints at in the quote above.

Moxey (ibid., p. 135 – 139) maps the developments in relation to the agency of images. I will follow his overview on the debate here. He sees two concurrent efforts emerge in the English- and German-speaking world²⁶. In the English-speaking world, Mitchell (2005, p. xv) asks what

²⁶ This is reflective of the almost simultaneous emergence of the concepts of the iconic and pictorial turn on either side of the Atlantic.

pictures want, what they claim from us, and how we are to respond. This positions the image or picture as an agent that can also ask something from us. Thus, the picture itself seeks to establish a relationship. In the German-speaking world, Gottfried Boehm also sparked a renewed concern for the existential presence of images, that they are objects with a life of their own (ibid., p. 136). Hans Belting and Horst Bredekamp followed Boehm’s recognition of the animated status of images and called for the expansion of the parameters of what can be considered an image (ibid.). In *An Anthropology of Images*²⁷, Belting (2011, p. 5) argues that the study of images needs to expand and include the concept of a medium, which transmits the image. Further, he includes the human body as a medium for the transmission of images. Belting’s work on the anthropology of images explores how pictures have been used to mediate between life and death (Moxey, 2008, p. 138). They are not just things to be looked at but take on a more active role in our understanding of and place in the world.

Belting’s working in the reading of Moxey (ibid.) offers us “[...] access to human behavior understood broadly enough to include reference to the emotional and psychic, as well as the more straightforwardly rational, dimensions of experience.” This is a far cry from viewing images as static representations. They become mediators, gateways to our experience, and imbued with levels of meaning and insights into what it means to be human.

Bredekamp, in turn conceives the study of images “[...] as a means of institutionalizing Boehm’s recognition of the independence of the visual” (ibid.). This recognition is independent from an aesthetic value of an image or artifact and rests on other forms of presence (ibid.). “The object becomes central to a technical and philosophical discussion that recognizes it as a form of visual thinking” (ibid.). Bredekamp further conceptualizes the agency of the images in his work in *Image Acts: A Systematic Approach to Visual Agency*²⁸.

The image act is the pictorial equivalent to the speech act, imbuing images with the ability to speak, act on their own. The image act

“[...] locates the image not in the place formerly occupied by the spoken word, but in that formerly occupied by the speaker. The images is, in short, no longer the instrument, but the actor – indeed, the ‘prime mover’ [sic], the protagonist. The *image act* [sic] [...] adopts the dynamism inherent in the relationship between the *speech act* [sic] and its own social, political, and cultural environment, but it finds its starting point in the latent capacity of the image to move the viewer.” (Bredekamp, 2021, p. 33).

To Bredekamp, an image “[...] is not a passive entity awaiting human scrutiny, but [...] an activating force in its own right” (ibid., p. xiii). Images act and activate, they speak and demand

²⁷ *Bildanthropologie* in the original version

²⁸ *Der Bildakt* in the original version

a reaction (ibid., p. 4). When scrolling through Instagram, we are not witnessing an endless succession of inanimate, digital pictorial surfaces, we are engaging with a constant image act, where every image we see interacts with us according to its own logic and agency.

Once an image is made, it is part of reality. As such, images resist any attempts to be forced into an order of things:

“While humanity has the distinctive capacity for spoken language, it encounters images as a distinct form of corporeality. Neither through the expenditure of emotion, nor through any amount of linguistic manipulation, can images be drawn back fully into that human order to which they owe their creation. Therein lies the essence of the fascination of the image. Once created, it is independent. It may then become the object of admiring astonishment, but also of that most powerful of all emotions: fear.” (ibid., p. 6).

In the above, Bredekamp also demonstrates the distinction between words and images and our differing perception of them. Our ability to speak is unique to us. Yet, our pictorial creations elude us in a way due to their distinct form and logic. Once an image is created, it goes out into the world to have a life of its own.

When Bredekamp refers to fear of the agency of images in the above, one can easily draw a connection to iconoclasm and censorship of images. Throughout history, images have been destroyed, hidden, and veiled to shield viewers from their power. On Instagram, in the present, day, content moderation and censorship regimes also reflect this. An entire armada of content moderators works to maintain Instagram’s community standards and evaluate images (or profiles) that were reported by users (Cox, 2018). For example, the standards forbid the dissemination of terrorist propaganda, Nazism, sexual exploitation, or drug sales (ibid.). Beyond such obvious candidates for moderation, more complex and nuanced debates repeatedly emerge in the context of displays of male and female nudity. For example: Male nipples do not get banned on Instagram, while female nipples do (Demopoulos, 2023).

Moreso, Bredekamp (ibid., p. 5) mentions that in historical conceptions of images, they were thought to exert a decisive influence on the freedom of those who look at them. Has this really changed? We may not veil images anymore like at the height of Catholic power. However, the idea that some images may be too strong or impactful to look at, persists, for example in blurred screens over photos that the Instagram algorithm considers too offensive or sensitive to show without consent in a regular feed. Instagram here uses a type of digital veil to shroud images in the feed, blurring potentially sensitive material and letting a user know that it contains extraordinary content. This is a testament to the concept of the agency of images: a viewer is advised to apply discretion, because something impactful may be lurking behind the digital veil.

If we deem images powerful, so powerful that we may need to shroud them, this implies that we also assume that they can do harm. An image’s ability to move as well as harm is a chief characteristic of the phenomenology of the image act, according to Bredekamp (ibid., p. 8). Images can even arrest us in our gaze, capturing us, chipping away at our freedom. When looking at an image, a viewer has two choices: either not look or relinquish any claim to freedom (ibid., p. 9). Once we engage in looking, we are bound in our connection with the image, even momentarily. The image’s “[...] role as an object is inextricable to its resistance to control” (ibid., p. 29).

In a media culture, images do not just represent, they form contents, meaning (Breidbach, 2007, p. 85). The present is highly saturated with images on Instagram and beyond. Following the argument of the agency of images, we need to completely rethink and adapt how we treat images. In the age of Instagram, even seemingly frivolous photographs like food layouts, lifestyle shots while traveling, or an influencer’s ad for cosmetic products or fashion are imbued with their own agency. As per the image act, all images have this agency of their own in principle. The image act is a helpful frame of reference to understand why images with all kinds of subject matter can capture our interest and awareness. Also: it does away with the distinction between supposedly meaningful subject matter like politics and supposedly frivolous subject matter like a lifestyle shot. As an ex-ante condition, all images speak and act, irrespective of what they show. Then, of course, there is a difference between them once we engage in decoding them. As Breidbach (ibid.) suggests, we can remove ourselves from the agency of the image only by interacting with and dissection hidden layers of innuendo and the trends that images set. Thus, once we begin to interact with the different layers of a political or lifestyle photo, differences emerge and we may also understand, for example, how visual trends are created on Instagram.

Thus, to navigate the present, visual literacy and competence are a key to interacting with images and their agency meaningfully. Visual competency includes understanding the image as a mental object and knowledge of the form that determines the shape and structure of what is recorded in the image, as well as the technical and informational conditions for creating, retrieving, and disseminating images (Wieczorek-Tomaszewska, 2020, p. 195). One can witness such attempts at attaining visual competence when Instagram users express that Instagram is not real in an attempt to shield themselves from the power of the images on the platform. Knowing that Instagram is a surface for presenting images in a certain, often glossy mode, helps to remove oneself one step from the content one consumes. However, visual competence in images needs to surpass the mere acknowledgment of Instagram photos as illusion or advertising surfaces. It needs to imbue viewers with the abilities to interact with the

different layers of an images as Breidbach suggests. The extent to which we can competently navigate the pictorial present is related to the extent to which we understand images, not necessarily on an academic level but acknowledging that images are more complex than what meets the eye in the feed.

Given this ability to remove oneself from the image act by interacting with different layers of meaning, we can also arrive at a better understanding of the nature of trends and virality on Instagram. Visual trends in subsections of Instagram communities like health, fitness, fashion, or design, to name a few, surely are enhanced by the algorithm that controls distribution of images. Yet, when everything begins to look the same, have a similar sensibility in colors, filters, saturation, angles, or poses, this can also be attributed to the image act. Likely, somebody has seen or experienced a particularly impactful image, where the ‘speech’ of the image was especially convincing and may have chosen to replicate it to create an image with equally powerful agency of their own. Considering the nature of the attention economy, image acts then can be considered at the root of certain trends in visuality on Instagram. If we all fight for attention on Instagram because attention is capital, producing an image with a particularly great impact or agency of its own can become a strategy, as well. Hoping to garner more attention, users produce the images they assume may hold the strongest communicative and viral value. However, this does not consider the agency of the image outside of its creator’s expectation around the agency of images. In short: images will still do their own thing, even if we carefully calculate or predetermine that their agency might help us to get attention. Once an image is out in the world, it is outside of the control of the creator. It lives on its own in the feed, direct messages, and viral loops. Because of its power, it is shared far and near in untraceable ways due to the sheer number of possibilities for dissemination and viral sharing. That is the power of the image act in the digital age.

3.2. Politics and Photography

After an overview of concepts of the image, I turn my focus to photography, the *raison d'être* of Instagram. Photography is one of the many modes of producing and interacting with images. Thus, the findings in the previous section on images, their reception, power, and how we see, apply to photography, as well.

Instagram is a visual platform that primarily focuses on photography. Instagram's visuality encompasses more types of visual media than just photography, for example diagrams, visual blogging through pre-designed graphically appealing arrangements, video content, as well as memes. As the app was originally designed to be a photography platform, I will turn my focus to photography as one – and for a long time dominant – media on the platform. After Instagram's tumultuous experiments with video in the summer of 2022, Adam Mosseri, Head of Instagram, admitted that the app had shown too many videos (Welch, 2023). Instagram backpedaled and acknowledged that “[...] photos are always going to be an important part of what we do” (*ibid.*). Despite the app's evolution over time, its initial main purpose of making photo-sharing fun, easy, and beautiful is still at the core of the brand.

Photography has been a natural companion of politics almost since its inception. Early political usages of photography emerged in the depiction of the US Civil War in the 1860s. The US Civil war was one of the first wars with extended photographic coverage (The MET, 2023). It was only preceded by Roger Fenton's photography of the Crimean War a decade earlier. The arrival of the medium of photography disrupted political portraiture. Where previously images of the sovereign or democratically elected leaders were confined to paintings or graphic media such as lithography that could be recreated and published in newspapers or leaflets, photography's disruption resulted in significant outcomes: the likeness of the monarch or president appeared more realistic due to photography's claim to reproduce reality. Photography greatly enhanced the toolkit for political communication because of mass reproducibility of photographs. To put it simply: paintings were confined to walls, statues to public squares, and lithography to an approximation of the appearance of a politician (democratically elected or god-anointed), while photography was mobile and offered a greater repertoire of portrayal at a lower cost or effort than the aforementioned media allowed.

However, techniques of visualization have not only increased the potential of communication in the political sphere, they have also become a problem (Bredekamp, 2020, p. 7). Falsifications of images, a growing deluge of pictorial material in political marketing, the pressure to always look camera ready, and the need for candidates to be photogenic are only

some of the aspects where the expansion of visual techniques through photography can create challenges.

The quotidian notion of photography portraying life as it is, is disputed. Photography can be interpretative, creative, and manipulated, despite the claim to realism that it is being frequently associated with – especially in its documentary uses or in photojournalism. Culturally, the use of photography has changed immensely since it was invented by Niépce and Daguerre in a process of trial and error between 1822 and 1839²⁹ (Grundberg, 2023). Over the course of almost two centuries, cameras have become smaller, more portable, and more affordable. In the late 20th century, photography also evolved to the digital format and moved online with photo sharing platforms like Flickr, which was launched in 2004 (Britannica, 2023b). Social media companies like Myspace and Facebook contributed to the online boom of photo sharing³⁰. It was not until Instagram’s launch in 2010 and its subsequent decade-long dominance of social online photo-sharing that photography got a social network of its own with global reach³¹ (Frier, 2020, p. 21).

At its heart, photography is an image-making and -creating process. It is one of several kinds of media that can achieve this. As previously stated, to comprehend the phenomenon of Instagram, its different layers of meaning and impact, it is necessary to consult other disciplines. Photography – whether it is on Instagram or a large format camera 150 years ago – creates images. To understand the effect of Instagram, it makes sense to take two points of reference: theorizations of photography as a medium and photography’s relationship with politics (including visual political communication on Instagram).

²⁹ The invention of photography was a process between 1822 and 1839 before culminating in the Daguerreotype, commonly considered the inception of photography. Niépce began experimenting with a method where light could draw pictures on a plate and went on to produce the first successful photograph of nature in 1826/27 with a camera obscura. Daguerre partnered with Niépce in 1829 to develop the technology further. In 1835, three years after Niépce’s death, Daguerre first managed to record an image onto a plate of iodized silver – albeit temporarily. Two years later, he was able to fix the images permanently with a solution of table salt. In 1839, Niépce’s son and Daguerre sold the rights of what was now known as the Daguerreotype, a machine and process that could help record images permanently, to the French government in return for lifetime annuities. (Grundberg, 2023)

³⁰ Facebook’s growth strategy used photo tagging in uploaded photos as what Silicon Valley calls a “growth hack”. In the 2000s, it was common for users to upload entire albums full of photos of college libations and other extracurricular activities. If you were not on Facebook, yet, at the time, the tags helped the company nudge you to join. “People who weren’t yet using Facebook were suddenly getting email alerts that photos with their faces in them were appearing on the website, and were tempted to click to see. It became one of Facebook’s most important manipulations for getting more people to use the social network, despite the hint of creepiness.” (Frier, 2020, p. 7)

³¹ There were and are other social networks for photography or competitors for Instagram like Hipstamatic, VSCO, Vero, and Glass. However, Instagram became the go-to social media app for photography in the 2010s and has dominated this part of the social media market for a decade.

3.2.1. Photography: The Mechanical Eye

Photography is a key part of modern life. When the mechanical ability to create images was invented in the first half of the 1800s, cameras were large, required long exposures, and specific knowledge of the practice. Fast forward almost 200 years and cameras are a standard feature of smartphones – with impressive technical capacities. Not only can we photograph with a camera we always have on us, but we can also share these photos with the world in an instant via social media, messenger programs, personal blogs, websites, or the like.

As a multivariate medium with numerous purposes, photography is studied by different disciplines: philosophy, art history, anthropology, cultural studies, and media and communication studies. It can be an artistic medium, an anthropological tool or signifier, a gateway into understanding culture, as well as a tool for reporting in media, and enable a form of self-expression and – disclosure in art. Photography can be an object, a practice, and a function (Kriebel, 2007, p. 5). In the words of Roland Barthes (1982, p. 9): “I observed that a photograph can be the object of three practices (or of three emotions, or of three intentions): to do, to undergo, to look.”

Photography occupies an interesting position in the visual landscape: it can be journalistic or documentarian as much as an art form. It occupies a standalone position among pictorial media in that it automatically generates content (Armstrong, 2012, p. 707). Bourdieu (1990) deigned it a middle-brow art. In the art world, photography long had a difficult standing, as it was considered a lesser art form than, for example, painting or sculpture. Photography was initiated into the mainstream artistic practice in the 1960s (Costello & Iversen, 2012, p. 679), over a century after its invention. Yet, its reception in the art world at large grew in the 1990s and 2000s (*ibid.*). If art market pricing is any indicator, photography still occupies a different place in the art world canon than painting, fetching lower prices at auctions and for art works in general.

Detractors from photography as an art form level arguments such as that works of art are products of agency (Lopes, 2012, p. 855 f.). A photograph is not a product of agency, because it is a product of a machine (*ibid.*). The obedience of the machine in recording or creating an image is not the same as the agency of an artist creating a painting, for example (*ibid.*).

Photography's evolution in the past two centuries has been impressive. Its story closely interwove with the developments in media technology. In the beginning, due to its technical constraints the medium was mostly used for subject matter that accommodated the sluggish

mechanics of the first cameras, like still lives or formal portrait settings. As cameras become more mobile, they began to move into exploring different areas of life. For example: the US Civil War is one of the first wars with photographic coverage (The MET, 2023). However, cameras at the time were still less mobile and required longer exposure times, so most of the images available from this era show scenes that are compatible with this exposure time like soldiers posing at camp or bodies on a battlefield. Photographic coverage of World War I already exhibits more dynamism due to increased technological capacities. Robert Capa's images of the D-Day invasion in Normandy are evocative of these changes in technology with small, reliable 35 mm cameras. The events in Normandy also show the relationship between photography and media. Film rolls with photos taken at the landing in Normandy were shipped to London for lab processing and then to Life magazine in the US for further use on the day of the event (Prevezanos, 2020).

Changes in photography technology did not just apply to documentary or war photography. One of the truisms of photography is that it is a democratic medium, that photography is for everyone. Before the 1900s, photography was an activity for experts and those who could afford it (Schewe, 2018). But in 1900 Eastman Kodak introduced the Brownie camera as an accessible tool for everyone to take pictures – children, working class people, non-experts (ibid.). The Brownie, priced at 1\$ at the time was a commercial success with 10 million units sold in five years (ibid.). With the Brownie, photography became accessible to the masses, thus laying the ground for the assertion that photography is a democratic medium. This claim certainly applies to the present age of smartphone photography: to take photos has never been easier and more accessible than with phones as pocket cameras that we can take everywhere with us. Yet, we need to separate the vernacular concept of democratization from terminology in political theory. Photography has no inherent bearing on political democratization.

Photography's leap into digital technology together with developments in data-processing that increasingly also include algorithms and AI brings with it a profound change in how we think about photographs. In the 20th century photography, photography was the visual arm of an industrial society (Rubinstein, 2016, p. 155). Then, photography reproduced the world as a commodity to be consumed by individuals (ibid.). The expansion of photography technology in the 20th century led to wide-spread photographing of every nook and cranny of the world as well as our experience, often to be consumed or looked at in glossy magazines or in the show-and-tell of personal photo albums. In the 21st century, with digitalization and online photography, algorithmic processing enters the process of photography (ibid.). To Rubinstein (ibid.), this creates a shift in the task of photography from representing the world as a (true) image to exploring the conditions that make an image possible. This is especially interesting

with AI applications such as Midjourney or NightCafe, where verbal prompts can produce photographic outcomes without the involvement of any camera technology, at all. Digital technology thus might render the camera as a tool for photography obsolete, at least compete with it.

The other truism about photography is that it shows life as it is, that it is somewhat objective. Photography's claim to reality is that a photograph shows reality *as it is*, that photography is a likeness (Kracauer & Levin, 1993, p. 423). Visual technology here plays a trick on us. Even though photography can create realistic looking representations of reality, they are still only that – a representation (Nieto, 2005, p. 1). A wide variety of considerations and factors go into the creation of a photograph – for example lighting, personal disposition, crop, and perspective of an image, as well as the arrangement of a scenery or the people in it. Even in documentary photography we see a representation of reality that is only as wide and tall as one frame covers it. Bourdieu (1990, p. 74) suggests that this is because photography appears true because "[...] it has been assigned *social uses* [sic] that are held to be 'realistic' [sic] and 'objective' [sic]". Meaning: we deem photography realistic because we assign it that purpose.

Conversely, Flusser (2000, p. 15) explores the claim to reality of images and studies the nature of pictorial symbolism in traditional and technical images. He detects a difference in symbolism between photography and traditional images like painting, for example (ibid.):

"With traditional images, by contrast, the symbolic character is clearly evident because, in their case, human beings (for example, painters) place themselves between the images and their significance. Painters work out the symbols of the image 'in their heads' [sic] so as to transfer them by means of the paintbrush to the surface. If one wishes to decode such images, then one has to decode the encoding that took place 'in the head' [sic] of the painter." (ibid., p. 15 f.)

Symbolism in art works thus occurs as a function of the human intervention in transferring a mental image to its medium. In doing so, painters make conscious decisions on perspective, postures, or positioning to encode the painting with meaning. This has given a rich field of study to art history, for example when decoding religious art and the layers of meaning a painter imbued them with. One can assume that if those paintings were created rich with symbolism, that at least a part of its contemporaries were symbolically fluent and understood how to interpret certain gazes, gestures, colors, or forms of dress.

For technical images like photography this process of imbuing the work with symbols is less clear:

"With technical images, however, the matter is not so clearly evident. It is true that with these images another factor places itself between them and their significance, i.e. a camera and a human being operating it (for example, a photographer), but it does not look as if this 'machine/operator' [sic] complex would break the chain between image

and significance. On the contrary: The significance appears to flow into the complex on the one side (input) in order to flow out on the other side (output), during which the process - what is going on within the complex - remains concealed: a 'black box' [sic] in fact. The encoding of technical images, however, is what is going on in the interior of this black box and consequently any criticism of technical images must be aimed at an elucidation of its inner workings. As long as there is no way of engaging in such criticism of technical images, we shall remain illiterate." (ibid., p. 16)

In the process of photography, here the encoding of a photograph with symbolism appears in an opaque manner. It is as if, somehow, images come out of a camera with symbols in them, but we do not know exactly how they are transferred onto the photograph or encoded in it.

Even in the present, the claim to reality persists. We may know that influencers or public figures like the Kardashians heavily edit their photos and use filters, yet whenever they do it in a manner that is obvious, they receive negative feedback. In a way, the expectation of trueness of photographs still carries over into the digital and social media. Even though we know (or should know) that a heavy amount of editing goes into social media photographs, we like to pretend the emperor is wearing clothes. Only when the changes are too flagrant, too obvious, public criticism ensues.

Defining photography is an endeavor in vagueness. One can define photography as a mechanical process involving a camera device like a Leica, Brownie, large format camera, Polaroid, or smartphone camera, for example (Benovsky, 2014, p. 731). Additionally, a photograph may be a photograph of something that exists and in a way that the photographer wants us to see it (ibid., p 731 f.). Yet, defining the limits of photography is challenging. For example: cyanotype, a photographic process, can be used without a camera and AI art generators can create photography-like outcomes without ever taking up the instrument of the camera. Yet, these two defining characteristics, that photography involves a camera device and that it shows something that exists, as abstracted as it may be, are helpful guardrails in exploring photography.

When we look at photography, three dominant modes of use emerge: photography as a process, a cultural practice, and a product (Kreuzbauer, 2016, p. 312). Photographic practice can be professional or private³² and encompass a variety of subject matter such as portrait, landscape, commercial, product, scientific, medical, architecture, fine art, or documentary photography, for example (ibid., p. 313). These numerous fields of application from the artistic to the scientific reflect photography's technical versatility – and a reason for the popularity of the medium. One can apply photography to a seemingly endless variation of situations.

³² I choose to not use the term amateur here, because it may imply a difference in value between photography as something somebody does for their career or in their personal sphere.

The Process of Photography

Irrespective of the technical prerequisites of the camera, the photographic process is the same in digital or analog photography. You make photographs according to the same principles, irrespective of whether you use a smartphone or a Kodak Brownie³³. Despite the divide between analog and digital photography, their differences are not that great (Polte, 2006, p. 143). Aside from preparing the subject (for example staging a product shoot or choosing a motif), the photographic process entails first recording or making the image, then processing it (for example in photoshop), and finally presenting it. In the digital age, especially the process of presenting the image has changed: one can still choose to print a photo, put it in an album or a book, or frame it on a wall, but also share it on social media, on a blog, webpage, keep it in a digital file folder, or more.

Furthermore, the presentation of the photographic image also touches upon a key qualifier of photography: its reproducibility. Depending on the camera technology and the era of photography, images could be reproduced easily or not at all, like in the case of the daguerreotype (Kriebel, 2007, p. 4). From 20th century technology onward, photographs – and especially digital photographs – could and can be reprinted repeatedly, creating a deep distinction between photography and other visual media like painting or sculpture, where only one copy of each distinct object exists.

Roland Barthes (1982, p. 4) describes another aspect of photography's reproducing capabilities: “What the Photograph [sic] reproduces to infinity has only occurred once: the Photograph [sic] repeats what could never be repeated existentially.” Lithography and other graphic arts are more closely related to photography in this aspect. In pre-digital ages, you could also reproduce them infinitely from a technical point of view. In the digital age, the aspect of reproducibility of photography changes fundamentally. Now, a photo can be disseminated ad infinitum as a file and online, viewed by millions without any additional production costs. This has commodified photography somewhat, changing its status from a readily reproducible artifact to a tool with exponential capabilities. In that, photography reflects the dynamics of the digital, exponential age we live in.

Social media photography is emblematic for the changes to the process of photography described above. The three steps of recording, processing, and presenting the photo are still the same, however our capacities for presentation have expanded. Our means to make or

³³ One might argue that preparing the camera by opening the photo app or loading a film into it is part of this process, as well.

process an image are still relatively similar, only replaced by software: we still require the tool of a camera and edit images. While there are modes of processing that might have replaced the photo lab, they still echo its functions in the digital realm. For example, we might still burn and dodge an image in photo editing software. This used to require expert knowledge. Now, it is much more accessible with software like Photoshop or Facetune for smartphones.

That being said: beginner level use of photoshop or other editing software is relatively easy to learn. Mastery of photoshop and other post-processing software is a different story. I think this reflects the overall tendency for the medium of photography: with digital technology it is much easier to produce decent images, even good ones. Digital and especially smartphone photography has democratized aesthetic proficiency. Non-professional photography can look much better much more easily than in the age of film, that required more technical know-how. However, as digital technology is advancing, so is the threshold to mastery. Proficient, prolific even, use of photoshop and digital photography techniques still require skill and practice.

The democratization of aesthetics through smartphone photography is most evident in Instagram. Firstly, because the platform was conceived to share beautiful smartphone photos. Secondly, because Instagram took on a life and dynamic of its own³⁴ with influencers and the overall imperative for aesthetically pleasing content on the platform. Individual accounts might have different aesthetics, however the demand for overall aesthetic coherence when scrolling through a feed or interacting with the grid³⁵ on a profile is high on Instagram. Aesthetic coherence with respect to color schemes, subject matter, and the rhythm of images across a profile is sought after.

When recording a photograph, we also encounter another chief quality of photography: its optionality and multiplicity. Photography's technical affordances allow for multiple takes and re-takes of a motif until the desired effect is achieved. This makes photography an interpretive and subjective medium, much in opposition to the claim to truth that surrounds it. Instead, going through an analogue or digital contact sheet or even a smartphones photo roll, a photographer can choose the image that has the most impact and is most visually appealing.

Stylistic Devices and Narrative in Photography

Photography has stylistic devices: globally, locally, and texturally (Kreuzbauer, 2016, p. 321). Global stylistic devices are all pictorial elements of a photography, for example the color

³⁴ One could argue that the combined dynamic of the image acts on Instagram contributed to this.

³⁵ The grid is the overall view of a user's Instagram profile that shows all published images in a layout that is three images wide and scrollable.

temperature or gradient, local stylistic devices are all countable elements in a photo for example the sky in a landscape photography, the number of buildings in an architectural shot, or faces in a group shot, and textural elements can be a film’s grain or digital noise (ibid.). One can use these stylistic devices similar to how a skilled speaker would use figures of speech.

These stylistic devices need to be distinguished from narrative elements in a photograph. Different elements in a photograph contribute to telling a story or capturing a scene, moment, or setup in different ways. In quotidian terms, we might think of this as the person in the foreground, doing something against a backdrop of a garden, house, or cityscape. Kreuzbauer (ibid., p. 322) suggests a more nuanced system of looking at narrative elements in a photograph: pre-iconic, iconic-symbolic, and narrative stylistic devices. Pre-iconic stylistic devices could be elements or aspects of a photography that are not associated with meaning, for example contrast or brightness on the global level (ibid.). Iconic-symbolic stylistic devices encompass everything that is associated with meaning, but not a narrative (ibid.). Returning to the example of brightness or darkness, these two qualities of an image can be used in an iconic-symbolic manner when darkness is used to convey a sense of dramatism (ibid.). Thirdly, narrative stylistic devices are all those that play an important role in the story told (ibid.). In addition, all these stylistic devices can be applied at the macro or micro level: the micro level relates to the individual elements, while the macro level addresses the arrangement of these elements (ibid.). Pre-iconic and iconic-symbolic stylistic devices often overlap or can be the same thing; whether they are interpreted as one or the other depends on the context of use and the cultural context of a creator and recipient of an image (ibid.). A photo with a visible element in the shape of a cross can be pre-iconic through the mere existence of its form and iconic-symbolic if somebody associates it with the cross in Christianity (ibid.).

The Inside-Outside of Photography

Photography can be a tool for making the invisible visible (Lynteris & Stasch, 2019, p. 5). In the section on seeing and vision, I wrote that seeing is a process where the eye chooses a focal point for our vision. Everything around this focal point is still there and part of our visual awareness, however unless something prompts our gaze or glance, we do not actively or consciously perceive it. Photography can help us make the invisible visible by showing us a record of a scene that functions in a different manner than our sense of vision. In a photograph, we may see hidden details or things that have eluded the conscious gaze.

Photography as a medium is characterized by an inherent inside-outside dynamic: what is inside the frame and what is outside it. Through this inside-outside dynamic, we come to

assume those who are in the photograph at a greater distance than those outside of it, viewing it (Azoulay, 2010, p. 11)³⁶. Azoulay here refers to an emotional or psychological distance rather than a geographic or metric one. The people inside the image are different from those outside of it. In the case of documentary photography, the inside-outside dynamic can lead us to see “[...] the disasters that befall others as if the disasters that struck ‘them’ [sic] were a (political) trait of theirs, as though they had not been governed alongside the viewers of their photographic images” (*ibid.*). Thus, we may assume that those in the image are governed by the disaster that befell them, when we are governed by it, too, looking at it (*ibid.*).

Azoulay’s (2010) argument invokes the bi-directional creator-spectator relationship in images I described in a previous section. The image itself helps to establish a communicative connection between the creator and observer – and in this case also those portrayed. One is implicitly, conceptually connected to the other. The photographer taking the photo is aware that the photograph will be seen by the reader of a newspaper, for example. The subjects of the photograph likely understand the photographers’ role present at a scene, as well – them taking a photo to then share it with the world. The viewers implicitly also know that the presence of the photographer was necessary to even construct the image. These three roles are intertwined. Following Azoulay’s (*ibid.*) argument above, it is impossible to divorce them from each other – there cannot be an outside or an inside in viewing a photograph.

Photography and Time and Memory

Photography, archive, and memory are closely connected (Cross & Peck, 2010, p. 127) Photography has a strong memory function and photographs can serve as mnemonic devices (Bate, 2010, p. 243). An archive is the aggregate of individual records of memory, catalogued and organized. Photography’s memory function is associated with the moment in time it was created:

“The photograph does not preserve the transparent aspects of an object but instead captures it as a spatial continuum from any one of a number of positions. The last memory-image outlasts time because it is unforgettable; the photograph, which neither refers to nor encompasses such a memory-image, must be essentially associated with the moment in time at which it came into existence.” (Kracauer & Levin, 1993, p. 428)

Photographs transcend and outlast time. They are a temporal bridge made manifest between now and a moment in time bygone.

Especially in the age of analog photography, there was a cultural practice to photograph what one deemed worthy of remembering. When considering one moment worthy of a photograph

³⁶ Azoulay here cites her own work from 2008.

and another not, photography also takes on an editing or selecting function in our life. A moment stands out from the everyday routine because we deem it worthy to be photographed; or maybe, we do the inverse and photograph the routine to record the minutiae of our everyday lives. At any rate, photography is a tool to help us remember and designate moments of importance or meaning through the practice of changing photos.

Casting a wider net on the memory function of photography, we also need to consider that memory as well as photography are selective. Just like our physical mind remembers selectively, photography, despite its claim to reality, is also a selective mnemonic device, depending entirely on the choice of framing and perspective of the photographer. Photography in its memory function thus is not an absolute record of history or the past but how the photographer saw or chose to see an event or scene.

Photographic Practices

There are different ways to take a photograph like snapshots, long exposures, instant photographs, or smartphone photos. Each of them has a distinct process determined by the properties of the machine and process used for the photographic process. While we consider photography as a reflection of a moment frozen in time, these different modes of taking photos also alert us to the fact that photography can take on different temporal qualities. For example: a snapshot has a different temporality than a long exposure shot. Time in photographs is not a monolith but a reflection of the choices of the photographer. For example: artist Hiroshi Sugimoto frequently works with large-format cameras and long exposure times. In one of his projects, he takes a photo of a movie theatre throughout the entire duration of a movie being shown (Barcio, 2017). The result is a photograph that was recorded during every single frame of the movie. This also illustrates that photos are synchronous (Kreuzbauer, 2016, p. 319 and 325). They cannot portray the temporal sequence of events like a film or video, but can only capture one frame of it, shaped by the duration of an exposure.

In comparison with other types of visual media, the snapshot gives photography a unique character trait as a medium (Arnheim, 1974b, p. 151):

“Photography does something unheard-of when it catches motion in the-act. The accidental shape of its appearance reveals the snapshot as a fragment, a sample extirpated from an action whose integrity resides beyond the realm of the picture.” (ibid.)

When comparing a painting of a fleeting moment, an instant, a seemingly spontaneous gesture, brought about by the occupation of a painter, Arnheim (ibid.) argues that it carries an element of classical finality; it looks like a painting, has studiously composed and placed gestures. A snapshot, on the other hand, is a spontaneous gesture (ibid.). In a snapshot,

mouths may be opened, hands placed randomly, and hair slightly disheveled. Only photography can create the snapshot – a slice of live – with its technological properties.

Henri Cartier-Bresson, the noted photographer who elevated the spontaneous street shot into an art form, even theorized taking snapshots. He articulated a form of decisiveness that is still relevant the street photographers and photojournalists, the so-called decisive moment (Armstrong, 2012, p. 708). You either caught it and pressed the shutter in the right moment or you missed the mark. For Cartier-Bresson, pushing the shutter with perfect timing is an intuitive process and the moment a photographer gets creative (ibid.). He later returned to painting as an artistic practice and then concluded that the photograph was an instant drawing (ibid., p. 709).

Roland Barthes and The Effect of Photographs

In his seminal work *Camera Lucida* Roland Barthes (p. 26 f.) defines two manners in which we can feel the effect and interact with photographs: the *punctum* and the *studium*. *Studium* is the “[...] application to a thing, taste for someone, a kind of general, enthusiastic commitment, of course, but without special acuity. It is by *studium* that I am interested in so many photographs, whether I receive them as political testimony or enjoy them as good historical scenes [...]” (ibid., p. 26).

Studium can also be described as an intellectually guided process of wanting to learn about images. Through *studium* we “[...] participate in the figures, the faces, the gestures, the settings, the actions” (ibid.). The other concept is *punctum*, which breaks or punctuates the *studium*:

“This time it is not I who seek it out (as I invest the field of the *studium* [sic] with my sovereign consciousness), it is this element which rises from the scene, shoots out of it like an arrow, and pierces me.” (ibid.)

Punctum is the affective value of the image, what draws us in, what pricks us. *Punctum* may also be what we experience when we encounter an image act and the particularly impactful agency of an image.

Barthes (ibid., p. 27) further explains:

“The *studium* [sic] is that very wide field of unconcerned desire, of various interest, of inconsequential taste: *I like / I don't like* [sic]. The *studium* [sic] is of the order of *liking* [sic], not of *loving* [sic]; it mobilizes a half desire, a demi-volition; it is the same sort of vague, slippery, irresponsible interest one takes in the people, the entertainments, the books, the clothes one finds ‘all right’ [sic].”

The *studium* is a cerebral attitude of study, shrouded in a benign indifference. A photograph we experience through *studium* is nice enough, but it does not stir us. A *studium* interaction

with a photograph on social media might not suffice to motivate a viewer to click on the like button. We may look at it and scroll past with a pleasant, yet inconsequential feeling.

The punctum is a more subliminal, instinctive way of interacting with a photograph:

“In order to perceive the *punctum* [sic], no analysis would be of any use to me [...]: it suffices that the image be large enough, that I do not have to study it (this would be no help at all), that, given right there on the page, I should receive it right here in my eyes.” (Barthes, *ibid.*, p. 42 f.)

Thus, the punctum needs no explanation, no labored inquiry in the image. It just is and it captures the viewer right away. Viral images on social media may be a consequence of the punctum. They pierce us and pierce us so intensely that we feel drawn to sharing them with others to experience the same. Interestingly, Barthes (*ibid.*, p. 43) notes that the punctum arouses sympathy in the viewer and at the same time shows no preference for morality of good taste. As he says, the punctum can be “ill-bred” (*ibid.*). To reach us, touch us, move us, an image does not need to be a cerebral or particularly moral creation. It needs to stir us – a possible explanation for yellow-press image practices, as well as sexualized or seductive content on Instagram. It is a possible explanation for the repetition of poses in certain locations, ever creating more of the same. What if the creators of those images had been affected by the punctum of a photograph in that vein and now wanted to create an image with punctum for themselves? In the attention economy, a photograph with punctum can increase a user’s follower count and exposure.

Most photographs, Barthes implies, are all *studium* (Fried, 2005, p. 542). Standard news photos, as well as pornography, may shout and shock but are powerless to disturb, prick, or wound us (*ibid.*). To Barthes, they are banal, and we may choose to invest in them with *studium*, acknowledging their existence to then swiftly move on (*ibid.*). Only a few photographs are different and elucidate the response of the punctum. Instagram, thus, is full of photos with *studium*.

Walter Benjamin’s “Short History of Photography”

Another seminal theorization of photography is Walter Benjamin’s (1972) *Short History of Photography*. In it, Benjamin echoes the sentiments of a later work of his, *The Work of Art in the Age of its Technological Reproducibility* (Benjamin, 1969). In the latter, he draws up a link between photography and the mechanical reproducibility of images, which he generally regards as a liability to the quality of images: “The situations into which the product of mechanical reproduction can be brought may not touch the actual work of art, yet the quality of its presence is always depreciated” (*ibid.*, p. 4). Mechanical reproduction reduces how we

experience the presence of an image. Benjamin's sentiment towards technical or mechanical reproduction of images is best summed up as follows: "Even the most perfect reproduction of a work of art is lacking in one element: its presence in time and space, its unique existence at the place where it happens to be" (ibid., p. 3). Mechanical reproduction of images takes something away. Benjamin famously coined this 'something' the aura of an image (ibid., p. 4). Not only does this affect the aura, but also radiate out into other areas of life beyond the realm of art:

"[...] the technique of reproduction detaches the reproduced object from the domain of tradition. By making many reproductions it substitutes a plurality of copies for a unique existence. And in permitting the reproduction to meet the beholder or listener in his own particular situation, it reactivates the object reproduced. These two processes lead to a tremendous shattering of tradition which is the obverse of the contemporary crisis and renewal of mankind." (ibid.)

The aura of a work of art can be compared with the perception of a mountain or landscape that are enveloped by a sensation of distance, however close one may be to them (ibid., p. 5). In other words, the aura is a

"[...] shorthand for the particular qualities of traditional art that he observed waning in modernity, associated with the singular status of the artwork, its authority, authenticity, and unattainability, epitomized by the idea of beautiful semblance" (Hansen, 2008, p. 336).

Technical reproduction is an attempt to bring the object closer to pry it from its shell (Benjamin, 1969, p. 5). Benjamin (ibid., p. 5 f.) links this desire to bring an object closer and reproduce it mechanically to larger societal changes: reality is adjusted to the masses and the masses to reality. Mechanical reproduction changes the context of making and creating art: instead of its dependence on ritual, it begins to be based on politics (ibid.). "In photography, the exhibition value begins to replace the cult value [...]" (ibid., p. 7). The rise of photography coincided with the rise of socialism (ibid., p. 6) and we may see how from this metaphorical conjugation of politics and photography practices such as documentary photography, the overall notion of the democratizing power of photography may have arisen.

Like other authors, Benjamin brings forward the argument that photography makes the invisible visible. With means of technical reproduction such as enlargement, one can capture images which are outside of or escape natural vision (Benjamin, 1969, p. 4). Despite all his criticism of mechanical reproducibility of art, this is a positive, minimally redeeming quality that Benjamin brings forward.

Returning to his earlier work *A Short History of Photography* (Benjamin, 1972), many of the themes discussed in *The Work of Art in the Age of its Technological Reproducibility* are present in it, as well. "At its most superficial level Benjamin avers that it is typical for a photograph of a

work of art to flatten it in such a way as to demolish its ‘aura’ [sic]” (Berkowitz, 2016, p. 71). Photographs, and especially when they are mass-produced kitsch, “[...] fail to capture the sensation that captivates a viewer when she or he experiences the actual art object” (ibid.). With the aura, that special layer or quality of the photograph gone, it becomes second-rate. We view it with indifference. On Instagram, the epitome of mass-produced kitsch in the sense of Benjamin, few photos retain that sense of the aura. At the same time, one needs to acknowledge that while Instagram may have started out as a platform to make smartphone photos look beautiful and share them online, the purpose of the app as it was shaped by its users and Instagram’s business strategy changed to an advertisement platform. The photos on Instagram then had to serve the conditions of the attention economy over notions of sublimity or beauty. The aura of photographs on Instagram is a secondary concern here.

“Photography makes aware for the first time the optical unconscious, just as psycho-analysis discloses the instinctual unconscious” (Benjamin, 1972, p. 7). At the same time, photography reduces the subjectivity of the individual that may be contained in arts such as painting or sculpture (Puppe, 1979, p. 275). “[...] photography is capable of extending the range of perception and reduces at the same time the individual, which is to say the idiosyncratic, [sic] ingredient in the pictorial product” (ibid.). Photography thus is a tool to create visual awareness about oneself as well as for the erasure of the subjectivity of the individual. Again, we can see a similar mechanism play out on Instagram, where trends and visual conventions can illuminate what may be unconscious to us (visually or cognitively) while at the same time reducing our own subjectivity through conforming to the logic of the platform, editing software, filters, and smartphone – as well as Instagram trends.

Benjamin also romanticizes early photography when he writes about how trained painters adopted the new technology for their art practices (ibid., p. 17). According to him, their work changed when businessmen invaded the field of photography, spread the practice of retouching images, and caused a sharp decline in taste (ibid. 17 f.). He also argues that early photographs still retained the aura (ibid., p. 18). This is not too dissimilar to arguments on how smartphone photography and the widespread use of editing tools such as Facetune and photo filters have caused a distortion of reality. Skepticism on the cultural rule of photography, thus, appears to have accompanied it throughout its existence.

Benjamin is especially critical of marketing and advertising photography and its reductivism:

“Therein is unmasked a photography which is able to relate a tin of canned food to the universe, yet cannot grasp a single one of the human connections in which that tin exists; a photography which even in its most dreamlike compositions is more concerned with eventual saleability than with understanding.” (ibid., p. 25)

Photography here appears as a tool for sales that absorbs any means of understanding. The photographic image cannot comprehend or support human connections. It appears as a flat surface stripped of essential layers of meaning that describe the complexity of human actions and interactions, even if just through a tin of canned food. Instagram, too, can be accused of this; that it facilitates connection between people on the one hand, but on the other hand flattens these connections due to the takeover of advertising, self-branding, and self-commodification practices in photography on its platform. With respect to Walter Benjamin’s works, it appears that little has changed about the underlying dynamics of photography and its role in the world.

Susan Sontag and the Cultural Criticism of Photography

Just like Barthes and Benjamin, Susan Sontag decisively shaped our idea of photography. By no means are they the only thinkers who have conceptualized photography; however, their writings have become canonical and have infused statements on artistic production as much as the academic debate. In their writings, the spheres of art and cultural analysis meet, whereas Benjamin’s work also connects photography to the political sphere.

Sontag is an especially keen observer of the social and cultural practices of photography and how they may affect the social sphere. In her work *On Photography* (Sontag, 2005) she describes the manifold social implications of picture-taking. We can find some familiar themes in it, such as excursions on the temporality of photography, as well as new thought, for example in her remarks on photography and tourism or the aggression of the camera.

To Sontag (ibid., p. 11) “photography is an elegiac art, a twilight art. Most subjects photographed are, just by virtue of being photographed, touched with pathos.” We photograph what we know is fleeting, will change – committing ephemeral moments to a photograph’s paper and glossy surface. This elegiac, time-aware nature of photography is also expressed in the photographer’s interest for nothing to change in the moment of the capture, for their own benefit:

“To take a picture is to have an interest in things as they are, in the status quo remaining unchanged (at least for as long as it takes to get a ‘good’ [sic] picture), to be in complicity with whatever makes a subject interesting, worth photographing—including, when that is the interest, another person’s pain or misfortune.” (ibid., p. 9)

Taking a photo, especially documentary photos, straddles the interest of the photographer with the present experience of the subject. Here, photography can take on a selfish mode of creating images, subjugating another person’s experience to the requirements of photography. This is also evident in contemporary practices of taking photos for Instagram. The primacy of

the photograph leads to overcrowding of Instagram hot spots or the destruction of natural phenomena, for example the trampling of lavender fields in Provence - all to get the winning, viral shot (Reiffer, 2019).

Taking this into account, Sontag (2005, p. 8) is almost prescient when she describes the event of taking a photo and its consequences:

“A photograph is not just the result of an encounter between an event and a photographer; picture-taking is an event in itself, and one with ever more peremptory rights—to interfere with, to invade, or to ignore whatever is going on. Our very sense of situation is now articulated by the camera’s interventions. The omnipresence of cameras persuasively suggests that time consists of interesting events, events worth photographing.”

This description shifts the perception of photography and an event. Where previously taking a photograph was a function of an event worthy of remembering or even deemed an event remarkable because of the act of taking said photos, now photography itself is the event, irrespective of what is happening. This also echoes the behaviors of Instagrammers the world over, who are seemingly oblivious to their surroundings in pursuit of the perfect shot.

Photography here alters the sense of reality. “Photography has become one of the principal devices for experiencing something, for giving an appearance of participation” (ibid., p. 7). Thus, we do not experience something because it is there, but when we photograph it. Sontag here solves the mystery of billions of photographs of breakfasts, lunches, and dinners on Instagram. We take those photos to experience something, to participate in it, even if it is something as mundane as a meal. In the age of social media, thus, something has occurred that suggests that participation in life, not remembering it, is marked by photography. This is a decisive shift in the purpose of photography that Sontag observed in the pre-digital age and that, as a social practice, has extended to the age of Instagram.

Sontag’s considerations on how photography moderates time and experience extend to other spheres, namely that of travel, as well:

“As photographs give people an imaginary possession of a past that is unreal, they also help people to take possession of space in which they are insecure. Thus, photography develops in tandem with one of the most characteristic of modern activities: tourism.” (ibid., p. 6)

We take photos to claim and explore a space that is new, not to remember it. When I observe my phone’s photo roll of a vacation and compare them with the carefully selected and posed holiday photographs of my grandparents in the 1950s and 60s, I notice a stark difference. In those photos of the past, the memory or documentary function of photography seems more alive and well than in the digital age of photography, where everything can be a photograph

for me and my contemporaries. Those vacation photos from a bygone era are carefully posed with only a handful of images preserved for posterity, due to the constraints of the number of exposures available on a roll of film. Contemporary digital camera rolls on a smartphone, in contrast, are more generous, allowing several takes of the same motif until perfection has been achieved.

Security or a lack thereof may not be the main driver for why hundreds of millions of tourists produce a deluge of digital photos on their holidays. However, Sontag (*ibid.*) makes a key point in the quote above that translates to present-day practices of photography: possession. Photos taken are photos owned and a way to claim ownership over one’s experience of a place and life. It is possible that in times of economic uncertainty, the explosion of photography can provide us with an anchor to feel secure, to be in possession and control of the moment, when in many other areas of life people may feel they are not³⁷.

Yet, photography in tourism and our experiences of being a tourist in our own lives does not exclusively provide means of possessing an experience:

“A way of certifying experience, taking photographs is also a way of refusing it—by limiting experience to a search for the photogenic, by converting experience into an image, a souvenir. Travel becomes a strategy for accumulating photographs.” (*ibid.*)

Sontag here formulates one of the most persistent arguments in photo-criticism, that taking photos somehow takes us out of the moment. What’s more interesting for the subject of inquiry of this dissertation is her referral to experience as a search for the photogenic, for images and visual souvenirs. In the present, not only travel but also life are becoming strategies for accumulating photographs. What if Instagram is turning life into a strategy for accumulating photographs? I remember well the days of my enthusiastic use of Instagram, when I began to view the world in terms of its instagramability, thinking to myself that something would make a good post on the platform. Here, the boundaries between recording and sharing one’s life and turning it into a constant photo op, for life to become an excuse or strategy for photographs, are blurred.

³⁷ In this context, it is interesting to note that Instagram was launched in 2010 shortly after the global financial crisis in 2007-2008. The millennial generation’s struggle to find their way into the workforce in this challenging economic climate coincided with the launch and rise of a wave of social media startups like Twitter, Instagram, and Facebook. Contemporaneity does not imply causation. At the same time, we should not disregard the potential for a connection between these two – control over one’s precarious experience through photo-taking. A similar pattern appeared in times of the COVID-19 pandemic. As control over our daily lives was taken from our hands, many turned to social media and online worlds for entertainment, but also to create economic opportunities for themselves with the emergence of a pandemic online persona (Marshall, 2020).

Photography in the present, is “a social rite, a defense against anxiety, and a tool of power” (ibid., p. 5). Sontag’s concept of photography as a social rite and defense against anxiety are laid out above. Beyond that, photography is aggressive, implicitly so, through every use of the camera (ibid., p. 4). A camera can be an intruder. An even the semantics of taking somebody’s picture as opposed to making it, imply that there is an element of photography that is not always on eye-level or in harmony.

“From its start, photography implied the capture of the largest possible number of subjects. Painting never had so imperial a scope. The subsequent industrialization of camera technology only carried out a promise inherent in photography from its very beginning: to democratize all experiences by translating them into images.” (ibid., p. 4)

Photography here conquers, is a subjugating force. Every corner of the earth, every aspect of life must and will be photographed, irrespective of its desire to be captured or not. Photography can be a democratizing force by providing a tool for visual learning, expression, and participation to the masses. It can also be tyrannical in its cause to capture - and intrude in - every moment of our existence. This is reflective of Walter Benjamin’s dis-ease about the social and political role of photography. The mechanical tool is a voyeur in every aspect of our life, leveling the meaning of all events (ibid., p. 7). What is the difference between a photo of one’s lunch and that of a milestone event like a wedding, graduation, or birth, when it is all shared on the feed of Instagram?

In all these interactions, photography straddles between the poles of art, commerce, and truth. “Even when photographers are most concerned with mirroring reality, they are still haunted by tacit imperatives of taste and conscience” (ibid., p. 4). Photography or any art form as a profession has always had to walk the tightrope between commercial and artistic uses, between one’s interests and self-expression, and monetizing it, when pursuing it as a career. Commercial expressions in photography, widely seen and received, could make their way into non-commercial or personal expressions of photography. This could be imitating a model’s pose (even if only subconsciously) or a certain angle or crop. On Instagram, a commercial platform where users increasingly fight to garner attention, the imperatives of taste and conscience are visible in ever-repeating poses and subject matter. Seen a hundred times in the feeds of others, mannerisms and tastes of the era or a sub-community like travel, beauty, fitness, or yoga, for example, may come to influence one’s own picture taking. Even if a user is not explicitly considering the imperatives of Instagram, they will likely have seeped into their expectation of what they must do to get their photo seen on the platform.

The communicative aspect of Instagram is another layer of meaning to consider in evaluating photos. One posts photos on Instagram to share them with others, for others to see them. It is not surprising that people will then consciously or unconsciously repeat the tastes and

imperatives shown on the platform in their own photos. A social photo app is useless for a user, if their photos do not at least get in front of their friends and followers’ eye; or, in the age of pervasive personal online brands, help them grow an audience. Little has changed in the nature and social uses of photography since Sontag has described them. Digital photography and Instagram have accelerated and intensified the developments she perceived.

3.2.2. Photography and Politics

Photography and politics have been close companions over the course of the history of the medium. Be it for portraiture of leaders or in the documentation of public events, documentary photography, and the capture of wars: photography's ability to produce images readily, increasingly easily over the years has lent itself to be a political medium. Photography can be political in two ways: by depicting political or politics-related subject matter or because it is used in political ways, for example in election campaigning.

Photography as a medium lends itself to political usage. Photography and politics, one might say, are a match made in political communications heaven. In *Camera Lucida*, Roland Barthes (1982, p. 3) recalls an encounter of a photograph of Napoleon's youngest brother, Jerome, that made an impact on him: "And I realized then, with an amazement I have not been able to lessen since: 'I am looking at the eyes that looked at the Emperor [sic].'" Here, we encounter two chief elements of our understanding of photography that I discussed in the previous section: photography's mnemonic, time-bridging function and the idea that photography represents a situation "as it was". Here, the photograph offers historical continuity with reference to Napoleon. Through the image the way Barthes (ibid.) describes it, we encounter, get closer to the locus and aura of power during the time of the French emperor.

I will investigate the political meaning of photography in two distinct sections. First, I will look at political subject matter and iconography. Second, I will describe usages of photography that are political not just because of their subject matter, but also because of their reception, like activist or documentary photography. Photography can be used to demonstrate and illustrate power – and it can be used to question it. Pictures are "[...] influenced by the political contexts in which they are created or viewed, and vice versa. Hence, pictures can influence political discussions, decisions, and developments" (Egea Medrano et al., 2021, p. 216 f.).

Historical Examples of Political Photography

After its invention in the first half of the 19th century, politicians and journalists quickly discovered the medium for themselves. Photography has since been used for royal and political portraiture, propaganda, photojournalism, and documenting wars among other purposes. While the entire political history of the medium is rich and multi-faceted, I endeavor to give a brief overview of exemplary usages of photography for political purposes on the following pages.

Queen Victoria's photograph was taken as early as in the 1840s, only several years after the new technology was announced to the world (Pearson, 2023). Initially, those early photographs were intended to be seen only by family and friends (*ibid.*). However, in 1860, the queen allowed their publication in the popular carte-de-visite format (*ibid.*). These photos showed the queen as a mother rather than a monarch and “[...] her use of photography to shape her public image set a precedent for future royal and celebrity portraiture” (*ibid.*). In later years, the queen's use of photography became strategic and calculated (Tramz, 2014). For her diamond jubilee portraits Victoria convinced the photographers to relinquish their copyright (*ibid.*). The photograph then appeared everywhere and became the most lasting image of the queen, effectively shaping the image people have of the monarch for decades to come.

Shortly after the invention of the medium, photographers began to cover wars. In the middle of the 1850s, Roger Fenton's coverage of the Crimean War established him as the first war photographer (Bellinetti, 2022; Daniel, 2004). Shortly after, photographers also engaged in documenting the US Civil War with photography. Due to technological constraints, the photographs taken both by Fenton and during the US Civil War showed scenes with soldiers standing quietly for their photo to be taken, still lives, or sceneries that could be photographed with long exposure times. Cameras were heavy and still required longer exposures at the time, so that it was impossible to take them into the battlefield for documentary purposes that captured movement or the action of combat. This changed when cameras became more mobile and war photographers began to embed themselves in the middle of the action, for example during World War I and World War II.

Two decades after queen Victoria's death, Heinrich Hoffmann began his photographic collaboration with Adolf Hitler in 1923. Throughout his work for and with Hitler, Hoffmann decidedly shaped the image of the Führer in the eye of the German public in an unprecedented use of photography for political purposes. The Nazis were skilled propagandists and tightly controlled the iconography of Hitler in the media. And they coopted the medium as a vehicle for integrating propaganda into everyday life. Collectible albums with photographs that were part of cigarette packs turned owning images of Hitler into a game. These ornate albums are reminiscent of present-day sports collectible albums where empty squares filled with a name indicate which player's image goes where. In the case of the Nazis, these empty fields contained the caption or a descriptive phrase of the image to be added. These albums were circulating widely throughout the Reich. Hoffmann's photography also made him a wealthy man. As the person with unique access to Hitler, he seized his chance to capitalize on his work.

The iconography of Hitler on the one hand emphasized him as a strong political leader and on the other hand as an ordinary citizen. Especially Hitler's mountain home on the Obersalzberg served as a backdrop for shaping the propagandistic image of the Führer in private, as a simple man of the people. There were photos of Hitler in the local traditional clothing, Lederhosen, greeting ardent followers who had made a pilgrimage up the mountain to see Hitler, having ice cream with children, or Hitler engaged in everyday tasks like reading a newspaper. Yet, these photos were careful to avoid any flaws: while Hitler needed glasses to read, the photo of him carefully avoided showing them, for example. Overall, photography decisively contributed to shaping the public image of Hitler at the time and in the aftermath of the Nazi regime. With a tightly controlled, yet widely disseminated image, photographs played an important role in visually supporting and cementing the Nazi rule and unifying the nation's gaze onto Hitler.

World War II also brought with it a surge in documentary photography. Images of liberated death camps and Europe ravaged by war are a testament to the destructive forces the Nazis had unleashed. They are also a testament to the Holocaust, despite the Nazi's efforts to shroud this in secrecy and the public's assertions that they had not known about anything.

After the war, photography became political through journalistic coverage, for example of the Vietnam War, conflict and insurgencies around the world, natural disasters, and the student protests of the 1960s. Photographs became tools for influencing and shaping the course of politics through civil participation and media. Nick Ut's photo of the "Napalm Girl" was widely distributed in the media and has become a powerful symbol of anti-war activism.

Until the invention of social media, photographic practice in journalism remained rather similar: a photographer (local or foreign) captured images to then be distributed on the front pages of print newspapers or their websites. Photo agencies like Magnum wielded significant power in the market, managing the work and assignments of photographers – and their commissions. Media edited and curated the images to choose the most suitable illustration for a news story or documentary photography project.

All this changed, when social media arrived and every individual with a smartphone and internet access was able to instantly share images online. Before Instagram, images were shared to Facebook and Twitter, as well, but Instagram significantly facilitated this process. With Instagram, everybody could be a citizen reporter – at least in theory. In practice, use cases for the platform vary widely. For politicians, as well, Instagram was a welcome tool, because it allowed them to craft their image in the public without the filter of the press. With the platform, they were able to publish any photo they deemed share-worthy on their own

profile, without any interference but for community guidelines. This revolutionized the political role of photography in the same way the invention of portable film cameras did in the century prior.

Political Iconography

Political iconography studies the visible shape of political ideas and contents as well as the function of images in political contexts (Krass, 2011, p. 345). It can analyze and interpret these images and make visible layers of meaning that may be otherwise hidden (*ibid.*). This may include poses, symbols, clothing, medals, events, and other signifiers of power or politics encoded in images (*ibid.*). “[...] political iconography can influence reality and intervene in actual events – sometimes by using reinvented motifs and visual narratives from previous iconographic sources” (Egea Medrano et al., 2021, p. 215).

Bredenkamp (2007, p. 29) refers to Thomas Hobbes and his concept of images to illuminate the locus of power in political iconography:

“For Hobbes, images achieve their political function not through acts of iconoclasm or image-producing human sacrifice but rather by deterring destruction. Through the ‘terror’ [sic] of their pictorial power, they support those authorities that are in a position to punish destruction.” (*ibid.*)

The political power of an image thus does not lie in the political subject matter itself, but in the power it communicates, especially in relation to the consequences of the destruction of an image. The public knows that what is shown is powerful. Nobody would dare to destroy a such image out of fear of the consequences of such an act. In digitalized democracies, this changes somewhat from Hobbes’ initial idea. Iconoclasm is not followed by punishment. Rather, images attain their political function through dissemination in the digital age. As individuals, we think less about deleting or destroying them and the consequences thereof. There is no way for an individual user to destroy a digital image of the German chancellor that appears in their Instagram feed, for example. In the present, trouble arises from unsanctioned or improper usage. Instead, we may retweet or reshare a political image with a comment in an Instagram Story or a quip on Twitter – something we may indeed get in trouble for³⁸.

The practice of making portraits of political leaders is tightly woven with the history of human society: from sculpture to royal portraiture, and numismatics. The image of the political leader

³⁸ Trouble here is a looser term, as the consequences for iconoclasm are not as severe as they were in the age of Hobbes or even before that. At present, consequences might entail scorn from other followers, negative media attention, or even getting your account reported or suspended – all depending on the scope of one’s actions. Then, there is also illegal conduct, which does not necessarily get addressed on the platforms themselves.

functioned to represent the power of the state and its imagination. Yet, political iconography far transcends the making of images. It can be found in architecture, monuments, paintings, bookmaking, leaflets, posters, photography, and film (Krass, 2011, p. 346). Much has changed in political portraiture in between history and the present. Sculptures or paintings are an inherently different medium compared to a photo of a president shared on Instagram. Yet, observing historical continuity: what is a statue of a sovereign, if not an act of “look at me”?

The latter is not too dissimilar to the visual communication practices of the present. A sovereign might have commissioned paintings or other works of art in an act of self-presentation. Due to the social framework at the time, they were also acts of representation: a sovereign shown on a horse or in ornate clothing on a canvas were also acts of representing their power and the power granted to them by god in absolutism. In democratic societies, presidential or leadership portraiture follows a similar purpose, albeit on different philosophical grounds: a such portrait is an act of representation of the office. In addition, there are different tools for political representation through images and visual material in the present. What used to be the prerogative of an elite (representation/self-representation to the public), seeing one’s own likeness captured in an image, has now become a global, widely dispersed phenomenon. Equipped with a camera phone and an internet connection, everyone can self-enthroned as the sovereign of their own brand.

Political iconography transcends the form and iconography of a mere work of art (ibid.). It also includes the aesthetics of its fabrication, as well as its material properties. On Instagram, not only the gestures and motifs of a politician’s photo matter, for example, but also its presentation. The feed itself influences how we think about and receive the political iconography of a leader or politician.

On the Instagram feed, there also is another area of political iconography: political uses of images. Mechanism of reproduction and reception of images provide information on not only the dispositions, attitudes, and projections of the sender but also the recipient (ibid.). Negotiating political iconography thus is a two-way street. This is very tangible in political photography on Instagram which caters to the attitudes of the recipient as well as that it serves the intentions of a politician who uses it. A politician likely posts what they assume voters or their followers will find interesting, helpful, or appealing – and what serves their own purposes. This was present in political iconography pre-Instagram, as well. With Instagram, the process becomes more immediate and there are direct feedback loops between the sender and receivers through comments and likes. A politician will know very quickly whether their followers liked a photo and its subject or not.

The linkage of aesthetics and politics poses a fundamental challenge, though. Walter Benjamin (2008, p. 19) cautions that “all efforts to render politics aesthetic culminate in one thing: war.” Benjamin relates this to the property conditions under fascism and its means of organizing the masses:

„The growing proletarianization of modern man and the increasing formation of masses are two aspects of the same process. Fascism attempts to organize the newly created proletarian masses without affecting the property structure which the masses strive to eliminate. Fascism sees its salvation in giving these masses not their right, but instead a chance to express themselves. The masses have a right to change property relations; Fascism seeks to give them an expression while preserving property. The logical result of Fascism is the introduction of aesthetics into political life.” (ibid.)

In the above, aesthetics and politics are inextricably linked for Benjamin – with potentially detrimental results. Self-expression in fascism is a means to maintain the existing power structure, a ruse to establish and maintain dominion.

With mass culture and self-expression under the guise of fascism, Benjamin notices a civilizational shift in the contemplation of humanity. In the time of Homer, mankind was a subject of contemplation of the gods, now it is a subject of contemplation by itself (ibid., p. 20). With dire consequences:

“Its self-alienation has reached such a degree that it can experience its own destruction as an aesthetic pleasure of the first order. This is the situation of politics which Fascism is rendering aesthetic. Communism responds by politicizing art.” (ibid.)

Close to a century after Benjamin’s writing of these lines in the 1930s, his observation remains to caution us. The aestheticization of politics – and everyday life – in the digital age comes with immense risks. In the US, media-savvy Donald Trump with his thoroughly implemented aesthetic³⁹, as well as other populists the world over, use images on Instagram and other social media platforms to construct narratives of their personality and governing power. There, we can witness an algorithm-mediated aestheticization of politics that has impacted not only the shape of governments but also how we perceive politicians in general. The lines between celebrity and political iconography are blurring. And in an unexpected turn, in the present it is not the aestheticization of politics but its celebrification that are shaping the political and social order in the age of social media. Here, too, an aesthetic turn can obfuscate power relations in modern societies. Though, while under fascism with respect to Walter Benjamin’s theorization, aestheticization of politics leads to war, at present the aesthetic and celebrity turn in political iconography may rather cause distraction from essential political matters. The latter is an

³⁹It may not suffice considerations of beauty or the sublime, but there is a distinct aesthetic or visual form in the displays and appearances of Trump. He maintains an aesthetic and style throughout, even though in the case of Trump this may rather be a matter of branding and political marketing to the businessman than a consideration of political iconography.

obfuscation, though both Benjamin’s and a present reading point to the aesthetic in politics leading to a fortification of property relations or economic stati.

Photography as a tool for political iconography comes with a host of technological means to alter and change photographs for political and propagandist motifs. Manipulation of photos can range from staging to heavy editing, removing figures, or even creating scenes and presenting them as fact, when they are completely fictitious. A classic example is the removal of Trotsky from a photo of Lenin’s speech on May 5th, 1920 on the behest of Stalin (Keller, 2011, p. 361). Stalin’s removal of Trotsky was a deletion of his presence from then present-day and historical records, like the process of damnatio memoriae in antiquity (*ibid.*). Present-day photography technology poses significant challenges to maintaining the truthfulness of photography, as editing of images on social media has become commonplace and technological affordances to delete individual actors or re-edit a scene have become more sophisticated. (Heavy) editing has become a common social practice.

Considering the complexity of photo manipulations, it can be a nuanced process to distinguish between an intentional lie and photographic direction. Is a photo-op a manipulation or intentional creation of images? And if so, is any of them or are both problematic for the democratic process? Increasingly complex symbioses of media and politics have been deciding what the population sees of an event and how an event is presented to the public since 1900 (*ibid.*, p. 365)⁴⁰, informing our ideas of “authentic” photos and portrayal of politicians. This is not damnatio memoriae like in the example above (we also need to note the wholly different political context). However, throughout history the lines between favorable portrayal, skillful political marketing, and lies have been blurry. Where does successful political communication end and manipulation begin?

Keller (2013, p. 1) describes the power relations at the advent of the picture press post-Civil War in the United States as follows:

“The advent of the illustrated press changed the nature of American presidential oratory and contributed to a major rearrangement of the political power structure, helping the presidency to usurp ‘imperial’ [sic] dimensions.”

Intentional use of photographs coupled with media culture does have consequences. The power relationship between the presidency and the legislative branch changed significantly because of the dynamic Keller (*ibid.*) described. A steady stream of images “[...] made the American polity imaginable as a unified theater of iconic action unobstructed by the constitutionally mandated separation of powers and persons [...]” (*ibid.*). Aided by the press

⁴⁰ Keller here cites his own work, Keller (1990).

and the pictorial material it used, President Wilson and his successors were able to transform this virtual relationship based on iconography into the real world without any changes to the US Constitution (*ibid.*). At the intersection of politics and media, images became a powerful tool to not only shape the public perception of a presidency but also power relations in domestic policy in the US.

How to Shape the Image of a Politician

The intentional use of photographs by politicians is an extension of political communication. Images can influence how politics are negotiated or pursued and can stimulate alternative forms of political thinking (Grave, 2019, p. 442). Leaders, heads of state, sovereigns, and democratically elected politicians have a vested interest in creating their public persona and appearance as an act of visual political communication. The ability to consciously shape the image of a politician is important when governing, as well as during election times. The fact that political iconography can influence reality and intervene in events gives it utmost importance in political campaigns (Egea Medrano et al., 2021, p. 215). To be able to master the image is a competitive factor for governing in mediatized political systems, as well as in the image-hungry age of Instagram. Additionally, Instagram's technological affordances allow politicians to create their public image independent from the curation and filter of the media. However, political communication studies still predominantly focus on textual material (Farkas & Bene, 2020, p. 119).

Instagram tends to be favored for visual communication in a top-down manner, rather than using the platform to actively organize followers (Moffitt, 2022, p. 6). This is reflective of the overall usage of Instagram as a platform for self-branding and self-presentation, as well as larger patterns in political communication:

“In the [...] age of media abundance, political communication may be reshaped by five trends: intensified professionalizing imperatives, increased competitive pressures, anti-elitist populism, a process of ‘centrifugal diversification’ [sic], and changes in how people receive politics.” (Blumler & Kavanagh, 1999, p. 209)

In addition, the most recent forms of political communication open up and blur the standard roles between senders and receivers in the communication process (Barandiaran et al., 2020, p. 256). Now, social media and technology users do not just see images in political communication. They can also respond to these images on Instagram and other social media. This creates a closer feedback loop for the effect of political images that politicians can use to quickly evaluate their performance and to engage with their followers. That and the demands of the algorithm significantly accelerate the process of political and visual political communication. Politicians need to constantly create pictures for their Instagram profiles and

other digital media. Images are often used to personalize communication on social media, for example by showing politicians as central actors in the political arena and presenting them as private individuals (Farkas & Bene, 2020, p. 119 and 123).

I interviewed Pete Souza, the Director of Photography in the Obama White House to understand better how democratically elected leaders are presented in photography online⁴¹ (Souza, interview, 2022). Souza worked as a Junior White House photographer under the Reagan administration, as well. Principally, he stated that the photographic practice of recording images under the pre-digital Reagan administration was the same as under the Obama administration. Dissemination of the photographs changed through digital means, as well as his level of access when he worked with the Obama administration. The work of the White House photographer is unique in Western democracies, as they are part of a team employed to create a visual record of the presidency for posterity and for political communication in the present. It is a role that has evolved as the individual photographers have shaped their office. To Souza, the job of the White House Photographer is that of a historian with a camera.

Souza photographed President Obama for the entire duration of his eight years in office. They had previously met when he covered the then-Senator’s beginning political career in Washington. The White House photographer and other photographers who work with political leaders to record or create their image behind the scenes rely on access to be able to do and shape their work. This is different to journalistic coverage of politicians for example in photo ops. It is a highly personal relationship where the politicians’ level of collaboration determines the type of photographs that are possible. This includes not only personal willingness, but also the level of political and security access a photographer gets. Souza had a very high level of security clearance to be in the room for every event, evident for example through the now-iconic photograph of the president and his team huddled around a desk in the situation room during the raid on Osama Bin Laden. Souza’s level of access was unprecedented and reflects his appraisal of the role in the historical context of documenting the presidency. During the Trump and Nixon administration, for example, White House photographers enjoyed significantly less access, resulting in a different iconography and a reduced volume of historical material for archival.

The Obama administration began to use Instagram in 2012. At the time, it was still a relatively new platform, but according to Souza Obama’s communication team thought it would be a

⁴¹ Unless indicated otherwise, the information on White House photography references my interview with Pete Souza.

helpful addition for the campaign for reelection. Previously, Souza had shared photos of the president on Flickr, including a monthly edit of photographs to show the events at the White House in any given month, prepared with the support of his team’s photo editors. With Instagram, the dissemination of images changed into a more interactive, dynamic context. From the perspective of photography and iconography, Flickr and especially Instagram change the role of a historian with a camera somewhat. Both tools can also be used for outward communication and a tool to shape the image of the presidency. Souza described his role as a documentarian, not political PR or communication. According to him, the latter was the domain of another team within the White House and generally communication interfered little with the photography department’s work.

Souza’s work also highlights an aspect that has hitherto not been a focal point in visual political communication or political uses of Instagram: the skill level of the photographer. Pete Souza is a master of his craft, having honed his skills under a previous administration and as a photojournalist and National Geographic photographer. The Obama administration’s impactful and memorable iconography presented on Instagram and Flickr was impactful, one could also say it worked, because of Souza’s skill and his close relationship with Barack Obama.

It is not enough to be there with a camera as a skilled photographer. For political iconography to work well and convey authenticity, it is helpful when subject and creator have a good working relationship. This refers to something I stated earlier in the section on photography: with modern camera technology, it has become much easier to take decent photographs. However, mastery is something else and I argue that many of the lackluster or maladroit images of politicians we see on their own Instagram accounts fall flat because of either the relationship between the photographer and politician or the skill-level of the photographer available.

Populist leaders, especially on Instagram use commonly shared motifs: the leader as a man (or woman) of the people. Donald Trump, for example, methodically constructed a positive, “Man of the People” image (Dobkiewicz, 2019, p. 826). This can be achieved, for example, by showing Trump or other populist leaders doing things regular people do, like buying fast food, or with pictures amidst a group of seemingly ordinary people. Additionally, photos can also be used to understand how populists understand “the people” through who they choose to represent and how often photos show them with others (ibid., p. 18). In Hungary, Viktor Orbán crafts a public image along similar lines, showing himself as an “ordinary man” while also conveying statesmanship through outlining “us” in ethno-nationalistic terms (Szebeni & Salojärvi, 2022, p. 812).

In authoritarian regimes, rulers can use different methods to exert compliance from their subjects, such as coercion or patronage (Bush et al., 2016, p. 1707). However, intentional use of iconography and photography can enhance support for the regime, for example through an enhancement of legitimacy (ibid., p. 1708).

Two types of actors can deploy authoritarian iconography: states and citizens (ibid., p. 1709). States can commission works of art or (huge) photographs to be displayed on public buildings, while citizens may choose or feel obligated to show photos of the leader in their stores, for example. This creates an interesting effect, because if authoritarian iconography is ubiquitous, people may not even consciously reflect on why it is there or register it on a conscious level (ibid., p. 1709 f.). Among other effects of political iconography in authoritarian states, “[...] the omnipresence of the images suggests that the state has the resources to dominate individuals” (ibid., p. 1712). This is also reflected in the maintenance of these images. Iconoclasm or attempts to destroy these images are not present or visible, for the power of the state excludes or squashes them – or quickly replaces the image in a show of strength.

Photojournalism, Media, and Documentary Photography

Photography and media form a close alliance with many benefits for the readers, as well as for publishing houses. Photographs can illustrate stories, make them more tangible, and help readers comprehend events. They also used to help sell the day's paper – now they help to garner clicks.

In the 1930s, Siegfried Kracauer already recognized the marriage of media and photographs:

“The daily papers are illustrating their texts more and more, and what would a magazine be without pictures? The striking proof of photography's extraordinary validity today is provided above all by the increase in the number of *illustrated newspapers* [sic]”. (Kracauer & Levin, 1993, p. 431)

The goal of illustrated newspapers, Kracauer thought, was to completely reproduce the world accessible to the photographic apparatus. Magazines like Life or National Geographic followed that impetus, producing long, visually stunning spreads on nature and cultures at home and far away. These magazines thrived on images photographers brought home from various long-term assignments in all corners of the globe. With this type of coverage also came an undertone of colonialism: to go out into the world, capture the exotic, bring home imagery of the lives of other people, and subject people around the globe to an interpretative gaze.

Photography can be documentary, recording events as is or it can take on an intrusive or even activist approach. It can be a tool for exposure and to keep power accountable as much as it can support the appearance of the status quo and existing power structures.

“Photography reaches into the world as an intruder, and therefore it also creates a disturbance [...]. The photographer takes a hunter’s pride in capturing the spontaneity of life without leaving traces of his presence. News reporters enjoy recording the uncontrolled fatigue or embarrassment of a public figure [...].” (Arnheim, 1974b, p. 151)

News photography used to be limited to those with technical skills and the willingness to establish the necessary industry connections to become a photojournalist. You had to be good at your craft and you had to find a way to break into the industry. This has changed in the digital age, where everybody can be an author. In the 1930s, Walter Benjamin describes a change in the nature of authorship and media that holds truth for the present age, as well:

“For centuries a small number of writers were confronted by many thousands of readers. This changed toward the end of the last century. With the increasing extension of the press, which kept placing new political, religious, scientific, professional, and local organs before the readers, an increasing number of readers became writers [...]. And today there is hardly a gainfully employed European who could not, in principle, find an opportunity to publish somewhere or other comments on his work, grievances, documentary reports, or that sort of thing. Thus, the distinction between author and public is about to lose its basic character. The difference becomes merely functional; it may vary from case to case. At any moment the reader is ready to turn into a writer.” (Benjamin, 2008, p. 12)

Extending this to the circumstances of the present, it not only means that everybody can be an author through blogs, Twitter, op-eds, and the like. Everybody can also be a documentary photographer or photojournalist, capturing images relevant to the political sphere or engaging in a documentary of one’s own life or the lives of people around them and their community. In the age of Instagram, everybody with the app and a smartphone can become a reportage photographer, without needing to be commissioned by an editor. On the one hand, this broadens the scope and perspective of visual reporting. On the other hand, verification and contextualization of news reports become increasingly difficult due to the sheer number of photographs produced and the waning editorial function of news media in the public sphere.

Iconic Images

Iconic images are a subset of photojournalistic and documentary work. Their power and wide circulation shapes the public imagination and remembrance of an event. Images like Nick Ut’s “Napalm Girl” or Robert Capa’s “The Falling Soldier” taken during the Spanish Civil War are often eponymously connected to entire chains of events. While Capa’s photo represented the human cost of the senselessness of a civil war, Ut’s impacted the perception of the American

Public of the Vietnam War. Iconic pictures could also make a photographer's career, catapulting them to the top of the public's and industry's awareness.

Photography may be uniquely situated to create collective experiences like that. Painting, as Walter Benjamin (2008, p. 14) wrote, is in no position to present an object for collective experience. Photography's reproducibility and ease of sharing in media presents different preliminary conditions that make the formation of public experiences possible. Photographs are more suitable for wide circulation. They also have the technical prerequisites to capture moments, where "[...] the split second of the exposure which decides 'whether a sportsman has become famous enough to deserve being photographed for the illustrated papers' [sic]" (Benjamin, 1972, p. 17)⁴². The split second of the exposure can also decide on whether an image captures a moment that becomes an iconic image or is doomed to oblivion. Furthermore, photojournalism can arrest the viewers of an image and paralyze them, echoing theories of the power of images.

Photojournalism raises several ethical questions. Susan Sontag vocally criticized the practice of going somewhere to capture the misfortune of others:

"Photographing is essentially an act of non-intervention. Part of the horror of such memorable coups of contemporary photojournalism as the pictures of a Vietnamese bonze reaching for the gasoline can, of a Bengali guerrilla in the act of bayoneting a trussed-up collaborator, comes from the awareness of how plausible it has become, in situations where the photographer has the choice between a photograph and a life, to choose the photograph." (Sontag, 2005, p. 8)

Sontag describes the ethical dilemma of the reportage photography: when you take a photo you cannot intervene and when you intervene, you cannot take a photo (*ibid.*). We become voyeurs of humanity, choosing documentation over interaction. Furthermore, exposing ourselves to ubiquitous images in the media can desensitize us to their contents: "Sontag's arguments about the power and danger of photography to anesthetize its viewers are well accepted in relation to photojournalism and documentary" (Parsons, 2009, p. 289).

Arnheim (1974b, p. 153 f.) echoes this criticism:

"[...] when one takes pictures one also transforms life and death into a spectacle to be watched with detachment. [...] the detachment of the artist becomes more of a problem in the photographic media precisely because they immerse him bodily in situations that call for human solidarity."

This is complicated further in the context of the media industry and its operational logic. For a photographer, an iconic or well-timed image can make their career (in a now precarious

⁴² Benjamin here cites from Kracauer. I found no reference to the source in his work or elsewhere.

industry), creating an ethical dilemma between the benefit of making injustices visible and the bid to help others while also navigating the complexity of forging a career and making a living as a photographer or journalist.

Most importantly, journalistic uses of photography need to be seen through the lens of photography's claim to represent reality. This is where they create most impact and great challenges in the case of falsified or manipulated images:

“Photographs furnish evidence. Something we hear about, but doubt, seems proven when we’re shown a photograph of it. [...] A photograph passes for incontrovertible proof that a given thing happened. The picture may distort; but there is always a presumption that something exists, or did exist, which is like what’s in the picture.” (Sontag, 2005, p. 3)

Because a photo of something exists, we may be lured to think that it happened or happened exactly as is shown. This is, as mentioned in the previous chapter, one of the truisms surrounding photography and one of its greatest challenges. Photography suggests that what we see is a moment frozen in time and can dupe us into accepting narratives or outright lies through its visual properties.

In documentary photography, a pictorial relative of photojournalism and another photographic genre that is often associated with political uses or subject matter, narrative is a key element (Kreuzbauer, 2016, p. 325). And narrative can vary depending on the photographer who is recounting a story through visual means. The creator of the photographic image shapes its content and different creators produce different pictures. At the same time, one needs to bear in mind that photojournalism and documentary photography are presented in different contexts: photojournalism is closely tied to the news and depicting news events, while documentary photography is more interpretative.

Arnheim (1974b, p. 157) defines three criteria for evaluating the documentary qualities of a photograph:

“Is it authentic? Is it correct? Is it true? Authenticity, vouched for by certain features and uses of the picture, requires that the scene has not been tampered with. [...] Correctness is another matter; it calls for the assurance that the picture corresponds to what the camera took: the colors are not off, the lens does not distort the proportions. Truth, finally, does not deal with the picture as a statement about what was present in front of the camera but refers to the depicted scene as a statement about facts the picture is supposed to convey. We ask whether the picture is characteristic of what it purports to show. A photograph may be authentic but untrue, or true though inauthentic.”

Snyder and Allen (1975, p. 169) propose an expansion of Arnheim's (*ibid.*) three criteria for photographs as documents by means of authenticity, correctness, and truth. They suggest

asking “what it means, who made it, for whom was it made, and why it was made in the way it was made” (ibid.). Aside from supporting us in academic evaluations of documentary photographs, these questions can also help us in moderating our relationship with and reception of political and other photographs in an age of fakes and weaponized information.

3.3. Visual Culture in the Present

Having studied images as well as photography as a sub-class of images, it is also necessary to focus on the use of images in the digital age. Moving from image to photography and now visual culture allows for a multi-level and nuanced understanding of the logic of images, the functions of photography, and its everyday usages on Instagram.

“[...] visual culture pays less attention to the operating structures of particular media in order to focus on their social and political function” (Moxey, 2008, p. 140). What are the social and cultural functions that determine and shape the use of images on Instagram? I see them two-fold, following the dichotomy of the analysis on Instagram in this thesis: content and medium. We can attribute social and cultural meaning through trends, subcultures, and sub-publics on Instagram that are organized around posting on certain themes. We can also see this meaning in how practices on Instagram, that are mediated through images, shape the present. For the first category, images and trends in travel, health, wellness, fashion, or beauty come to mind. The second can be in changing practices around self-branding, celebrification, and a cultural shift from representation to presentation. The former are one level of abstraction removed from the latter, which describe more general, broader changes in our use of images as it is shaped through Instagram.

The power of images here can be located in the ability of technical images to “[...] absorb the whole of history and form a collective memory going endlessly round in circles” (Flusser, 2000, p. 19 f.). Technical images, photography, exude a unique draw and force:

“Nothing can resist the force of this current of technical images – [...] there is no everyday activity which does not aspire to be photographed, filmed, video-taped. For there is a general desire to be endlessly remembered and endlessly repeatable.” (ibid. p. 20)

Instagram, we meticulously commemorate and share the minutiae of life to be, not as Flusser puts it above – endlessly repeatable – but endlessly scrollable. On Instagram, individual pictures are ephemeral, lost in the feed after seconds. However, the act of sharing and posting to a timeline is endlessly repeatable.

Flusser also offers a perspective on the changing function of images from the pre-social media age that connects to how we use Instagram in the present as well as how our pictorial, visual cultures are evolving:

„Human beings cease to decode the images and instead project them, still encoded, into the world 'out there' [sic], which meanwhile itself becomes like an image - a context of scenes, of states of things. This reversal of the function of the image can be called 'idolatry' [sic]; we can observe the process at work in the present day: The technical images currently all around us are in the process of magically restructuring our 'reality' [sic] and turning it into a 'global image scenario' [sic]. Essentially this is a question of 'amnesia' [sic]. Human beings forget they created the images in order to orientate themselves in the world. Since they are no longer able to decode them, their lives become a function of their own images [...].” (Flusser, 2000, p. 10)

Three elements stand out in the above: that images project out into the world, turning it into an image, that they restructure our reality, and that in the absence of the ability to decode these images, people's lives become a function of their own images. Instagram and its visual culture have created a photographic takeover of and reshaped the world, where so many aspects of our lives are affected and dominated by their perceived instagramability. This changes how we experience reality and how reality is structured. The global image scenario Flusser (*ibid.*) refers to can very well be seen as the global ephemeral body of images created for and posted on Instagram. And lastly, these large amounts of images can not only be disorienting; the push of images on Instagram, the draw of the platform, exudes a strong force in our lives. When users ask themselves whether a moment or scenery is instagramable, the reversal of the function Flusser (*ibid.*) describes, sets in. Photos become our way of experiencing the world, our existence, instead of serving as mere devices to make something visible or remember it. I share on Instagram, therefore I am.

Visual culture is a vague field with fluid definitions. However, visual nature is central to visual culture:

“This does not [...] mean some reduction of visuality to a natural reflex or an automatic, mechanical process: what it does mean is that visuality is constituted as a dialectic between operations that are automatic and willed, reflexive and learned, programmed and freely chosen.” (Mitchell, 2003, p. 251)

Studying the various visual cultures on Instagram, it is helpful to keep in mind the dialectic between what is conscious and unconscious as well as intentional and learned Mitchell describes above. Visual culture on Instagram is at once informed by a user's likes and interests, the behavior of peers and accounts they follow and the contents they absorb consciously and unconsciously, and the algorithmic distribution of images in the feed that further may shape their tastes, likes, and aesthetics. What we see play out on Instagram and in how Instagram is being used is a confluence of all three of these factors.

3.3.1. Visual Cultures on Instagram: On Selfies, Overtourism, and Remembrance

Numerous cultural practices surround Instagram with seemingly endless sub-communities and -publics organized under hashtags and the connective tissue of recommended and mutual followership. I will explore four different aspects of visual culture on Instagram in this section: selfies, travel, nature, and remembrance as examples of current visual culture practices on Instagram and their effects. I chose these four examples out of a wide variety of visual cultures on Instagram to highlight the complexity and nuance surrounding cultural practices on Instagram.

Cultural practices surrounding photographs quickly developed after the invention of the medium. In the mid-1800s, cartes-de-visites, small cards with photographic portraits mounted on them, became a fad, for example. At the time, an invention in camera technology enabled the production of portrait photographs with a four-lensed camera that could produce eight photos in one sitting (Britannica, 2023a). Relatively inexpensive, these photos were then cut up and mounted on cards (ibid.). The resulting cartes-de-visites were very popular in the 1860s and exchanged widely on birthdays and other social occasions (ibid.). Queen Victoria used cartes-de-visites to shape her public image, as these little cards could be shared widely and reprinted with ease (Pearson, 2023). This historical example demonstrates that sharing about ourselves has been a vital part of the manifold cultural practices surrounding photography – even in the pre-digital age. Photography can be a helpful tool to help us tell the story of who we are to the world.

Family photo albums are another example of visual culture and anthropological practices in photography. We may use them for photography's mnemonic function, to present records of past events, people who have passed, and to look back at how things were. Notably, family photos contain [...] emotional, psychological, and affective qualities that reach further than the individual owner [...]” (Sandbye, 2014, p. 1). Family albums have an innately sociological, anthropological, and historiographical element:

“Family photo albums are about social and emotional communication, they can be interpreted as ways of understanding and coming to terms with life, and at the same time they document more sociological aspects of daily lives, that we do not have access to from other historical sources.” (ibid.)

In the family album, we negotiate not only our story. We also negotiate how we interact with and interpret life. Through the show-and-tell of family albums, often presented in special albums and folders, we pass on and share meaning and stories about our own existence and that of the family unit to the person who is shown the photographs. This is akin to how many users approach Instagram. Instead of communicating the story of our family to our family and

other people in our immediate social network, we use Instagram to tell the story of ourselves to the world.

Selfies

Only about 0.7% of all photos on Instagram are selfies (Caliandro & Graham, 2020, p. 1). At a comparatively low volume, selfies still have been the subject of cultural attention and discussions, seen as signs of selfishness, digital narcissism, and the shallowness of a younger generation that uses them (Meese et al., 2015, p. 1818). Academic research around selfies diverges, too, along the lines of selfies expressing narcissism or encouraging social engagement (Cornelio & Roig, 2018, p. 2776). Either way, a selfie can be considered a kind of visual genre (Meese et al., 2015, p. 1820):

“It is a formalized category of media image and production, which is structured by a number of stylistic conventions. These include the conflation of photographer and subject, a framing in which the subject dominates the foreground of the image, a subject typically looking directly into the lens, and a perspective that is generally front-view from above.” (ibid., p. 1820 f.)

In addition to being considered a genre in visual communication, the selfie is also a communicative act embedded in the conventions of social media culture (ibid., p. 1821). Overall, selfies have become more normalized and consolidated as a cultural practice (Cornelio & Roig, 2018, p. 2788). They are an ephemeral and creative form of real-life communication, a way to convey information about a person’s emotional circumstances or cues about their current situation, and part of ongoing streams of communicative exchanges of the people depicted (Meese et al., 2015, p. 1825). Selfies are not a monolithic concept but consist of sub-genres with their own logics of production, distribution, and reception (Leiendecker, 2018, p. 189).

In their study of selfie-taking at cultural events, Cornelio and Roig (2018, p. 2787) find that selfie-taking is justified by the exceptionality of the moment, whereas photo-sharing legitimizes one’s attendance of the event in the sense of “pics or it didn’t happen”. Furthermore, they suggest interpreting selfie-taking and -sharing on Instagram as a form of real-life family album, where memories are narrated in real-time (ibid.). This reflects the memory function of photography and suggests that photography can be a performance to locate and capture one’s existence. Selfies are a form of making the self visible to oneself and the world. With the selfie, “[...] the viewer is invited to establish their own relation to both the subject and the pictured object, which in effect assumes the role of a backdrop for the self” (S. P. Smith, 2021, p. 611). Selfies disclose a plethora of information about the person taking it: their emotional state, location, situational or cultural context they are moving in (depending on how much of the

backdrop is visible), social status (also depending on the backdrop and any signifiers that may be visible), as well as any other information the taker of a selfie may share in captions and hashtags. However, once shared on Instagram, the human agency in selfies is transformed

“[...] into a constant reminder that once anything enters digital space, it instantly becomes part of the infrastructure of the digital superpublic, outliving the time and place in which it was original produced, viewed, or circulated.” (Senft & Baym, 2015, p. 1589)

Selfies can grant aesthetic and political importance to moments and people – especially those who would otherwise be invisible (Caliandro & Graham, 2020, p. 5). On the other hand, in the context of digitally mediated platforms, this form of self-expression and visibility is absorbed by the technological infrastructure and larger contexts at play on the aforementioned platforms.

Instagram and Travel: Impact on Behavior, Destinations, and Digital Nomads

In the late 2010s, overtourism became a widespread concern among popular tourism destinations, governments, and tourism agencies (Dodds & Butler, 2019, p. 6). The explosion of global tourism numbers can be attributed to a multitude of factors, among them the falling cost of travel (*ibid.*). However, changes in media technology, the emergence of social media, and Instagram’s role as a highly visual platform have played an important role in the change of tourism behavior and numbers (*ibid.*, p. 14). Social media like Instagram “[...] not only allow tourists to share information with large audiences, but also allow them to share their behaviour at destinations, and such behaviour is often copied by subsequent visitors” (*ibid.*). This can create an especially great pressure on natural or tourism sites, where droves of visitors come to not only experience but also take the same photo they have seen on other people’s Instagram feeds. Instagram images influence travelers’ destination choices (Fatanti & Suyadnya, 2015; Shah, 2020; Tesin et al., 2022). Ironically enough, sharing images taken at these destinations on Instagram creates a sense of individuality of one’s own post and feed that is not warranted given the endless repetitions of the same poses and motifs at the same site. S. P. Smith (2021, p. 604), for example, analyzes the motif of the lone traveler on a promontory looking out into a vast landscape that is as very common motif in the travel Instagram sphere. In popular tourism locations, lines of eager snapshotters queuing for the winning shot juxtapose the seemingly unspoilt nature of the final product of a single person posing in front of an imposing natural backdrop (*ibid.*).

Photography and Instagram here take on an interesting role. On the one hand, they provide photography’s memory function, on the other they invoke Susan Sontag’s (2005, p. 6) observations that with photography travel becomes a strategy for accumulating photographs. With these photographs, Instagram users certify their own experiences – and may use them

to build a personal brand for commercial or personal gains. Tourists travel to mass Instagram spots in order to specifically take a photograph that usually presents a much more glamorous, aesthetically pleasing image than the reality of standing in line to wait to take a photo that has been created in the same way hundreds or thousands of times (Thurlow, 2021, p. 125). The power of these iconic travel photo spots shapes the behavior of travelers not only at destinations but also in advance, when booking trips. One travels to be able to take and share these photos. S. P. Smith (2021, p. 619) notes that photos and poses of travel influencers are imitated by average, non-influencer users, as well, potentially with the desire to become more known or build branding credit for their profile. However, it is not clear whether this applies to all people imitating poses and perspectives. We can note, though, that travel photography on Instagram can have an effect on mass behavioral patterns.

With tourism imagery, nature, travel, other cultures, and one’s own experience becomes a commodity to be captured and shared on the internet. Landscapes “are sought principally as backdrops for the mediation of the self [...]” (ibid., p. 611). This is close, conceptually, to Sontag’s (2005, p. 6) assertion that photography helps people take possession of spaces where they feel insecure in relation to tourism and photography. Instagram and the photography on it are catalysts for commodification. As S. P. Smith (2021, p. 613) writes:

“Where one travels, the activities they engage in, the landscapes they experience are all commodified in Instagram’s marketplace, if not in monetary terms than [sic] in social capital. As a banal mediator of travel and tourism, Instagram can encourage tourists to imagine themselves as a capital-generating brand.”

Beneath the veneer of dreamy, enticing travel imagery, S. P. Smith (ibid.) detects a more somber level of meaning: that of Instagram as a reflection of market and branding considerations. Individual users may have a variety of reasons to participate in it: self-branding, intentions to become influencers, social and cultural belonging, or an absorption of the existing cultural and aesthetic hegemony. The outcome – which I will discuss in more depth in the following chapter – is the same. Travel images shared on Instagram reflect commodification dynamics on the platform that is Instagram.

Adjacent to and a part of travel culture on Instagram, the figure of the digital nomad has been a more present figure since the emergence of the internet in the 1990s (Caliandro & Graham, 2020, p. 5). Since then, the entrepreneurial promise of remote work coupled with the emerging mega trend of travel have created not only new lifestyles, but also challenges with globalized gentrification the figure of the digital nomad is symptomatic for (ibid.). The aesthetic of the digital nomad is depoliticized, often repeating tropes such as making money from a hammock or the beach – or the cliché image of a “laptop next to a cappuccino on a wooden desk” (ibid.).

At the same time, an alternative reading of the digital nomad “[...] through their creative use of the platform’s techno-poetic affordances signals the potential for alternative cultural narratives and new political categories” (*ibid.*). Here, the digital nomad with their lifestyle posts appears as an avatar of post-work. Aside from the performative nature of cappuccino- and beach-heavy imagery in digital nomad’s posts, this Instagram (and online) subculture opens up a scenario, where “[...] the redistributive potential of digital work might be alloyed with the communitarian potential of social networks.” Aside from (performative) content of the good life abroad and on the road, the digital nomad is a representation of the underlying forces that are shaping and reshaping how we live.

Instagram’s Impact on Nature

Natural sites have felt increasing pressure from rising visitor numbers because of Instagram. Stress on national parks and blooming fields due to Instagram activity highlights the same patterns as with Instagram and traveling. Often, these two phenomena, Instagram and travel and Instagram’s effect on nature, are related, with eager Instagrammers traveling long or shorter distances to photograph natural sites and themselves in them. Provençal lavender fields (Reiffer, 2019), the wildflower “superblooms” in California (Farah, 2023), or alpine national parks (Moczek et al., 2020) are all overrun and subsequently damaged in the quest to take the perfect photo for Instagram.

Instagram use has a deep impact on nature conservancy. Especially in protected areas that sustain little human intervention, Instagram’s functions like geo-tagging that reveal information about a place visited like the time, date, and – most impactfully – GPS coordinates exacerbate the strain on natural areas (Šmelhausová et al., 2022, p. 1). Places that were previously local secrets or known to only few visitors through research, local connections, or a more intimate knowledge of a place were now accessible to the masses through a simple tagging feature. Overcrowding and overtourism in sensitive nature spots and agricultural areas (when Instagram users chase the perfect photo in a sunflower or lavender field), have increased all over the world in the age of Instagram (*ibid.*, p. 2). Poignantly, an Instagram user in connection with the run on the California “superbloom” admitted that she had photoshopped the images and let her followers know they would not be able to recreate the image she took (Moss, 2019). Here, the desire for the perfect photograph led to the creation of a digitally enhanced phantasy that can, potentially, have dire consequences for nature sites.

Akin to Instagram’s draw in choosing a travel destination because of its photographic appeal, users visit natural sites to craft photographs for their profiles. This may not only result in the

strain on the natural sites themselves, but also infrastructural demands on the surrounding area that now may need to accommodate the influx of visitors. Challenges arise especially, when places are geotagged that are off the beaten path, in remote areas, and potentially dangerous to reach. In the US, the Jackson Hole region actively encourages visitors to tag responsibly to counter these effects (Jackson Hole, 2023). Contrary to that, activists view the bid to prevent geotagging as a means to gatekeep the outdoors (Moss, 2019; Mullen, 2020). In turn, initiatives like US environmental organization’s *Leave No Trace Social Media Guidance* (Trace, 2020) intend to educate users on sensible, sustainable, and respectful social media usage in the outdoors. For example, they encourage people to “consider the platform you have and the people you reach when posting and commenting about the outdoors” (*ibid.*) or “give some thought to what your images may encourage others to do” (*ibid.*).

In Germany, Berchtesgaden National Park is one of the sites, where the phenomena described above affected nature greatly. Berchtesgaden National Park is Germany’s only national park in the alps. The region has been a popular tourist destination since the middle of the 19th century. In the late 2010s, a hidden natural infinity pool became an Instagram sensation leading to an influx of thousands of visitors at the unmarked site that was previously only accessible through an unmarked path.

To understand the challenges of managing natural areas in the age of Instagram, I interviewed Carolin Scheiter, Head of Public Relations at Berchtesgaden National Park (Scheiter, interview, 2022). She shared that the park administration had been overrun with the sudden and growing visitor numbers to the site. Every new photo shared on Instagram contributed to growing awareness of the space. The situation reached a tipping point when a well-known influencer with a following of 1.6 million (at the time) shared photos of the natural infinity pool on her profile. While the park tried to intervene and make her aware of the consequences of posting the photo, they were unable to reach her. The park administration resorted to publicly commenting on the photo, which sparked a debate in the influencer’s community, as well as the media. This highlights the challenges nature conservancies face in the Instagram age: speed and scale. Things move faster and have greater effects.

In our interview (*ibid.*), Scheiter shared several considerations in conservancy in connection with Instagram: the park’s inability to generate fast responses due to administrative challenges⁴³, legal challenges around the regulation of access to public land which reduced the park’s ability to cordon off the area and changed sensibilities in nature conservancy by the

⁴³ Public institutions have a different speed of operation than the fast-paced world of social media.

people who visited. Presently, the area is closed off to visitors for several years and its reopening depends on nature’s recovery in the area.

A study on user behavior around the natural pool reveals a dilemma of Instagram, travel and nature, and individual attitudes: 33.9 % of visitors to the pool had learnt about it on Instagram with 61.9% in total coming from social media (Moczek et al., 2020, p. 496)⁴⁴. Visitors of the pool consider themselves closer to nature than the average person. Their visits and photos taken are an extension of appreciation of nature to them (*ibid.*, p. 498). As a complicating factor, information on the national park’s boundaries and rules were not immediately visible in the surrounding area of the natural pool – not all visitors knew that they were inside the national park and which guidelines to follow (*ibid.*, p. 496). At the same time, Scheiter (interview, 2022) shared that this leads to the paradoxical development of people damaging nature while perceiving themselves as appreciators of nature. Furthermore, an investigation of user motifs also revealed that visitors to the pool sought to escape mass tourism and experience a more real, true version of nature (Moczek et al., 2020, p. 498). It is paradoxical that this quest for a more genuine experience of nature leads to the production of the ever-same photo and ultimately the destruction of a natural site.

The case of these and other nature areas highlights a variety of challenges created by visual culture on Instagram: along the fault lines of accessibility and restriction, visitor management in parks needs to balance nature conservancy with public access laws and maintaining opportunities to experience nature. Along the individual fault lines of experience and sharing, visitors negotiate cultural practices around photo sharing on Instagram as proof, social signifier, and brand-building opportunity with the need to align their actions to protect nature. Ultimately, this is the tragedy of the commons revisited in the social media age.

Auschwitz: Experience, Education, and Remembrance Through Instagram

Instagram’s visual culture and the memory function of photography pose new questions and challenges for remembrance culture at sensitive sites like Auschwitz:

“Selfies at Auschwitz have become increasingly popular and have generated agitated public debate. While some see them as an engaged form of witnessing, others denounce them as a narcissistic desecration of the dead” (Feldman & Musih, 2022, p. 1).

However, the question of visual culture and photo practices on Instagram at memorial sites is more nuanced than the denouncement of selfies. Technological innovations have always

⁴⁴ Other sources of information were YouTube (5.9%), Pinterest (5.1%), outdoor websites (5.1%), Facebook (5.1%), personal recommendations (28%), and regional papers (1.7%). Respondents could choose more than one answer (*ibid.*).

changed how we remember and introduced new forms of behavior (*ibid.*, p. 4). At the same time, the Auschwitz Memorial asked visitors to refrain from balancing on the beams of the train track leading to Auschwitz’ gate on social media and shared four exemplary photos to clarify which behavior they discouraged (*ibid.*, p. 10). Taking selfies at Auschwitz and reactions of disgust reveal several processes relating to the memory of the Holocaust on social media: the authority of the witness and their next-of-kin, changes through new technologies and sensory regimes, and the continued strength of existing categories of what constitutes good, proper memory among gatekeepers and older generations (*ibid.*, p. 14).

I spoke with Paweł Sawicki, a press officer at the Auschwitz Memorial, who manages the museum’s social media channels, including Instagram (Sawicki, interview, 2022)⁴⁵. The Auschwitz Memorial was the first institution of its kind present on social media. Sawicki explained that there were several concerns and unanswered questions when the institution decided to open social media accounts, for example: how to define what a heart or like means when presenting information with difficult contents, how to approach comment functions and moderating, and to what extent the institution wanted to “go with the flow and accept” (*ibid.*) the logic of social media and algorithmic distribution. In other words, what would be appropriate posting strategies on a platform that generally favors imagery that commands attention in order to be favored by the algorithm.

The Auschwitz Memorial’s content strategy on social media focuses on the commemorative function of the museum to remember victims and educate about history. There is an additional factor in social media use at the Auschwitz Memorial when it comes to Instagram because Instagram is a visual platform. This raises the question of sensible use of this image-centric platform in connection with a site like Auschwitz. The site’s Instagram shows images that are from the museum, as well as photos by visitors the account reposts together with historical context. Paweł Sawicki explained that the Auschwitz Memorial is promoting images that are good examples for Instagram use by visitors. Managing the account, Sawicki intends to choose pictures that are interesting in terms of visuality and subject matter, that show the variety of the site, not just iconic images, and may add historical content to a building or place that people choose to take photographs of and share on Instagram. Sawicki stated that through this approach they have been able to teach the world how to remember visually.

Overall, Instagram (and other digital media) raise the question of what an appropriate role for photography in commemoration is. Sawicki chooses photos for the Instagram that are

⁴⁵ Unless referenced otherwise, the information on the use of Instagram at Auschwitz Memorial refers to the interview with Paweł Sawicki.

respectful, offer good visual quality of a place and the memorial. Sometimes, he also posts photos the museum staff created, as well as images that show and tell the stories of the victims. In choosing photos, he also considers whether a photo is aesthetically interesting, captures attention, or allows the museum to communicate more. “It’s a picture that when we add the context where the picture was taken, it builds a connection, which will be good for people who will follow us and who see what we post” (ibid.). However, there is no straight line or clear cut. When resharing a photo of a visitor, Sawicki works with three elements: the visual quality, the relation to the site, and the context of the photographer and the message they want to convey with a photograph.

Addressing user behavior on Instagram, Sawicki shared that at the beginning of each tour there is information on the site’s sensitive nature without giving visitors specific information on photography. Yet, setting boundaries is challenging, because determining what is and is not respectful is not a binary issue but a continuum. The same applies for selfies which have by now become part of our visual vernacular: “And so the question is, is a selfie disrespectful [overall]? And here the answer will be, not really. And another question is, is a selfie always appropriate in every place?” (ibid.). Sawicki points out that just as selfies are not always disrespectful, they are not always appropriate in every place of the Auschwitz Memorial. When looking at selfies on Instagram context matters: Some visitors share in the caption that they were really moved by the visit, that it was emotional, and that they wanted to have a type of document of their visit.

In the case of disrespectful photos, the Auschwitz Memorial in the past shared those examples on their social media, yet quickly noticed that this led to attacks on the people who had taken them. Now, if they are not public people, the museum messages them privately or leaves a comment that this might not be the way to photograph the site. With a public figure, the process is different, however this has rarely occurred. The Auschwitz Memorial overall has chosen to focus on showing good examples. Sawicki shared that he believes this has an educational function in the long run in showing people how to visually share about the Memorial. Overall, he notes that Instagram is a living environment and that sensitivities may change. For the museum, thus, photography culture on Instagram is an ongoing process of exploration and mediation about what is and is not appropriate for or supportive of the Auschwitz Memorial’s memory function.

Overall, this is reflective of the changes to photography’s memorial function that has changed dramatically in the age of Instagram (Caliandro & Graham, 2020, p. 5). Instagram can serve as a “digital memory box” (ibid.). “The remembrative work of photographs has become

interwoven with myriad social and communicative functions” (*ibid.*) through how we use Instagram to share and construct our reality through the photos we take and share on it.

3.3.2. Self-Branding, Celebrity, and the Presentational Turn

Instagram’s visual culture is shaped by bigger trends and forces that impact how its users take and share photos, how they use and interact in the public space, and how they experience the world. As discussed in the section on nature and travel in the previous chapter, Instagram’s self-branding impetus creates incentives to not only commodify one’s surroundings but also oneself. In addition, this results in an emergent aesthetic that users choose to further their own visibility in the attention economy.

Social and cultural changes on Instagram are complexly interwoven at the intersection of self-branding, aspiring to become influencers or gain celebrity capital on the internet, digital content creation as a career opportunity, as well as the backdrop of neoliberalism that has an atomizing effect, singling out individuals in the economic sphere. Cultural practices as all these mentioned contribute to and are reflective of bigger socio-cultural shifts from a representational to a presentational media and cultural regime (Marshall, 2020, p. 95), the pervasiveness of the logic of self-branding, as well as a shift in the social logic from generality to singularity (Reckwitz, 2020, p. 142). Images posted on Instagram are a catalyst for and representation of these developments.

Self-Branding – Commodifying the Self in the Digital Age

Self-branding has become prevalent, paralleling the growth of digital technology against the backdrop of neoliberal individualism (Khamis et al., 2017, p. 191). “Self-branding discourses reflect a larger [...] global trend in which individual workers directly compete against each other in a race to lower earnings and job security” (Curran & Jenks, 2022).

Research on self-branding draws from two fields, marketing research and cultural studies (Hu, 2021, p. 355). The marketing perspective regards self-branding as a strategy that individuals use to promote their careers, while cultural studies consider it immaterial labor associated with consumerism that implies hierarchy and inequality (*ibid.*). Hu (*ibid.*) defines it as “[...] a strategy that individuals use to present self-images either through commodifying self-identities or embodying a cultural symbol to attract attention to gain social or economic benefits.” Self-branding here appears in connection with the attention economy. For example: travel influencers in the examples in the previous chapter craft images that commodify the self and their experience to attract attention and build a brand or following for economic opportunities. In travel photography pictorial strategies like that of the sole person on an elevated point gazing out into the distance over landscapes “[...] offers a case study in how influencers operationalize

aesthetics in the production of profitable, branded selves” (S. P. Smith, 2021, p. 618). Through self-branding, the self becomes a saleable commodity, intrinsically linked to self-promotion with the objective of obtaining visibility (Zulli, 2018, p. 144).

Branding practices on Instagram affect individual users and businesses. On Instagram, the self enters into multi-layered, commercial relationships that have been normalized as standard and accepted social practices. Through Instagram’s business nature, every aspect of interactions on the platform is infused with a commercial and quantifiable touch. For example:

“[...] gentrifiers use social media to express their identity status, often creating posts that serve as advertisements for hip and high-class establishments. Meanwhile, other establishments are largely absent from digital platforms, with the notable exception of a number of shops that changed their aesthetics to appeal to gentrifiers.” (Bronsvoort & Uitermark, 2021, p. 2857)

The aforementioned authors study gentrification in an upscale street of Amsterdam. There are two notable themes present in the quote above that illustrate the change Instagram has created for our cultural and social norms of interaction and communication: advertising baked into communicative actions, and the pressure of the world and individuals to visually conform with the demands of the platform to be competitive in the economic and social market. Instagram marketing is clever: aesthetically pleasing designs of stores, cafes, or restaurants lend themselves to be instagrammed. “[...] spaces of (or associated with) aspirational consumption are typically more ‘instagramable’ [sic] than quotidian urban spaces” (Caliandro & Graham, 2020, p. 6). This can lead to the construction of lifestyle enclaves (*ibid.*).

In practical terms, users can choose to include information on the location where the photograph was taken, performing advertisement services for the establishment. Instagram marketing is not just clever viral or referral marketing through appealing surfaces and design, though, it is a commodification of self-expression and communication.

Furthermore, this also results in pressure to conform to the visual conventions and modes of use on Instagram in order to participate in business and attain social and cultural capital online as an individual. Numbers on profiles (followers, comments, people followed) allow us to quantify and assess the value and standing of a profile and implicitly the person associated with it. Here, photography’s communicative, documentarian, and memory function have been coopted and absorbed by the imperatives of business and advertising practices.

“Through visuals and thematic material, Instagram users are enthusiastically implored to deploy stylistic consistency in their posts as a way of fostering a personal brand” (S. P. Smith, 2021, p. 612). This is achieved, for example, by using the same editing settings throughout

one's sharing on Instagram: a certain saturation of hues and a certain, repetitive color scheme provide cohesive visual branding in the overview of a feed. Aspiring influencers can even buy so-called presets for photo processing apps like Lightroom to achieve the same effects as popular influencers. “[...] rather than a plethora of unique visual styles what emerges are markedly consistent aesthetics that are styled for mass appeal, indicating the manufacture of a hegemonic aesthetics⁴⁶” (ibid.). The best way for users with an average following to maximize engagement is to tailor posts to the dominant values of Instagram's market (ibid.). This in turn, can lead to a blandification of content on the platform, reducing photography's potential for self-expression, self-inquiry, and sharing the self in a type of ongoing, instant online family album. After all, the optimal branded self “[...] has to cater to the taste and need of the mainstream market” (Liu & Suh, 2017, p. 13).

Social media's scalability – the fact that one account can theoretically reach hundreds, thousands, if not more other users – implies that social media photos are performed for much vaster audiences than before social media (S. P. Smith, 2021, p. 612). Just like photographs per definition include the triangular relationship between creator, spectator, and the machine making the photograph, photographic performance on Instagram includes not the potential for one, but large numbers of spectators or viewers. This has the potential to change one's behavior in posting and communicating online – being mindful of the potential audience, as well as to establish, curate, and maintain one's own brand.

Scalability also relates to growth levers in the commodification of one's brand. Instagram affords scalability through the power of images and the social and cultural functions of photography (ibid., p. 610). Scalability here is also the potential to impact larger numbers of people than in the pre-digital age (ibid.). Those users “[...] that successfully manipulate scalability gain access to the monetizable market afforded by Instagram” (ibid.). As their platform and reach scales, users can offer their profile and brand to advertisers. As a key outcome of cultural practices on Instagram, this affects the tenor of the entire platform (ibid.).

Instagram affords every user the supposedly democratic potential to become an influencer (S. P. Smith, 2021, p. 619): “[...] users may be encouraged to conceive of themselves as brands in even the posts they make to a small following: they may be quoting an advertisement in the hopes of transforming themselves into an equally attractive advertising space” (ibid.). Even with only a few hundred followers, you can still record a video of your haircare routine, link to the products used in it, and share it with your audience. Outside of an influencer endorsement deal that is typically only accessible to users with larger followings, this is another way of

⁴⁶ Using the term “hegemonic aesthetic”, Smith here refers to Gramsci.

turning an account into an ad space. Instagram is a driver of commodification. With it, the reach of economic practices extends into the spheres of personal and family life as well as communication. Seemingly, everyone is building a brand and everyone needs to manage their personal public PR endeavor on their Instagram profile.

Another phenomenon is important in this context: context collapse. On the way to build an audience, users share, post photographs, reveal details about themselves, or tell stories to engage an audience. Context collapse occurs when users lose track of the context in which they are operating in their actions and interactions on social media (Wexler et al., 2018, p. 1). This can be especially unhelpful for new users of social media or those who are only beginning to understand the challenges of navigating Instagram as a commodified personal brand, instead of a private person.

Influencers and Celebrity

In connection with self-branding strategies, a key figure of the social media age emerges – the influencer. Influencers are a practice of microcelebrity on social media (Morais et al., 2022, p. 289). Microcelebrity practices are characterized as processes of self-commodification (*ibid.*). Here, self-branding and building an audience turns into accidental or intentional economic opportunity – at the cost of commodifying the self.

“Branded selves are designed for Instagram’s market and its demand for attractive bodies as advertising space [...]. Like any form of advertisement, consumers are left comparing themselves to the models; what is different about Instagram, however, is the aspiration to become just such a model. The very real potential in achieving this end seems to encourage the average user to perform the images of the influencers they see.” (S. P. Smith, 2021, p. 619)

Instagram here is a (seemingly) accessible economic opportunity and a space for continuous marketing and advertising on the condition of commodifying the self and one’s experiences. Photos taken and shared on Instagram are the vehicles for this. The power of the image here is the catalyst for gaining attention on the platform to accrue social and cultural capital through rising follower counts and reach that can – eventually – be converted into economic capital through advertisement deals and other professional opportunities.

Commodifying the self has long been the domain of celebrities (Marshall, 2021, p. 164). In the age of Instagram, this celebrity logic has spilt over into the interactions of those aspiring to be or who already are influencers, a form of microcelebrity.

“The kind of agency that celebrities bring to the public world is infused with ‘Industrialized’ [sic] Agency. This form of Industrialized Agency (IA) has been naturalized as billions now engage in some form of persona construction for the attention economy through their elaborate uses of social media.” (*ibid.*).

Marshall’s observation is important. It reflects on the global changes that have occurred in the past decade that become visible in the examples cited in the previous section: touristic self-presentation, nature images as a backdrop for self-branding, and needing to conform to a hegemony in aesthetic vernacular that mediates economic opportunities. All this is negotiated and moderated by the algorithm. In pursuit of attention and visibility on Instagram, influencers’ algorithmic practices resemble a game constructed around rules embedded in algorithms that regulate visibility (Cotter, 2018, p. 896). The algorithm is the ultimate arbiter of social, cultural, and economic capital on Instagram. Hence, users feel a draw to play to the algorithm.

The influencer relationship not only commodifies the self but also that of communication and relationships. Authenticity is a key currency in the digital self-branding landscape, creating a somewhat paradoxical dynamic: on the one hand individuals turn themselves into brands through strategic photo production and sharing on social media, on the other hand, this needs to be presented in an authentic, personable way. Relationships obscure the underlying dynamics of mercantile interests. An influencer’s authenticity when posting about a product, for example, is an important element in the perception of the product promoted (Park et al., 2021, p. 586). Micro-influencers (those with 100,000 followers or less) are perceived as more authentic than mega-influencers (1 million followers or more) and maintain more intimate relationships with their followers (ibid., p. 586). Furthermore, indicators such as follower numbers or likes serve as signposts for an individual’s social and cultural capital and can be an important factor in determining professional opportunities, for example podcast appearances, book deals, sponsorships, and other forms of collaboration.

With the influencer, or now content creator, celebrity dynamics move into the realm of interaction and economic activity. Yet, there is also a focus on celebrity activities on Instagram. As a testament to a cultural focus on celebrity on social media, a cottage industry of celebrity observation has emerged on the platform. The Instagram account *Comments by Celebs* investigates how celebrities have commented on each other’s profiles, scanning them for the most intriguing, controversial, or entertaining comments. These also show that stars are just like us, in line with the overall impetus for celebrity use of Instagram: to create the illusion of approachability or normalcy through a carefully crafted dissemination of images.

Furthermore, accounts like *Deuxmoi* are founded on anonymously submitted news on celebrities’ activities and photos of celebrity sightings. Doing so, social media and digital photography are weaponized, turning everyone into a paparazzi or documentarians of the private moments of public persons’ lives. The person behind *Deuxmoi* exposes others’ private dealings while guarding her identity carefully. This is Bentham’s panopticon translated to real

life: where (you think) you are watched 24/7, yet the center of the panopticon remains shrouded in secrecy and at a distance.

I assume that users underestimate the impact this type of celebrity communication can have on everyday, ordinary culture. Celebrity lifestyles and dealings with celebrity are aspirational, can influence the wider conditions of our existence. If celebrities are fair game for recurring intrusions into their personal sphere during private moments, this may easily carry over into how we deal with each other, as well. “I’m recording this” can be as much as a tool for empowerment and conduit for agency as it can be a threat.

Both of the aforementioned accounts present a type of celebrity by proxy or a second-hand level of celebrity through analyzing celebrity that can be leveraged into profitable businesses and media careers or through merchandise, book deals, and advertisements. Another account, *Influencers in the Wild*, showcases videos of (aspiring) influencers creating content submitted by followers. The account humorously highlights the often-absurd process of making content in the public sphere. As a matter of that fact, the account also demonstrates how our relationship to the public sphere has changed from a shared space to a backdrop for one’s self-branding and celebrity aspirations.

From Representation to Presentation and Singularities

Following Marshall (2020; 2021) and Reckwitz (2020), all the above points to larger changes in social and cultural relationships that radiate out into the social and political sphere. In the neoliberal economic environment of the past decade, strategic photo-sharing on Instagram created economic and entrepreneurial opportunity (doing something you enjoyed). It also contributed to an acceleration of tendencies in the gig and wider economy that atomized individuals and put more pressure on them in uncertain times. If anyone can be an influencer, you could, too. This is at the same time empowering and cynical, considering the mediating role of the algorithm and the multi-layered implications of performing the type of visibility and attention work that is required to build an audience on Instagram. The overall dynamic also introduces the system of celebrity into our lives through pervasive self-branding, where we now essentially perform constant self-PR with the photos that we show on the platform.

Public personae such as influencers

“[...] are far from identical to the elaborate system of celebrity and public personality that constructed the 20th century’s notion of a public sphere; nonetheless, it is a system of public personalities that is pedagogically connected to this past and present organization of fame and celebrity focus” (Marshall, 2020, p. 95)

In the world of the neo-online celebrity, we perform all the roles that traditional celebrity outsources: hair, makeup, PR, communications – and being our own agent. Yet, Instagram users do not sell a movie or music, they sell the brand of who they are. Once an audience is large enough, one can begin to sell products, ads, or merchandise as a business model, for example.

This is a very critical and somewhat cynical reading of Instagram. The platform’s reality is rather complex, straddling communicative and business functions. However, when observing overall cultural trends in the use of photographs for personal intentions – be they communicative, commemorative, or commercial – shifts in the underlying social dynamics become visible. Marshall (ibid.) argues that this signifies a cultural shift from representation to presentation, which potentially far-reaching consequences, considering that Western political and administrative systems have been built on the principle of representation.

Reckwitz (2020, p. 148 f.) identifies a momentum in culture that is rooted in a quest for authenticity he terms singularity:

“Against the rationalism of mainstream modernity in the culture of authenticity, the idea and conviction emerged that the subject – if freed from all constraints – strives for authenticity, self-realization, and self-expression. To be authentic, however, means to be special, singular. In a second step, this search for authenticity is projected onto the whole world, which now is perceived in the expectation of the singular: a singularization of nature, places, communities, objects (artefacts), beliefs, and other subjects.” (ibid.)

It is paramount to consider economic motifs and dynamics here. Creative cultural production of singularities – including photos we make for and share on Instagram – is aimed at an audience of potential customers (ibid., p. 150). This encompasses best how the role of photography has changed through Instagram: as a function of creating and speaking with an audience of customers for one’s own brand or products. Photography on Instagram has become a function of an ongoing, 24/7 commercial that retools the foundations of cultural and social interactions through a shift from the logic of representation to presentation with pervasive uses of self-branding.

3.4. The Political Meaning of Images on Instagram

What is photography in the age of Instagram? Starting with concepts surrounding images, proceeding via definitions and theories on photography, and lastly delving deeper into the cultural notions surrounding photography, a multifaceted image of the role of photography in the present and in particular on Instagram emerges. Inquiring into the nature of images on Instagram, I proceeded from the conceptual plane of images to the specifics of their usage in Instagram cultures.

Images have a multitude of definitions drawing from a rich background of various academic fields. And even though intuitive or vernacular notions of the image appear obvious, to encompass this phenomenon in words is a more complex task. Firstly, images depict something and allow us to understand that something in an instant. Following Belting (2011), images are a part of a three-way relationship between the image, the body, and a medium. For images to leave the mental plane of imagination and become visible, manifest, they rely on the medium as a carrier of its meaning. These media can be practices such as photography, sculpture, painting, or drawings. With Instagram, the app and feed become the medium for the transport of the image from one individual user to another.

Moxey (2008, p. 140) analyzes scholarship on images and identifies two schools of thought, images as a cultural representation or as a presentation of something. What we see on Instagram can thus either be interpreted as something powerful that works its magic on the viewer and needs examination or as a representation of culture that we study for the social effects it can create (*ibid.*). These positions are not mutually exclusive. I proceeded to explore both in this entire section on Instagram’s contents.

Following Bredekamp’s (2021) *Image Act*, I define images as imbued with a power and agency of their own. This is especially evident in viral images on Instagram that take on a life of their own once shared. However, all images have agency according to Bredekamp’s definition. On Instagram, this is evident in content regulation and censorship regimes around female nudity, for example, where an image is clouded with a grey overlay and users are warned that viewer discretion is advised. This is similar to the iconoclastic practices in the Middle Ages that shrouded images⁴⁷ to protect viewers from their power. When we look at images, not only do we gaze at them, but they also gaze back at us and arrest us in their might. For Instagram, this means that the platform through its feed and constant deluge of images therein is like a scrollable, continuous image act. This can also desensitize viewers to the impact and agency

⁴⁷ or destroyed them altogether

of images. Facing a plethora of pictorial material, we can get overwhelmed by their impact, losing our ability to engage with images in an intentional way, potentially leading to a loss of the capacity to decode them (Flusser, 2000, p. 11 f.).

Furthermore, images are defined by their relationships between the image and the spectator or observer and the relationship between creator and observer. This creates a triangular relationship between them, where the observer has an awareness for the creator when looking at an image and the creator produces images knowing that somebody will indeed look at them. The nature of this relationship has changed significantly in the digital age and on Instagram due to its scalability. An image can now be viewed by potentially everyone with an internet connection and access to Instagram. In algorithmically moderated feeds like on Instagram, this is dampened because only a small percentage of one's followers will see when someone shares a new image in their feed. However, the scalability of the reach of an image persists. So, not only are images powerful, but because of their agency as per the image act, they can also reach more people with a singular image's particular power.

How we interact with images has also changed in the digital age. Gazing used to be a prominent mode of seeing, of investing one's eye and attention on an image. In the digital age and mediated by the attention economy, this mode of seeing has been supplanted by the glance. The glance is a quick look, a scanning of surfaces. Glancing has become a dominant mode of seeing on social media platforms like Instagram, especially considering the demands of overcrowded digital environments and the attention economy. In the attention economy, producers of content and image material compete for the valuable commodity of attention to turn glances on one's images or profiles into social, cultural, and eventually economic capital. To be able to focus a larger number of glances on oneself is a form of power and agency in the attention economy.

We also encounter this in the numerous cultural practices Instagram users engage in that relate to self-branding and the commodification of their individual experiences of life, work, identity, home, family, relationships, and travel, for example. Users create images on Instagram for others to see them. However, due to fierce competition in the visual market, the use of well-tested strategies to focus as many glances, likes, comments, and follows as possible on one's profile, is an extension of the practice of self-branding and the pressures it creates. It is not enough to merely post one's photos on Instagram. Photos perform better if they are visually appealing, speak to the aesthetic hegemony on the platform or the subculture one is active in on Instagram, and commodify the self. This is how influencers work, having adopted the self-commodification practices of celebrity. In theory, the microcelebrity of being

an influencer is available to anyone on the platform. This can indeed be an economic opportunity. Yet, in practice, most imitate the styles of the influencers du jour with little success. Notwithstanding, this introduces self-branding as the modus operandi across the platform. We are all playing the game of the attention economy, even if we may not think we are drafted on the team. Our participation in Instagram constitutes our presence on the playing field already.

Furthermore, I described how these larger trends influence sharing and creating of photos as part of visual cultural practices on Instagram, exploring selfies, travel and nature images, and the nuances of remembrance in sensitive sites like Auschwitz on a visual platform like Instagram. For the latter three, the aforementioned pressures of self-branding, behavioral and posting conventions create challenges in conservancy (nature), adapting and negotiating historical education and remembrance for a present-day audience while respecting the sensitive nature of the site (Auschwitz), and overtourism phenomena that put destinations under pressure with Instagrammers traveling for the perfect photo.

The role of photography in all this is that of a medium. Photography’s functions and the power of the images shared on Instagram unwittingly form an alliance with the self-branding practices on the platform. If we assume that images are powerful, it is not surprising that the most popular social network for photo-sharing has become a driver for all the above. While Twitter may spark debate and shape political processes, Instagram is where users go to present themselves and establish themselves as actors in the social, cultural, and economic sphere. Politicians use Instagram to convey a personal, more approachable image and forward their own iconography on a platform that circumvents the editing and curatorial function of the media. In doing so, political actors also engage in celebrity-like practices, owing to the overall modus operandi of the platform.

Photography’s characteristics like its memory functions are still visible and in use on Instagram. However, they need to be perceived within the framework of the overall visual culture on the platform. Photographs, for example through Barthes’ (1982) *punctum*, can be impactful in their memory or communicative functions while still heading the creed of self-branding on Instagram. Walter Benjamin (1972) would likely state that on Instagram images are devoid of an aura, while Susan Sontag’s (2005) writings on photography, originally published in the late 1970s, seamlessly link to the present-day experience. For example: “A way of certifying experience, taking photographs is also a way of refusing it—by limiting experience to a search for the photogenic, by converting experience into an image, a souvenir” (ibid., p. 6). On Instagram, we turn experience into an image, viewing life through the lens of the photogenic and instagramable, be it cappuccinos on wooden tables, the trope of the lone traveler against

an impressive natural backdrop, or waiting in line to take a photo that already exists hundreds of times in the exact same way.

All this reflects the power of images that become vehicles for self-branding in the context of Instagram. As a consequence, these developments create a shift from the previous logic of representation to now presentation that is not only reflected in the visual culture on Instagram but also affects the very foundations upon which we have built our political and administrative systems (Marshall, 2020, p. 95). Reckwitz (2020, p. 148 f.) describes the aforementioned self-branding thrust in culture and its effects as the society of singularities, driven by the expectation of the singular in nature, communities, objects, belief and other. This is a far cry from social cohesion.

Thus, responding to the questions I asked at the end of chapter two, I can formulate the following answers:

Visual material indeed has a powerful effect considering its mediating role in human communication and interaction, influence on our imagination, and the agency that Bredekamp (2021) assigns it through the image act.

Visual strategies of politicians are embedded into the overall logics of usage of Instagram. Politicians use images on Instagram for their self-branding (like everyone else) and PR, and in most cases to construe an image that show them in personable settings or – in the case of populists – as men or women of the people. As the platform is informed by microcelebrity dynamics in the attention economy, politicians must play the game to a certain extent in order to be visible. However, there are boundaries and limits with respect to how much a politician conforms to the modus operandi of the platform. They depend on the political culture of a country, as well as the overall approach of the politician. Populists use somewhat different strategies of self-presentation and images on Instagram in comparison with non-populist politicians in democracies.

Lastly, I can formulate an answer to the question of what is political about images on Instagram that do not have political subject matter. One photo of an aesthetically arranged lunch is not necessarily political. The aggregate of the cultural and social practices surrounding image-sharing on Instagram, however, are political because they lead to shifts in political interactions and – following Marshall (2020) – to profound changes in the organizational principles of modern societies. To dismiss Instagram photos as frivolities is to dismiss the agency and power of images as mediators of human relationships and experience.

4. Instagram as a Medium: The Logic of the Platform

Instagram is more than just its visual contents. Instagram is a medium for content distribution and a platform. As such, it is reflective of the business models and worldviews of the technology sector. After all, Instagram is created and developed by technologists, engineers, and venture capitalists in the environment of Silicon Valley. Neither the UI design, nor its functionality, the effect of the algorithm, and how the platform behaves overall, have appeared *ex nihilo*. On the contrary, the present state of Instagram, other social media platforms, and digital technology at large are reflective of greater undercurrents in the technology industry and economy.

This section explores various aspects of Instagram as a platform and its surrounding conditions, starting with the thought and ideals of the very context that bred Instagram – Silicon Valley. The technology industry has long been under the radar especially in political science research. Only in recent years with the Brexit referendum and the election of Donald Trump in 2016, as well as documentaries such as *The Social Dilemma* (ExposureLabs, 2020) and internal leaks such as the Facebook Files (WSJ, 2021) have the shortcomings of social media companies created more awareness in the public eye. Social media companies are not the only tech companies facing scrutiny. In 2022, for example, The Guardian published a detailed report on Uber’s political lobbying, breach of laws, and how the company duped police in Europe (Davies et al., 2022).

Part of the challenges outlined above relate to the mindset of the technology industry. An example to illustrate this: “[...] the Valley’s most bracing creed: the belief that most social problems can be ameliorated by technological solutions, if only inventors can be goaded to be sufficiently ambitious.” (Mallaby, 2022, pp. 2-3)

The most influential technology companies of the present like Google, Apple, Facebook/Meta, and Twitter emerged in Silicon Valley. These companies are rooted in the local ethos and as such the background of these products and companies merits a deeper exploration. The tech industry operates according to its own view of the world, as the quote above describes: technology can solve almost any problem, including social and societal ones; you only have got to find the right innovation and disruption. This goes as far as that a new proposal for statehood has emerged from Silicon Valley, the Network State (Srinivasan, 2022). In short, this new approach to statehood is a technology-driven concept for governance, downloaded and made manifest from the cloud and digital ethers: “A network state is a highly aligned online

community with a capacity for collective action that crowdfunds territory around the world and eventually gains diplomatic recognition from pre-existing states (ibid.).”

New technological possibilities come with new opportunities for social, communal, and collective organization. At the same time, the concept of the Network State not only reflects the mindset of finding technological solutions for all matters of life, but it also exemplifies a relentless motion forward:

“techne [sic] in the form of modern technology has turned into an infinite forward-thrust of the race, its most significant enterprise, in whose permanent, self-transcending advance to even greater things the vocation of man tends to be seen, and whose success of maximal control over things and himself appears as the consummation of his destiny.” (Jonas, 1973, p. 41).

Jonas’ words, written 50 years ago eerily echo the pandemic creed of one of the most influential figureheads of tech, Marc Andreessen in 2020: “It’s time to build” (Andreessen, 2020). In his essay in the immediate throes of the beginning of the pandemic he wrote:

“We need to want new companies to build these things, even if incumbents don’t like it, even if only to force the incumbents to build these things. And the problem is will. We need to build these things. And we need to separate the imperative to build these things from ideology and politics. Both sides need to contribute to building.” (ibid.)

Here, building new things, new technology products – even through force – appears as the highest value to the technologist. Andreessen’s writing exemplifies the infinite forward-thrust of technology Jones (1973, p. 41) described.

Coupled with financing models that reward growth above all, an exploration of the underbelly of Silicon Valley and the tech industry yields foundational insights for the other chapters in this section. Beyond the conditions of creating technology companies, I will also explore the existing platform model and its economic cost, as well as algorithms and algorithmic feeds, the challenges of persuasive technology and surveillance capitalism.

Platforms are built in deregulated settings to capture significant, dominating shares of markets – just like Instagram’s parent company, Meta. Furthermore, Instagram is not just reflective of tech thought and platform economies, it is also an application with an algorithmic feed where content delivery is steered by the invisible hand of the algorithm. To understand whether and to which extent algorithms and algorithmic feeds are compatible with democracy (or not), understanding them first is essential. And lastly, this section closes with an exploration of the darker aspects of the digital economy at present: so-called persuasive technologies that may cause wide-spread manipulation and surveillance capitalism, the practice of building entire swaths of the economy on data harvesting and surveillance of users.

All this is closely interlinked with Silicon Valley and the existing conditions in the technology industry. As the companies the startup model creates span the world beyond California or the US, they become global actors and often slip away from the control of governments and regulators. At their worst, tech companies are para-state actors that operate according to their own logic and their own set of rules, not necessarily laws.

4.1. Genesis and Conditions of Digital Business Models

Instagram, first and foremost, is a business. And as such, it reflects the thought, attitude, and ideology of its creators. Silicon Valley, where Instagram emerged, is a hotbed for innovation and has brought about revolutionary companies like Apple, Netflix, Adobe, PayPal, Zoom, LinkedIn, eBay, Intel, Cisco, among others. Digital and technology business models are deeply entrenched in a local way of doing business, startups. There is a cottage industry of advisors, investors, and thought leaders who shape tech's modus operandi. Technology companies are funded by venture capital and driven to capture market shares and ideally grow at exponential rates. They are also informed by a strong ethos and mission statement that tech makes the world a better place: “Everywhere software touches the real world, the real world gets better, and less expensive, and more efficient, and more adaptable, and better for people” (N. Smith, 2021). Countless academic studies on the effects of technology, including this one, debate, whether and to what extent this is truly the case.

Silicon Valley has significantly shaped the existing philosophy of tech and how tech companies are created and funded. It is also home to a particular approach to doing business and seeing the world that – aside from myth making on innovation – has always been more complex than the enthusiastic, hopeful promises of changing the world technologists may communicate. The tech industry with Silicon Valley as its guiding light is complex. In the following section, I explore the history and thought of Silicon Valley to anchor Instagram into the context that created it.

This deeper dive is especially important, as it is easy to forget that platforms and technology are social constructs. Tarnoff and Weigel (2020, p. 1) state that: “Tech companies have many reasons to speak as if their products fund themselves. To obscure the human work involved in training an algorithm or moderating a social media feed is both a sales pitch and an evasion.” It is convenient to obfuscate the operational logic of the tech industry. This section serves as an illumination. As tech companies rely largely on outside investing through several funding rounds to grow and become successful by the industry's standards, a second chapter of this section also explores the main financial vehicle behind tech companies, venture capital, and how its conditions contribute to shaping technology.

4.1.1. From Counterculture to Technocracy: The Evolution of Silicon Valley

The genesis of Silicon Valley is steeped in myths and mythmaking. In the world of technology, Silicon Valley is an aspirational brand name, underscored by the monikers other tech hubs, or those aspiring to be, assign themselves to align themselves with the powers of “The Valley”. Even though other tech hubs have developed across the world like London, Berlin, Paris or Tel Aviv, Silicon Valley remains the yardstick for achievement and aspirations in the technology industry. It created the culture of technology and the investment vehicles for supporting startups. Technologists, investors, and smart entrepreneurs not only created companies in this California region, but they also established an entire ecosystem with accelerators, support programs, early talent scouting, advisors, and a culture around what it means to be a technologist and building companies. Silicon Valley is the navel of the technology world. Its culture and context have created world-spanning companies that transcend nation states. With these technologies, platforms, and social media companies, the ethos, thought models, and approaches in Silicon Valley have come to play out on a global scale. It is a system that has created a value export through the vehicle of technology. Its most recent incarnation and its consequences that lie at the heart of the inquiry in this dissertation can be exemplified through Mark Zuckerberg’s now infamous dictum “move fast and break things⁴⁸” (Taneja, 2019). It captures well how Silicon Valley and its entrepreneurs have seen the world: it is better to disrupt and get your product (digital or physical) into the hand of your prospective customer base, than to miss out on an opportunity (*ibid.*). It is better to ask for forgiveness than permission.

But what is Silicon Valley? Silicon Valley is

“[...] a global network, a business sensibility, a cultural shorthand, a political app. [...] Its rhythms dictate how every other industry works; alter how humans communicate, learn, and collectively mobilize; upend power structures and reinforce many others. As one made-in-the-Valley billionaire, Marc Andreessen, put it a few years back, ‘software is eating the world’ [sic].” (O’Mara, 2019, p. 2)

Silicon Valley shapes narratives that believe itself to be at the center of the world. Ultimately, its utopian tales of the progress technology can create, monopolize our imagination and serve to retain the tech industry’s power and influence (Daub, 2021a). Technologists like to present themselves as outsiders, nerds, who just happen to change the world through engineering and methodical thinking (Graham, 2004). Yet, these perceived outsiders have become operators, founders, and movers in an industry that is extending its vast control across the globe. There is a fundamental contradiction in believing yourself an outsider and underdog, while

⁴⁸ Taneja (2019) also describes that Zuckerberg’s statement was intended to inform internal design and management process. However, it has become eponymous with an approach to technology that prioritizes asking for forgiveness rather than permission.

simultaneously controlling, for example in the case of Facebook, communication streams for half of the world population, to speak of utopian visions while creating a reality with thinly veiled dystopian characteristics. To understand technology means to understand the mindset and discursive intentions of Silicon Valley.

One such element of storytelling is the mythmaking and obfuscation behind the story of the technology industry. Prominent myths on the success of the technology industry stress that it was a combination of several factors unique to Silicon Valley that contributed to its success such as the proximity of world-class universities and research at Stanford University and Berkeley, as well as the fact that San Francisco area was a banking and industrial town with a robust community of people who liked to tinker with electronics even before the emergence of the tech industry (Daub, 2021b). “The emergence of the growth of Silicon Valley were made possible by the building of unique manufacturing, product engineering, and management competencies” (Lecuyer, 2007, p. 5).

The history of Silicon Valley also hinges on a detail that is often omitted in glowing accounts of the tech industry: its military history. Yasha Levine (2018) describes in detail how the development of technology and the related industry in the US were deeply connected with the US government, military, and intelligence community during the Cold War. The tell-tale heart beating underneath the floorboards of the tech industry is not just one of flying cars and software driven utopias. For decades, it drew its lifeblood from a public private partnership in the name of fighting off the threat of communism before the collapse of the Soviet Union. To this date, the technology industry retains ties with the defense and intelligence community. For example, in 2022 Google, Amazon, Microsoft, Oracle jointly won a \$9 billion dollar contract to build the Pentagon’s cloud computing network (Copp & O’Brien, 2022). Furthermore, the CIA operates a venture capital investment firm to attain access to developing technologies (Reinert, 2013). It is an uneasy alliance, when digital behemoths with considerable influence such as the companies involved in the defense contract above expand their scope of operations from mass-oriented digital technologies to surveillance and optimizing operations of war.

Furthermore, a profound shift has taken place in the thought and philosophy of Silicon Valley, according to Robert McNamee, an expert I interviewed. He worked in the tech industry in California from the 1980s to early 2010s and was an early advisor to Mark Zuckerberg (Robert McNamee, interview, 2022). While technologists initially (seemingly) were driven by a utopian vision to create technology that would help humanity, McNamee observed a shift in the mindset of the tech industry in the 2000s, when more managerial and career-oriented types moved into the tech industry. To date, the technology industry has attracted ambitious graduates with high

salaries and stock options which – at the point of a sale or IPO (initial public offering) – could convert into substantial wealth, if not a down payment on a house or apartment. In other words, the tech industry became a way for young people to build wealth fast while being at the cutting-edge of building the future.

The Countercultural Roots of Silicon Valley

Earlier technologists – among them Steve Jobs – were heavily influenced by counterculture. “From the first moment that Silicon Valley burst into the public consciousness, it was awash in revolutionary, anti-establishment metaphors” (O’Mara, 2019, p. 2). In the late 1960s and early 1970s, Stewart Brand published the so-called Whole Earth Catalog which was instrumental in shaping the thought of this generation of technologists. This catalog full of DIY-tips was published for young people who set out to establish communes to give them the tools they would need to build their new communities (Turner, 2008, pp. 4-5). The catalog

“[...] made the case that technology could be harnessed for more democratic and decentralized view. The catalog ultimately helped shape the view of an entire generation, which came to believe that computing technologies could be used in the service of such goals as political revolution and safeguarding the environment.” (Markoff, 2006).

At the time, there was an overlap between counterculture and technology in the San Francisco area that was shaped by Stewart Brand, because he was instrumental in connecting previously disparate communities – among them technologists and hippies (Brand, 2013; Turner, 2008, p. 3). This led to a socially integrated vision of technology that could and should serve the benefit of humankind. Inspired by the cybernetics of Norbert Wiener (1950), they connected the nature of the digital with the living, breathing, interactive qualities of the social. This gave birth to a redefining of “[...] the microcomputer as a ‘personal’ [sic] machine, computer communication networks as ‘virtual communities’ [sic] and cyberspace itself as the digital equivalent of the western landscape, [...] the ‘electronic frontier’ [sic]” (Turner, 2008, p. 6). The ethos of this connection of counterculture and technology presents itself prominently in the work of Steve Jobs, who called the computer “a bicycle for the mind” (Yarow, 2010). Another example for this is John Perry Barlow’s (1996/2023) *Declaration of the Independence of Cyberspace*. Barlow was a member of the countercultural rock band The Grateful Dead. He was connected to counterculture and technology spaces and an advocate for digital liberties and a free internet. Stewart Brand’s ethos and effect reached far, as friends and employees of his built elements of Amazon and Facebook (Weigel, 2021).

The Emergence of a New Ethos in Silicon Valley

In the past two decades, a different type of technologist and Silicon Valley ethos has emerged. As mentioned in the beginning of this chapter, a central creed in technology now is “[...] that most social problems can be ameliorated by technological solutions, if only inventors can be goaded to be sufficiently ambitious” (Mallaby, 2022, pp. 2-3). This is a technocratic worldview, for example embodied by entrepreneur and investor Peter Thiel. Stewart Brand and Peter Thiel are emblematic examples I chose to represent the shift in the technology industry Roger McNamee described (McNamee, interview, 2022). They were or are figure heads in trends in the technology industry, yet by no means the only actors inspiring its direction.

Peter Thiel is considered key in “[...] creating the ideology that has come to define Silicon Valley: that technological progress should be pursued relentlessly – with little, if any, regard for potential costs or dangers to society.”⁴⁹ (Chafkin, 2021, p. xii). More than any entrepreneur or investor, he has been creating and shaping the ideology that now defines Silicon Valley (ibid.). Thiel stands for a shift in the worldview of Silicon Valley that Roger McNamee described (McNamee, interview, 2022).

“Thiel was not Brand. He was never a hippie, and he is not really technical; he was a finance guy who got to pick the engineers. These *Revenge of the Nerds* [sic] types did not drop out to tune in; they dropped out to raise a Series A. It was a new kind of California dreaming for the era when *greed was good* [sic]. Members of Thiel’s network came together [...] in an environment where venture capital and newly globally networked computers would create possibilities for dizzyingly rapid growth”. (Weigel, 2021)

Three dominant themes in the tech industry emerge in the above: (1) a change in who made decisions in technology companies from technologists to “finance guys”, (2) being a cultural outsider had moved from counterculture to nerds, and (3) the alliance between capital and technological possibilities that created rapid growth in networked systems. This alliance was fueled by the notion that as long as companies grew and financial success was within reach, things were fine – never mind the consequences. Additionally, there is also a sense of technological determinism in present-day Silicon Valley: if we do not do this, somebody else will (Daub, 2020), as if the development of certain tools or progress in a certain direction of technology were an inevitability individuals can only respond to. This shifts the agency away from the people who create technologies to technology itself.

⁴⁹ Thiel backed Donald Trump’s campaign for the US presidency in 2016. Because of this, among other things, Thiel is a contentious figure, especially in the political discourse in the US. In this dissertation, I will not focus on his role in the election but on how key players have shaped the thought, approach, and ideology in Silicon Valley. He is among them.

Thiel, exemplary for the shift in tone in the tech industry, holds the view that technology defines the future of the world more than globalization (Thiel & Masters, 2014, pp. 8-9). For him, technology is “[...] any new and better way of doing things [...]” (ibid, p. 8). By this definition, anything can be technology, even how you optimize your morning routine. Thiel and Masters (2014, p. 10) further extol their understanding of technology:

“New technology tends to come from new ventures – startups. From the Founding Fathers in politics to the Royal Society in science to Fairchild Semiconductor’s ‘traitorous eight’ [sic] in business, small groups of people bound together by a sense of mission have changed the world for the better.”

Thiel appears to apply this sense of mission to himself and his contemporaries, as well. In a similar vein, Mark Andreessen (2020) shares an indirect mission statement of the tech industry with the following:

“The problem is regulatory capture. We need to want new companies to build these things, even if incumbents don’t like it, even if only to force the incumbents to build these things. And the problem is will. We need to build these things. And we need to separate the imperative to build these things from ideology and politics.”

Like Thiel, he describes the role of technologists as those who drive progress and technological developments, irrespective of political divides or considerations⁵⁰. In other words:

“The Valley’s engineering-dominated culture rewarded singular, near-maniacal focus on building great products and growing markets, and as a consequence often paid little attention to the rest of the world. Why care too much about the way government institutions or old-line industries worked, when your purpose was to disrupt them in favor of something far better? Why care about history when you were building the future?” (O’Mara, 2019, p. 7).

Peter Thiel and the worldview of many of his contemporaries appear rooted in a sense of intellectual mission awareness. To them, technology is what drives the world forward – and they are relentless in their pursuit of it. Their entrepreneurial and investment successes seemingly imbue them with the wisdom and tools to recognize big societal patterns and provide solutions for them. How would one not assume that when success of an investor seemingly hinges on a sensibility for detecting the next big trend in technology? The more entrepreneurial home runs one hits, the more confident one gets in one’s ability to predict and have a different access to what one may think of as the truth of the bigger picture. However, expertise in one area of life is not always transferrable to another. Fittingly, the founder of startup incubator Y Combinator, Paul Graham (2004, p. xi) wrote that “the computer world is like an intellectual Wild West, where you can think anything you want, if you’re willing to risk the consequences”. According to Graham, there seems to be an innate quality that hackers share: “[...] misfits and

⁵⁰ That an entrepreneur and investor would complain about regulations here is hardly surprising, if only informative.

iconoclasts are more likely to *become* [sic] hackers” (ibid.). Who exactly these misfits are, remains unclear.

On the flipside of the misfit, there is also a cult of personality in the technology industry. There are several figureheads the industry, invested in the hagiography of its leaders and the creation myths it weaves around prominent founders, puts on a pedestal. There is an almost cult-like veneration for the archetype of the creative genius creating world-changing companies that shines through in tech reporting and conversations (Bains, 2019; Daub, 2021a). And while it is true that good companies need leadership and a vision, this focus on the archetype of the genius leader discounts that companies are the sum of all parts – employees, contractors, teams, and coders (Tarnoff & Weigel, 2020). In part, this may reflect the outsized importance placed on founders in the funding process of startups. At the earliest stage, a technology company is an idea with a prototype. There is little to base an investment decision on, except for embryonic technology and a founder’s ability and personality. Investing in startups is a bet on people – and a direct route to creating plinths for successful founders and investors.

Free thought and being contrarian are well within the scope of what technologists may choose to believe in themselves. Yet, what happens when their particular logic is applied to a product billions of users connect with in their everyday lives? When technology reaches a critical mass of distribution, it becomes a concern to politics, whether the effects are positive, negative, or mixed. The current bedrock of Silicon Valley is fueled by a steadfast belief in technological progress with little considerations for its effects. If only, criticism or invitations to reflect on the course of a technology may be seen as an impediment to the execution of a mission – growth, domination. Structurally, the current incarnation of Silicon Valley works in non-democratic ways. Many companies do – this was the case before and remains so outside of the technology industry, as well. However, when companies and the technologies they sell, attain a level of leverage of influence that affects entire populations and nations, then this may become a problem. The challenge in the shift is not so much that people think about technology and their place in a certain way but that this thought deeply influences which effects people and governments across the world will come to experience when they interact with technologies. This is why the mindset behind technology greatly matters.

4.1.2. Venture Capital: The Role of Finance in the Creation of Tech Companies

Tech companies are business endeavors. While they may start with exciting ideas or a founder's desire to contribute to the world in a small or big way, at the end of the day, they are businesses. With the business of startups and technology comes a financial model that has been instrumental in shaping the technology industry into what it is today. Capital and the networks around capital of venture capitalists – limited partners⁵¹, family offices, former founders reinvesting, angel investment syndicates, or groups of investors collaborating – congregate in small networks. Startup “mafias” are a prominent example for this. The most well-known among them – due to an infamous mafia-style photo shoot in Fortune magazine (O'Brien, 2007) – is the so-called “PayPal Mafia”, a group of early PayPal employees who went on to create web 2.0 companies like YouTube, LinkedIn, and Yelp (Carson, 2020). Like elites elsewhere, Silicon Valley elites like to reproduce themselves. For example, Jack Dorsey, the founder of Twitter, created the payment services provider Square, whose employees then went on to found companies like Opendoor or Doordash, both valued as unicorn companies at \$1 billion⁵² or above (ibid.). Similar dynamics can be observed for other startup success like Uber and Airbnb (Griffith, 2019). While the tech industry likes to project a meritocratic image, it is heavily network-based (ibid.), so the existing elites reproduce themselves.

Venture capital (VC) is the financial vehicle of choice for the technology industry. Individual funds deploy capital according to their investment thesis along defined funding stages: pre-seed and seed for fledgling companies to Series A, B, C, D, E, etc. for more mature businesses. VC firms operate according to an investment thesis. This thesis works twofold: it is the pitch deck of a venture capital firm when they themselves raise a fund from their limited partners such as pension funds, university endowments, public investment funds, family offices, high net worth individuals, and former founders. An investment thesis is also a fund's framework for decision-making on which companies to give money to. Venture capital and the startup industry work in environments that encourage and rewards outrageous risk-taking. Participants in venture capital and the startup industry are generally aware of these risks and that nine out of

⁵¹ Limited partners are those who supply capital to venture capital investment funds. They may be, for example, individual people, companies, family offices, university endowments, pension funds, publicly held investments funds, among others.

⁵² In this context, it is important to note that a valuation does not express the hard market value of a startup. These valuations are based on investment rounds and what they mean for the market value of a company pre-IPO (initial public offering). As an example: If a venture capital firm decides to invest 200 million dollars or euros for 20% of a startup, this makes the company a unicorn based on the assumption that all remaining shares of a company are valued the same. This is different from market capitalization of a company through an IPO in the stock market. Startup valuations can fluctuate greatly and may not always be an adequate expression of the value this company brings to the world. Venture capital is also a game of hype and PR. Inflated valuations are par for the course. One of the most prominent examples for this is the biotech company Theranos that was valued at several billion US dollars before reports of the company's fraudulent promises in blood testing emerged and it collapsed.

ten startups fail (Patel, 2015). This is a given expectation in venture capital and the art of assessing investments, especially at an early stage, is to find the outliers who will produce extraordinary returns on investment to not only offset losses but also return a multiple of the investment sum to the limited partners. A good return on a fund is three times the initial investment. Beyond that: the more, the better. This structure incentivizes more and more outrageous and risky bids (Weigel, 2021). If a fund makes 20 investments under the assumption that only a small number of them will become viable companies, or even successful ones, the only way to return the fund is when some of the portfolio companies become huge successes⁵³. This requires companies with exponential growth rates, or, as venture capitalists say: they want to see the J-shaped hockey stick growth curve.

Furthermore, venture capital and startups operate on a defined timeline. When a VC raises a fund from limited partners, they are expected to repay the investment to their limited partners within a timeframe of seven to ten years. Venture capitalists deploy money in the first years of existence of any fund and then let the investments mature. After the investment stage, where they fund startups, a venture capitalist usually only makes add-on investments in existing portfolio companies, for example to retain the size of the stake in their companies during follow-up funding rounds. A company only has a short timeframe to become big enough for an initial public offering (IPO) on the stock market or an acquisition. All this must occur within the short lifespan of a fund⁵⁴, creating incentive structures that prioritize growth above all.

Venture capital investments and doing business in the startup world operate on a different set of assumptions than regular businesses do. For example: there is the notion of bootstrapping a business, which means that you fund a business through its own revenue throughout the years. A company can be successful in this manner but will likely struggle to achieve the size and market capture that venture capitalists value. In the tech world, revenue or profits are not at the core of startup investments.

"For example, it's ok to focus on growth instead of profits—but only if the growth is genuine. You can't be buying users; that's a pyramid scheme. But a company with rapid, genuine growth is valuable, and eventually markets learn how to value valuable things." (Graham, 2008)

⁵³ As an example: A fund has two million Euros or US-Dollars available for investment and chooses to invest 100,000 each in 20 companies. If 9 out of 10 startups fail, let's assume that for this fund 18 do not make it. The remaining two, then, need to not only turn the initial investment of 100,000 into a million each to recoup the investment. They also need to create enough of a return to satisfy the expectation of limited partners. In the industry, a triple return on an investment is considered a decent outcome. For the two remaining companies in the exemplary portfolio this means they would each be required to recover the initial investment by the factor of 30, creating three million Euros or US-Dollars each. Outrageous bets, and a focus on exponential growth and market domination are born from this dynamic.

⁵⁴ To clarify: a venture capital firm can raise several funds. The financial vehicle and the firm are not the same, the firm as a legal and administrative entity outlasts the fund.

In the past decade especially, revenue was less important than user growth. This is the inverse of a commonsense assumption of how to run a business: revenue first. Low interest rates further shaped this dynamic – startup financing was relatively easy to find, as it was for venture capitalists to raise funds. Low-cost money in the financial markets allowed investors to deploy capital into the growth of startups without requiring an immediate return (Varoufakis, 2022b). In addition to that, low interest rates in the markets also led to an increase in capital flow to venture capital (Bellavitis, 2016; Wiggers & Wilhelm, 2022), as investors were restructuring portfolios looking for greater returns in more exotic asset classes.

The intersection of the state of the financial markets, venture capital, and the tech industry gave birth to a business model that prized exponential growth and asked about revenue later. For example:

“PayPal seized on the method of losing money to literally buy market share: Wall Street investors were valuing companies based on number of users, rather than profitability, and PayPal realized that they could pay people to join, and the stock market would support them.” (Weigel, 2021)

This practice can have disastrous consequences: all this growth at some point needs to be underwritten by a business model. Profitability may be an option, not a requirement while a startup is growing. In the long run, revenue needs to follow valuations and (the cost of) large user bases. Facebook is one of the most prominent examples for the challenges this can create. Growing rapidly, the company needed to determine a way to generate revenue and landed on ads. Facebook introduced ads in 2007 (Facebook/Meta, 2007) and over the years refined its data-driven advertising model to allow micro-targeting of users.

It is important to note in this context that the pressure to create revenue based on the prioritization of growth in venture capital investing is not the only factor in creating the tech landscape of the present. However, when considering the financial incentives in venture capital and how they translate into expectations and goal setting for companies in combination with the intellectual bedrock of Silicon Valley, a clearer picture emerges on why some of the existing technologies like social media have been causing social and political challenges. A business, whether it is publicly traded or privately owned, will prioritize financial imperatives, be it the generation of revenue or growth targets investors set. This is not surprising. However, where this couples with the technocrat’s mindset “[...] that most social problems can be ameliorated by technological solutions, if only inventors can be goaded to be sufficiently ambitious” (Mallaby, 2022, pp. 2-3), this poses real challenges to democracy and the social fabric. If companies with a rocket-like growth trajectory on a short-term time horizon purport to find solutions for societal matters that equally require democratic processes on a different timeline, friction arises between the impetus of technology and the requirements of democracy.

4.2. Platform Capitalism

Tech companies operate in a system of digital capitalism that is organized through the principle of proprietary markets (Staab, 2020, p. 169). The companies that dominate the digital sphere are not producers that interact on markets, but markets where producers interact (ibid., p. 170). The term for these companies is platforms and the economic system they shape is referred to as platform capitalism. Enterprises like Amazon, Uber, or Airbnb own the proprietary markets where commercial exchanges take place and thus can exert considerable influence and power in the digital economy.

Crucially, there is a power dynamic built into the platform economy. Hardly any company can exist without interacting with one of the few dominant large digital platforms. Amazon is a great example for this: the digital behemoth operates a large online marketplace that has expanded far beyond selling books. Even if one might choose not to purchase any products via amazon.com or offer them there, Amazon's influence extends far beyond its platform. The company's cloud hosting service, Amazon Web Service, presently controls one third of cloud hosting worldwide (Vailshery, 2022). Even when a consumer makes a purchase of a good outside of Amazon, there is a one in three chance that their digital infrastructure runs on Amazon technology.

The large-scale influence of companies such as Amazon, Uber, Airbnb, or Google creates a commercial internet that is dominated by hierarchies: meta-marketplaces integrate smaller marketplaces and thus exert indirect (or direct) control (Staab, 2020, p. 174). Staab (ibid.) points out that no Uber, Instagram, or Spotify can operate without Android or iOS. So, while Instagram or Uber may act as markets of their own, in the hierarchy of the digital economy, they are still dependent upon these operating systems. The model of platforms brings with it several challenges that not only reduce commercial liberty on the internet but also create downstream problems for individuals, businesses, culture, as well as democracy. In the winner-takes-all-world of the platform many lose.

While Instagram began its journey in the digital ecosystem as an app for photo sharing, it has since moved towards a different trajectory. Instagram is becoming more like a platform than a tool for posting photographs. With its commercial shopping features and as one of the go-to social media companies for marketing for small and large businesses, it acts as a place of connection for suppliers and buyers as well as a market for communication. While this section explores platform architectures at large and their consequences, it also includes Instagram as a platform.

4.2.1. Platforms: Key Players in the Digital Economy

The concept of the platform relates to the modus operandi of big tech companies with individual, social, and political implications. Srnicek (2017, p. 3) suggests that abstracting them from cultural notions (see previous chapter) or considering them as political actors that seek to wield power may have less explanatory power than an economic framework. A such framework sees them as economic actors within a capitalist mode of production and intent. First and foremost, Instagram, Amazon, Uber, Airbnb, and others tech firms are companies. And as such, they seek profit through a variety of avenues. In particular, meta-platforms like Alphabet/Google, Apple, Amazon, and Meta/Facebook have been identified as the core entities that exert market control in the digital economy (Staab et al., 2022, p. 2). An alternative, broad definition of platforms underlines two key features: “[...] a platform is a tool to match users and providers and it is also a set of rules defining the creation, the exchange and the closure of the dyadic relationship” (Montalban et al., 2019, p. 807).

Platforms are key elements in the digital economy, a sector of the economy that increasingly relies on IT, data, and the internet for its business model (ibid., p. 2). In the digital economy, capitalism has turned to data for growth in an otherwise sluggish environment (ibid., p. 5-6). The influx of capital into the tech industry outlined in the previous chapter is reflective of this trend, as well. Data is its most important resource. The Economist (2017) has reported that data has become more valuable than oil. Data as a resource is practically inexhaustible. In this context “the platform has emerged as a new business model, capable of extracting and controlling immense amounts of data, and with this shift we have seen the rise of large monopolistic firms” (Srnicek, 2017, p. 6). In other words, the capture and commodification of data are at the core of the economic model of platforms (Staab et al., 2022, p. 4). It is important to note here that Srnicek (2017, p. 7) considers platforms a continuation of existing tendencies in capitalism. Their technology might be new, but their underlying tendencies are nurtured by historical continuities.

Srnicek (ibid., p. 49 f.) identifies five types of platforms: advertising platforms, cloud platforms, industrial platforms, product platforms, and lean platforms. *Advertising platforms* extract data, then perform an analysis of this data and use that information to sell advertisements. Facebook, Google, and Instagram are examples of advertising platforms. *Cloud platforms* like Amazon Web Service own and rent out hardware and software that digital businesses depend on. *Industrial platforms* like Siemens or General Electric build the hard- and software that is necessary to transform traditional manufacturing into an internet-connected process. Their products lower the cost of production and transform goods into services. *Product platforms*

use other platforms to transform a traditional good into a service and collect rent on them. Spotify is an example for a product platform. *Lean platforms* like Uber and Airbnb run on minimal ownership of assets and profit by reducing costs. They often work in tandem with other firms. Amazon transcends these categories, as different subsections of the Amazon platform encompass all the above.

Platforms are marketplaces, yet differ from traditional conceptions of markets: they connect supply and demand, yet are rarely neutral and significant players in their own markets (Lovink, 2021, pp. 1-2). Platforms organize and manage interactions between users (Belleflamme & Peitz, 2021, p. 6) – with the intentions of the platform owner in mind. Platforms are intermediaries between users and create marketplaces they can interact on (Ducci, 2020, p. 17). Doing so, they reduce interaction and transaction costs (*ibid.*). Two major market shifts occur in connection with platforms: “[...] (1) from one- or two-sided markets to intricate *multisided platform configurations* [sic] and (2) strong *winner-take-all effects* [sic] affecting all sides in platform markets” (Nieborg & Poell, 2018, p. 4282).

Many platforms are not markets in the traditional sense whose ideal model is to allow the free flow of exchange and goods. Furthermore, platforms exert significant influence over neighboring businesses and wider ecologies (*ibid.*, p. 2). Platforms are privately owned markets, which means they can be designed in a way so that behavioral incentives for market participants align with the architect (and owner in this case) of the market (Ockenfels, 2013). As platforms have access to vast swaths of user and interaction data, an imbalance of power emerges. With an overview of transactions and behaviors, owners of platform markets can come close to Smith’s invisible hand guiding it all – only that these platforms are not free or open markets. In its most detrimental conception, a platform is a bid to extract a maximum amount of money by setting up a framework for trade or economic exchange, while at the same time exerting control over the platform and defining its rules.

“Building “data moats” [sic] is a central strategy for platforms seeking to expand their market power: bringing together disparate groups of participants (users, advertisers, and companies) and facilitating their interactions on the platform in order to maximize aggregation and control of the data” (Staab et al., 2022, p. 5). For example: the personal development industry is a subset of small business entrepreneurship. Instagram was, for years, one of the prime social media platforms of choice for small businesses. Its highly visual nature allowed business owners to connect with users under the guise of authenticity. Posting engaging photos and uplifting content is a low-barrier entry-level marketing strategy for many newly minted entrepreneurs without business backgrounds. As whole industries moved onto Instagram,

Instagram absorbed them fully. The more coaches promote their businesses on Instagram, the more prospective clients expect to find them there, and the harder it becomes to build a business presence outside of the platform. This is the power of the platform in practice: the market dominance of leading platforms creates path dependencies in their favor (Staab et al., 2022, p. 5). Once a critical mass of supply or demand in an industry has moved onto a platform or the platform has acquired a critical size, it becomes inescapable, while the company owning the platform designs the market of the platform in its favor.

The “data moats” mentioned above also act as structural and market moats. In investor parlance, a moat is a defense in the company’s market advantage that is built into its business model and relates to its position in the market. For example: In the 2010s, Instagram had a strong moat around being a visual social network. It was impossible for competitors to create an alternative social network focused on images, because Instagram had too much power in the market. It was the logic of the platform in action, yet again. The platform absorbs not only its own market but adjacent fields of business, as well. Platforms all but starve competition. There were and still are alternatives to Instagram like Vero, Glass, or VSCO. However, a photographer or designer looking to market their services would likely choose Instagram over these smaller social networks due to network effects. For many social media and tech companies that operate as platforms, the “[...] value they provide to customers increases as they scale and acquire more users.” (Stobierski, 2020). Where network effects come to play in markets, they create a “winner-takes-all” market (*ibid.*). A platform like Instagram has too much influence and market power for people to forgo it or choose a smaller competitor. It hoovers up any room there might be for competitors.

Platforms have acquired a scale and indispensability that likens them to infrastructure (Plantin & Punathambekar, 2019, p. 164). In a platform environment, the powers of the platform become most evident when a user attempts to exit the platform and move to a (often nonexistent) competitor. A user cannot market their own business as effectively and will not be able to connect with their friends with as much ease and consistency as when staying on the platform. Of course, you could still leave the platform. When doing so, a user truly encounters the reach of the platform, because you lose access to the opportunities and connection the platform provides for you. This is challenging, because of platforms’ dominant position in markets. They are the market – and often there are no or too few viable alternatives to them. The power dynamic is two-way: users can also experience a platform’s reach, for example when they are locked out of their account, shadow-banned⁵⁵, or removed from a

⁵⁵ Shadow-banning is when social media companies are taking stealth actions to reduce the visibility of a user’s post or profile to others (Livni, 2023).

platform. Then, all of the above evaporates immediately, with little to no room for appeal. Lovink (2022, p. 15) writes that because platforms enable social interactions in a “free” and useful manner, they form and format relationships of power. According to him, platforms have a repressive power and a disciplinary machine. Platforms ask for a tribute from their users (*ibid.*). They absorb any value produced by our interactions on them. Exhausted individuals do not have enough energy to question the situation and opt out (*ibid.*). This is the power of the platform in action. “On the platform, we long to harness value, instead of losing ourselves in the tangles of the network.” (Lovink, 2021, p. 1) The platform, it appears, is inescapable. It is an unfree relationship.

Many platforms have a global nature and offer services worldwide (Ducci, 2020). However, platforms are not exclusive to Western countries. They are a global phenomenon with China and the US hosting the world’s largest ones (Mueller & Farhat, 2021, p. 348). Davis and Xiao (2021, p. 103 f.) point out that platform studies have tended to universalize Western platform capitalism and the ideological forces that underpin it under the assumption of Western leadership in technology. Yet, they are a global phenomenon beyond the assumed dominance of US companies, because this model can be found in many markets outside of the US. They are also regional entities that can construct or presume regions through defining target geographies (Steinberg & Li, 2017, p. 174 f.).

Beyond their geographic aspects, platforms are characterized by a complex interplay of relationships. Internally, they manage user-user, user-vendor, vendor-vendor, and user-platform relationships⁵⁶. Externally, platforms organize their market environment through moats and exert control in various domains. Furthermore, they are also areas for political contention. In the context of US-China relations, platforms become politicized in a neo-mercantilist approach that “[...] fuses the power and security of the national state with economic development in the digital economy” (*ibid.*).

Modes of Control of Platforms

Platforms attain and control power in four ways: Control over information, access, price, and performance (Staab, 2020, p. 173). They are monopolistic or hegemonic⁵⁷ actors that disrupt competition and create a mercantile regime through intentional market design and control

⁵⁶ The user-platform relationship is managed by the additional user-algorithm relationship.

⁵⁷ I do not think it is possible to make a uniform statement about whether platforms are hegemonies or monopolies. It depends on the hierarchy level of the digital economy as your point of reference. Android and iOS are a duopoly of operating systems. Instagram exerts hegemonic power over its platform, yet its market dominance in visual social media has decreased since the advent and growing success of TikTok.

mechanisms in that market. Power and control over information are aimed at exclusive acquisition of market data to steer supply and demand, and surveil consumers and producers (ibid., p. 177).

“Because the data-based management of platform markets gives market owners full control over this data and the respective infrastructure of economic exchange, dominant platform companies can execute market interventions that directly affect the economic conditions of millions of people by designing their proprietary market” (Staab et al., 2022, p. 5).

Control over information enables control of market access for platform enterprises (Staab, 2020, p. 177). Platform companies can decide which producers and vendors they grant market access to and on the side of consumers they can determine which offers to show to which users at which given point in time (ibid.). Platform companies can set prices with algorithms and thus create another form of control: price control (ibid., p. 178). Since platforms can control the supply side on a market of their own design, they can extend market offerings to optimize prices for consumers as well as launch and systematically prefer their own offers that compete with other suppliers in the market (ibid.). Lastly, a combination of these three forms of control (information, access, price) enables a fourth pathway to attaining control: performance control (ibid.). Owners of marketplaces dictate conditions of performance to suppliers (ibid.). One very visible form of performance control on platforms is to display and structure customer reviews according to their own interests and to force the desired level of performance from suppliers (ibid.).

In the paragraph above, Staab (ibid.) describes a model of platform control that best applies to companies like Amazon. However, its basic tenets are fitting for communication platforms like Instagram, as well: leveraging flows of information coupled with algorithmic analysis to shape a proprietary market in a way that profits the company most while enforcing a certain type of compliant behavior from platform users. In the case of Instagram, the platform controls information through data collection and algorithmic distribution of content. Further, access control can be found in measures such as shadow-banning an account. In principle, everyone can sign up for an Instagram account⁵⁸, yet whose content is shown to a user when and how is within the realm of Instagram’s platform control. As a further measure of access control, Instagram launched a paid verification feature in February of 2023 that gives users a blue badge along with increased visibility and other features (Roth, 2023). The service requires submission of a government ID and costs \$12 per month (ibid.). This pay to play scheme is an indirect form of access control, because it tiers market access according to a user’s subscription status (verified or not). In the case of Instagram, price control is most relevant in

⁵⁸ Within the realm of legality: for example, there are protections in place for minors that require a minimum age for signing up for an Instagram account.

paid advertisement, where the company controls pricing. However, this differs from Staab's (2020) concept of price control, because Instagram so far has not launched any types of proprietary content or products that directly compete with the output of businesses and users on the platform. Performance control on Instagram also differs from mercantile platforms. On Instagram, performance control does not take place through customer ratings but users reporting accounts and the platform's rules on which content it will host. Specifically, performance control is exerted after a violation of content guidelines when Instagram may reduce the visibility of a post or account, and whether content is displayed in the Explore or hashtags section (Constine, 2019; Livni, 2023). Performance control on Instagram can also extend to the deletion of a post altogether or an account being disabled (Instagram, 2018).

Beyond strictly economic considerations, platforms do not just facilitate market, but also political and cultural interactions (Nieborg & Poell, 2018, p. 4276). In the example of Instagram, this can mean interactions between politicians and their followers, election campaigns, political communication, activism, advocacy, and cultural production for accounts with cultural subject matter as well as the overall contribution of content to culture in the digital age. However, platforms do not just facilitate interactions, they organize and steer them (ibid.). Cultural production and political communication are becoming increasingly dependent on platforms, so that the autonomy and sustainability of political communication and cultural production can become compromised (ibid.). The long arm of platforms extends far beyond the sphere of the market. Platforms increasingly structure and govern every aspect of our lives.

4.2.2. The Effects of Platforms

At present, platforms are a dominating force in digital markets. As seen in the previous section, they exert considerable economic power and exude control via algorithmically supported data harvesting and use regimes. Platforms have changed how we think about work, cultural production, and the economy. They also have a political effect. Jin (2015, p. 6) reads platforms as an extension of US power: “[...] American dominance has been continued with platforms. Platforms have functioned as a new form of distributor and producer that the U.S. dominates. [...] we’re still living in the imperialist era.” These globally active platforms export US cultural norms, thought, and attitudes for example through content moderation policies. They also contribute to amassing data, the world’s most valuable resource (Economist, 2017), in US jurisdictions⁵⁹. Platforms like Facebook or Amazon with their global reach are a form of soft and market power for the United States. The same applies for other countries that are home to big platforms like China with Alibaba and Tencent.

The impact of platforms reaches many, if not all, areas of our lives: from work to transport, communications, culture, shopping, travel, and many more. Platforms and their logic are pervasive in our digitalized present, with their advantages and disadvantages. Broadly speaking, the academic discourse on platforms and their effects is critical. Evaluating platforms follows the path of social media and many other tech products in the 2010s: after initial excitement from users and suppliers (Uber drivers, for example) about the manifold opportunities and ease platforms offer, enthusiasm gives way to more complex considerations, as the true effects of platforms become visible. Big platforms like Uber, Lyft, and Airbnb have been exposed for paying paltry wages, destabilizing urban neighborhoods, and accelerating carbon emissions (Schor, 2020, p. 2).

As discussed in the previous section, platforms design markets through measures of control of whatever is happening in the market that their parent companies set up to own. Initially, platform companies created disruption, because they provided the infrastructure for multiparty connections and allocations of goods and services within a market: travelers with spare rooms, riders with cars, or businesses looking to outsource tasks to workers. Through control mechanisms and data moats, platforms gained considerable power over a market and adjacent areas of business, stifling competition. Platforms created a new evolution of capitalism that undermines the idea of free markets. As Staab et al. (2022, p. 6) put it:

⁵⁹ This varies, depending on a country’s legislation on data transfer to the US. In the case of the EU, the Safe Harbor Privacy Principles initially regulated the transfer of data between EU and US companies (ENISA, 2023). Overturned in 2015 (Justice, 2023), this is now regulated in a new transatlantic data privacy shield, the “EU-US Privacy Shield” (E.L., 2016).

“Evidently, the ability to abuse market infrastructure to serve one’s own interests contradicts the very core of liberal economic thinking.” Platforms are winner-takes-all systems. They reflect the principle of socializing costs while privatizing profits under the banner of personal choice and convenience (Lovink, 2021, p. 2).

Platform Effects on Work – Gig Work

Uber is one example for how platform companies change work and can exude algorithmic market dominance. Those who enthusiastically promote what is called “gig work”⁶⁰ deem it a fundamental reinvention of labor markets that enable value creation for all participants, while its detractors view the effects of platforms and gig work as an incursion into previously protected areas of our lives (Prassl, 2018, p. 3). Work is becoming increasingly flexible, spontaneous, and precarious. On platforms, employers can find people for their constantly changing needs and tasks, while workers are left without security or protection (ibid., p. 4). In this new reality “work is rebranded as entrepreneurship, and labor sold as technology” (ibid., p. 4).

In this context, Prassl (ibid., p. 5) coins the term “platform paradox”: On the outside platforms might present themselves as technology companies, creating marketplaces based on matching software. However, they act more like traditional employers, controlling performance of a worker and ensuring compliance with company policy and customer instructions (ibid.). In all this, technology does not just provide matchmaking, it also shapes our perception of what is going on: when we magically summon a warm dinner to our house with a swipe on an app, it is easy for the lines between humans and algorithms to become blurred (ibid., p. 5 f.). Hence, platforms and the gig economy make labor less visible (ibid., p. 6).

Uber is a prime example for the above. “Uber [...] harnessed technology to create an entirely new business logic for employment” (Rosenblat, 2018, p. 6). At Uber, drivers are penalized if they decline passengers, yet the company does not provide a driver with the information in advance whether a ride is profitable (ibid., p. 4). This is the power of the platform in action with regards to price and performance control. If a driver declines too many rides, their internal rating goes down which may affect their ability to get rides in the future. Here, Uber controls the price and leaves gig workers in the dark about their earnings, while also forcing compliance with the platform. This is possible due to new technologies that “[...] make it possible to create a man-machine integrated circuit – which operates using algorithms that constantly reprocess

⁶⁰ Gig work and the gig economy are inspired by comparisons with artists whose work consists of gigs – engagements that are independent from one another. Whether the situation of a platform laborer is comparable to that of a musician traveling for concerts is doubtful (Crouch, 2019).

the data – in which the worker risks decisive insecurity and exasperating exploitation” (Carinci & Dorssemont, 2021, p. 2).

The case of Uber especially highlights the challenges of new work models that platforms create: Are Uber drivers employees of the company, consumers of algorithmic technology (as the company likes to state), or self-employed entrepreneurs? (ibid., p. 8). This has far-reaching consequences on insurance, benefits, immigration status, and worker protection, among others (ibid.). A key characteristic of the relationship between platform workers and the platform owners is an increase in inequality between these parties. While workers fought for more equal rights with employers and have been enjoying them in parts of the second half of the 20th century, platform dynamics reverse this effect and widen the gap between those who do and those who assign the work (Crouch, 2019). Platforms collect data and process them with algorithms to manage these proto- or not employment relationships (Carinci & Dorssemont, 2021, p. 4). Managed by the rules of the algorithm, there is little space for human appeal in the case of data or algorithmic errors.

Beyond platforms like Uber, Lyft, or Airbnb who connect supply and demand in a proprietary market and affect the nature of work, platforms also affect the sphere of cultural production. “Also, [...] platforms intervene deeply in the curation of culture and the organization of public communication” (Nieborg & Poell, 2018, p. 4285), as is the case of Instagram.

Platform Effects on Cultural Work and Precarious Entrepreneurship

Algorithms structure cultural work in the age of the platform. Here, too, there is a power disparity between the platform worker or user and the platform. Those who populate and power the platforms are dependent upon the algorithm to support the display and dissemination of their cultural goods, most likely content. “[...] cultural workers amid platformization are *only as good as their knowledge of the algorithm* [sic]” (Duffy, 2020, p. 105). Duffy (ibid., p. 103) coined the term “algorithmic precarity” to reflect the dependence of cultural workers on algorithms. This can be extended to not only cultural work but all forms of work in the platform era, in which success and the worker’s livelihood depend on algorithmic distribution.

Algorithms have changed the nature of cultural production. Previously, cultural production followed a linear process (Nieborg & Poell, 2018, p. 4287). Now, it is an iterative, data-driven process in which content is continuously adapted and changed to optimize for platform distribution and monetization (ibid.). As a result, junk content⁶¹ is everywhere – cultural

⁶¹ Akin to junk food, junk content is conceived for quick consumption.

production for the sake of the algorithm first. While certainly not all content or cultural production in the digital age needs to fit high artistic or cultural standards (there has always been great variety in culture), platforms bring with them a palpable shift away from the agency of a creator to the agency of the algorithm, which ultimately sets the rhythm for creation. Cultural producers on platforms are compelled to use publishing strategies that align with the business models of platforms (ibid., p. 4281) over their own inclinations.

This applies to journalistic cultural production as well as to influencers, content creators, and those who use platforms for marketing. “Platforms decontextualize news and reduce news organizations to mere content developers” (ibid., p. 4287 f.). Legacy media and platforms are entangled, “as the editorial and curatorial practices of mass media are now embedded in a platform environment and are informed by platform data metrics” (Ye, 2022, p. 189). The logic of the platform deeply impacts how we obtain information on politics and how media distribute reporting.

All producers on platforms are subject to algorithmic regimes. While their work and cultural creations contribute to the platform, “for platform holders, content developers can become dispensable” (Nieborg and Poell, p. 4282). You can see this in the indifference of social media companies when it comes to algorithm changes, for example. “Cultural content producers have to continuously grapple with seemingly serendipitous changes in platform governance, ranging from content curation to pricing strategies” (ibid.). When the algorithm changes, those making a living through platforms like Instagram scramble when their posts’ reach decreases. In the case of a small business owner, an algorithm change can mean a dip in their income or a strong effect on their livelihood.

Platforms exercise significant control between those who create content or cultural output on platforms and end users (ibid., p. 4281). This affects the distribution of economic and cultural power and the degree of autonomy to which producers create content and distribute it through platforms (ibid.). Algorithms regulate an end user’s interaction with content on Instagram and other platforms, effectively shaping this relationship. Successful cultural and content production complies with and leverages the algorithm. This creates a sense of algorithmic capital, the knowledge of how to use the algorithm to one’s own advantage. Furthermore, this mode of production on the platform shapes the relationship between reader and author and creator and recipient into one of an individual (or profile) and audience. To know how to build an audience on a platform with the potential for eventual monetization is a coveted skill.

The creator economy is a manifestation of the above. On the one hand, it encourages entrepreneurial activity through creation of content. On the other hand, it rests on free labor for

platforms with the hopes of opportunities for monetization. Content producers and consumers are locked into platforms that foster a mutual system of instrumentalization: follow me so I can build my audience, so I can sell you something. Platforms convert cultural production into economic opportunity and an exercise in algorithmically optimized entrepreneurship that instrumentalizes human relationships. All of this happens within the control of the platform, where individual professionals are exchangeable, while a creator depends on the platform and access to it for their livelihood. Thus, cultural production on the platform is shaped by a great power imbalance.

Lorusso (2019) coined the term “entreprerariat” to encompass the widespread reach of entrepreneurialism into our lives and the precarious nature of entrepreneurship in the reality of the digital economy. “Everyone is called to — or coerced into — free enterprise (even employees, as the concept of *intrapreneur* [sic] suggests)” (ibid., p. 65). To live in a state of entreprerariat is to work everywhere and all the time, while life is in perennial startup mode (ibid., p. 18 and 56). The entreprerariat is a symptom of a greater change in society as well as digital platforms that “[...] incorporate entrepreneurial dynamics while taking advantage of widespread precariousness [...]” (ibid., p. 18 f.). Entreprerariat is a continuation of the uncertain conditions platform workers face. Here, the uncertainties are turned upside down by the leitmotif of plucky entrepreneurialism and self-innovation. Entreprerariat mirrors a society where everyone is an entrepreneur and nobody is safe (ibid., p. 19), reflecting the concern around gig work in the platform economy. Lastly, the question of precarity here is not only linked to work but also needing to build and maintain one’s identity (ibid., p. 68).

Platform Effects on the Individual

The platform economy has profound effects on individuals, even outside of cultural production and gig work. When technology companies are too big to fail and dominate markets, and users have nowhere to go, this creates a sense of cultural and individual pessimism, aggression, and depression (Lovink, 2022, p. 12). “Living without [platforms] shackles social and cultural life” (Plantin & Punathambekar, 2019, p. 164).

Nowhere does the power of tech companies become more visible than when one realizes how deeply one depends on a platform like Amazon, Meta, Uber, or Airbnb to live one’s life. We may want to leave, but we may not be able to, because the hegemonic power of the platform is baked into everyday life in digitalized, contemporary societies. Platform power can create a sense of powerlessness in individuals, for example that there is no point in reading the terms and conditions of a software app and consciously decide whether one wants to opt in or out.

Most often, clicking the button that says “agree” is accompanied by a shrug that acknowledges the lack of agency of the user when confronted with the platform.

Platforms can create a sense of safety and intimacy for the individual. With all their data collection in the background, social media companies as well as other platforms, make sure to show users only what they may want them to see. This is the effect commonly described as echo chambers. Echo chambers or filter bubbles are contested concepts. The sense of safety platforms can offer is an alternative approach to describe the phenomenon that users are seeing a lot of the things they already like on platforms:

“Platforms as gated ‘safe spaces’ [sic] know us intimately. They can tell us what we might like in accordance with our own tastes, preferences, previous orders, search histories, and likes. Platforms remember us. They know how to comfort us and how to trigger us” (Lovink, 2021, p. 2).

What Lovink (*ibid.*) refers to in the last statement is that, for example, social media companies have been engaging in practices that exploit our neural circuitry, specifically dopamine feedback loops, for operant conditioning of its users to keep scrolling and liking (Haynes, 2018). These apps tap into the “[...] very same neural circuitry used by slot machines and cocaine to keep us using their products as much as possible.” (*ibid.*). Dopamine is a neurotransmitter associated with motivation and reward – the comfort and triggering Lovink (2021, p.2) describes is exemplified in the toying with this neurochemical. See a post you like – feel a flash of reward and warm feelings wash over you.

Furthermore, platforms can shift or influence a user’s ambition and how they perceive their position in the world. “The platforms that we want to own and control are aspirational media for the users who visit in search of something” (Lovink, 2021, p. 2). Nowhere is this more evident than on Instagram, the platform of choice for displays of aspirational lifestyles and modes of existence. You too could have this, the steady stream of posts on the Instagram beckons, all you need to do is build an audience as part of an entrepreneurial business model. We may want to own and control our stake, our profile on the platform to harness the potential of this promise. In reality, the platform owns us through its aspirational veneer. As large swaths of creative – and especially visual creative industries – have moved onto Instagram, the aspiration of “you, too, could build a thriving creative business with a couple of posts”, turns into a sense of utter exhaustion of having to feed the algorithm with a deluge of new content.

This sense of exhaustion can also be attributed to the fuzzy mode of content creation and consumption that dominates our lives: prosumption. Prosumption is when the relationship of production and consumption becomes difficult, if not impossible to distinguish (Ritzer, 2015, p. 414). Ritzer (*ibid.*) also points out that production and consumption are on the extremes of the

prosumption spectrum and do not occur by themselves: production always involves consumption and vice versa. This is especially evident on social media, where users post and consume content on the same platform, often within instances of one another. Switching between production and consumption, between posting and scrolling, can be disorienting – especially when using social media for professional purposes. Work never ends and leisure never begins, when an individual uses platforms for both purposes. Exhaustion looms, when work is supposedly fun, but that fun is never-ending.

4.3. The Digital Dilemma: Algorithms, Persuasive Technology, and Surveillance Capitalism

As previously discussed, platforms use several control mechanisms to consolidate their market power internally and externally, among them control of information (Staab, 2020, p. 173). Platforms attain informational control through data harvesting and analysis, so they can overview interests and actions of market participants and optimize market allocation within their proprietary market. Collection, capture, and analysis of data are key functions of a platform's ability to control information. “The activities of users and institutions, if they are recorded and transformed into data, become a raw material that can be refined and used in a variety of ways by platforms” (Srnicek, 2017, p. 56).

In advertising platforms like Instagram, technology companies generate revenue through extracting user data, analyzing this data, and then using it to sell ad space to advertisers (ibid.). Hence, these technologies need to be designed to optimize data collection. To collect data, platforms monitor user activity; the more time a user spends on a site, the more data a platform can harvest (ibid.). This creates incentives for digital capitalism to collect as much data on users as possible through tactics such as tracking, cookies, and persuasive technology design. This is akin to commercial surveillance of consumers, “surveillance capitalism” (Zuboff, 2019a).

A key aspect in the relationship between data processing, technology design, and surveillance capitalism is that companies do not pay for raw data, but data that has been processed with the aim of fulfilling a certain function (Srnicek, 2017, p. 56). Most likely in online platforms, an algorithm processes this data with the revenue stream and business incentives in mind. In the case of Instagram, the algorithm has three objectives: allocate content between users and creators in a way that both are incentivized to spend as much time on the platform as possible, analyze user data for optimized ad selling, and allocate ads optimally in a user's feed to support conversion. Persuasive technology design further helps to keep users hooked to the app.

This is the trinity of business models in digital capitalism: algorithms, persuasive technology design, and surveillance capitalism all working together. Data is extracted everywhere online owing to the logic of surveillance capitalism. Algorithms provide data analysis for optimal allocation within the proprietary markets platform companies design. Persuasive technology design ensures that users spend as much time on platform apps and user products to optimize data harvesting and habituate usage. This drives the incentives of platforms like Instagram and is a key factor in why the app functions the way it does.

4.3.1. Algorithms: The Invisible Hand

When people speak about algorithms in quotidian contexts, it can often sound like they are invoking a distant deity. Algorithms are fickle, removed, and an ultimate authority. One does not know exactly why they work the way they work. However, what frustrated social media users know across the world is that the algorithm’s decision is final: if it does not show your content to your audience, you are out of luck. The only way to change this, seemingly, is to pander to the algorithm. Countless truisms on how to work the algorithm circulate online, for example the suggestion to comment on and like comments under your own posts to demonstrate to the algorithm that you are an active and engaged account. I have seen this especially in small business communities, where scrappy business owners rely on “free”⁶² social media marketing to build their business through content marketing, i.e. building a following online that you can leverage into a business. Lopatto (2022) describes this well from a user perspective:

“I saw stuff passed around on social media about how to please the algorithm: a certain number of Stories, a certain number of Reels. If you didn’t do what the algorithm wanted, people simply wouldn’t see your posts.”

The algorithm is a black box. Akin to a deity, one can best hope one’s offerings are well-received and yield blessings in the form of increased exposure or – ironically! – that someone’s followers see their posts in their feed once in a while⁶³.

Aside from this anecdotal description, algorithms are central to big data operations across all fields of the economy. Algorithms are created to solve allocation problems and analyze large amounts of data. The more complex they get, the more challenging it is to understand what influences their problem-solving. This is somewhat problematic for contemporary societies and individuals because algorithmic processing of data is ubiquitous.

Algorithms are highly political in nature. If we assume that they structure everyday interactions, commerce, communication, allocation of goods, services, insurances, and jobs, among other fields, they touch on many relevant aspects of our lived realities. Regarding the public sphere and expression of opinions therein, algorithmic allocation of content can distort the deliberative

⁶² Free only in terms of monetary prerequisites to joining. Up until now, posting on Instagram was free of charge, not counting the time investment required to prepare a post and share it. This is changing: in early 2023 Instagram announced a paid verification program. In addition to verification, the monthly subscription fee also comes with increased reach, raising concerns about creating two tiers of social media users.

⁶³ I find this ironic because following an account implies that somebody is interested in hearing or seeing more from said account. Algorithmic distribution intervenes in this relationship between two people or two profiles and decides what the right amount of exposure to the content of the person a user just followed is. This is the antithesis to autonomous decision-making and somehow, bafflingly, taken as a given.

process by favoring the business imperatives of the company that owns an algorithm over the epistemic interest of a deliberative process. This can undermine the organic unfolding of debate, weighing opinions, and using reason to arrive at an expression of public opinion on a subject. Ownership and control of algorithms thus also is an expression of commercial, social, and political power. Those who control an algorithm potentially hold discursive power, at the very least can sway public opinion or influence the world view of a group through what they show in algorithmically curated feeds. This is a more extreme case and the extent to which companies make use of this varies. However, conceptually this opportunity exists and democracy scholars need to bear in mind the deeply transformative power of algorithms in contemporary society. Since intentional changes in the emotional value of news feed content can affect the emotional state of Facebook users and their posting behavior thereafter (Kramer et al., 2014), at least in theory the possibility exists to leverage this mass-scale emotional contagion through an algorithm.

Algorithms are an intermediary in parts of the democratic process that are employed, owned, and controlled by a third actor. In the case of social media companies, this often occurs in transnational settings. To understand contemporary politics, one needs to understand the logic of algorithms. For example, algorithmic recommender systems have spread across the cultural infrastructure online. Developers of these systems describe their work as “hooking” people, guiding their paths through digital architectures in a manner that entices people into frequent and enduring usage (Seaver, 2018, p. 421). Between freedom and coercion, these recommender systems – as Instagram uses them, as well – reduce autonomy in our interactions with digital material in favor of maximizing the time we spend online. Search engines and their algorithmically curated recommendations structure our social and political reality, as well.

The effects of social media algorithms are political. However, research on polarization and echo chambers shows no clear evidence on whether algorithms on social media add to the former or not. I have already discussed this in the section on social media research. In this section of the dissertation, I will investigate algorithms on the macro level. Even if we can argue whether and to what extent algorithmic distribution of content is responsible for the creation of filter bubbles, echo chambers, and polarization, algorithms still play a role in structuring reality for us. An algorithmic feed in a social media app is different from a chronological feed, therefore a type of structuring can be said to occur over which users have little to no say. This has consequences for the social and political sphere.

Algorithms pose considerable challenges to political science research – or any other field, for that matter. There is little access to them for research purposes, so scholars are left to attempt reengineering them or inferring causes or effects on an incomplete set of inputs. By design, this leads to less certainty in scholarship. One can only infer so much about the algorithm without access to it.

There is a lot of ambiguity around the term algorithm and what it means. Scholarship and wider public debates haven not settled this, yet, and often, terms like machine learning, big data, algorithm, and predictive analysis are used interchangeably or with fuzzy conceptual boundaries (Rubel et al., 2021, p. 8). Foundationally, an algorithm is a set of instructions for solving a problem (*ibid.*). An algorithm does not need to be technical; it could also be an instruction manual or a recipe. In technological settings, the term algorithm is either used to describe an individual set of instructions to complete a specific task or a system that is driven by algorithms (*ibid.*). In the context of this dissertation on Instagram, I will follow Rubel et al. (*ibid.*, p. 8 f.) and consider algorithms that are incorporated into decision making systems. The Instagram algorithm, algorithms of communication platforms or even on Amazon and Spotify, as well as those embedded in complex social structures (like supply chain logistics, law enforcement service, or criminal justice) all make decisions.

“Moreover, algorithms in this sense are best understood as constitutive parts of socio-technical systems. They are not purely sets of instructions for carrying out a task and they are not mere technological artifacts. Rather, they are used by individuals and groups and affect other individuals and groups such that they constitute an interrelated system that is both social and technological.” (*ibid.*, p. 9)

Algorithms occupy an interesting position in present socio-technical systems. They are programs with their own operational logic that are fed on human-made data as well as trained and created in alignment with the goals of their owners. At the same time, the more complex the algorithm, the more challenging it can be to understand its workings or how to make changes to it to create alternative outcomes.

Advocates of algorithmic techniques argue that they eliminate human biases from decision-making processes (Baracas & Selbst, 2016, p. 671). But any algorithm is only as good as the data it works with and the data it is being trained on (*ibid.*). In some cases, algorithms may reveal useful patterns in the data and others, they may also inherit prejudices or reflect any types of biases or modes of thinking that exist in society (*ibid.*). This may result in algorithmic discrimination of marginalized groups, for example – or in general attribution errors. It is especially challenging, when any of this happens because its effects like discrimination are “[...] almost always an unintentional emergent property of the algorithm's use rather than a conscious choice by its programmers, [so] it can be unusually hard to identify the source of the

problem [...]” (ibid.). Hence, algorithms are neither objective, nor can we fully control how they arrive at their decision-making.

Ziewitz (2016, p. 6 f.) charts the reception and theorization of algorithms as what he deems an algorithmic drama in two acts: the first act introduces algorithms as powerful and consequential actors in a wide variety of domains, the second then picks up on difficulties involved in explaining how algorithms exercise power and influence. The former applies to search engines, social media platforms, movie ratings, or music recommendations, among others (ibid.). The latter points to the difficulties in conceptualizing and understanding the black box of algorithms. For Ziewitz (ibid.), the relationship between the black box and power in the narratives around algorithms appears peculiar: “[...] opacity of operation tends to be read as another sign of influence and power” (ibid.).

Yet, hesitancy around algorithms and claims of their remote powers – the narrative Ziewitz (ibid.) is skeptical of, have plausible origins. On a quotidian, intuitive level even, it is understandable that the opaque, remote nature of algorithms and their increasing involvement in human lives evoke a sense of unease. “[...] algorithmic selection has become a growing source of social order, of a shared reality in information societies” (Just & Latzer, 2016, p. 238). Algorithms shape lives, realities, affect individual and collective perception of the world, and influence behavior (ibid.). On a micro-level, if an Instagram feed recommends a user yet another video of baby animals, this has no inherent political consequences. At the same time, it is an expression of this social ordering or changes in our shared reality the authors describe. It is the algorithm’s subtle hand that can feel so disconcerting.

In this, it is important to remember that algorithms are artefacts and have intrinsic values. Different people who design algorithms may accept different value-judgments and have rational reasons to design the same algorithm in a different way (Kraemer et al., 2011, p. 251). This aspect needs to be emphasized in any debates on algorithms: while it can be challenging to completely trace the emergent decision-making of an algorithm back to its origins, the overall design and purpose of an algorithm is still a decision of its creator(s). Such choices in algorithmic creation might be as small as the thresholds for counting data values in a cell (ibid.).

At the same time, it can be challenging to identify human influence in complex, multi-user processes that create algorithms – doing so often requires investigation of long-term processes (Mittelstadt et al., 2016, p. 2). Discourses on algorithms, in alignment with what Ziewitz (2016) described as the two-act drama of algorithmic conceptions, that focus on power of algorithms through their obscurity, need to be aware of the intentionality or agency of their creators. They

engineers and decision-makers behind them may not be able to predict the exact outcome or trace every decision an algorithm makes, but they design algorithmic software with a certain intent, creating a set of instructions to solve a problem – albeit in a complex way.

Effects of algorithms on people, especially when it may be challenging to trace the outcome of a calculation to a data input as the complexity of an algorithm increases, create social challenges with a political dimension. In societies structured by algorithms, what happens to those who are on the receiving end of a miscalculation? Determining whether a problematic decision is a one-off error or evidence of a systematic problem may be impossible with algorithms that are hard to interpret and predict (Mittelstadt et al., 2016, p. 2). As algorithms begin to rely on learning capacities, this is a more urgent consideration.

While these errors may be rare or statistical outliers, arguments along a utilitarian cost-benefit analysis do not suffice in settling this matter. Individuals bear the consequences of algorithmic discrimination, joblessness, or accidentally rejected credit applications. As algorithms mediate group and even processes that have societal consequences – like social media algorithms – their effects come into view in the political sphere (*ibid.*). Furthermore, an algorithm’s margin of error can have deleterious consequences for an individual. Unease about algorithms’ autonomous decision-making capacities is understandable when these decisions can feel removed and opaque with currently little room for appeal. When a user’s account on Instagram gets blocked or shadow-banned, for example, there is no human relationship for appeal and explanations. Another example is when a job application is rejected by algorithmic filtering in applicant screening platforms before reaching human eyes. To be characterized and analyzed by an artifact with little to no room for recourse can feel deeply dehumanizing,

Effects of Algorithms

On social media, algorithms construct regimes of visibility (Bucher, 2012, p. 1164). On platforms like Instagram, algorithms decide whose posts, stories, videos, and Reels get pushed into the feeds of followers or shown in sections that invite exploration. To social media users, visibility is key for personal communication and professional objectives. Personally, we may be on Instagram to share our lives with our friends and followers. There, visibility in the feed is a condition for being seen and known socially among our peers. Professionally, our invisibility, as mediated by the algorithm, can be the arbiter of professional opportunities and success of a business endeavor that depends on visibility in social media marketing. The threat of invisibility and the algorithms governing authority over it are the locus of power on social

media, especially in societies that are moving toward a culture of sharing and viewing social media as extensions of the self.

Concerns of visibility also extend to the political sphere. In highly contested informational spaces on the internet, algorithms structure the distribution of content and information. They are designed to produce winners from these information contests with little transparency on how the algorithmic contests work (Crawford, 2015, p. 77).

Burrell and Fourcade (2021, p. 213) point out three interesting social phenomena in connection with algorithms: 1) the rise of a new occupational class, the coding elite that has consolidated power through controlling digital means of production, 2) the implementation of techniques of mathematical optimization intensified the domination of actuarial logics of decision-making, and 3) the same algorithmic intermediation in digital communication is changing how people interact, associate, and think. Algorithms are a lever of profound societal change processes that feed back into the political sphere:

"Altogether, compared to reality construction by traditional mass media, algorithmic reality construction tends to increase individualization, commercialization, inequalities, and deterritorialization and to decrease transparency, controllability, and predictability." (Just & Latzer, 2016, p. 238)

Similar to Burrell and Fourcade's (ibid.) argument, Totaro and Ninno (2015, p. 139) state that a culture informed and shaped by algorithmic logic has promoted rationality in science and society. Following this argument, the logic of algorithmic, cybernetic thinking thus permeates society even in areas that traditionally are not the domain of this type of thought processes. When applied to humans, algorithms may be outside their domain of definition and lead to social disaggregation (ibid.). Disaggregation occurs, when an intermediary like an algorithm interrupts human reciprocity not to reassemble it but replace it with a technical interaction by an organizational machine (ibid., p. 146). The individual then gets encapsulated in a process wherein the algorithm facilitates connection between the steps of the process over promoting reciprocity between the human actors (ibid.). The authors (ibid.) term the loss of reciprocity between humans caused by bureaucratic system "system disaggregation". In our human interactions, we are becoming a step removed from one another in favor of the prevalence of the systems- and steps-oriented logic of a mathematical and computational process.

At the same time, a mode of individuation in algorithmic personalization becomes visible, as well. Not only does the procedural logic of algorithms create a distance between actors, individual personalization of content, for example, furthers this process leading to a reconfiguration of the basis of our collective interactions (Lury & Day, 2019, p. 17). Digital platforms also undermine ways of knowing ourselves. Digital, algorithmically distributed media

exclude self-reflection from the creation of knowledge about ourselves (Fisher, 2021, p. 1309). How can you reflect on yourself, when recommender systems only reflect your preferences back to you?

Furthermore, a person's level of insights into algorithms can affect their agency. Algorithm awareness and algorithmic capital may turn into social qualifiers when interacting with algorithms. Algorithmic capital in my definition is the understanding of how to use an algorithm and best use it to further one's own interests. Having algorithmic capital equals a different level of agency from somebody who does not or is even algorithmically unaware. Even though algorithms have been subject to public discourse in the past years, it is not certain that knowledge of how algorithms work is widely shared (Cotter & Reisdorf, 2020, p. 746). Algorithms structure our reality and can be gatekeepers in how we perceive media. Algorithmic knowledge is an important component of navigating the digital reality as an informed, autonomous user. “Without knowledge of algorithmic curation, users lack crucial insight into the various factors influencing who and what reaches them in search results and social media feeds” (ibid., p. 748). Without this knowledge, users cannot properly evaluate information and calibrate their reception accordingly (ibid.). There is a risk that without algorithmic knowledge individuals treat information they see on search platforms as the unadulterated truth (ibid., p. 758). Inequities in knowledge about algorithms create gaps in agency between different users and user groups. Cotter and Reisdorf (ibid., p. 757) find a gap in algorithmic knowledge along socioeconomic divides. People with greater socioeconomic advantages also tend to have a greater understanding of how algorithms work.

Further, a user's awareness of algorithms is closely related to their perceived autonomy (Dogruel et al., 2022, p. 1311). “When users feel in control of their interactions online, they are less aware of the impact of algorithms governing their interactions” (ibid.). Yet, third-person effects also apply in this relationship and users may feel that algorithms have a stronger effect on others than on themselves (ibid.). A study by Fouquaert and Mechant (2022, p. 1769) shows that awareness of algorithms alone appears to be sufficient for people to indicate more concerns about social media sites.

These findings on individual awareness of algorithms and algorithmic knowledge underscores the importance of digital literacy campaigns and education to support people in navigating the online world. Algorithms increasingly structure our social interactions and many parts of our personal, social, economic, and political experience. This poses challenges to the social fabric and integrity of the political system that require addressing through regulation, norms around algorithmic creation, and ideally greater transparency by the companies who apply algorithms,

for example. In addition, individuals navigate these algorithmic worlds in their everyday lives with far-reaching consequences. The well-being of individuals and democracies as well as of the social fabric require a closing of knowledge gaps and for digital literacy education to expand beyond social media and internet literacy. To know about algorithms is to know more about how the world works.

4.3.2. Pandora’s Box: Persuasive Technologies

Digital business models are competing for customers’ attention in crowded markets. Data analyses may optimize allocation of posts and viewers, sellers and buyers, and rides and riders, but they are still facing the challenge of creating incentives for customers to return to an app, digital service, or platform. In the digital economy of the present, persuasive technology design solves this for companies vying for customers’ attention. This is reflective of an underlying shift in the dynamics of the internet away from mere information-sharing to influence and garnering attention. (Bourzac, 2010)

The concept of persuasive technologies emerged with the research BJ Fogg, a Stanford professor who coined the term “captology”. Captology is the study of computers as persuasive technologies (Fogg, 1998). Fogg created the Persuasive Technology Laboratory at Stanford University⁶⁴ to study the ethical challenges of persuasive technology (University, 2023). BJ Fogg (2003, p. 1) defines persuasive technology as follows: “[...] any interactive computing system designed to change people's attitudes or behaviors.” Initially, computers were not designed to persuade but as they made their way onto desks and into the hands of consumers, they became more persuasive by design (ibid.). Persuasive technologies can take on roles that were traditionally occupied by teachers, coaches, salespeople, and clergy, among others (ibid.).

Fogg “[...] learned from studying history, [that] technology could rival language in its power to persuade. ‘Technology allows you to trigger behaviors in new ways, motivate in new ways, then simplify, automate, and scale up,’ he says” (Bourzac, 2010). Technology opens new ways to persuade and change behavior in ways that were previously not possible. Computer technology allowed persuasive efforts to reach larger audiences in more accurate ways, which created immense potential for supporting human well-being – and destructive applications. Computers’ advantages in persuasion also lie in their interactivity (Fogg, 2003, p. 6). Persuasion techniques are most effective when a persuader adjusts their influence tactics on a situation and computers (and digital technology) can adjust their modes of persuasion based on user data, needs, and situations (ibid.).

Incidentally, Stanford university enjoys close ties with the technology industry, so Fogg’s approach to creating technology products crosspollinated into the tech industry in the San Francisco Bay Area. Founders who took courses with BJ Fogg created Instagram and design

⁶⁴ The lab has now shifted its research focus and has been renamed the Stanford Behavior Design Lab. It focuses on “understanding human behavior and how to design for behavior change” (University, 2023)

products at Uber, Facebook, and Google (Stolzoff, 2018). Methods for creating habits, insights on the causes of behavior, automating behavior change and persuading people via phones studied at BJ Fogg’s lab were applicable in business contexts and caused a sea change in consumer technology (Wing Kosner, 2012).

At the heart of persuasive technology as defined by Fogg lies the Fogg Behavior Model that states that “[...] three elements must converge at the same moment for a behavior to occur: Motivation, Ability, and a Prompt. When a behavior does not occur, at least one of those three elements is missing” (Fogg, 2023). In doing so, it is more effective to make a task easier, than to boost somebody’s motivation to do it (Wing Kosner, 2012). In the context of technology, a prompt could be a notification to check your phone, while ability could relate to how easy it is to perform a certain task like forwarding a photo on Instagram or retweeting a tweet. Findings from persuasive technology research informed intentional design choices that streamlined friction and usability for example in social media apps.

Instagram’s co-founder, Mike Krieger, is a former student of BJ Fogg (ibid.). During his time in BJ Fogg’s class, he created the prototype for what would eventually become Instagram. Some of the learnings from the class may be visible in design choices on Instagram, for example that the team around Instagram prioritized ease of use from the beginning. Instagram made sharing smartphone photos on the internet a streamlined process and created filtering tools that delivered visually compelling results. Not only was it enjoyable to share a good photo you took online, but it was also easy. As Wing Kosner (ibid.) describes:

“[...] if you look at the gradual addition of features to Instagram [...] you will find that they all answer these type [sic] of questions: will this prompt the user to take or share more pictures, will it make the process easier or faster, will it be more fun and fulfilling for the user and their friends?”

Intentional technology design can hook users and habituate interaction with a technology. For example: Facebook taps into our human need to belong and checking it is an efficient way to feel that you matter and are seen (Bourzac, 2010). When you do this often enough and the product facilitates appropriate triggers, motivation, and ability as per Fogg’s behavior model, your engagement with the product can eventually become a daily habit. Persuasive technology design reflects technology as a socially constructed artifact.

There are several paths to approach behavioral change in individual users applying Fogg’s approach. Fogg’s team set up the website “The Behavior Wizard” that exhibits a behavioral grid model Fogg developed (Wizard, 2023a). It guides visitors through a questionnaire that results in suggestions on how to increase or decrease a certain behavior over time (ibid.). There are 15 guides to behavior change on the website, dependent upon the intended time

span for the behavior change (for example one time) and desired type of behavior change (for example stop an existing behavior). For example: to get somebody to commit to a behavior over a period of time (a GreenSpan behavior in the model), according to the Fogg Behavior Model, you must trigger the behavior when the person is motivated and able to make the commitment (ibid.). The site also offers specific tips on how to achieve this: “1. Boost motivation, while downplaying factors that de-motivate. 2. Increase the ability to make the commitment. 3. Deliver the trigger (request to commit) when motivation and ability are high” (Wizard, 2023b). In individual relationships, it might be challenging to achieve all three. Savvy salespeople can downplay demotivating factors such as risk of failure in conversation with prospective clients and help them make committing as easy as possible, for example by streamlining purchase processes or lowering the obstacles to carry out a certain behavior (ibid.). However, in technological applications at a mass level, especially the third element in the model cited above (GreenSpan) is interesting and novel. The more data a company has on an individual user, the better predictions it can make on when to deliver a trigger, for example in the form of a notification. Humans can only intuit perfect timing in interactions, platform companies can collect data on a user’s behavior and analyze it to predict the best moment in time for delivering a trigger.

Nir Eyal (2014)⁶⁵ summarized behavioral modification through technologies in his aptly named book *Hooked*. In it, he develops the “Hook Model”, “a four-step process that, when embedded into products, subtly encourages customer behavior. Through consecutive ‘hook cycles’ [sic], these products bring people back again and again without depending on costly advertising or aggressive messaging” (ibid.). More startling in its frankness is this admission on behavioral modification in connection with economic goals in the book:

“Amassing millions of users is no longer good enough. Companies increasingly find that their economic value is a function of the strength of the habits they create. [...] By mastering habit-forming product design, [...] companies [...] make their goods indispensable.” (ibid., p. 2).

Pressure to monetize, especially given the temporal horizon of VC funding, and ad-based revenue models of tech companies have created an incentive structure that led to the development of technologies that are often described as addictive in the public discourse. Adam Alter (2017, p. 3 f.) argues that conventional definitions of addiction are too narrow to describe the experience of technology users across the world. Millions, if not billions, are finding themselves scrolling longer than they intend to or wanting to look up one video on YouTube and reemerging from a black hole of binge-watching two hours later, without

⁶⁵ There are conflicting reports about whether Nir Eyal was a student of BJ Fogg or not. Fogg denies this. However, there are blog posts and newspaper reports that state Eyal attended a retreat at Fogg’s house as a student (Eyal, 2023) and sat in his classes at Stanford (Stolzoff, 2018).

cognizance of what just happened – and compulsively repeat the cycle again and again. This may be considered a form of behavioral addiction under a broader definition of the term.

This is the shadow side of persuasive technology: when tech products are designed to act against the goals or best interests of a user. Tech companies optimize product design and a user's experience to capture data, display more ads, and habituate product use. Tristan Harris, a design ethicist and the co-founder of the Center for Humane Technology, states that tech habits are not a question of will power, but that the problem is that “there are a thousand people on the other side of the screen whose job it is to break down the self-regulation you have” (ibid., p. 3).

When you combine persuasive technology with behavioral conditioning processes, you can create a powerful mechanism to hook users to tech products, as individuals and societies worldwide are witnessing presently. To understand the functions and profound effects of persuasive technology, we need to understand the link between two concepts: behavioral conditioning and the role of the neurotransmitter dopamine for reward and motivation.

Conditioning and the Role of Dopamine

Conditioning is a process for training animals (or people) to behave in a certain way or accept a certain set up circumstances. In Pavlovian or classical conditioning,

“[...] an initially neutral conditional stimulus (CS) is paired in close temporal proximity with a biologically significant unconditional stimulus (US) that elicits a reflexive unconditional response (UR). Through the formation of a CS-US association, the CS comes to evoke a conditional response that typically mimics the UR and has an adaptive value.” (Kim, 2001, p. 1946).

The classic example for Pavlovian conditioning is a dog's salivating (unconditional response) when they see food (unconditional stimulus). Pavlov then began to ring a bell (neutral conditional stimulus) whenever he put food in front of a dog so that eventually the dog began to salivate, when he heard a bell (CS-US association) – even without any food present.

Pavlov's is not the only approach to conditioning. B.F. Skinner (1937) coined the term “operant conditioning” to describe a behavior that is maintained by reinforcement schedules (Staddon & Cerutti, 2003, p. 115). Skinner found a method for training in new behaviors through reinforcement according to a set rule (ibid.). For example: a hungry pigeon learns to use a peck of the beak to open a feeder (ibid.). With the peck, the feeder releases food and the pigeon learns that pecking at a lever or button will feed it (ibid.). The rule in this case is “peck opens lever” and the reinforcement is the food. This approach theorizes that positive

reinforcement supports the development of a behavior but negative enforcement discourages a behavior (Akpan, 2020, p. 71). For example: if instead of the dispersal of food at the peck of a beak, a small electric shock would be administered, the pigeon would get discouraged from pecking at the lever. In addition, with this approach one can set reinforcement schedules, for example time-based ones with a fixed or variable interval (Staddon & Cerutti, 2003, p. 115). In a fixed, time-based interval, food is released every so many hours. In a variable interval, the food is delivered in quick succession or after long breaks at random. This mirrors the reward function in slot machines when a player does not know when a reward will be administered.

Dopamine, a neurotransmitter that has been traditionally considered to signal reward and motivation (Bratcher et al., 2005, p. 371) is a key component in these conditioning processes. There are four dopamine pathways in the brain; three of them are involved in signaling reward and reinforcement (Quock, 2022). They each assume different tasks, but their underlying purpose is to respond to what is important for our survival, such as food, sex, or sleep (ibid.). This also makes dopamine a feel-good neurotransmitter because it signals reward. In conditioning processes, when a reward is released, the brain produces dopamine. It is what motivates humans to seek pleasure and reward, because we want to feel the sensation its release creates in response to a stimulus or in anticipation of an event (Waters, 2021). In the example above, when the pigeon pecks at the lever and food is released its brain signals dopamine. Dopamine is also the neurotransmitter associated with addiction: The higher the dopamine release, the more addictive an experience (Waters, 2021).

Curiously enough, the brain processes pleasure and pain in the same location (Lembke, 2021, p. 2). These two emotions are like opposite sides of a balance, explaining why someone may want a second piece of chocolate or to check Instagram again for another dopamine hit (ibid.). This is because as soon as the brain has released dopamine and we experience pleasure, there is a dip in our emotions, so that the brain can regulate itself into a balanced state (Waters, 2021). An Instagram user may not want to experience the dip and reaches for the app again to experience more pleasure. This can create long-term challenges for mental health. The more someone indulges in pleasurable things, the more the brain compensates this by bringing our emotional state lower and lower to create a balance again (ibid.).

In the contemporary digital world, persuasive technology approaches use conditioning principles and tap into dopamine feedback loops, hooking users to apps through reward patterns. For example: when a user logs onto Instagram and encounters content they enjoy, like a video of baby animals, their brain releases dopamine. When they do this more often and their brain releases dopamine each time, they can become hooked, to use Nir Eyal's

terminology. In algorithmic feeds, content can be arranged in such a way that it maximizes a user's dopamine reward through variable reward schedules. This could mean displaying content the algorithm predicts a user will enjoy not immediately after they open the Instagram app but in a more randomized pattern, for example, echoing Skinner's operant conditioning. This intensifies the reward sensation and encourages users to open the app even more frequently. In addition, checking Instagram has a very low cost. Following B.J. Fogg's model for behavior changes as broken down in “The Behavior Wizard” mentioned earlier in this chapter, behavioral modification is relatively easy in connection with smartphones, because there are almost no challenges to interacting with a phone. Taking a smartphone in your hand and opening an app is a very simple task with little friction. Users likely find themselves picking up their phones repeatedly, disrupting their days or activities to get another dopamine hit.

The dynamics in conditioning, dopamine hacking, and persuasive technology create a perfect storm for personal well-being, mental autonomy, and the ability to function well as humans. Some considerations from the insights on dopamine that may be relevant for democracy: if users seek out dopamine repeatedly from digital sources, as this pattern is common across many apps and especially social media, they may abandon more important tasks. In the long term, this reduces our attention spans through repeated checking to generate a dopaminergic reward. This is a personal cost that may also have effects on our ability to participate in the political sphere. Paying a little less attention may seem like a small concern, in the aggregate of an electorate it can make a difference. Furthermore, as dopamine operates on a seesaw of positive and negative emotions that balance each other out, overindulgence in digitally administered dopamine can lead to negative effects on mental well-being. Again, this is more of a personal cost that may influence society in the aggregate.

More importantly, intentional, planned exploitation of an individual's neural circuitry through tapping into neural feedback loops poses a challenge to a person's mental autonomy. This type of neuron-wrangling for economic purposes opens a new chapter in our collective relationship with capitalism:

“The purposive design, production and marketing of legal but health-demoting products that stimulate habitual consumption and pleasure for maximum profit has been called ‘limbic capitalism’[sic]” (Lyons et al., 2022, p. 1).

In the digital realm, this means that platforms are designed to generate and analyze vast amounts of personal data to capture a user's time and attention as well as influence their moods, emotions, and desires to generate and increase profits (*ibid.*). This is especially concerning, when commercial and informational functions overlap. On the one hand, persuasion and neural hacking are geared towards aligning users with the desired outcomes of a platform company in the model of limbic capitalism, on the other hand, these users may

scroll on platforms like Instagram to inform themselves and participate in civic exchanges. These two interests are at odds with each other, especially because the algorithm’s subtle cues stimulate user behavior in ways they might have neither consented to nor are aware of. Mark Tschaeppe (2016, p. 32) proposes the term “dopamine democracy” to capture the confluence of neoliberalism and digital media as they affect (among others) the dopaminergic systems of individuals.

A further fundamental challenge in exploitation of dopamine pathways is that “cheap” dopamine from sources like social media increases challenges when performing challenging or uncomfortable things. Why expend an hour at the gym, when dopamine is more readily available scrolling? This skews an individual’s perception of reality, as well as their ability to take on agency over their own lives and participating in low-reward activities such as some civic duties. This is not to say that societies are immediately headed into the abyss of citizens forgoing debate for scrolling – that would be reductive and unhelpful. However, these changes affect minds over longer periods of time as we train ourselves through conditioning to use apps in a certain way and shifts our baseline for what we deem worthy expanding effort for. This can have a plethora of subtle, long-term effects on social and communicative interactions online. More importantly, limbic capitalism interventions and the phenomena described above are an intervention in a person’s mental authority, when these technologies covertly and gradually manipulate users into attaining a goal that was predetermined by the algorithm, disregarding a user’s right to make their own decisions (Botes, 2022, p. 1).

Ethical Questions in Persuasive Technologies

Unsurprisingly, persuasive technologies raise the question of ethics. Fogg (1998) did so early on, outlining challenges and potential losses for individuals over the gains of companies that might employ persuasive technologies. Persuasive technology is a different magnitude of persuasion than marketing tactics before the internet and digitalization. Digital persuasion can be delivered in a targeted, timely manner to optimize behavioral triggers, while tapping into neurochemical signaling through dopamine. Traditional persuasive marketing techniques pale in comparison to the technological affordances of persuasive technology.

Persuasion in digital technologies can have advantages and disadvantages. Imagine, for example, somebody learning a foreign language on an app. To keep up and support their learning, they enable the app to send them aptly timed notifications to remind them of their daily learning goals. With the support of these notifications, they can learn more easily and may accomplish their goal of speaking some phrases of Italian on their next vacation in Rome

with greater ease. This is the advantage of persuasive technology in action when it supports users by nudging them in the direction of their goals.

On the other hand, the disadvantages of persuasive technology are familiar to social media users worldwide. Unless turned off, notifications on new posts and messages on Facebook, WhatsApp, and Instagram can be highly disruptive to one’s day. Furthermore, they can get in the way of fulfilling personal goals, for example in the case of students who are distracted from studying when notifications repeatedly appear on their phones. Persuasive technology extends beyond notifications; however, notifications are a very comprehensible illustration of its mechanics. At the end of a long line of design choices in technology products, persuasive technology can lead to compulsory behavior, which in everyday life and media people like to refer to being addicted to their phones⁶⁶.

Not all persuasive technology is manipulative per se (Botes, 2022, p. 1). As the example of the language learning app demonstrated, consent to be persuaded is a mitigating factor. Yet, not all algorithms are created equal and scholarly debate on whether online manipulation is harmful or not has not yet been settled. Klenk and Hancock (2019) state that not all online manipulation may automatically lead to a loss of autonomy and that implicitly assuming this is incorrect. On the other side of this debate, Susser et al. (2019, p. 11) argue that online manipulation (which affects an individual’s capacity to exert mental autonomy) is harmful, because of its effect on decision-making, not outcome – even if meant well⁶⁷. The authors continue that it is harmful not only to the individual, but also to the collective, when manipulation affects democratic decision-making processes (*ibid.*).

Regarding the threat of manipulative technologies, Klenk and Hancock (2019) suggest that manipulative technologies should be subject to different policies than non-manipulative ones. While this approach is laudable, it poses many practical questions: What defines a manipulative technology? What are policy intents and goals behind a such differentiation? Will tech companies need to inform customers of manipulation? Will there need to be a label for manipulative technology just like for genetically modified foods?

Beyond labeling manipulative technologies, more profound ethical questions are required to address the unique position of digital technologies in exerting influence over users through

⁶⁶ It is important to tread with caution regarding terminology. Smartphone addiction can be a clinical diagnosis. In everyday usage of smartphones, boundaries between compulsion and addiction can be blurred. I have chosen to refrain from definitive descriptors of smartphone addiction in this dissertation, as this is far outside the scope of my expertise.

⁶⁷ According to the authors, manipulation’s harmfulness does not mean it is necessarily wrong.

persuasive and manipulative tactics. Botes (2022, p. 7) suggests a framework with five elements to decide whether a technology is persuasive or manipulative, or ethically acceptable or unethical. The five elements are: intention disclosure, option consideration, exploitation, resource vs. person, and control (ibid.). Determining the ethics of a technology’s design asks whether intentions have been disclosed and a user is aware of the algorithm’s influence on them, whether a user has the opportunity to evaluate their options to use a technology, whether the algorithm exploits a psychological, emotional, or behavioral vulnerability that may not be aligned with the values and beliefs of a user, whether the algorithm uses a person as a means toward a goal, and whether a user keeps control over their decision-making capabilities in using a technology (ibid.).

The interaction between dopamine and our individual and collective existence holds further research potential at the intersection of neuroscience and politics. Dopamine is associated with belief formation (Nour et al., 2018), learning (Seitz et al., 2021), and even paranoia (Barnby et al., 2020). In a study on tribalism in fans of sports teams, dopamine was found to contribute to the process of emotional learning and arousal which processes motivationally relevant information (Seitz et al., 2021, p. 9). In the study, viewing images of intense moments of a participant’s preferred sports team signals in dopaminergic reward regions (ibid.). The most significant takeaway of this study for political science considerations is this:

“The observation of an increased response bias in these areas preferentially to positive stimuli of the loved team suggests that this kind of non-romantic love represents a strong motivational state, with a bias for processing positive content” (ibid.).

If this mechanism extends to other types of fandom, as well, we may be able to observe this strong motivational state due to positive attachment in other social arenas, as well, including politics. Instagram’s visual nature through the affective power of images occupies a special place in this context in comparison with other text-based (Twitter) or more varied social media platform (Facebook). Images and the cultures surrounding their use in Instagram may contribute to the formation of fandom-like emotions in followers of an account, including that of politicians.

I would like to share two parting thoughts from this excursus in the field of behavioral psychology and neuroscience. Cognitive neuroscience offers new methods to understand the neural mechanisms of decision-making, yet the field of political science has been slow to explore neuroscientific research (Krastev et al., 2016, p. 1). Considering the role of dopamine for cognitive processes like motivation and decision-making against the backdrop of neurochemical manipulation through tech products and platforms, this opens new avenues in political science research. Firstly, we do not yet understand how neurocognitive processes

moderate behavior in the social and political plane. Secondly, considering that dopamine manipulation in tech products has been ongoing for years, affecting, altering dopaminergic signaling in our brains, this beckons the question on the long-term social-cognitive effect of the practices described in this section. Considering again dopamine's involvement in belief signaling, as well as tribal affects, a possible working hypothesis for research at the intersection of political science, neuroscience, and social media studies is that prolonged dopamine manipulation through social media has altered dopamine levels and signaling in the brain in a way that can account for increasing political division and fragmentation through a change in affective state in the individual. Toying with dopamine levels in a manner that aligns with the intention of technology companies, that seek to – over time – align users' goals with theirs through neurocognitive and behavioral techniques, can potentially have far-reaching societal consequences through the aggregate effect of dopamine signals on belief, tribal attachment, learning, and motivation. Simply put, if it benefits engagement levels of a tech company, users may be seeing and seeking out more content on social media (and other online platforms) that creates a dopamine release in their brains among political divisions, further fortifying beliefs.

Persuasive technology's evolution has opened a pandora's box of widespread cognitive behavioral modification program in technology products.

4.3.3. Surveillance Capitalism

Wide circulation, harvesting, and analysis of data is shaping the economic reality of the present. Technology companies like Facebook with its vast user base of billions of people hold and control analysis of all this data at a central, neuralgic point. The challenges and dangers of this were evident, when Instagram’s parent company was embroiled in the biggest privacy scandal in the history of social media in 2016, having allowed Cambridge Analytica to tap into its vast data for political advertisement on the platform (Sun, 2022, p. 104).

With the dawn of the digital era and its many technological possibilities for economic activity, a palpable shift in how capitalism operates has taken place. Several proposals for terminology intend to account for these changes at the intersection of technology, psychology, data, and neuroscience. George Franck (2005, p. 99) coined the term “*mental capitalism*” to describe how the scramble for attention in a digitalized society has become the overriding objective of commercial activity. *Limbic capitalism*, as discussed in the previous section, is “the purposive design, production and marketing of legal but health-demoting products that stimulate habitual consumption and pleasure for maximum profit” (Lyons et al., 2022, p. 1). This is evident in the design of digital applications like Instagram. *Neurocapitalism* centers on the premise that human behavior is governed by the laws of neuronal activity and the organizational structure of the brain with economic activity reorganizing itself around this premise (Hess & Jokeit, 2009)⁶⁸. Zuboff (2019a) suggests a variant of capitalist change she calls *surveillance capitalism* that focuses on the broad adoption of commercial surveillance activities at the center of the digital economy of the present.

As Zuboff (*ibid.*, p. 8) notes:

“Surveillance capitalism unilaterally claims human experience as free raw material for translation into behavioral data. Although some of these data are applied to product or service improvement, the rest are declared as a proprietary *behavioral surplus* [sic], fed into advanced manufacturing processes known as ‘machine intelligence’ [sic] and fabricated into *prediction products* [sic] that anticipate what you will do now, soon, and later. Finally, these prediction products are traded in a new kind of marketplace for behavioral predictions that I call *behavioral futures markets* [sic]. Surveillance capitalists have become very wealthy from these trading operations, for many companies are eager to lay bets on our future behavior.”

The underlying assumption of this is that human behavior, if measured correctly is predictable, that there is a sense of patterned regularity in this (Jungherr et al., 2020, p. 182). Based on the data collected, an organization can forecast conditions, outcomes, and behaviors (*ibid.*). This

⁶⁸ The argument I make in the previous section on the behavioral and neurological components that drive technology design align with the framework of neurocapitalist considerations.

not only connects to the surveillance practices outlined by Zuboff in the quote above, but it also introduces actuarial-quantitative reasoning into every sphere of social interactions and existence. Follower counts, likes, comments, and engagement rates on Instagram fall into this logic as well as Facebook’s and other companies’ rampant data collecting and processing. Following the truism that you cannot know what you cannot measure, the quantified individual is a byproduct of surveillance capitalism.

The impetus of data mining and widespread practices to collect data predate Zuboff’s concept by almost two decades. Peter Thiel, a Silicon Valley investor and technologist who had a decisive role in shaping the thought architecture of the technology industry, also played a significant role in the industry’s move towards surveillance capitalism. His second company, Palantir, “[...] popularized the concept of data mining after 9/11 and paved the way for what critics of the technology industry call surveillance capitalism” (Chafkin, 2021, pp. xii-xiii).

Shoshana Zuboff initially introduced the concept of surveillance capitalism in an article in 2015. She based her initial work on four uses of computer-mediated transactions laid out in two articles authored by Google’s Chief Economist Hal Varian (Zuboff, 2015, p. 75). These four uses are: data extraction and analysis, new contractual forms due to better monitoring, personalization and customization, and continuous experiments (ibid.). Mechanisms of data analysis create a new expression of power Zuboff (ibid.) called the Big Other that is [...] constituted by unexpected and often illegible mechanisms of extraction, commodification, and control that effectively exile persons from their own behavior while producing new markets of behavioral prediction and modification” (ibid.). Surveillance capitalism not also produces “[...] a new futures market, where surveillance capitalists sell certainty to businesses determined to know what we will do next” (Zuboff, 2019b).

Surveillance capitalists derive this certainty from extensive data extraction and analytics processes. In surveillance capitalism, data collection practices

“[...] render the entire world’s actions and conditions as behavioral flows. Each rendered bit is liberated from its life in the social, no longer inconveniently encumbered by moral reasoning, politics, social norms, rights, values, relationships, feelings, contexts, and situations. In the flatness of this flow, data are data, and behavior is behavior” (Zuboff, 2019a, p. 211).

Surveillance capitalism leads with a type of power that Zuboff calls instrumentarian power (Zuboff, 2019b). This form of power works through the architecture of digital instrumentation; instead of pressuring us into certain actions, it shapes our actions remotely through choice architectures, behavioral nudges, and using the data it has gathered from us (ibid.). This is the mechanism behind aligning a platform user’s goals with the goal of a platform. This type of

power undermines democracy, because of the informational asymmetries between individuals and the above-mentioned Big Other (ibid.). We know nothing about the systems that guide us, while they know everything about us, undermining our autonomy (ibid.).

Shoshana Zuboff deems the power dynamics in surveillance capitalism a coup from above, an overthrow of the people concealed through the Trojan horse of technology Zuboff (2019a, p. 513). Surveillance capitalism restructures human experiences by means of technology and uses data to nudge, shape, and manipulate the realities of human life. This form of power is held by a few, wherever data streams converge for analysis.

Surveillance capitalist practices can now be found in almost every sector: insurance, retail, health, education, and finance, among others (ibid.). Even innocuous household items like electric toothbrushes are now operating as commercial surveillance tools. Sloan and Warner (2021, p. 22) inspected the privacy policy for an Oral-B Electric Toothbrush⁶⁹ and found that it not only records a user's brushing style to coach on improved dental hygiene techniques, it also collects a vast array of information such as contact information, government-issued identifiers (such as driver license numbers), financial, biometric, demographic, and transactional and commercial information (such as purchase history, qualification data, and related records including returns, product service records, records of payments, and credits), among others. The toothbrush connects to a smartphone app that is linked to the servers of Oral-B, to where a user's data is transferred.

Another example for surveillance capitalism in action is the augmented reality game Pokémon Go. Developed by Google and released by a subsidiary in 2016, its game engineers herded players through cities to destinations that contribute profits for the company as business customers like McDonald's and Starbucks paid for visits to their locations on a “cost per visit” basis (Zuboff, 2019b). Players of the game were unaware of this mechanism.

Consequences of the data accumulation regimes in the present economy can reach all parts of human lives: insurance policy through data collected on driving behavior, smart home appliances that not only vacuum the floor by themselves but send data on maps of the home to its companies of origin, or employers gathering data to monitor team members' behavior and productivity (Debrabander, 2020). These examples of widespread data gathering on our activities in the home, cars, and at work illustrate more profound challenges of surveillance capitalism. Based on the data gathered through intense monitoring powers, companies may be able to overview users' behavior and nudge them in different directions (ibid., p. 61). As a

⁶⁹ the Oral-B Genius X Rechargeable Electric Toothbrush

consequence, we may look to make our behavior appear safer and more predictable to (ibid.) – for example – not be exposed to negative consequences of changing insurance policies in case of more adventurous driving or being exposed to the stress of pretending to be a perfect worker⁷⁰. This effect of surveillance capitalist models is an intrusion into an individual’s agency. On the other hand, maybe humanity will be able to find different ways to remain distinct in the face of the demands of insurance or other companies who can monitor individual behavior through the data they collect (ibid.).

Even without complex data capturing mechanisms, companies and public actors can develop considerable data vaults through scraping publicly available information. Clearview, an AI company, scraped Facebook profile photos and, taking advantage of Facebook’s real name policy, developed a real name database to sell to the police (Weigel, 2021). Due to a cultural shift to publicize details of one’s own life in the past two decades, there is a plethora of data freely available online to be used by clever engineers.

Opting out of surveillance capitalism is nearly impossible, as this practice is deeply interwoven with the structural underbelly of the internet. Protecting your data is an uphill struggle. While technological developments move onward at dizzying speeds, we are left with catching up as individuals and regulators. In a digital net that is interwoven with our everyday lives, it will be increasingly more difficult to do anything without revealing ourselves and open our lives to data surveillance (Debrabander, 2020, p. 58). And yet, surveillance capitalism is not a given. Taking the view that technology is a social construct, its path not determined, implies a possibility to change this course.

Albeit salient, surveillance capitalism’s proposal also has detractors. There is a burgeoning industry of tech criticism that contributes to the narrative of technological determinism by descriptions like the ones in this chapter. This raises challenges of its own by repeating the narratives of tech companies. Jungherr et al. (2020, p. 180) caution to weigh evidence carefully, especially to distinguish the evidence of data-driven techniques and evidence from the effects of these techniques in commercial or political environments. Additionally, Staab and Thiel (2022, p. 134 f.) point out that a more sober reading of Zuboff’s concept is a description of the “[...] operational logics of advertising-financed platforms – especially social media platforms – that exploit their specific mediality.”

Conversely, the merit of Zuboff’s considerations lies in providing a frame of reference for widespread data harvesting and analytics practices that now have crept into many areas of

⁷⁰ Let alone the loss of privacy and dignity associated with constant monitoring during the workday.

human lives. The toothbrush from the example above is particularly striking. Procter and Gamble, the producer of the toothbrush is primarily active in consumer goods manufacturing. Inherently, they are not an advertising platform like Facebook, Instagram, or Twitter, among others. Yet, widespread data collection for their products demonstrates a shift in business activities. Car companies collecting and selling user data is another example for the shift of tectonic plates in the operational logic of capitalism that is currently taking place (Gitlin, 2018).

From a political science perspective, developments in surveillance capitalism raise two challenges for the democratic state: one is how to answer these incursions into citizens' privacy and the other how to respond to the growing informational asymmetries between private companies' insights into populations and governments.

4.4. Instagram as a Medium: The Political Meaning of the Platform

At the outset, this dissertation asked about what is political beyond political material on Instagram. Taking into account the previous considerations on Instagram as a medium in the previous section, I arrive at the following conclusion: Instagram’s political nature expands beyond its subject matter of politicians’ or parties’ visual political communication strategies. The conditions that create, shape, and evolve Instagram have political bearing, as well.

The section on Instagram as a medium reveals key insights: 1) Instagram is inseparable from the socio-technological conditions of technology production in Silicon Valley and thought associated with it, 2) the platform business model applies to Instagram as an ad model and as such restructures communicative and sub-public spheres on Instagram, 3) persuasive technology design under the guise of the platform model and its related behavioral modification approaches are an incursion into an individual’s autonomy and reason, both prerequisites for democratic deliberation and communicative interactions in the public sphere, 4) algorithms constitute a black box that in the case of Instagram’s distribution algorithm can have an influence on communicative or deliberative processes and who sees politicians’ posts, 5) data collection regimes in surveillance capitalism enable a shift of power to the economic and implicitly away from the political sphere.

Inquiring into the tech industry of Silicon Valley, where Instagram was created and is currently shaped, allows for deeper insights into the intellectual bedrock of technology creation. In a deregulated digital economy, the tech industry is shaped by forces that deem almost any societal problem solvable through technological intervention. Furthermore, and this is a key consideration of the politics of Instagram, the tech industry so far has held power over the discourse on technological developments. Its stories are rife with technological determinism in line with the argument of “if we don’t build it, somebody else would”. Technology and its status quo are presented as inevitabilities of a deterministic evolution. Technology is a one-track train that is going places with little room for intervention. Technological determinism has two definitions: the above of technology’s inevitable development and another, more commonly used one, that describes technology’s inherent impact on the social (Kline, 2001, p. 15495). Discursive strategies of the tech world uphold both. Yet, the narrative of technological determinism and its impact on society and the social order is also upheld by the burgeoning industry of tech criticism. Most often, critics in academia and media follow the storytelling of tech companies, instead of creating their own. Discursively, this grants power to the narrative of Silicon Valley on two levels: that technology is presented as an inevitable process and, through the same line of questioning, that its effects on society are inevitable, as well.

It is challenging to truly separate technological innovation from its societal impact. The point of the argument above is that by continuously basing criticism on the narratives of the tech world, they are being fortified, instead of questioned successfully. This is especially important, because the tech companies’ storylines and marketing insist on visions of a better, more convenient, comfortable, safe world, that upon closer inspection reveal a different picture.

In the case of Instagram, the determinist argument was on view during a user and media upheaval in the summer of 2022, when Instagram began prioritizing videos heavily in users’ feeds to compete with TikTok. At the time and in the subsequent debate around it, Adam Mosseri, Head of Instagram⁷¹ repeatedly pointed to the inevitable rise of video content on the internet that was driving the company (Lopatto, 2022; Newton, 2022; Welch, 2023). Video was inevitable and Instagram had to accommodate it, reflecting the macro-level determinism narrative on the meso-level of the app. Users had to contend with this, irrespective of how they felt about seeing or producing video content in their feeds.

Despite narratives of bright futures, a closer inspection of the tech industry reveals a different, more nuanced picture. Behind the curtain of shiny, clear interface designs resides a widespread regime of data collection, behavioral modification through persuasive technologies, and the market-creating and -dominating logic of platform companies. Platform companies are proprietary markets designed to align the goals of the market participants with the goals of the market owners through control mechanisms over information, access, price, and performance (Staab, 2020, p. 173). These actors squash competition through data moats and their influence on adjacent industries. There are also platform hierarchies. For example: Google and Apple hold a duopoly over the infrastructure of mobile operation systems and thus hold tremendous amounts of power on all platforms that are built upon their systems. In the case of Instagram specifically, the platform’s logic is at odds with the free flow of information necessary for political processes. As mentioned, platforms operate to align the intentions of their users with their own, creating a pull that leads users to conform with their logic or leave them. When leaving, an individual encounters the true power of a platform like Instagram. Network effects on Instagram mean that the more people use Instagram, the more valuable the network is due to the number of potential interactions in it. When leaving Instagram, a user not only loses access to the app’s functions, but also the network. This creates pressure to use the app, even if one may not agree with its functional logic.

⁷¹ Technically, he is the CEO of Instagram. However, within the Meta companies Mark Zuckerberg holds this title exclusively. Hence, when Instagram was acquired, co-founder Kevin Systrom lost his CEO title. It was reinstated after a while, however when Instagram’s co-founders Systrom and Krieger left the company, their successor became Head of Instagram, not CEO. (Frier 2020, p. 101).

Furthermore, if the platform organizes the proprietary market of Instagram, this structures communicative processes according to corporate logic, subjugating what may be necessary for functioning democratic publics and interactions to corporate logics. This differs significantly from the commercial operations of traditional or even online media because Instagram can – through behavioral nudging and optimized targeting and content display – provide content distribution in granular ways with technologies that are currently out of reach for existing media companies. Thus, Instagram’s political nature is felt in its capability to structure communication processes and the public sphere along the logic of the proprietary market for communication it owns. Market-based communication is the antithesis to democratic principles and a challenge to the functioning of public spheres and political communication in the public. In informational markets like Instagram, participants are subject to engaging in tactics that are attention-garnering and pander to algorithms, the invisible neo-Smithian hands that structure markets in the digital age.

How do companies get users to align their actions with the goal of platform markets? Persuasive technology design and behavioral nudging and manipulation can be used to alter users’ behavior and align it more closely with the intentions of the market owner covertly, persistently, and gradually. Based on the intense data collection regimes and surveillance momentum in contemporary capitalism, these behavioral modifications can be supplied in a manner that is optimized for timing and emotional state, also instrumentalizing neurocognitive processes like the role of dopamine in our brain. An example – one of the few existing ones – for this is a study on modifications in the emotional value of the Facebook feed that led to a change in users’ emotional posting behavior, demonstrating the possibility of large-scale emotional contagion through social media (Kramer et al., 2014)⁷². These modification processes undermine a person’s reason and (mental) autonomy, when, ultimately, it is not clear anymore whether a person’s desires and habits are their own or the result of nurturing by platform companies. Yet, reason and autonomy are two foundational prerequisites for the democratic process, as well as for deliberation. This is especially important in the context of elections: how can a person know they genuinely prefer a candidate over another, when their perception of them or their party may have been influenced by the underlying forces of the platform and the quest to align individual behavior with a platform’s goals?

Data collection, evaluation, and behavioral modification processes (for example nudging users or showing them aptly timed content to maximize ad conversion rates) are commonly steered by algorithmic systems. These algorithms, owned, designed, and implemented by companies, are black box systems with little transparency. As we have seen, even for engineers the results

⁷² Notably, this experiment was conducted in-house at Facebook.

of algorithms can sometimes be challenging to trace and locate. Algorithms can be used in recruiting, finance, lending, content distribution and advertising on apps like Instagram, or the evaluation of employee performance, among other areas. They increasingly structure the social, economic, cultural – and as an extension of that – political reality. This can create numerous problems, for example in algorithmic discrimination, misallocations, or miscalculations. Political actors on Instagram and their recipients thus conform to the algorithm and its decisions on content delivery. The algorithm acts as an intermediary moderator of content and communicative processes that – referring to the platform – prioritizes the economic imperatives of its owner over civic needs, for example. The existence of an opaque, inaccessible, privately owned entity that, in the case of Instagram, can steer informational and communicative processes of two billion people creates national and transnational questions on a democratic sphere's⁷³ informational and communicative autonomy. Potentially wide-ranging opportunities for involvement in these processes are a constitutive problem in the relationship between algorithms and the democratic sphere. I have a conceptual sense of unease around the opaque authority of the algorithm on the one hand and its umbrella power over representative processes and the general principle of elected representation in democracy on the other hand. It is an uncomfortable consideration that a company's algorithm that is not part of representative and democratic processes, can steer so many aspects of what is necessary for communicative and informational exchanges in democracies.

Lastly, data collection regimes result – if following the argument of Shoshana Zuboff (2019a) – in a new type of capitalism that is characterized by widespread commercial surveillance practices through the transfer of large-scale datasets on individual and group behavior to private entities. Companies thus not only own large swaths of data but can analyze and sell them, eroding privacy in the process. Furthermore, they can get deep insights into population-level information that may rival that or be more detailed than that of states.

I shared a poignant example of an electrical smart toothbrush in one of the previous sections that exemplifies this. The toothbrush not only analyzes a user's brushing behavior, but it is also part of a privacy policy regime of its maker that collects virtually every conceivable data point available on a user's smartphone: contacts, transaction data, ID data, identifiers, among others and forwards them to the company's servers through the app that is necessary to use the smart toothbrush. Similar mechanisms can be observed across numerous industries, including for ad platforms like Instagram. I argue that privacy – and especially the privacy of one's own mind, which includes insights into behavioral patterns – is a key pillar for a functioning democracy. Privacy is power (Véliz, 2020). Deliberation, for example, requires a personal

⁷³ A county, state, or nation, for example.

thought process that allows an individual to explore and formulate ideas in the privacy of one's own mind before they utter them in deliberative exchanges. Furthermore, and potentially more important at present, data collection regimes shift the locus of power away from elected governments to private actors who know so, so much about an individual's life.

5. Instagram and Political Theories

Concerns about technology’s impact on the social fabric have been companions to human life since the invention of technology. Technology as it relates to the realm of democracy and the social fabric is challenging, because often the consequences of an invention only unravel and become visible over the long term. Nobody could have predicted that the printing press might have a hand in the restructuring of the political order of Europe by facilitating the spread of protestant thought, when it first originated. The car profoundly changed human mobility to go farther, faster, and more comfortably, and re-shaped the urban fabric with sprawling suburbs, for example. Computers and the internet have – as mentioned in the beginning chapter on democracy and the internet – created a profound revolution in how we communicate, share information, and work.

We are still in the middle of the process of taking stock of the effects of social media and smartphones. One of my interviewees, Roger McNamee, said that it felt like we were still catching up to the events of 2016, societally (McNamee, interview, 2022). This notion is sensible, because on the one hand the pandemic accelerated our dependency on technological tools and ingrained them into our everyday lives even further, on the other hand the events of the pandemic occupied our awareness for so long that the processing of other societal and political themes were deprioritized in public and individual awareness. As much as the documentary *The Social Network* as well as leaks of tech companies’ wrongdoings might have entered media and public conversations, the effects of social media (and web 2.0 platforms) on individuals, culture, and the social fabric are still unclear. Technology moves on and is evolving rapidly, while academia and critics are in a perpetual process of catching up. What applies to the relationship of technology and nature, “[...] the critical vulnerability of nature to man’s technological intervention – unsuspected before it began to show itself in damage already done” (Jonas, 1973, p. 38), can be observed in other arenas, as well. We only know that technology will create a change. What this change will look like is uncertain.

How can one anchor Instagram in political science theories, then? As seen in the previous sections, Instagram is a multi-layered and complex subject of inquiry. Its dual nature of a focus on images and its platform character, of content and economics require a two-pronged approach for anchoring the phenomenon within political theory. The pictorial and entertainment character can be accounted for as another manifestation, an update of the workings of the culture industry (Horkheimer & Adorno, 2006). As a digital platform, Instagram is embedded into a larger context of structural social transformations. Instagram is part of a wider shift in the digital communication landscape. We are witnessing another structural transformation in the

public sphere (Habermas, 2022b) that extends far beyond the question of what images on Instagram do. Yet, the public sphere approach also leaves gaps, especially in evaluating the effect of the platforms’ powers in structuring and directing communication in a democracy’s public sphere. I will explore both theories, the culture industry and the transformation of the public sphere, in relation with Instagram in the following chapter.

5.1. Instagram and the Culture Industry

The binary nature of Instagram, its content and the platform, lends itself to separate political theorization of these aspects. While theories of the public sphere address the changes Instagram may have as a platform, the culture industry in the sense of Horkheimer and Adorno (2006) offers a gateway to the inquiry on images on Instagram and the cultural practices surrounding them.

Adorno is a cultural skeptic. In his essay *Culture and Society* (Adorno, 1983), he compiles a scathing review of cultural criticism and its role in society. The cultural critic, for example, is somebody “[...] necessarily of the same essence as to which he fancies himself superior” (Adorno, 1983, p. 19). Furthermore, the cultural critic plays a role in the reproduction of the cultural status quo. While critics may like to place themselves above the subject of their critique, they affirm culture:

“The cultural critic can hardly avoid the imputation that he has the culture which culture lacks. His vanity aids that of culture: even in the accusing gesture, the critic clings to the notion of culture, isolated, unquestioned, dogmatic.” (ibid.)

Cultural criticism remains superficial in its inability to capture an “untrue consciousness” (ibid., p. 20). Critics occupy a privileged position, because the fate of those judged depends largely on their vote (ibid.). Yet, the critic is only another manifestation of the forms of competitive society, in which all being is for something else (ibid.). Critics are permitted to express their opinion as if it were objective, even though “[...] it is solely the objectivity of the ruling mind. They help to weave the veil” (ibid.).

Adorno’s writing on cultural criticism gives much room to considerations on the purpose of an academic treatise on Instagram as a part of the wider criticism on the technology industry. At present, no technology company appears to be affected or swayed by such criticism.

In this context, it is potentially important to make a distinction: Adorno’s writings reflect his time, the pre-internet age. While he opines on the press and art critics, technological criticism as it is, has emerged in recent years as part of the techlash sensibility. It requires a slight expansion of the term culture. Of course, during Adorno’s time there was criticism of technology and its role in our lives. However, I perceive a slight differentiation in the focus of the impetus of Adorno’s cultural criticism compared to the technology criticism in the present age, which takes greater aim at the technological foundations of our existence.

The Role of the Critic

Returning to Adorno, his considerations on the cultural critic are important reminders for a thesis that is adjacent to a field that critiques much and still upholds the narratives of the status quo. Daub (2021a) states that Silicon Valley has discursive power through repetitions of the stories of technology's wonders and technological determinism. From his perspective, technology's utopias are lies to secure power (ibid.). Criticism of technology in the present upholds these narratives by repeating them. I do recognize a sense of superiority that Adorno mentions in the numerous, at times cantankerous, receptions of technology in the present and its multidimensional effects on human lives. It is strange to think that technology criticism can be a means to build one's own social, cultural, and economic capital as a critic or academic while at the same time doing so within the framework of the existing narrative – at once critiquing as well as fortifying the status quo by adding to the existing narratives of technology's power.

In *Culture and Society*, Adorno (ibid., p. 21) makes another interesting point concerning the mind and marketability that reappears in the realities of Instagram and platform capitalism:

“Not only does the mind mould itself for the sake of its marketability, and thus reproduce the socially prevalent categories. Rather, it grows to resemble ever more closely the *status quo* [sic] even where it subjectively restrains from making a commodity of itself. The network of the whole is drawn ever tighter, modelled after the act of exchange. It leaves the individual consciousness less and less room for evasion, preforms it more thoroughly, cuts it off *a priori* [sic] as it were from the possibility of differencing itself as all the difference degenerates to a nuance in the monotony of supply.”

Here, Adorno captures the dialectics of intellectual freedom that criticism is founded upon in bourgeois societies (ibid.). It oscillates between the above pole of the mind molding itself into prevalent categories and the other pole of a semblance of freedom in this system, which makes reflecting upon one's own unfreedom significantly more difficult (ibid.)⁷⁴. Critics thus are not really free in their criticism due to this molding of the mind and the pressures to conform to market imperatives they may experience.

The same can be said of Instagram users, whose freedom to use the platform is only relative, as ultimately the logic of the platform is what determines their actions. In competing in the market for likes in the attention economy, platforms like Instagram subvert human needs of belonging and being seen and supersede them with the imperatives of like and follower counts, as well as engagement rates. To make one's living on Instagram (or other online platforms) is to subjugate oneself to the force of the market, turning oneself into a commodity, while at

⁷⁴ Adorno (ibid.) also notes that it was easier to reflect upon one's own freedom in the context of manifest unfreedom in what I understand to be pre-bourgeois societies.

the same time experiencing a semblance of freedom. The experience of an Instagram user is equally dialectic to the experience of the critic for Adorno: on the one hand, users' desires and actions are slowly, covertly, and gradually aligned with the goals of the platform – molding the mind – on the other hand users feel seemingly free to chart their own paths and empower themselves through telling their own visual stories on Instagram, while not being truly free to use the platform to their own liking.

Yet, Adorno sees a vital, if paradoxical role in cultural criticism:

“Criticism is an indispensable element of culture which is itself contradictory: in all its untruth still as true as culture untrue. Criticism is not unjust when it dissects – this can be its greatest virtue – but rather when it parries by not parrying.” (ibid., p.22)

Without criticism, culture cannot be. However, in criticism that does not fulfill its potential and role, culture finds its demise. Thus, what could a sensible approach to technology criticism look like? If it needs to dissect and Adorno has previously mentioned that criticism weaves the veil, then what exactly is cultural – and by extension tech criticism – to do?

“But by limiting its attention to the entanglement of culture in commerce, such criticism itself becomes superficial. It follows the pattern of reactionary social critics who pit ‘productive’ [sic] against ‘predatory’ [sic] capital. In fact, all culture shares the guilt of society. It ekes out its existence only by virtue of injustice already perpetrated in the sphere of production, much as does commerce.” (ibid., p. 26)

Adorno's position here is the swansong of all criticism lodged against the commercial nature of the internet, of considerations on the commercialization of human interaction on social media. Culture, whether manifested in a cat video on Instagram or a poem, bears responsibility for reflecting and perpetuating societal values and norms.

Adorno (ibid., p. 27) also dissects the distinction between high and popular culture as a reflection of power dynamics, of portraying one as inherently more valuable than another. Ultimately, this is a reflection, a projection of one's own uneasy conscience onto those one deems less (ibid.). Pure, unadulterated culture to Adorno has always aimed at discomfort to spokespeople of power (ibid.). Thus, the critics of purportedly shallow Instagram practices are misled in their moral sense of superiority – a projection of unease around the bigger dynamics of “[...] the subjugation of men to the prevailing form in which their lives are reproduced” (ibid.).

The critic might deem they understand the relationships and dynamics of the status quo of culture – or technology, for that matter – better than others. And yet, they project their dis-ease about these power dynamics onto those who are seemingly ignorant and engage in practices labeled vapid. This points more to a complex entanglement of the critic (or academic) in the conditions of their time than absolute or clear notions of a culture's decline. By deeming

something less than, a critic ultimately risks projecting their sense of superiority or superior knowledge of the status quo onto those who are just looking to get on with their lives, instagraming their lunches and posing in front of picturesquely pink walls. What kind of dissecting is there to do here? Does it even help to understand why things are the way they are, and which effect neatly laid out photographs of food may have in the grander societal scheme? Reflecting on the entanglements of the critic makes evident that for the critic (or academic) it is bordering on impossible to divorce oneself from the grander scheme of things and the bigger societal picture shaped by technology and culture. Rather dishearteningly, an analysis of Instagram may be a blip on the radar of conditions that would develop, anyway.

Technology is involved in the level of repression of a society that reproduces its life under the existing condition (ibid.). Technology, thus, is a vehicle to maintain the status quo, the structure and power dynamics of the existing order. This might be Adorno’s most helpful contribution to the analysis presented in this dissertation: everything is as it has always been, only with a different veneer of paint. This season in the grand story of society’s reproduction has a different technological flair than previous ones. Other than that, little has changed. However, this paints a rather bleak and uncomfortable picture. It is equally disconcerting that Adorno refers to the world as becoming an open-air prison (ibid., p. 18).

One solution to this might be to consider that “[...] criticism retains its mobility in regard to culture by recognizing the latter’s position within the whole” (ibid., p. 29). It is an awareness for the complex interplay of culture with other areas of life and the role of the critic in it that opens more room for understanding and the sensible role criticism can play.

The Culture Industry

Departing from the framework of cultural criticism, another work by Adorno, this time in collaboration with Max Horkheimer, can offer more insights into how to anchor Instagram and its contents into the politico-theoretical discourses. The *Culture Industry*⁷⁵, written in the 1940s, explores the regression of enlightenment through the ideology expressed in film and radio (Horkheimer & Adorno, 2006, p. 6). They find that enlightenment consists of calculations on the effect and technology of production and dissemination of culture, where ideology exhausts itself in its idolatry of existence and the power that controls technology (ibid.).

A closer reading of the *Culture Industry* yields further insights into the relationship of culture and society, as well as how to interpret cultural practices on Instagram. Horkheimer and

⁷⁵ *Kulturindustrie* in the German original.

Adorno deliver a scathing assessment of contemporary culture at their time. Mass culture appears as a cover of the emergent underpinnings of society:

“All mass culture under monopoly is identical, and the contours of its skeleton, the conceptual armature fabricated by monopoly, are beginning to stand out. Those in charge no longer take much trouble to conceal the structure, the power of which increases the more bluntly its existence is admitted. Films and radio no longer need to present themselves as art. The truth that they are nothing but business is used as an ideology to legitimize the crash they intentionally produce. They call themselves industries, and the published figures for their directors' incomes quell any doubts about the social necessity of their finished products.” (Horkheimer & Adorno, 2002, p. 95)

What stands out here is not only the reduction of mass culture to a matter of business, devoid of any cultural significance, but also the blatant matter-of-factness with which the structures behind mass culture use it to conceal monopoly only thinly – that is, economic power. Written in the 1940s, this assessment of mass culture has lost little of its – if depressing – appeal. Mass culture on social media, as the previous sections on the medium of Instagram and the conditions of creating and disseminating content on it have shown, operate in the same vein. Upon closer inspection, the colorful worlds of entertaining, moving, and attractive posts give way to deeper, structural dynamics that – once learnt – are difficult, almost impossible to unsee. Once the veil of the illusion has lifted, a different image of Instagram, social media, and the tech industry at present emerges. Adorno and Horkheimer’s statements on the nature of film and radio and that they no longer need to present themselves as art, finds its counterpart in the present-day concept of content. Content is a ubiquitous term in life online. A new branch of the economy, the creator economy, has emerged around it: an industry that is based on individuals creating an income from the content they are sharing online. This includes the profession formerly known as influencers. Content, then, is what they produce to engage and garner attention in online spaces with close and manifold competition. Content has subsumed writing, music, dancing, the creation of art or design online, for example. All of it is now content, created with the purpose to build an audience and turn this captive audience into consumers for whichever product or service one is producing. In that vein, content is, as Horkheimer and Adorno share above “nothing but business” (ibid. p. 95).

Technology plays a vital role in societies with culture industries and their formation:

“[...] the basis on which technology is gaining power over society is the power of those whose economic position in society is strongest. Technical rationality today is the rationality of domination. It is the compulsive character of a society alienated from itself. For the present the technology of the culture industry confines itself to standardization and mass production and sacrifices what once distinguished the logic of the work from that of society. These adverse effects, however, should not be attributed to the internal laws of technology itself but to its function within the economy today.” (ibid., p. 95)

Standardization is delivered through the algorithm, creating ever-repeating visual and behavioral trends like the selfie, plastic surgery demands for Instagram face (S. Smith, 2021;

Tolentino, 2019), or the same templates for posts in earthy beige or 90s space colors that dominate entire industries on Instagram in waves. In the above, Horkheimer and Adorno separate technology’s logic and its social determinism from the powers that wield it. In alignment with my descriptions of the economic imperatives of the platform and the economic interests and ideology of those who create and build technology companies, as well as demands of the stock market in publicly owned social media companies like Instagram, one can indeed view the cultural manifestations on Instagram and other platforms as a consequence of the function of technology within the economy today.

Yet, the culture industry’s position in the economic sphere is subaltern to the real locus of economic power, other sectors of industry:

“Compared to them [the most powerful sectors of industry] the culture monopolies are weak and dependent. [...] The dependence of the most powerful broadcasting company on the electrical industry, or of film on the banks, characterizes the whole sphere, the individual sectors of which are themselves economically intertwined.” (Horkheimer & Adorno, p. 96)

Similarly, we can find this dynamic reflected in the pressures of platforms with ad-based models. Despite all their data-collecting, persuasive technologies, and potential for manipulation, platforms, especially ad-driven platforms depend on the investment of advertisers in their services. Ultimately, they yield to the financial power in other industries, needing to create content policies that align with the interests of advertisers. A platform like Instagram works in whichever way serves its primary goal – selling ads as a business model.

Throughout the text, Horkheimer and Adorno expand on the vapid- and vacuousness of cultural production in the culture industry. For example: “Something is provided for everyone so that no one can escape; differences are hammered home and propagated” (ibid., p. 97) and “[...] mechanically differentiated products are ultimately all the same” (ibid., p. 98). Details in movies or soap operas become interchangeable. It does not matter whether a hero speaks directly to a pampered heiress in a romance movie or a hit song moves through a sequence of intervals that has proven to be catchy, they are all “[...] ready-made clichés, to be used here and there as desired and always completely defined by the purpose they serve within the schema” (ibid., p. 98). The clichéd output is indifferent, because their true significance lies in the upholding of the status quo, as “the whole world is passed through the filter of the culture industry” (ibid., p. 100).

How about Instagram? Technically, there is no mechanical but digital reproduction on Instagram. One can argue that the variety of post formats on Instagram such as selfies, outfit of the day shots, belabored confessionals in the name of performed (or real) authenticity as

well as the universal greeting of “hiiii guyyyyss” at the beginning of a video have become clichés of Instagram, as well. Where a user experiences them or interacts with them and which account performs them, ultimately, is a matter of personal preference, not of epistemic value. The forms of expression offered are all the same. The premise of the reproduction of sameness is also central to the culture industry, as described (*ibid.*, p. 106).

Tellingly, “the products of the culture industry are such that they can be alertly consumed even in a state of distraction” (*ibid.*, p. 100). This is not too different from absentmindedly scrolling through a feed on all occasions of everyday life, even when watching a movie. Further, the culture industry’s idea of naturalness “[...] asserts itself more imperiously the more the perfected technology reduces the tension between the culture product and everyday existence” (*ibid.*, p. 101). At present, the holy grail of internet self-branding is authenticity to fulfill the paradoxical expectation to perform the natural as part of one’s brand, even in a non-natural environment. Or one manages the magic trick and truly presents oneself online as how one really is. But can a user really achieve this on a platform that measures engagement, likes, comments, and followers? What is authenticity online, if not an idea of convoluted naturalness that increasingly reduces the tension between the culture product (Instagram content) and everyday existence (the remaining sections of life off-screen)? Can one truly be authentic, when one anticipates speaking to one’s 500,000 followers?

Adorno and Horkheimer are eerily prescient when they broach the subject of administrative logic as it is embedded in culture. “The general designation ‘culture’ [sic] already contains, virtually, the process of identifying, cataloging, and classifying which imports culture into the realm of administration” (*ibid.*, p. 104). On Instagram, too, cultural output – content – is classified according to reach, engagement, and comment and like numbers. Follower count and audience size are the true measures of cultural capital on social media. Social proof’s effect on one’s willingness to follow a previously unknown account augments this tendency. Those who already have large follower numbers are more likely to attract additional followers.

In several instances Horkheimer and Adorno refer to the fate of those who resist or do not want to be a part of the culture industry and cultural consumption as they describe it. For example: “Anyone who resists [the culture industry] can survive only by being incorporated. Once registered as diverging from the culture industry, they belong to it as the land reformer does to capitalism” (*ibid.*, p. 104). And: “one has only the choice of conforming or being consigned to the backwoods [...]” (*ibid.*, p. 118 f.). Resisting the culture industry borders on impossible and usually leads to incorporation, subsuming of the individual under mass culture’s umbrella. Horkheimer and Adorno also mention: “The more all-embracing the culture industry has

become, the more pitilessly it has forced the outsider into either bankruptcy or a syndicate” (ibid., p. 107). Existing outside of the culture industry comes at a significant cost. In the same vein, existing outside of Instagram’s reach is – at least among certain demographics – challenging. The social and cultural cost of foregoing Instagram and social media altogether is high; the platforms’ power and control mechanisms (for example through information control) fortify the market position of an app like Instagram. Once inside, it is challenging to imagine an existence outside of Instagram, especially when most of one’s peers or age cohort are on it.

On Instagram, work and leisure often blend, especially for those seeking to create a living through it. Scrolling, commenting, and liking for work and pleasure mix seamlessly, blurring the boundaries between one’s private and work life. Furthermore, there can be a feeling of exhaustion in dealing with the constant onslaught of content, information, and the constraints and expectations of the branded self in the digital age. This self-branding practice that commodifies a person into the expression of their online profile, is a type of work. It is not enough to exist, one must carefully consider one’s brand, lest they want to jeopardize future personal or work opportunities. This connects closely with Horkheimer and Adorno’s perception that entertainment is an extension of work in what was already late capitalism at the time:

“Entertainment is the prolongation of work under late capitalism. It is sought by those who want to escape the mechanized labor process so that they can cope with it again. At the same time, however, mechanization has such power over leisure and its happiness, determines so thoroughly the fabrication of entertainment commodities, that the off duty [sic] worker can experience nothing but after-images of the work process itself.” (ibid., 109)

This is exacerbated by the always-on creed of hustle culture perpetuated on social media by business and motivational gurus, as well as the blossoming wellness industry’s calls for continuous self-improvement – all packed into entertaining, chipper content. Here, entertainment and work blend, merge, lose their boundaries altogether, especially on a platform like Instagram that lends itself so much to aspirational marketing.

The culture industry also addresses sexual promises in cultural or entertainment production. It is a culture of eternal promises with no avenues for fulfilment. It suppresses, while dangling carrots in front of viewers and consumers:

“The culture industry endlessly cheats its consumers out of what it endlessly promises. [...] The culture industry does not sublimate: it suppresses. By constantly exhibiting the object of desire, [...] it merely goads the unsublimated anticipation of pleasure, which through the habit of denial has long since been mutilated as masochism. There is no erotic situation in which innuendo and incitement are not accompanied by the clear notification that things will never go so far.” (ibid., p. 111)

The same applies for Instagram influencers and sexualized advertisements. Sexy photos in advertisement certainly are not a novelty. What is interesting about Instagram is that it has moved the codified experience of mediated advertisement into the realm of the feed and everyone's experience. With a good camera and good lighting everyone willing can now sell whatever they want using the same sexy tropes as traditional advertising did and does – right out of their living room. Horkheimer and Adorno deem the culture industry “pornographic and prudish” (ibid.). In the age of Instagram, this is reflected in the platform's content guidelines that permit nude male, yet not female breasts (Demopoulos, 2023). It is fine, as per the platforms' guidelines, for women to sexualize themselves for advertising purposes, yet a sliver of a nipple provokes deletion of the image. The new culture industry is similarly pornographic and prudish in comparison with Horkheimer and Adorno's times.

The culture industry also squashes any potential for rebelliousness. “Culture has always contributed to the subduing of revolutionary as well as of barbaric instinct” (ibid., 123). Rebelliousness in Instagram's sense might be to demand different rules of engagement, privacy over one's data as well as insights into and control over the algorithm's effects on one's own life. Yet, in the thrall of the feed, the existing level of entertainment or content that elicits positive emotions or a state of dopaminergic signaling suffices to appease the users. Concerns for change are met with a shrug in the sense of “it is what it is, and I am getting fun out of dance videos”. In doing so, Instagram aligns with Horkheimer and Adorno's diagnosis: it subdues the revolutionary instinct. “The culture industry can only manipulate individuality so successfully because the fractured nature of society has always been reproduced within it” (ibid., p. 126). Instagram and its self-branding regime expressed through the profile (a commonly shared element of web 2.0), fracture the whole further and create a society of singularities (Reckwitz, 2020), highly individualized person-entities. Singularities, in turn, or any form of fractured society, faces greater challenges in coming together for political processes.

The Culture Industry and Instagram

Horkheimer and Adorno's *Culture Industry* is full of analyses and reference points that have lost none of their validity in the present. In a sense, their criticism of the role of culture and society is timeless for capitalist economies, because it aims at the structural changes of capitalist societies – in their case at the beginning of the 20th century (Behrens, 2004, p. 9). As these structural elements persist, the concept of the culture industry may provide frameworks of reference to understand the locus of contemporary culture in societal and economic systems.

As demonstrated above, we can encounter many of the themes the authors describe in present life, especially as culture on platforms like Instagram plays its part in maintaining the power structures of the present economic order. The culture industry's power is also evident in the meaning of entertainment itself: “[...] as society's apologia. To be entertained means to be in agreement” (Horkheimer & Adorno, 2002, p. 115). “Amusement always means putting things out of mind, forgetting suffering, even when it is on display. At its root is powerlessness” (*ibid.*, p. 116). Society offers entertainment as a consolation price and glossy veneer over the powerlessness of the individual in the status quo. When you are amused or entertained, you are distracted. Putting these two thoughts together offers this perspective: when an individual is entertained, they have given into the promise of momentary delight and distraction as an escape from that which appears unchangeable. Thus, they have agreed to the status quo – whether it be watching a movie in the 1940s or scrolling through Instagram. Things are the way they are, the sociopolitical landscape in the post-2008 economic order is very complex. However, as users are scrolling, they may be momentarily happy, aware they may not be able to change the status quo.

Horkheimer and Adorno conceptualized an endpoint for the culture industry. It expires, when the culture industry leads to advertisement and society reproduces itself with this advertisement (Behrens, 2004, p. 9). Its conceptual continuation may be found in the “Society of the Spectacle” by Guy Debord (1970). Debord's term denotes the process in the postwar economy that established consumer society as ubiquitous pop culture (Behrens, 2004, p. 9). Debord's critique has a similar thrust to Horkheimer and Adorno: “Everything that was directly lived has moved away into a representation” (*ibid.*, p. 2). The spectacle is the result and project of the mode of production that exists at a given time (*ibid.*, p. 3). It is the affirmation of appearance and affirms social life as mere appearance (*ibid.*, p. 4). Most interestingly for an investigation of Instagram, Debord (*ibid.*, p. 3) assigns images a central role in the spectacle: “The spectacle is not a collection of images but a social relation among people mediated by images.” Pop culture in its union with consumption relies on images and negotiates existence in the spectacle.

The leitmotif of the culture industry is the “[...] demonstration that what appears as particularity and individuality is not so, and that what might emerge as a point of resistance to the all-embracing unity of the system is immediately integrated and repressed” (Bernstein, 1991, p. 9). Protest or alternative imaginations, following Horkheimer and Adorno, are subsumed and hoovered up by the culture industry. Behrens (2004, p. 7) perceives a sheen of a plural field of strategies for self-determination and empowerment, turning individuals into empowered subjects in a democratic leisure society who are imbued with reason. The appearance of

reason, the grand category of enlightenment here, suggests that one can attain it through empowering oneself (ibid.). Against the backdrop of the bleak writings of Horkheimer and Adorno, this is a wonderful prospect. However – and Behrens asserts this, as well – the mechanics of contemporary culture still are very similar to what Horkheimer and Adorno describe. The illusion of choice in a media and social media society does not detract from the validity of the arguments in the *Culture Industry*: choice is only relative, and it supports the upholding of power structures more than anything else.

“The effectiveness of the culture industry depends not on its parading an ideology, on disguising the true nature of things, but in removing the thought that there is any alternative to the status quo” (Bernstein, 1991, p. 10 f.). The dynamics in the culture industry appear cemented, especially as they can be observed over time. As Adorno writes in a follow-up essay to the *Culture Industry*, *Culture Industry Reconsidered*: “The entire practice of the culture industry transfers the profit motive naked onto cultural forms” (Adorno, 1991, p. 99) . This is equally the case in the age of social media and content creation. Content creation on Instagram – an advertisement platform posing as a forum for communication and self-expression – is all but the same: thinly concealed advertising practices to help the turning of a profit.

In another essay, the *Schema of Mass Culture*, Adorno continues the thoughts presented in the *Culture Industry*. “At the end of the essay Adorno shows how the forms of behaviour the culture industry offers to people have the perverse character of making them practice on themselves the ‘magic’ [sic] that is already worked upon them” (Bernstein, p. 12). Individuals are more than happy to comply, as the sections on persuasive technology and the potential for subtle, covert behavior modification through platforms have shown. More so, even without subtle nudges, users were happy to jump onto Instagram and sharing their lives with the world, when it launched – one self-branding exercise at a time.

For many years, there was no time or space for reflection on the role of technology and social media in society, despite early warnings from technologists (Lanier, 2010). The enthusiasm for web 2.0 products was too great. This changed in 2016 and subsequently with cultural moments like the documentary *The Social Dilemma*. However, while legislators are moving slowly in the direction of regulating internet behemoths like Google and Facebook which will affect Instagram, as well, users are still happy to participate in the spectacle that is online advertising posing as communication. This may be in part because of the tactics employed to hook users to apps (Eyal, 2014), in part it is because of our willing participation. In the case of Instagram two billion people worldwide are participating in the platform. Despite all warnings about the

detrimental effects of social media on mental health and society – aside from complaints about the algorithm and how much of a time-sink it can be – users are still scrolling away merrily.

Bernstein highlights the anti-enlightenment element in the culture industry that may explain this:

“Instrumental rationality in the form of the culture industry thus turns against reason and the reasoning subject. The silencing of reflection is the substantial irrationality of enlightened reason. The culture industry is the societal realization of the defeat of reflection” (Bernstein, 1991, p. 11).

Horkheimer and Adorno deliver scathing and thoroughly pessimistic reflections on the state of culture and the dynamics that underpin it. There have been manifold criticisms of their cultural elitism for example on their disregard for jazz. Theirs is a critique of the status quo that deems mainstays of culture as mere instruments for the purpose of maintaining the economic status quo and the power dynamics behind it. In that sense, nothing has changed since their initial writings. This dissertation can certainly be read as a continuation of more of the same – a digital culture industry so to speak, while the momentum remains the same.

It is important to note here that Adorno’s criticism of culture is informed by the experiences of the Nazi era and the Holocaust. In 1949 he wrote that “to write poems after Auschwitz is barbaric” (*ibid.*, p. 34). Even though he later qualified and regretted the statement, Auschwitz appears as a caesura, because in articulating an “after Auschwitz” this also implies a “before Auschwitz” (Saltzman, 1999, p. 67). Saltzman suggests that in “after Auschwitz” “[...] the biblical prohibition on images – what could be termed a position of iconoclasm – experienced a theoretical renaissance” (*ibid.*, p. 68). It is important to note here that Saltzman refers to the second commandment in relation to Adorno’s Jewish identity and how this may have informed his stance on culture. The second commandment as an a-priori condition and Auschwitz as a result of history intertwine to leave an aesthetic ethics of visual absence and poetic silence (*ibid.*). As a result, Adorno considers that visual abstraction satisfies these demands. Most images on Instagram certainly do not.

The culture industry addresses the contents and culture of Instagram, as well as its reception in society. However, it has little bearing on the communicative processes in a democracy that Instagram is a part of in many countries. It posits that culture is instrumental in subsuming and suppressing the individual under the guise of entertainment. And yet, we learn little about culture’s role in the democratic process. That is not the purpose of Horkheimer and Adorno’s essay. However, it opens up the question on what happens with individuals thoroughly emerged in the process of the culture industry when it comes to political participation. Do politics become entertainment here? Do they forgo their rights and interests to participate,

because – as mentioned before – the culture industry squashes this impetus with the velvet-clad hand of the great seducer of entertainment?

The culture industry offers a helpful explanation on the status of online culture and why exactly people keep posting photos of food or their children, homes, exercise routines, bodies, and the like. All these practices can be considered manifestations of the culture industry of the present. As such, it exhibits the same draw and subtle pressures Horkheimer and Adorno observed: to forgo participation means to cast oneself into backwoods, at best in the role of an eccentric. At the same time, the promises of personal branding and audience-building strategies and their economic potential have wound their way deep into the culture of the internet over the years. By now, users may have acquired them by osmosis.

However, despite all this – admittedly cathartic – deep cultural criticism of Instagram, the culture industry leaves unexplained how the mechanics in culture affect the political sphere. To do so, I will turn to another theorist: Jürgen Habermas. While the culture industry addresses the contents and culture of Instagram, Habermas’ work on the public sphere can provide a deeper understanding of why Instagram poses a challenge to the political process.

5.2. Instagram and the Public Sphere

Social media platforms, among them Instagram, have created a new paradigm in communication. The invention of digital technology and systems for exchange of information and interaction online created at least as profound of a revolution as the invention of the printing press. Initially, the advent of the commercial internet in the 1990s and social media in the 2000s was welcomed with great enthusiasm. There was much to be excited about: these technologies connected people across the globe creating a digital agora, enabling communication across borders and social groups in ways that were previously unimaginable. With the @- and direct messaging functions on social media, for example, one could connect with anyone who had a profile on these platforms. During the Arab Spring, social media was heralded as a motor of political exchange and mobilization. Finally, there was a place that gave everyone a voice to participate in democratic discourse. At the time, social media bore the promise of acting as a digital market of ideas, of facilitating an enhanced space that allowed for broader participation in discursive processes.

Instagram and other social media platforms, as well as changes in the digital media landscape have profoundly altered how information, news, and debate function in democratic societies. They have disrupted the public sphere, the figurative place where individuals in democracies come together to exchange ideas and deliberate.

“The public sphere is, in Habermas’s theory, the societal domain in which communicative interactions have a chance to make Reason [sic] come to bear on human societies and lead them on the path to social and political emancipation” (De Angelis, 2021, p. 437).

An exploration of Instagram and social media platforms, thus, is well-suited for the context of Habermas’ theory of the public sphere.

Habermas’ work on the public sphere “assigned the sociological concept of the public sphere a place in the functionally differentiated structure of modern societies between civil society and the political system” (Habermas, 2022b, p. 146). The public sphere ensures the sustainability of the democratic community (*ibid.*). An “[...] increasingly popular liberal understanding of the public sphere [defines] it very broadly as the general, even non-political sphere of visible social life” (Staab & Thiel, 2022, p. 131).

The Structural Transformation of the Public Sphere

Habermas (1991) traces the development of the public sphere back to the development of the bourgeois society in post-feudal Europe, where – due to economic activity and the empowerment of a new social class constituted of entrepreneurs, merchants, financiers, and

the like – concepts of public and private life fundamentally changed. The public sphere resulted from an emergence of this new social class, the bourgeois. It created forms of media like newspapers. There was a gradual change and retreat of absolutist powers, giving way to a space in society where individuals could begin to voice and exchange opinions:

“In its clash with the arcane and bureaucratic practices of the absolutist state, the emergent bourgeoisie gradually replaced a public sphere in which the ruler's power was merely represented before [sic] the people with a sphere in which state authority was publicly monitored through informed and critical discourse by [sic] the people” (McCarthy, 1991, p. xi).

The liberal public Habermas (1991) described reflected the historical structures of the late 18th to 19th century when it emerged (McCarthy, 1991, p. xii). Nevertheless, the idea it claimed of “[...] rationalizing public authority under the institutionalized influence of informed discussion and reasoned agreement [...] remains central to democratic theory” (ibid.). Notably, the public sphere is different from the private sphere, “[...] which by law, tact, and convention is shielded from intrusion [...]” (ibid., p. xviii).

In his work, Habermas (1991) then traces the structural transformation of the public sphere from its original conditions in the 19th century to its mediatized form in a capitalist welfare state. With the intertwining of state and society in the late 19th and 20th century, the liberal public sphere in its initial form ceased to exist (McCarthy, 1991, p. xii). It was replaced by the public sphere in a social-welfare-state, where conflicting interests compete with one another and where “organizations representing diverse constituencies negotiate and compromise among themselves and with government officials, while excluding the public from their proceedings” (ibid.). Public opinion is taken into account not in the form of deliberation, as described in the bourgeois public sphere, but as PR and public polling, among others (ibid.). Public opinion becomes “[...] a substitute for what should have given rise to it: public deliberation” (Mendieta, 2019, p. 359). Media and the press serve as technologies to manage consensus and promote consumer culture rather than as a locus and organ of rational, public debate (McCarthy, 1991, p. xii).

“Habermas criticised [sic] the development of the public sphere in the Western democracies of the 1950s, which, in his view, (re)institutionalised [sic] a feudal structure of one-sided representation through the focus on consumption and entertainment” (Staab & Thiel, 2022, p. 132). Here, Habermas shares a sense of cultural pessimism with Horkheimer and Adorno (2006) and their work, the *Culture Industry*, I discussed in the previous section. In this transformed public sphere, the private manifests itself through consumerism and turns interiority into personality (Mendieta, 2019, p. 359). The inner of the individual ceases, “[...] is no longer expressed in the public use of reason, but in conspicuous consumption and the

development of countercultures of malcontent” (*ibid.*). The realities of consumption find a parallel in an expanded public sphere that is fragmented into special interest groups that use the public sphere and public opinion to promote private interests and convert them into a general common interest (*ibid.*). This new public sphere is characterized by a clamoring for attention.

What remains of the public sphere for democracy theory is its conceptual nature. The public sphere is a space that mediates between the state and civil society (Seeliger & Sevignani, 2022, p. 1). It is the space that

“[...] bears the central burden for the functioning of democracy – a lively public sphere is supposed to, first, make and control decisions (politics); second, identify problems and find solutions for them (epistemology); and third, include and form opinions (culture)” (*ibid.*, p. 8).

The public sphere is where plebiscitarian participation happens in the political process outside of the election cycle. Democratic participation entails more than just casting a vote: in the public sphere, citizens can come together to deliberate issues and formulate the will of the people. Debate alone is not enough in the public sphere, it requires listeners meet with the purpose of establishing a communicative exchange that makes a difference and triggers transformative processes (*ibid.*, p. 9). The public sphere is “[...] the medium of the production of a collective self-understanding” (Mendieta, 2019, p. 357).

The demands of the public sphere – rational actors coming together with an epistemic interest – are often critiqued as too idealistic. The same goes for the initial constellation of the bourgeois public sphere that Habermas (1991) refers to, as it only included men of a certain social standing. Furthermore, the theory of the public sphere places great emphasis on the rationality of the actors coming together. One the one hand, reason is an important driver for changing the feudal, monarchical societies that deferred to authority into liberal social orders where political power itself is transformed through self-legislation (Mendieta, 2019, p. 357). That is: deliberative processes in the public sphere change the nature of governing from accepting the decree of a monarch to a process of self-government through the exchange of positions and perspectives on the base of reason. “This rationalization of politics achieves its institutionalization in the rise of the constitutional state, in which public opinion and juridification are married” (*ibid.*, p. 358). On the other hand, reason often constitutes an ideal speaking situation, while real-life experience on debates and human interaction challenges the assumption of the rationality of actors.

A New Structural Change of the Public Sphere in the Internet Age

Since Habermas (1991) wrote *The Structural Transformation of the Public Sphere*, great changes have been afoot in the media and communicative landscape. Three institutional developments are shaping the present and affect the functioning of the public sphere: digitalization, commodification, and globalization (Seeliger & Sevignani, 2022, p. 10). In 2022, Habermas⁷⁶ updated his initial work on the structural transformation of the public sphere (Habermas, 1991) to account for the changes to the public sphere through social and new media. He describes the following changes: digital communication has dissolved boundaries but also fragmented the public sphere (Habermas, 2022b, p. 146). On digital platforms, readers, listeners, and viewers can spontaneously assume the role of authors (ibid.), leading to a blurring of the traditional media boundaries between journalist and reader, sender and receiver as well as author and recipient. In traditional media, TV and radio have been able to hold their ground, while printed newspaper and magazine consumption has decreased significantly (ibid.), eroding the previous foundations of the public sphere. The commercial side of digital communication, as discussed in the previous section on platforms, has two effects: it threatens to undermine the economic viability of traditional newspapers and journalists and “[...] a mode of semi-public, fragmented and self-enclosed communication seems to be spreading among exclusive users of social media that is distorting their *perception of the political public sphere* [sic] as such” (ibid.). This threatens an important subjective prerequisite for the formation of public opinion and will through deliberation (ibid.). Shared public spheres are eroding.

Habermas' concept now has to contend with the global or transnational aspect of the public sphere, changes in mass media, and the post-secular consciousness of a world society (Mendieta, 2019, p. 356). Social media in the context of these current changes represents a new, fourth phase in the structural transformation of the public sphere (Staab & Thiel, 2022, p. 139). The present changes are more than just a change in media, they spark something beyond a continued retreat into the private sphere and consumption (ibid.). Referring to Reckwitz' (2020) concept of singularities, commercial and political expression encourage the declaration of the subjects' uniqueness (Staab & Thiel, 2022, p. 140):

“Subjects' political distinction thus becomes a matter of public concern. As a by-product the digital public sphere of social media is thereby to a certain extent politicised [sic]. In the digital constellation, the monarchical representation of late industrial mass society is replaced by a politicisation [sic] under the primacy of the commercial: privatisation [sic] without privatism” (ibid.).

⁷⁶ Habermas' reflections on changes in the public sphere were published in German in a small booklet titled “Ein neuer Strukturwandel der Öffentlichkeit” (Habermas 2022a). A translated version appeared in the journal “Theory, Culture & Society” (Habermas 2022b). Throughout the text, I primarily use the translated version for direct quotation. Habermas (2022a) and (2022b) both refer to the same source material. Habermas (2022a) further includes an interview with the author.

As audiences are shaped by singularization, they are susceptible to a constant stimulation of interests, which in turn encourages them to continue to be active on social media (ibid., p. 139). Social media, including Instagram, thus cause a disruption of the concept of the public sphere. In the age of self-branding and internet profiles as extensions of personhood, political activity is less of a function of collective will-finding, but an activity to underscore one's own uniqueness. In the attention economy, democracy becomes a struggle for attention and influence (as well as data sovereignty) (ibid., p. 140). The identification of preferences⁷⁷ takes the place of political contestation (ibid.). On the fundamant of the platform economy, discourse and political exchanges thus become functions of a digital market environment that is mediated by the commercial interests of the platform owner and the algorithm they control. The public sphere – or what is left of it – is thus operating in a place of structural power mechanisms that “[...] seek to monopolise [sic] access to social life: representation without the public sphere” (ibid.).

Further, the theory of communicative exchanges for deliberation in the public sphere is predicated on reason – people coming together to debate on the course of society or the better of any given political option. Habermas (2022a, p. 72 f.) has stated that deliberative processes do not need to resemble an academic seminar. They can be messy and argumentative, as long as the political process of deliberation has an epistemic dimension (ibid., p. 73). Digital technology may affect both aspects that are necessary for successful deliberation: an epistemic interest and reason. The culture of online communication is different from previous forms of communication. Habermas (2022b, p. 166) describes the nature of the digital public sphere as semi-private, like an inflated world of private, epistolary correspondence. Social media users have become accustomed to sharing their *privatissima* with the world – be it their homes, bodies, families, or innermost feelings. Algorithmic content distribution and displays raise the question of how rational individuals can be in processes of opinion formation and expression when what they see as part of the opinion-formation process is determined by a technological entity. Algorithmic content curation differs from news editing in the old media world in two ways: it is highly personalized and perfectly timed. An algorithm decides not only what a user might like best but also when to show it to them for maximum engagement, splintering not only publics but also attention spans. Furthermore, online technologies shape and amplify individual and collective emotional states (Steinert & Dennis, 2022, p. 3), which beckons the question to what extent individuals can actually be rational, when interacting online. The public sphere has undergone profound changes with digital technologies. Habermas (2022b) addresses them and posits that digital communication and online media may constitute a new structural transformation of the public sphere.

⁷⁷ Through liking and following on social platforms, for example.

Habermas (2022b, p. 168) ends his update on the public sphere theory underscoring the constitutional importance of a functioning media system:

“[...] maintaining a media structure that ensures the inclusive character of the public sphere and the deliberative character of the formation of public opinion and political will is not a matter of political preference but a constitutional imperative.”

In a media and communications world that is drifting into silos and echo chambers, a shared sense of reality through mass media can aid the creation of a modern-day polis. Yet, Habermas' conceptual demand may also be rooted in a sense of idealism for what media can and ought to do for a democratic sphere that is increasingly taking the shape of occasionally interconnected sub-publics in the present. Digital platforms with their algorithmic distribution of content are accelerating this process and providing the infrastructure for sub-publics or more granular public spheres. In the case of journalists, the interconnected nature of smaller public spheres can create challenges. Considering that 69% of journalists in the US use Twitter, but only 13% of the rest of the population use Twitter for news⁷⁸ (Jurkowitz & Gottfried, 2022), journalists and the greater public may not be well-connected in the public sphere on Twitter. Furthermore, journalists on social media are subject to the same pressures and cultural changes in self-promotion, self-branding, and celebrification as all other internet users. This creates a complex interplay of roles for journalists between service, celebrity, promotion, and the joker (Mellado, 2022, p. 1). This dynamic creates a feedback loop for media production, too. Coverage can affect a journalist's brand as well as social and cultural capital on social media, creating incentives to incorporate personal branding considerations into reporting⁷⁹.

Democratic support of a healthy media landscape like Habermas (2022b) suggests is indeed important as a connective tissue for formulating and sharing opinions in a healthy public sphere. However, this leaves a conceptual gap that does not reflect the evolving conditions of journalistic production and the roles of journalists. Social media's logic of production and consumption of content, as well as algorithmic distribution have already influenced and changed the lives of the people who make the news. They, too, are members of smaller public spheres that make up the aggregate, conceptual public sphere Habermas (1991) refers to. As such, they are inextricably connected to the communicative conditions of the present. In other words, Habermas' (2022b) call for a support of a healthy media landscape needs to extend beyond considerations of financing institutions for journalistic news production. They need to

⁷⁸ A non-peer reviewed study by Kamps (2015) finds that journalists make up 25% of all verified accounts on the platform. This percentage is not up to date anymore in light of Twitter's paid verification system. Kamps (*ibid.*) arrived at his conclusion based on all verified profiles with blue checkmarks, assuming that professional journalists overwhelmingly had verified accounts. With paid verification and changing roles of journalists, for example through the journalistic environment on Substack, it is less clear now, whether this proportion is still adequate.

⁷⁹ To be clear, this is not to state that journalists report according to self-branding considerations, but that self-branding on social media can have – if only subtle – effects on reporting and editorial decisions.

include the people making the news and their position in the complex web of digital communication and media, as well. This necessitates a constant reevaluation and consideration of individual and collective journalistic production in the context of cultural practices in the digital landscape and the role of algorithmic distribution on platforms.

In a digital environment that is dominated by platform companies, public spheres are underwritten and designed to be proprietary markets. Understanding this dynamic is paramount to understanding why social media, as a manifestation of platform capitalism, has created forces that shake up the foundations of democracy. A distinction needs to be made between the technological principle and the business model of social media. A technology that enables information to flow more freely can be beneficial for the concept of the public sphere – if it supports communicative processes that aid deliberation. For a functioning public sphere in the age of social media, their underlying business model needs to aid this, as well. Social media as a concept and technology holds much potential for revitalizing and extending public discourse – if applied and realized in a manner that aligns with democratic values and principles.

Social media as a platform is the antithesis to the above. It locks communicative processes into a market-based structure, where all communicative actions are underwritten by the logic of the market. Market design is an essential consideration in this context. In the definition of Ockenfels (2013) market design means that an owner of a market sets up the conditions of interactions in it in a manner so that the intentions and goals of market participants align with the intentions and goals of its owner. In that sense, there are no free interactions in that market. Awash with data, platform companies have the tools and wherewithal to create the exact conditions and markets they need to meet their business goals, providing behavioral nudges to market participants based on insights from the data they gather. In addition, these companies intentionally create the flood of data they own and take advantage of by harvesting information from every user interaction on the platform. This creates a circular system of informational exploitation that has no semblance with the communicative processes that deliberative democracy or public spheres need to be successful: platform companies shape markets according to their goals, harvest data from users, use algorithmic micro-targeting that determines who sees which contents when, and apply cognitive manipulation methods to increase a market participant’s dependency on a platform⁸⁰. This system creates behavioral compulsions⁸¹ so participants come back time and again to the platforms. When users log onto

⁸⁰ Roger McNamee calls this Manipulation as a Service as a pun on a term for a popular business model in software startups, Software as a Service (McNamee, interview, 2022).

⁸¹ Often, instead of compulsion, the word addiction is used to describe the individual effects of platform behavioral models. I find this less suitable because addiction is a clinical diagnosis. While we may see

platforms like Instagram to engage in communicative exchanges, learn about politics, and debate in the comments sections or private messages⁸², their movements are tracked and whatever they are exposed to is tailored to their preferences. This ensures maximum profitability for a platform like Instagram through an ad-based revenue model. Those engaging to share perspectives through posting are tracked, as well, and must surrender to the decisions of algorithms who deliver their messages to their followers.

It is almost impossible to capture the significance of this relationship for the public sphere and deliberation. Social media is a space for neither of the latter two, because on platforms all communication processes – those related to politics, as well – are subject to the market interests and rules platform companies set. Despite clever marketing messages that purport the opposite, nothing users experience on Instagram is in service to the free flow of information. The platform logic obfuscates and creates realities (even in minor ways like which influencer's post a user sees in their feed first) that are disjointed from the communicative needs of democracy. Images on Instagram are tools to further cement this tendency. Blue check marks next to profiles solidify hierarchies in communication⁸³, as do follower numbers. In the platform and attention economy, building an audience, community, or following is an asset in social and cultural capital that can be transformed into economic capital in the reading of Bourdieu (1986, p. 243). Economic motifs lie at the very heart of the platform culture of the present, while promises of ease, entertaining content, and self-actualization through entrepreneurial and communicative activities obscure the interests of platforms.

As a consequence of the above, considering platforms as communicative spaces or public spheres obscures their economic foundations. Despite the benefits they may provide to users, they are markets posing as communicative interfaces. They may offer a space for communication and debate, but the economic imperative behind these offerings trumps the communicative function. The logic of social media platforms differs from the previous logic of communicative processes in media. Privately-owned media companies have always catered to economic motifs, as well. However, they have so far never had the power to control each aspect and touchpoint of interaction between a sender and recipient or a writer and a reader. I cannot stress enough how significant of a difference this is. As an example: When I worked

addiction-like or addiction symptoms, determining whether these platforms have addictive traits is outside of the scope of this dissertation.

⁸² Assuming they do so in a civil manner – trolling and hate-speech are another challenge of the public sphere online.

⁸³The blue check mark used to be reserved for people in the public eye like musicians, artists, journalists, politicians, and notable influencers to prevent impersonation. It was also a sign of clout as well as social and cultural capital. In late 2022 and early 2023, several social media companies began offering paid verification subscriptions that turned the coveted blue check mark into a paid feature (Espada, 2023).

as a duty editor⁸⁴, I had editorial control over a news site during my shifts at the news desk. Typical tasks of this position included monitoring breaking news, coordinating with other departments on articles they were writing for publication on the site, ensuring that website traffic met the editorial and business targets, and positioning articles on the site according to how readers were responding and what we knew or assumed people would like to read. A news organization like the one I worked at has some control or influence over which news readers get exposed to and what they may perceive as important based on what gets published where, how, and updated how often. This is a fundamentally different relationship to the consumption of content on a platform. In addition, in the 24-hour news cycle, the process of sharing information has significantly sped up, creating challenges in verifying reports, as well as filtering the essential from the meaningless, and contextualizing the news.

Habermas (2022b, p. 163) describes the above-mentioned curatorial function as one of the key aspects of media in the public sphere:

“[...] the media are the intermediary which, in the diversity of perspectives of social situations and cultural forms of life, whittle out an intersubjectively shared core from among the competing interpretations of the world and validate it as generally *rationally accepted* [sic]”.

In an accelerating media landscape with growing complexity due to multi-variate, intense, and synchronous informational input, it is increasingly challenging to deliver on the curatorial function of media.

In contrast to the above, the platform version of a news site⁸⁵ would track individual user data⁸⁶ to optimize personalized content delivery and ad targeting. In a news site like this, every user would see a different main headline when they access a site. In this personalized version of a news site, every article, headline, and tidbit of information is arranged and displayed to harness the maximum of a readers’ attention through algorithmic content distribution. All this happens while the organization behind the site has full control over the flow of information and programming of who gets to see what and when through the algorithm they own⁸⁷.

⁸⁴ The German translation for this role is “Chef vom Dienst”.

⁸⁵ In analog terms, it would be like buying a personalized physical copy of the New York Times.

⁸⁶ The semantic difference between reader in traditional media and user in the online world and on platforms speaks volumes on the perception of the role of the audience and conditions for engagement with digital technology. “Edward Tufte of Yale, one of the fathers of information design and data visualization, noted that ‘there are only two industries that call their customers ‘users’ [sic]: illegal drugs and software’” (Szalontay, 2021).

⁸⁷ Shortly before submission of this dissertation an app that follows this principle was launched to the public. Artifact, created by the former Instagram co-founders Kevin Systrom and Mike Krieger, promises to deliver a “personalized news feed driven by artificial intelligence” (Artifact, 2023) at the intersection of Twitter and a news site. The app is also slated to include a discussion function, so users of the app can debate the content of a news article with their friends. Artifact is a departure from existing recommendation modes where “at first, social networks showed you stuff your friends thought was

In his 2022 update to his public sphere theory, Habermas (2022b, p. 165) writes that new and social media create great challenges in maintaining a shared frame of reference and an intersubjective reality in a public sphere. To wit, participants in the public sphere so far got exposed to about the same information⁸⁸ that is necessary for the process of political deliberation and decision-making. With new and social media, the public sphere splinters into disparate sub-publics that have little or no relationship with each other, which creates fragmentation and challenges for the political process and the stability of democracies. Habermas also refers to the role of platform companies in the digital economy, yet then abandons the thought and prioritizes aspects like the pressure of conformity new media companies exert on old media companies, for example with how old media firms create articles and news content to conform with expectations in ad-based revenue models (*ibid.*, p. 163). Doing so underestimates the paradigm shift that has occurred with the adoption of platform logics and the digital neo-feudal system (Lovink, 2022, p. 4) that emerges with them. Communication on social media is not communication. It is a market-based transaction within a market that is designed for profit optimization for the owner of the market who can exert subtle, long-term, and covert influence on an individual’s perception and worldview. As the example above demonstrates, this is a fundamental shift from for-profit news organizations, because it facilitates total control over distribution and flow of information by the owner of the platform. Habermas (2022b) recognizes this, yet we differ in our respective reading of the effects of the techno-capital conditions of digital media and platforms.

Instagram, social media platforms in general, are not public spheres but markets⁸⁹ – and in many cases markets without viable alternatives. Images on Instagram function as expressions of preferences and to constitute the validity, the interestingness of a singularity in the sense of (Reckwitz, 2020). Markets, in turn, structure the communicative reality and potential in the present. The exchange and flow of information on Instagram and social media platforms are regulated by the imperatives of the proprietary market designs of tech companies.

interesting – the Facebook model. Then they started showing you stuff based on the people that you chose to follow, whether you were friends or not – the Twitter model. TikTok’s innovation was to show you stuff using only algorithmic predictions, regardless of who your friends are or who you followed.” (Newton, 2023). Artifact translates the TikTok model to a newsfeed. In line with the platform logic, Systrom, one of the co-founders, “[...] isn’t shy about the fact that the company will be exercising its own judgment about who [which news site or magazine] belongs and who doesn’t” (*ibid.*).

⁸⁸ With some allowance for political slant in reporting, I assume. The Guardian and The Economist have always had different perspectives on the world.

⁸⁹ Old economy comparisons can be helpful to understand the effects of digitally mediated experiences of reality: An equivalent to this for the print world would be if a publishing company owned all newsstands and would set up a choice architecture for a customer that would always put their own magazines and newspapers on eye level whenever the customer approaches the stand. The customer may still feel like they are making a free, individual choice to buy Tatler, not Vogue. In reality, this was a never their own choice to make. It was made for the customer. This is an illusion of choice that infantilizes the individual, instead of curating the informational flow in a complex reality for their benefit.

Reading Instagram with Horkheimer and Adorno - Takeaways

The culture industry is a helpful analytical framework for conceptualizing Instagram. It shows that Instagram is just another aspect of culture's role in only thinly concealing economic power. This is where Horkheimer and Adorno and Habermas meet. The culture industry problematizes culture, while Habermas' communication in the public sphere (albeit in decline in the 20th century when he first analyzes it) paints a vision for how to engage in deliberation in a quasi-utopia. When Habermas wrote the *Structural Transformation of the Public Sphere*, he was already witnessing its decline in post-war societies. Habermas, too, is a cultural skeptic. Yet, his seminal work offers a look back to create a forward-oriented perspective, a north star for communicative practices in a democracy.

In a reading of Instagram with Horkheimer and Adorno (2002), the cultural practices and images presented on the platform provide a form of entertainment, distraction, and momentum to move and keep individuals in a system ruled by economic powers. The culture industry works so subtly that in the end individuals think they are willingly participating in entertainment that only cements the status quo. There is an affective quality to this – it can momentarily feel good and entertaining to be deceived in this manner, especially considering dopamine hacking strategies by companies like Meta. Instagram as an advertising platform only thinly conceals its true nature in the bigger picture of technology's role in society as well as that of power consolidation and monopolistic forces in the tech industry. To create content on Instagram is thus a form of self-deception, of misinterpreting the opportunity for individual expression on a visual platform fueled by market and advertisement imperatives. It was never about pretty pictures and connection.

Habermas' (1991) theorization of the public sphere takes the baton from Horkheimer and Adorno to locate why these changes matter for the democratic process. Social media brings with itself another structural transformation of the public sphere with new economic conditions – the platforms (Habermas, 2022a). They fundamentally reshape public discourse in the present era with the emergence of numerous sub-publics, threats to the economic existence of traditional media companies, and a vague mode of communication that is somewhere between private messaging and public communication, among others. As mentioned above, the key challenge in public sphere theory of the present is the market environment of informational exchange on social media. It renders all communicative actions subject to the imperatives of the market that platforms create. The culture industry as it is present on these platforms helps to underwrite this dynamic. Users in the thrall of the numerous entertainment options on Instagram and the like stay mainly unaware of this in the same manner as Adorno

and Horkheimer describe in the *Culture Industry*, originally written eight decades ago. To be entertained is to agree. This is also the case for Instagram.

Thus, social media cannot constitute an element of or satisfy the expectations and requirements of a functioning democracy. A feudal system for information distribution, as Lovink (2022, p. 4) suggests, does not magically support the conditions necessary for a functioning democracy. Public sphere theory has some explanatory power on the phenomena and effects of platforms like Instagram on a democracy, while the culture industry explains why the role of Instagram is cemented so strongly into everyday life. However, a robust politico-theoretical evaluation of the digital technologies and their effects needs to consider the relationship and inherent power dynamics of technology and democracy through platforms like Instagram. I will do so in the subsequent section on the anti-enlightenment thrust of the technology industry.

6. The Anti-Enlightenment and Neo-Feudal System of Technology

As the two previous sections on theorizing the contents and medium of Instagram have shown, existing political theories provide helpful templates to understand the phenomenon of Instagram. Yet, they fall short in accounting for the profound changes that are occurring through digital technologies. This can be attributed to two reasons. Firstly, data extraction and algorithms support precise content distribution to individual users on platforms like Instagram in ways that far exceed what television or any other pre-digital, pre-algorithmic medium could have ever achieved. Secondly, the current conditions in digital capitalism – platforms, data harvesting, as well as surveillance capitalism and their power dynamics – create a digital environment with a neo-feudal undercurrent.

At its core, the present state of capitalism with Instagram, social media, and platforms is an anti-enlightenment project. One of the key tenets of enlightenment is to dare to use one's own reason: "*Enlightenment is man's emergence from his self-imposed immaturity* [sic]. Immaturity is the inability to use one's understanding without guidance from another" (Kant, 1784/2023, p. 1). Kant (ibid.) distinguishes between two types of immaturity – one is a lack of understanding, the other a self-imposed one that is caused by a lack of resolve and courage to use one's reason without guidance from another. In the case of digital technology, both types apply, as well as a third that consists of an unravelling of the tenets and achievements of enlightenment through the modus operandi of data-driven tech companies.

To counteract the implications of tech companies' practices, individuals and society need a deeper understanding of how technology works and is impacting them. There is a burgeoning industry of tech critics in academia and media that is contributing to that. Still, there is much distance to cover, yet, in order to provide adequate education about the effects of technology to the public. This corresponds to the first part in Kant's concept of immaturity. Then, there is the second aspect of lacking the courage or resolve to use one's understanding, best exemplified in the shrug of resignation that accompanies so many conversations on technology. When a user knows they should scroll less or look for alternative paths to market their business, for example, but stay on social media, because it is more convenient or too difficult to imagine an alternative, this touches upon the second aspect of Kant's concept of immaturity. In the context of tech companies' holds on our lives and the control they exert through platforms, data collecting, algorithmic manipulation of our realities, and surveillance capitalism, it is paramount to recognize that some, yet not all responsibility lies on the

individual⁹⁰. In the case of digital capitalism, there is a third avenue for immaturity: one that is cultivated or a buy-product of digital capitalism.

There are two emblematic characteristics of the anti-enlightenment thrust of current technology: its incursion on mental autonomy and its neo-feudal structures. Persuasive technologies, algorithmic feeds, use and abuse of dopamine pathways, and hyper-personalized recommendations beckon the question whether what a user sees, for example on an Instagram feed, reflects their genuine preferences and where the distribution of content, notifications, constant nudging, and other techniques cross the boundary of a user's mental autonomy. In short, it is the challenge of distinguishing between one's genuine desires and algorithmically cultivated ones. As the previous sections have shown, the internet is increasingly dominated by winner-takes-all forces that have incorporated data surveillance into their business practices, employ cognitive modification and manipulation tactics, and design and create entire markets for themselves to not only wipe out competition but hoover up all the profit and data available from this. Platform business models are one aspect of that. However, this phenomenon goes much further as authors and researchers such as Dean (2020b), Jensen (2020b), and Varoufakis (2022b) argue: we are entering a stage of post-capitalism that is best characterized as technofeudalism.

The trajectory of cognitive manipulation in neo-feudal structures is a disaster for functioning discourse in a democracy, as well as for the ability of a citizen⁹¹ to exercise their political rights consciously and intentionally, for example through voting. Expecting healthy, informed discourse of participants in a democracy who (dare to) use their own reasoning on the conditions of a structure that is built on principles that underwrite exactly the opposite, is oxymoronic. The internet operates on illiberal and authoritarian practices – the former infringe on the autonomy and dignity of a person⁹² and the latter sabotage accountability and threaten democratic processes (Glasius & Michaelsen, 2018, p. 3795).

This dissertation began as an exploration of Instagram and its dual nature – content and medium. Instagram, through the power of images, has played an instrumental role in shaping worldviews through repeatedly exposing users to images in algorithmically curated feeds, constructing inner worlds (as evidenced through the widespread mental health effects of the platform), guiding aspirations as a key player in the influencer economy and infrastructure for

⁹⁰ It would be cynical to assign individuals with the sole responsibility for solving systemic challenges. At the same time, there are steps individual users can take to curtail tech companies' incursions into their lives by, for example, turning off notifications (a prime tool for persuasive and manipulative technologies).

⁹¹ In the sense of *citoyen*, voter, member of the civic, beyond mere passport-holder.

⁹² Which can turn into a human rights matter.

easily accessible digital entrepreneurship, and creating the environment of visual platform work and personal branding that is like a perpetual carrot of *you could, too, if you tried*, dangled in front of its two billion users. The anti-enlightenment aspects of the internet and digital technologies at large are the somber reality of the optimism that accompanied the web 1.0 revolution.

Web 2.0, social media, algorithms, and soon AI, are paradigm-shifting technologies. While this section is rather critical of the developments in digital technologies, it is important to keep in mind that “[sic] the most important examples of technologies that have political consequences are those that transcend the simple categories of ‘intended’ [sic] and ‘unintended’ [sic] altogether” (Winner, 1980, p. 125). As Winner (ibid.) suggests, there are instances where the process of technological development is so very biased in a particular direction that it produces results that are perceived as breakthroughs by some social interests and awful setbacks by others. Bearing in mind the process of technological production in the ideological climate of Silicon Valley – where Instagram and other web-dominating platforms originated – Winner’s perspective provides a helpful frame of understanding for why some aspects of the digital technologies at present may be so helpful (for example giving a communication platform to the otherwise voiceless), while others are outright detrimental (for example algorithmic discrimination). Winner (ibid.) cautions against stating that somebody is doing somebody else harm. “Rather, one must say that the technological deck has been stacked long in advance to favor certain social interests, and that some people were bound to receive a better hand than others” (ibid., p. 125 f.). This, again, is a very fitting framework of thought for the contents of this chapter. As demonstrated in the previous sections, the deck at the intersection of capital markets, financial incentives, and ideologies in the tech industry has been stacked against humanity’s favor. This occurs much farther upstream than an immediate look at Instagram or other platforms might suggest.

Dwelling on the nature of the internet for another moment in this context, it is important to note that digital technologies are entirely based on code. The rules of the tech environment are mediated by code. Hence, code becomes the organizing foundation of the internet and the “[...] predominant way to regulate the behavior of Internet [sic] users” (De Filippi & Hassan, 2018, p. 1). This is expressed in the idea that “code is law” (ibid.) – that code creates a set of governing principles that shape human behavior online. Behind the shiny, colorful surfaces of Instagram posts, the artifact of code governs all digital experiences. Code is created based on social interests that have been stacked in favor of certain interests, as Winner (1980, p. 125 f.) stated.

As a matter of that fact, code and the technologies it creates can be inherently political in two ways, following Winners’ (*ibid.*, p.123) concept of the politics of artifacts: firstly, technical arrangements in forms of order, meaning technologies create some form of order as an organizing principle⁹³, and secondly, technologies that are inherently political because they appear to require or are strongly compatible with particular types of political relationships. Digital technologies, and especially Instagram and other platforms I discussed in this dissertation, are political firstly because of the design choices that created patterns of power and authority (*ibid.*, p. 134). Social media, platforms, and online technologies were flexible in their design since their inception. There was no imperative that they work and create power dynamics in a certain way. Hence, they need to be “[...] understood with reference to the social actors able to influence which designs and arrangements are chosen” (*ibid.*). Irrespective of whether this thesis deems Instagram and digital technologies anti-enlightenment, detrimental to mental autonomy, or technofeudal, all of these dynamics are reflective of the underlying dynamic that somewhere somebody’s choice of one over other alternatives had political meaning and created social ordering effects in society that were codified in both senses of the word – law and code.

Winners’ alternative reading of the political nature of technology may apply here, too⁹⁴. If technologies require or are strongly compatible with certain types of political relationships, in the case of Instagram and digital technologies this can refer to two aspects: they are the way they are because of a set of existing political relationships or they work most favorably with them. As for the former: the technological experience of the presence is rooted in highly deregulated markets, for example, that provide the framework for all the disrupting, moving fast, and breaking things the tech industry purportedly delivers. Also, the digital technologies discussed in this thesis are strongly compatible with authoritarian, illiberal political relationships or those described by the concept of technofeudalism. Here, a technology’s design is political because it creates an order. It is directly political because it requires and aligns with certain political relationships. Technologies of the present were shaped by people into what they are today and have – from their beginnings – been shaped by the political relationships surrounding them.

Hence, the considerations in this section on anti-enlightenment, mental autonomy, and technofeudalism in the present technological reality are responses to the multi-layered political nature of the status quo. In other words: the status quo has not fallen from the sky. People,

⁹³ For example: centralized versus decentralized technologies.

⁹⁴ Winner (1980, p. 134f.) states that these two perspectives are not mutually exclusive and instead suggests a “both/and” position. Both approaches to the politics of artifacts can be applied in different circumstances.

through the aggregate of conscious decision-making over the years, have made technology what it is. Additionally, these technologies, fostered by political relationships of deregulation and Silicon Valley ideology, have moved closer to non-democratic politics and modes of governing.

The dynamics discussed above also demonstrate that there has always been another way. Technological determinism is a discursive power move to retain the status quo and the locus of power in the sphere of technology. As bleak as the present state may be, the best way to extricate ourselves from it is to follow the enlightenment dictum of “sapere aude”. Our conceptual immaturity in relationship with technology need not be permanent. While the conditions of rolling back the developments of the past two decades will require considerable effort, as the following sections will show, there are still many avenues for change, as I will also lay out in the subsequent chapter.

6.1. Mental Autonomy, Algorithms, and Neurorights

Political science traditionally concerns itself with the aggregate and the role of the individual in it. Democracy theory, analysis of elections, and comparative political analysis all ask questions about the bigger picture. In recent years, interdisciplinary approaches in political science have been expanded to include biology, psychology, and neuroscience (Haas, 2016, p. 355). These new methods can help us understand how individual and cognitive processes may play out on the mass level (*ibid.*). As these technological developments progress, they create more possibilities to influence and measure brain activity (Hertz, 2022, p. 1), for example neurological implants or mind-reading capabilities (Rainey et al., 2020, p. 2295). Even far before that stage of technology, persuasive technologies, digital nudging, and behavioral modifications through the use and exploitation of neural circuits raise the question where the limits of the autonomous self begin and mere persuasion in technology ends. Neuroscience and psychology can help illuminate this boundary. When considering Instagram (or any other platform that for example has a scrollable feed, sends user notifications, or displays a landing page customized to a user’s individual set of preferences), behavioral or cognitive approaches can help us understand better whether what a user sees in the feed is an expression of their own desires or a desire created for them by the algorithm. Repeated, habituated scrolling through algorithmic feeds may tip the scale further in the direction of worlds that are created for us by long-term tugging at our cognitive autonomy. When a user scrolls through algorithmically curated digital worlds long enough, when does the vision and worldview they practice this way supplant their own desires? An exploration of the concept of mental autonomy can help illuminate this.

Digital Challenges to Mental Autonomy

Mental autonomy is of paramount importance to the political sphere. Democratic elections and deliberative processes in the public sphere depend on the electorate’s ability to make decisions independently and consciously. In the case of large-scale social media apps and related platforms, two levels of challenges present themselves: the individual, whose desires, cognition, and worldview may be affected by persuasive technologies and algorithmic interference, as well as the collective where the aggregate of individual manipulation may create challenges. For example: A team at Facebook conducted an experiment and moderated the amount of positive or negative posts in individual users’ Facebook newsfeeds and were able to show that mass emotional contagion is possible in online social networks (Kramer et al., 2014, p. 8788). When they reduced positive content, fewer users posted positive content and negative posts increased. The effect worked the same when negative content was reduced

in the feed. This exemplary study shows that slight tweaks to algorithmic feeds can have meaningful effects on the individual and collective. Modifications in the emotional value of the newsfeed can affect the mood of people and groups and thus their behavior and interactions in the political sphere. If intentional changes in the content that users see is shown to influence their emotional state and their decision-making because of that, this relationship re-iterates the importance of mental autonomy as a factor in politics in the digital age.

The study above and questions on mental autonomy also delineate a key difference between traditional, pre-digital advertising and persuasion techniques, algorithmic feeds, and content distribution. Traditional advertising worked with segments and probabilities, for example, to ensure that an election campaign message was broadcast on video at the most favorable time of the day to reach the desired target audience. Advertisers would broadcast the election campaign video, when they knew the audience they wanted to reach was highly likely to watch TV. In the age of algorithmic feeds, it is possible to reach any individual with the specific message that best converts them at the optimal time.

Micro-targeting is not the same as casting the wider net of segments. Persuasive technologies

“[...] have blurred the lines and morphed into technologies that covertly and gradually manipulate people into attaining a goal that is predetermined by the algorithm and disregards the decision-making rights of the individual. This may lead to people exercising decisions that do not align with their personal values and beliefs, and rob them of their autonomy—an ethical principle, in the absence of which the application of these technologies may be unethical.” (Botes, 2022, p. 1)

When a user logs onto Instagram, social media, and other digital platforms with data-optimized choice and persuasion architectures, at present they relinquish their ability to make fully autonomous decisions. Digital manipulation may be, as Botes (*ibid.*) writes, gradual and covert, holding our hands on the path to convincing ourselves that what the platform wants us to want is really what we want. This is further complicated by the fact that technologists often do not have a complete understanding of how their algorithms work. This is the so-called “Black Box Problem”, the challenge of not being able to know how exactly an algorithm makes decisions and understand why it offers a certain set of solutions over another (Schneider, 2019).

Definitions and Dimensions of Mental Autonomy

The concept of autonomy has been subject to philosophical debates since antiquity (Metzinger, 2013, p. 2). Furthermore, mental autonomy is a key concept in studies in human development and medical ethics and laws. In the medical context, mental autonomy refers to a patient’s ability to make their own decisions, especially but not exclusive to when it comes to consent

to treatments. Owen et al. (2009, p. 79) locate mental autonomy in three spheres: philosophy, law, and psychiatry. Debates on autonomy generally are complex and nuanced – what does it mean and entail to govern oneself, to make one's own free decisions? In the sphere of philosophy, Owen et al. (2009, p. 82) identify two deep fissures in philosophical debates on autonomy: the first is about whether or not autonomy is value-laden, the second about whether it includes rationality.

Metzinger (2013, p. 2) identifies four spheres of autonomy: “[...] rational self-control, a sufficient degree of independence to causally enable individual goal-commitment, ‘self-governance’ [sic] and rule-setting, and causal self-determination [...]. Furthermore, autonomy is a process that can be gradually achieved by a human being, can come in degrees, and can be lost (ibid.). Autonomy is part of the process of becoming a person (ibid.). This aligns with the perspective of human development, where autonomy enjoys pivotal importance in the development of an adolescent (Beckert, 2018, p. 355; Beckett, 2007).

In more general terms, autonomy is the capacity for rational self-control, while mental autonomy is the ability to control one's own mental functions (Metzinger, 2013, p. 2). Beckett (2007, p. 6), defines it as “[...] an individual's ability to think for one's self”. Metzinger (2013, p. 2) defines mental autonomy as the

“[...] ability to control the conscious contents of one's mind in a goal-directed way, by means of attentional or CA [cognitive agency]. This ability can be a form of rational self-control, which is based on reasons, beliefs, and conceptual thought, but it does not have to be. What is crucial is the ‘veto component’ [sic]: Being mentally autonomous means that all currently ongoing processes can in principle be suspended or terminated.” (ibid., p.4).

Attentional and cognitive agency are core mental processes that enable mental autonomy (McCarthy-Jones, 2019, p. 1). Thinking for oneself requires that we can pay attention.

Mental autonomy is the “[...] necessary condition to all other freedoms that cannot be reduced to existing rights” (Sommaggio et al., 2017, p. 27). If we lose sovereignty over our minds, we lose our dignity, democracy, and ourselves (McCarthy-Jones, 2019, p. 2). If we cannot exercise our own will, or if our will is manipulated, an individual is unable to shape their own behavior and future (Botes, 2022, p. 1). In this context, Botes (ibid.) refers to Kant's concept of dignity of human beings by treating them as persons instead of resources – reflected in practice by respecting people's rights and choices over time.

A definition of adolescent cognitive autonomy can yield further insights into how mental autonomy translates to everyday decision-making. The CASE⁹⁵ inventory quantifies five areas of independent thought⁹⁶: (1) the capacity to evaluate thought, (2) to voice opinion, (3) to make decisions, (4) to capitalize on comparative validations, and (5) to self-assess (Beckett, 2007, p. 579). On Instagram, as well as on other platforms, algorithmic content distribution, dopamine hacking, and optimized digital nudges based on user data impact these areas of independent thought. To what extent and how depends on the platform and its technology. In the case of Instagram, an algorithmic feed that optimizes the display of content to satisfy the interests of the platform may affect the capacity to evaluate thought, make decisions, capitalize on comparative validations, and self-assess. In all of these, these effects are more likely long-term outcomes. For example: when a user sees a certain shoe in their feed repeatedly over a longer period of time, is their decision to purchase it truly their own, has this desire been created in them, or both? A shoe is a benign, quotidian example. The same principle applies for attitudes, content about personal well-being as well as social and political matters. This is further complicated by the role of dopamine. When tech companies tap into neural feedback loops that signal reward and motivation, this can have effects on decision-making, self-assessment, and the capacity to evaluate thoughts. Dopamine is a powerful driver of human motivation and associated with addictions like gambling. Toying with an individual's dopamine level on an app and using it intentionally to steer user behavior is an infringement upon mental autonomy⁹⁷. Voicing an opinion, in turn, depends on the rules of engagement on a platform. Additionally, an individual's perceived ability to voice an opinion on Instagram or real life may be informed by the contents they take in while scrolling, i.e. the worldview this content forms and its moral implications. This is a long-term effect on autonomy. It very likely does not stem from one post.

Instagram and related platforms considerably undermine mental autonomy online. The more data a platform has on an individual user, the better they can anticipate this user's interests and behavior and deploy content, likes, nudges, and ads accordingly. Botes (2022, p. 4 f.) points out that this creates ethical problems for three reasons: a lack of adequate information to allow an individual to consider his or her options, the lack of full capacity to exercise a

⁹⁵ Cognitive Autonomy and Self-Evaluation (CASE)

⁹⁶ CASE is a measure for cognitive autonomy for adolescents. In adolescence, humans develop autonomy from their parents (Beckert, 2018). It is a key step towards adulthood. In the reverse, and why I chose to use this score here: if we do not go through these steps or if our autonomy in these areas decreases, we revert to a state of agency (not cognitive development!) that is more adolescent than adult. Kant's concept of immaturity comes into play here. If our mental autonomy is diminished, we are unable to fully access our reason, which informs all parts of life, including an individual's participation in democracy.

⁹⁷ To further this argument: when abused, dopamine hacking may lead to compulsive use of apps and even addiction. Social media can cause addiction with dopamine implicated (Burhan & Moradzadeh, 2020, p.1).

decision due to the individual being targeted at a time when he or she may be at their most vulnerable, and undue influence in the form of online manipulation that specifically targets those weaknesses and vulnerabilities. Whatever a user sees on Instagram may not be enough information for them to fully consider their options. They may see an ad or content at a time when the algorithm has determined they are most receptive to it and their cognitive and attentional agency are weakest. This is the key dilemma of mental autonomy in the digital age: an individual is confronted with a plethora of tools for behavioral social engineering, optimized with micro-targeting to ensure optimal outcomes for the owners of algorithms.

Maintaining mental autonomy while using Instagram (or other social media) and existing in platform societies is a near impossible task for an individual. Two aspects play into this, a psychological and a technological one. Humans do not possess mental autonomy for about two thirds of their conscious lifetime⁹⁸ and a lot of their mental activity is not driven by a consciously available set of goals (Metzinger, 2013, p. 14). From a neuro-psychological point of view, full mental autonomy is thus impossible to achieve. If most of conscious human activity is characterized as a form of unintentional mental behavior (*ibid.*), the most interesting question is where those behaviors originate. Homan (2003, p. 96) provides a helpful perspective here: there is an intimate relationship between our cognitive and emotional development – our conscious and unconscious minds. Our unconscious (or subconscious) is an important driver of our actions and decision-making and may be the key to understanding why we are only able to access mental autonomy for about one third of our lifetime.

Furthermore, Homan (*ibid.*) points out that an individual's development is shaped by their surroundings, mentors, and community. Environmental influences may influence the subconscious, as well, including what we see on social media time and again. The technological factor in mental autonomy may play a big role here:

“[...] if manipulative technologies covertly, gradually, and persistently effect changes to individuals' personal beliefs and values, it will lead to changes in the way in which individuals think, evaluate their choices, form intentions about them, and act on the basis of those intentions.” (Botes, 2022, p. 5)

Mental autonomy in relationship with digital technologies may not only depend on the ability for conscious decision-making, but also the ability to control input into the subconscious. In the case of Instagram, images a user sees repeatedly in the feed or that are shown to them by the algorithm under certain conditions, such as their emotional state or the hour of the day, can exert their greatest influence by shaping their subconscious perceptions through the persistent, gradual, and long-term effect that Botes (*ibid.*) describes. Drawing on the findings on the

⁹⁸ This is akin to the quotidian notion of performing activities on autopilot.

pictorial nature of Instagram in this dissertation, the images users consume on Instagram exert influence on their worldview and cognition through their agency and impact. In addition, they influence users subtly and over time as these images are embedded into the functions of a platform. This is another reading of the emergence of visual trends and hegemonic aesthetics on Instagram I discussed in the context of visual culture: long-term, gradual, and persistent effects on users' mental autonomy can also apply to the visual, as well. Seeing certain styles a significant number of times may shape a user's aesthetic preferences.

What Botes (ibid.) describes above also exemplifies the anti-enlightenment aspect of current digital technologies that covertly, gradually, and persistently create immaturity (in the sense of Kant) in users by undermining their ability to use their own reason independently. Users only have a limited sense of agency here. While they might know that social media or other platforms trade on algorithmic behavioral modification, the long-term effects are below the threshold of their perception. When they enter a platform, users cannot truly know what they are opting into – especially over time.

Lastly, mental autonomy extends beyond considerations of independent thought and decision-making. It crucially also involves mental privacy. This need for mental privacy is further accentuated by bids for neuroenhancement with chips or so-called mind-reading software. In the context of the latter,

“[...] having one’s mind open to view, the possibility for free deliberation, and for self-conception, are eroded where one isn’t at liberty to privately mull things over. Themes including privacy, cognitive liberty, and self-conception and expression appear to be areas of vital ethical concern.” (Rainey et al., 2020, p. 2295)

However, these concerns for privacy are relevant for current digital technology, as well. Kosinski et al. (2013, p. 5802) demonstrated that Facebook Likes can be used to predict personal attributes such as sexual orientation, religious and political views, personality traits, use of addictive substances, parental separation, age, and gender. Prediction accuracy varied between 93% for gender and 60% on whether one’s parents were together at the age of 21 (ibid., p. 5803), showing that one’s data trail reveals a plethora of personal information⁹⁹. Furthermore, it is also possible to predict personality on the basis of information users share in their Facebook profile (Golbeck et al., 2011). Instagram, social media, and platform companies already can access a variety of data that offers more than a peek into our mind. How much mental privacy do users enjoy online at present, when their data trail already allows

⁹⁹ The researchers only use data of Facebook Likes for their study. Even a decade ago, when this study was produced, Facebook had access to a cornucopia of user data that extended far beyond likes. One can only assume how far Facebook could reach into an individual’s sphere at the time and how much its reach has grown since then, after a decade of technological advances and more data collection on users.

inferences on personal attributes and religious and political views to scholars who do not have complete access to data analysis in the way Facebook does?

The Neurorights Proposal – Protecting Mental Autonomy in the Digital Age

Protecting mental autonomy and cognitive agency of individuals must be a key area of interest for individuals and national states. Interference with individual mental autonomy can have profound effects on the social and political fabric, since the institutions that make up a democracy are inhabited and governed by people. The present era of algorithmic micro-targeting is concerning for the integrity of humans and democracies. It is an even more pressing concern as advancements in AI and neurotechnology are reaching the masses. These concerns are met by legal approaches to protect mental autonomy and enshrine cognitive liberty into law. These laws are a response to the risk of “[...] creating unparalleled forms of intrusion into people’s private sphere, potentially causing physical or psychological harm, or allowing undue influence on people’s behavior” (lenca & Andorno, 2017, p. 2). There is growing awareness about how data collection and analysis in algorithmic decision-making might undermine human autonomy – which is the basis for the right to freedom of thought itself (Shiner & O’Callaghan, 2021, p. 109). Interestingly enough, so far there have been no cases before various Supreme and Human Rights Courts in Europe, the US, or the UK¹⁰⁰ that engage with the question whether and to what extent algorithmic decision-making might undermine our ability to exercise political agency (*ibid.*).

Debates on legal enshrinement of mental autonomy mainly concern artificial intelligence and neurotechnology. Considering the far-reaching effects algorithms and tactics of platforms can have – as outlined in the previous section – proposals on neurorights, human rights to freedom of thought, and extended free speech arguments can sensibly be considered for the current status quo of technology, as well. Furthermore, as this dissertation seeks to create proposals for democratic principles for technology, the legal perspectives in this section offer important insights on legal frameworks to ensure that technologies are compatible with democracy. A key tenet in this context is: “Artificial intelligence and brain–computer interfaces must respect and preserve people’s privacy, identity, agency and equality [...].” (Yuste et al., 2017, p. 159)

In order to define policies and regulations, ethical arguments need to be translated into rights-based arguments (Bublitz, 2013, p. 5). While scholars recognize that the advances in neuroscience, data, and technology require some form of legal response, there is no clarity, yet, on how to best respond to them. Legal approaches in this area can be divided into two

¹⁰⁰ Shiner (*ibid.*) lists these courts: European Court of Human Rights, the Inter-American Court of Human Rights, the Supreme Courts of Canada, the US, the UK, or Ireland.

different camps: drafting neurights, or amending or updating existing human rights. Bublitz (2020, p. 393) outlines key desiderata: the “[...] protection of the mind must be limited to severe, exceptionally worrisome interferences.” This specification is necessary to avoid conceptual creep, as mental harm is ubiquitous (*ibid.*). While some interferences may include a non-respectful way of interacting with other humans, many are consequences of accepted forms of social interaction (*ibid.*). Legal approaches to curtailing mental interference and strengthening cognitive liberty in individuals considering existing and emerging technologies must bear this in mind. Regulation through these rights cannot reach into every realm of everyday human interaction and modulation of minds¹⁰¹: “[...] ordinary negatively valenced mental states cannot be the domain of (human rights) law; only exceptional attacks on the mind may qualify.” (Bublitz, 2020, p. 393)

Reflecting the emerging and dynamic state of the neurights debate, several concepts appear and re-appear in the literature: cognitive liberty and mental integrity, as well as mental autonomy (as discussed previously). A right to mental integrity can be understood as the right against certain types of nonconsensual interference with the mind (Douglas & Forsberg, 2021, p. 182). “Cognitive liberty [...] is necessary to all other liberties, because it is their neuro-cognitive substrate” (Ienca & Andorno, 2017, p. 11). As such, cognitive liberty resembles freedom of thought, which is usually considered essential to other freedoms such as freedom of speech, religion, and others (*ibid.*). “Cognitive liberty or a right to mental self-determination guarantees individuals sovereignty over their minds” (Bublitz, 2013, p. 9). It is a right to free will and protects the conditions of possibilities of free actions (*ibid.*). Cognitive liberty is not a political claim, but an implicit assumption of the legal order rooted in individual self-determination and responsibility (*ibid.*). It is the basic freedom “[...] that restricts state interferences with minds of citizens” (*ibid.*, p. 29). Bublitz (*ibid.*, p. 19) defines three dimensions of cognitive liberty: first, the liberty to change one’s mind, secondly, protection against interventions into other minds to preserve mental integrity, and, thirdly, the promotion of cognitive liberty. Merely protecting cognitive liberty is not enough, laws or a legal order must actively promote it. While these concepts do not completely overlap, they highlight the general thrust of the scholarly debate: at minimum, they require a means to ensure non-intervention into the independence of the mind.

Then, there is also the right to freedom of thought. The right to freedom of thought exists in proximity to cognitive liberty (Bublitz, 2013, p. 13). It is one of the strongest existing rights, part of human rights treaties, but not enumerated in most (European) constitutions (*ibid.*). It is also

¹⁰¹ Even a conversation might change a mind. Some aspects of it may be conscious, some determined by subconscious factors. It would be conceptual overreach to regulate human interaction on a granular level.

an absolute right; there are no clauses that allow its restriction (ibid.). There is no room for state regulations with the right to freedom of thought (ibid.). However, despite its theoretical importance, practically this right is insignificant and enjoys little legal attention¹⁰² (ibid.).

The neurorights proposal extends beyond concepts of mental autonomy, cognitive liberty, mental integrity, and freedom of thought. Neurorights are a new category of human rights for the digital and neuro-technological age.

“Neurorights can be defined as the ethical, legal, social, or natural principles of freedom or entitlement related to a person’s cerebral and mental domain; that is, the fundamental normative rules for the protection and preservation of the human brain and mind” (lenca, 2021, p. 1).

Neurorights in the definition of lenca (ibid., p. 6) are derived from normative ethical principles: derivatives of freedom of thought, privacy, mental integrity, personal identity, and other ethical corollaries. They are a translation of ethical desiderata into law in the age of AI.

The main argument for neurorights is that the scope of human rights does not suffice to address neurotechnologies and require an adaptation and the creation of new human rights in order to protect mental autonomy (Asís, 2022, p. 56). There are several proposals for new human rights in the digital era. lenca and Andorno (2017, p. 1) identified four new rights: “The right to cognitive liberty, the right to mental privacy, the right to mental integrity, and the right to psychological continuity.” Reconceptualization of existing rights and creation of neuro-specific rights is a coping strategy against misuses and a form of protection of fundamental liberties in decision-making processes (ibid., p. 24). Conversely, Bublitz (2020, p. 387) suggests only the introduction of one such right, the right to psychological or mental self-determination. This law is a more general right and fills the gaps between mental integrity and freedom of thought because it secures factual human capacities that the law usually presupposes (ibid., p. 398 and p. 403). The mind, thus, is an entity worthy of full human rights protection, including emotions and non-rational processes (ibid., p. 389 and p. 398). Another set of proposals includes:

“(1) the right to identity, or the ability to control both one’s physical and mental integrity; (2) the right to agency, or the freedom of thought and free will to choose one’s own actions; (3) the right to mental privacy, or the ability to keep thoughts protected against disclosure; (4) the right to fair access to mental augmentation, or the ability to ensure that the benefits of improvements to sensory and mental capacity through neurotechnology are distributed justly in the population; and (5) the right to protection from algorithmic bias, or the ability to ensure that technologies do not insert prejudices.” (Yuste et al., 2021, p. 160f.)

¹⁰² for example, in constitutional lawsuits

Especially the last set of proposals demonstrates the challenge of adequately defining neurorights in a parsimonious, yet effective manner. As all the proposals above show, scholarly opinions on the matter vary greatly in how many and which kinds of rights they demand, highlighting how nuanced a matter it is to codify mental autonomy. Furthermore, it is challenging to predict which rights will be necessary for the technological developments of the coming years to adequately address any incursions into mental autonomy by tech products.

Are neurorights truly necessary or covered by existing human rights? There are two ways to remedy the lack of legal clarity: the introduction of a new right or the interpretation of an existing right (Hertz, 2022, p. 10). There is no inherent advantage to introducing a new human right over the interpretation of an existing one (*ibid.*). Critics of the neurorights proposal argue that the “[...] existing human right to freedom of thought can be coherently interpreted as providing comprehensive protection of mental processes and brain data” (Hertz, 2022, p. 5). An evolving interpretation of this right to freedom of thought may be more convincing than introducing a new human right (*ibid.*; Shiner & O’Callaghan, 2021, p. 109). Introducing a new human right does not automatically lead to more legal clarity and protection (*ibid.*). Furthermore, creating a new category of rights may not be advisable, especially since the creation of new rights implies a general and not very exhaustive description (Borbón & Borbón, 2021, p. 3). Thus, these rights may not be able to adequately provide the regulation they are intended for (*ibid.*).

In the political sphere, there has been an initial effort to codify neurorights. At the end of 2021, the government of Chile was the first country worldwide to introduce neurorights to its constitution (McCay, 2022, p. 1). The South American nation’s constitution now requires that “[...] technological development respect people’s physical and mental integrity and [...] that the law must especially protect brain activity and information related to it” (*ibid.*, p. 1). It remains to be seen whether Chile has acted too soon or whether other countries are not acting with enough urgency (*ibid.*). The Chilean approach seems to be to create legal norms more proactively. All the approaches to laws and legal interpretation around mental autonomy discussed in this chapter highlight that there is a growing awareness and interest to safeguard the human mind from technological influence.

6.2. Technofeudalism: The Neo-Medieval Turn of the Internet

There are two factors that determine the anti-enlightenment thrust of current digital technologies: incursions on mental autonomy, as discussed in the previous chapter, and the neo-feudal nature of technology. Techno-, neo- or digital feudalism¹⁰³ is a recent approach for theorizing the social and economic phenomena of present-day digital capitalism, or rather post-capitalism. The concept emerged in the early 2020s among academics and critics on the left (Dean, 2020b; Durand, 2020; Kotkin, 2020; Varoufakis, 2022b) and right (Morozov, 2022). Another approach, Jensen (2020b), compared the structures of the current internet with the social order in the Middle Ages. The works of Staab (2020) on digital capitalism, as well as Srnicek (2017) on platforms explore the shifting political and economic powers in a form of digital capitalism that is dominated by a few companies who create markets they can then control. All these theorizations describe a concentration of power in digital markets – with problematic outcomes for the sociopolitical sphere.

Despite the larger thrust of the argument around technofeudalism in the early 2020s, authors like Lanier (2010), Hudson (2012), Neckel (2019) and earlier works of Shoshana Zuboff (2015) explored power structures around technology that echo a techno- or neofeudalistic sentiment. Tech critic Jaron Lanier (2010) writes about the power dynamic between peasants and lords of the clouds in his book *You Are Not a Gadget*. Hudson (2012, p. 1) observes feudal tendencies in financial markets that produced a neo-rentier economy, where a financial class enjoys special privileges and economic rent is paid out in interest. Technofeudalism can be considered a consequence of trends in financial markets where the focus has shifted “[...] from wealth creation to wealth extraction. It allows the massive transfer of existing assets rather than the creation of new ones in the real economy” (Savvides, 2022, p. 11). Neckel (2019, p. 472) refers to Habermas’ term of “refeudalization” to describe the changes in social forms, hierarchies, and power structures in the present-day economy that generate the old as the new, hence neo-feudal structures. In a precursor to her work on surveillance capitalism, Zuboff (2015, p. 75) coined the concept of the “Big Other”: a distributed and largely uncontested new expression of power created by surveillance capitalism and the global architecture of computer mediation it depends upon. The “Big Other” is

“[...] constituted by unexpected and often illegible mechanisms of extraction, commodification, and control that effectively exile persons from their own behavior while producing new markets of behavioral prediction and modification.” (ibid.)

¹⁰³ These terms are used interchangeably. Another approach that intends to account for the changes to the present sociopolitical order through digital technologies is “cybernetic capital” which emphasizes the concept of abstraction as a material social practice (Ström, 2022).

Some brief thoughts on medieval societies and feudalism to contextualize the renaissance of feudalism in the technological age: Medieval societies were characterized by a feudal economic system based on a chain of exploiters and the exploited that organized social and political structures (Jensen, 2020b, p. 8). In pre-capitalist societies, human relationships were bounded by rules of reciprocity and redistribution: even if the rules were oppressive and exploitative, they were part of a known universe of social regulation that informed and governed the expectations of all parties involved in all important social relationships (Comminel, 2000, p. 6). Feudalism was not a monolithic system across Europe, however it shared some key features across the continent: a distinct social hierarchy, submission of inferiors to superiors, restricted mobility for the lower classes, property was consolidated into manors, urban middle classes dwindled, the peasantry descended into serfdom in exchange for protection, and large landowners took on public functions (Kotkin, 2020, p. 13). Anderson (2013, pp. 147-148) provides a thorough definition of the feudal system and its economic, political and social characteristics:

“The peasants who occupied and tilled the land were not its owners. Agrarian property was privately controlled by a class of feudal lords, who extracted a surplus from the peasants by politico-legal relations of compulsion. This extra-economic coercion, [took] the form of labour [sic] services, rents in kind or customary dues owed to the individual lord by the peasant [...]. Its necessary result was a juridical amalgamation of economic exploitation with political authority. The peasant was subject to the jurisdiction of the lord. At the same time, the property rights of the lord over his land were typically of degree only: he was invested in them by a superior or noble (or nobles), to whom he would owe knight-service [...]. His estates were, in other words, held as a fief. This parcellization of sovereignty was constitutive of the whole feudal mode of production.”

Elements of the definitions above can be found in present-day concepts of technofeudalism or neo-feudalism. Kotkin (2020, p. 2 f.) observes that there is a new group of proto-nobility that has power through extreme concentration of wealth, a type of cognitive elite – today’s cultural creators, academia, and media that takes on the role of the former clergy in providing guidance on existence, and a Third Estate of commoners, a middle class split into property owners and the working class who are becoming more like medieval serfs. “Neoliberalism turns into neofeudalism because it effects a change in social-property relations by destroying state ‘fetters’ [sic] or constraints on markets – employee safety nets, corporate taxation, social-welfare provisions” (Dean, 2022). In addition, the enormous amounts of wealth in the hands of few create political and political power that protects capital owners while intensifying the strain on almost everyone else (ibid.).

Mapping Technofeudalism

Technofeudalism's thesis is that today's world is organized by a post-capitalist order whose social order is decisively shaped by technology and technologists within a broader set of similarities between feudalism and capitalism. These similarities are:

“prolonged stagnation, upward redistribution by political means, a digital sector in which a few ‘barons’ [sic] benefit from a mass of users ‘tied’ [sic] to their algorithmic domains, and the growth of a service sector or sector of servants” (Dean, 2022).

Jensen (2020b, p. 1) uses the Middle Ages as a lens to discuss current trajectories in economics and argues that the workings of modern society caused by technological advancements with internet and digital technology and the way these technologies are used, governed, regulated, and abused is similar to the logic of medieval times¹⁰⁴. Jensen (ibid., p. 2) observes that there is a connecting thread between social phenomena related to the spread of new media: they are a product of logics that shaped medieval societies, among them control, surveillance, and feudalism. “As the medieval common was colonised [sic] and exploited by churches, states and feudal lords, the once free Internet common is now colonised [sic] by [tech giants] who compete for attention, information and, ultimately, money.” (Jensen, 2020a). The main difference between traditional and digital feudalism is that people willingly participate in the latter under the guise of user experience, efficiency, and convenience (ibid.). Informed consent on participation, however, is up for debate, as tech companies have set up a system of data harvesting and analysis, and market design that lock users into these technofeudal power dynamics. You encounter the true power of these structures when you attempt to leave them¹⁰⁵.

Dean (2020a, p. 2) defines four features of neofeudalism:

“1) the parcelization of sovereignty; 2) hierarchy and expropriation with new lords and peasants; 3) desolate hinterlands and privileged municipalities; and, 4) insecurity and catastrophism.”

Varoufakis (2022a, 2022b) conceptualizes the techno-financial origins of technofeudalism: As algorithms have become more sophisticated and can evaluate their own performance, they monitor and react to the outcomes of their own actions. Algorithms are affected by the way they affect us, creating a spiraling feedback loop between users and software (ibid.). The challenge in using algorithms for advertising purposes Varoufakis (ibid.) outlines, is that these

¹⁰⁴ There even are public shaming rituals in neofeudal times, for example online shaming on social media as well as the contested concept of cancel culture (Ronson, 2015).

¹⁰⁵ The dynamic of platforms creates a high level of resistance to leaving. When doing so, a user may notice that their social relationships and economic opportunities are tied to a or several platforms. For example: Professional opportunities may be connected to LinkedIn, social activities and relationships to Instagram or Facebook. Leaving a platform has a cost – losing access to these opportunities.

systems acquire powers to guide our choices and command us, based on the data trail and information they capture on their users. Here, we reencounter the question of mental autonomy discussed in the previous section. Or, as Varoufakis (*ibid.*) states: “We train the algorithm to train us to serve the interests of its owners. The more we do this, the faster the algorithm learns how to help us train it to command us.”

Those who own these algorithms¹⁰⁶, “cloudalists” in Varoufakis’ definition, have profound powers that set them apart from the previous capitalists: they can extract huge rents from manufacturers whose products they persuade us to buy and the algorithms they own can guide us in ways to produce more capital for cloudalists (*ibid.*). Instead of reinvesting profits to develop new capacity, expand output, or increase productivity, the technofeudal model involves the creation of a monopoly position and using data extraction and behavioral modification of users to secure it (Harris, 2022). Durand (2022) also attributes guaranteed monopolies and underwriting speculative financialization, both through political intervention, as driving forces of the status quo.

Whenever we post on Instagram or leave a recommendation somewhere, we generate more of this capital (Varoufakis, 2022a, 2022b) – a form of capital we have no ownership over and get no share of. Social media platforms like Instagram encourage users to create. However, once a platform is set in place in a market, it does not create any new assets on its own. Instead, a platform acts like a big hoover for data that runs on the content and participation of its users. Additionally, the sheer size of these companies and their transnational operations let them appear as state-like actors, not companies, which further complicates the relationship between the political and techno-financial sphere that the cloudalists stand for.

Platforms play a key role in technofeudalism. They insert themselves into relationships between service providers and customers to demand a cut of the revenue. In technofeudalism

“expropriation, domination, and force have intensified to such an extent that it no longer makes sense to posit free and equal actors meeting in the labor market even as a governing fiction. Rent and debt feature as or more heavily in accumulation than profit, and work increasingly exceeds the wage relation.” (Dean, 2020a, p. 1)

For example: pre-Uber people did not need an intermediary to secure a ride in a city. You could simply hail a cab in the street. With Uber, the platform acts as an intermediary between drivers and clients and demands a cut for each transaction, as well as imposing a rating system that (in what exhibits elements of binary, moralistic religious logic) defines who are good drivers and riders¹⁰⁷. As Dean (2022) writes:

¹⁰⁶ Varoufakis (*ibid.*) refers to this as cloud-based command capital.

¹⁰⁷ This is the performance control element of platforms in action (Staab 2020, p. 173).

“Dependent on the market for access to our means of subsistence, we become dependent on the platform for access to the market. If we are to work, the platform gets its cut. If we are to consume, the platform gets its cut as well.”

Harris (2022) describes the experience of existing in technofeudalism with a helpful analogy: “[Technofeudal companies] have turned the slippery slope of digital surveillance into a hamster wheel, a new self-perpetuating system of exploitation.” As mentioned earlier, a user encounters the real power of the platform, when they attempt to exit it.

Aside from proponents of technofeudalism, Glasius and Michaelsen (2018, p. 3795) identified illiberal and authoritarian practices in the digital sphere that, in the case of the former, infringe on the autonomy and dignity of a person and in the latter sabotage accountability and threaten democratic processes. Theirs is a more political approach to the question of what may have tipped the internet away from its initial egalitarian idea, and how, while supporters of the technofeudal approach answer this question from an initially economic point of view. Glasius and Michaelsen (*ibid.*) list three threats that citizens may be exposed to in a digitally networked world: arbitrary surveillance, secrecy and disinformation, and violation of the freedom of expression. There is some overlap between the authors’ insights and the technofeudal approach. Both share an awareness and perception of an anti-democratic turn of the internet. Glasius and Michaelsen (*ibid.*, p. 3796) state that it is not always clear what is being threatened by whom when it comes to digital threats to citizens. In contrast, proponents of the technofeudal approach create a more abstract model to accommodate the economic reality of the present.

Technofeudalism has critics, as well. Detractors of the technofeudal proposal like Harris (2022) and Morozov (2022) refute the claims for a variety of reasons. Harris (2022) is not convinced by conceptualizations of tech companies’ far-reaching powers: if Facebook really were as powerful as technofeudal approaches make it out to be, there surely would be a way to nudge people into accepting and adopting the metaverse, the company’s foray into augmented reality that has seen poor rates of adoption so far. Morozov (2022) launches a more complex argument against technofeudalism. To him, we do not live in a new post-capitalist economic order as technofeudalism posits. He calls for a broader definition of capitalism that can account for the phenomena technofeudalists observe. Morozov (*ibid.*) rejects the idea that there is “something in the nature of information and data networks [that] pushes the digital economy in the direction of the feudal logic of rent and dispossession, rather than the capitalist logic of profit and exploitation.” He (*ibid.*) is also skeptical about omissions of the role of the state in technofeudal concepts. While some Western and global governments surely are lagging in the

development of digital capitalism as it is, the same cannot be said for the role of the US government that has been more closely involved with Silicon Valley (ibid.).

Furthermore, critics of the technofeudal approach claim that the real power players in the internet are not technology companies like Google or Facebook, but the owners of internet infrastructure like server farms (Greene, 2022; Harris, 2022). To Greene (2022, p. 905), ownership of the internet – even though it is run on a complex stack of different technologies – rests with the entities and people who own and run the physical foundations of the internet: “[...] it is not software developers in control, but firms like Equinix and Digital Realty; whom I call *internet landlords* [sic]. At the core of the new economy is one of the oldest: real estate” (ibid.).

In a similar manner, Staab (2020, p. 174) observed a hierarchy of platforms in present digital capitalism: the owners of operating systems iOS and Android run a more powerful platform than apps like Facebook or Amazon, because other companies depend on using their particular operating systems to distribute their own software. Internet landlords, then, can exert even more power, because they own and operate the infrastructure of the internet. A special case of this is Amazon, which owns the amazon.com platform as well as AWS (Amazon Web Services), a cloud computing service provider that hosts one third of the entire cloud computing market (Vailshery, 2022). As a matter of that fact, Amazon is active on different levels of the tech infrastructure hierarchy: real estate and proprietary platform markets built on top of the infrastructure layer.

Despite its headline-grabbing title, technofeudal theories hold great explanatory power in describing the unequal status quo in the digital economy. The medieval lens is very helpful for achieving a greater level of abstraction and understanding which larger dynamics are shaping the economic reality of the present. In the technofeudal economy, the subjugated subject is not even aware of its subjugation (Lovink, 2022, p. 18)¹⁰⁸. This is immaturity in the sense of Kant. However, it is a form of immaturity that the individual may not be aware of as they are navigating a complex world of algorithms that are optimized toward steering users to serve the interests of their owners. When, as stated in the section on mental autonomy, algorithmic and digital nudges occur gradually, covertly, and persistently (Botes, 2022, p. 5), the individual faces challenges to determine their own desires over something that may have been cultivated by digital technologies. Do they really like the red shoes or do they like them because they have been shown them often enough in a manner that was optimized through algorithms to

¹⁰⁸ Lovink (ibid.) attributes this concept of subjugation to Byung-Chul Han in the referenced work.

expose them to the shoes at the most opportune time for the business goals of the algorithm's owners?

The technofeudal model is especially interesting because, just like in medieval times, it creates levels of serfdom and hierarchies. Even capitalists can become serfs or enjoy reduced autonomy when they are interacting with whom Varoufakis (2022a, 2022b) calls the cloudalists. It is a system of multi-level extraction where all roads lead to the owners of self-designed critical markets and – currently – mainly communicative and commercial infrastructures. Keeping the medieval lens, a lack of mutual guarantees or social expectations becomes evident. As opposed to the medieval order, there are no guarantees for protection or established social rules of conduct. It is a one-sided relationship where participants, willing or not, in this system are lured to participate in them by the promise of ease, efficiency, and chipper modernity. Examining reality, it is evident that these promises contain little truth. Once a platform is big enough, the social, cultural, or economic cost of not participating in it might be too high. All this is underpinned by an unsettling sense of uncertainty and instability for the individual. They may produce content on Instagram for years, yet one day their content is banned from view or they get locked out of their account by accident. When this happens, they not only lose access to their account but to their social relationships and economic opportunities, depending on how they were using Instagram prior to that. There is no due process and no recourse for those who build the foundations of their livelihoods on cloudalists' platforms. They are at the whim of changing platform policies and corporate goal setting. This is the opposite of a situation that supports rational decision-making and any notions of daring to use one's reason *á la* Descartes. Here, reason is undermined by algorithmic recommendation systems and a digital serf's existence is reduced to shambles through a revocation of participatory privileges by automated evaluation systems.

Following the logic of techno-, neo-, or digital feudalism reveals that large parts of humanity are in the process of or have entered an economic relationship of digital serfdom. Our data and information on our behavior is harvested, aggregated, and analyzed to devise ever new, more specified modes of algorithmic intervention in the realities our feeds create and the advertising we see. In a digitalized world on the brink of the AI revolution, it borders on impossible to understand where individual choices end, and behavior modification begins. And yet, while many aspects of our lives are increasingly subsumed by the technofeudal logic, we still need to act as the citoyens of a democracy. This is a gargantuan task. The true challenge to democracy in the coming years – until we solve the challenges technofeudalism poses to all levels of our existence – will be to be conscious of and negotiate our digitally feudal existence with the conceptually higher order requirements of democracy.

7. Democratic Principles for Technology

Democracy, technology, tech companies, and individuals have entered into an uneasy relationship in the first two decades of the 21st century. Tech companies have fallen behind on their promises of a bright, happy future with the help of technology. Instead, we are teetering on the edge of a new, digital feudal system that undermines and hollows out the structures of democracy. Instagram is an apt example for the dialectics of technology and democracy: the emotional effect of its images act as a counterpoint to the realities of engaging on the platform. Current editions of technology are anti-enlightenment, un-free, and deprive users of their agency, while hoovering up the benefits in self-designed markets. Democracy cannot thrive in a communicative and technological environment that is fueled by feudal principles.

How can we safeguard and create conditions for technology that support the conceptual demands of democracy? With the current status quo and the looming acceleration of technology with machine learning and AI, regulatory approaches do not suffice in solving the problem. A focus on regulations and critique of the most recent developments in technology serve as distractions and hinder us from reimagining a better version of the techno-social relationship (Lovink, 2022, p. 19). Many scholars are devoting time and energy to exploring the nuanced and granular effects of, for example, social media on all aspects of life. However, as I pointed out in the beginning of this dissertation, we are lacking approaches that reimagine the relationship between democracy and technology, as well as our human role in a technologized world. The tech industry is adept at its own myth making and fortifying stories about its benefits. This is a lie, a skillful tweak of narrative and retaining control over a discourse to retain power (Daub, 2021a). And, it has worked. Narratives about technological progress have become so steeped in our consciousness that – despite all the existing criticism – societies and culture seem to be convinced that a certain path of technological progress is all but inevitable. This negates that there are always multiple options and a multiplicity of solutions available to us. By controlling the narrative around technology, tech companies exert covert control over our agency to imagine and create a different relationship with tech.

Most attempts to reign in technology occur ex-post: regulation and criticism happen in response to something the tech industry has done or is doing. The time lag between an event and regulation is at once sensible and frustrating: sensible because legislative and deliberative processes in a democracy require time, frustrating because it can feel like democracy is always falling behind. The temporality of democracy is slow, while technology speeds ahead (McNamee, interview, 2022). This has always been a conceptual challenge. Nowhere is it becoming so evident as in the question of how to approach curtailing the reach and effect of

tech companies and digital technologies on our lives. Only once damage has been done, activity for change begins. On the brink of a new age in technology, this reactive approach can have detrimental effects on the stability of individuals and society.

Democracy's halcyon days in the West seem to lie in the past – and technology plays a part in this. Technologies, built in secluded spaces like Silicon Valley, have come to exert great influence over regions, continents, or the entire globe. Even if different geographies apply different regulatory approaches, the past decade has shown that the regulatory and cultural conditions for doing business in tech have spillover effects into other regions. An example for this is the US law Section 230, the law that created the conditions for the modern internet. Section 230 was passed in 1996 with the Communications Decency Act in order to protect services that power users' speech (EFF, 2023b; Richman, 2023). It has a broad reach from individual users to blogs, web magazines, and publishing to social media companies (*ibid.*). It states:

"No provider or user of an interactive computer service shall be treated as the publisher or speaker of any information provided by another information content provider." (United States Code, 2023)

Section 230 shaped the modern internet. Without it, platforms that rely exclusively on user generated content like YouTube, Instagram, Reddit, or Twitter, among others, would not be able to exist as they do (Kosseff, 2019). Section 230 is a "[...] strong shield for websites against claims arising out of content created by a third party" (Godfread, 2011). As internet companies based on the premise of Section 230 expanded across the globe, the law did the same for the illicit as for the legitimate digital economy (Leary, 2018, p. 554). Critics of the law argue that it leaves too much room for libel, slander, misinformation, and criminal activities while its supporters view it as an important provision for protecting free speech online (Review, 2018). Section 230 is reflective of the more comprehensive protections of free speech in the United States than in other nations (Kosseff, 2019). With their global growth, technology companies exported the implications of Section 230 across the globe. In their pursuit for global expansion, tech companies not only spread their technologies, but also export Silicon Valley's sociopolitical values. Other nations then need to decide on whether and to what extent to create regulatory boundaries.

As previously discussed in this chapter, regulatory action usually happens ex-post. This raises the question whether and to what extent considerations on drawing a boundary around technology require transnational coordination – or whether and to what extent democratic principles of technology should be globally applicable. From a perspective of political theory, not regulation, I argue that these provisions should be applicable to the concept of democracy,

overall, not individual nation states. Furthermore, like other theories of democracy, they leave enough room for interpretation and application in a practical political context.

As this dissertation has shown in its analysis of Instagram, tech platforms touch upon and affect various aspects of individual life, as well as culture, society, and democracy. The effect of Instagram is special in the context of social media platforms because the emotional value of images and their agency create a different experience for a user than on Twitter or Facebook. Images are powerful. Beyond a political or any subject matter of the platform, studying Instagram has been valuable in the context of this dissertation because it offered a gateway to understanding the underlying mechanisms of social media platforms and the digital economy. The images posted on Instagram, shared in algorithmically organized, scrollable feeds are reminiscent of the culture industry (Horkheimer & Adorno, 2006), while their mode of distribution and the economic factors behind it are more aptly linked with changes in the public sphere (Habermas, 2022a). When applying these considerations and accounting for the conceptual gaps, a need arises to conceptualize the relationship between technology and democracy. As democracy is exposed to tech companies and the consequences of their creations, at present it is more sensible to consider prerequisites for democratically minded production of technology and how this may add to the existing corpus of political theory, than to rewrite democracy theory for the digital age. The concept of democracy has proven to be sufficiently flexible to changing conditions in human life since its origins in the Greek city-states.

Three themes emerge for formulating democratic principles for technology:

1. They must be proactive.
2. They must account for the different temporalities of technology and democracy.
3. They must be globally applicable.

Firstly, they must be proactive because the framework these principles establish needs to surpass current regulatory questions and describe a relationship with technology that is supportive of democracy. These are meta-norms that extend beyond ad-hoc regulations. Secondly, these principles need to account for the different temporalities of technology and democracy – the speeding up through advances like AI and the slowness of deliberative and legislative processes. Technology and democracy presently operate on fundamentally different timelines and democratic principles for technology need to take this into account. Thirdly, these principles are meta-norms, not suggestions for regulation, and as such need to be globally applicable within the context of democracy. The goal of formulating these principles is to support democratic governance in the future. We cannot anticipate the future. However, we can create strategies and principles for how we want to respond to it.

7.1. The Temporalities of Democracy and Technology

The temporalities of technology, algorithms, and democracy are not in harmony with one another. As technology is accelerating in the digital age, its speeding-up creates a rift between the human mind and the institutes and structures it creates: companies, organizations, and governments (Azhar, 2022). Technology and democracy operate on fundamentally different timelines in the digital age. Democracy is a trans-generational project. Its deliberative processes and law-making need time. Temporal experiences in democracy also connect to the rhythm of elections or their interruption (Lavi, 2017, p. 1). Technology on the other hand, is created on an intellectual bedrock of moving fast and achieving rapid growth. This is partly due to market dynamics in the technology landscape¹⁰⁹ and partly because of the investment cycles that determine the timeline of tech companies. As discussed in the section on venture capital, financial models of venture capital investors use a timeframe of seven to a maximum of ten years for the entire lifecycle of a fund. Within this timeframe, startup companies need to have grown rapidly and either achieved an acquisition or gone public in an IPO. Startups and the tech industry have always been on a different, accelerated timeline. AI adds fuel to this fire, because it simplifies and speeds up the creation process of new software by magnitudes. Programs like ChatGPT can carry out many coding tasks at greater speed and efficiency (Marr, 2023). Using ChatGPT or similar programs, a software engineer can significantly accelerate the development and launch of software of any kind – for better or worse. Software and technology can scale in the manner described, democracy cannot.

While it is possible to streamline administrative inefficiencies, democracy has a distinct temporality of its own. Its relative slowness also sets it apart from other forms of government like autocracies, where political decision-making processes may appear more efficient and faster due to centralization of power in a smaller group of people or a singular political leader. Criticism of democracy's slowness is a time-honed rite – and an ongoing temptation in elections: to yearn for the strongman or -woman, who will finally resolve it all. Bids for improvement and raising awareness around where processes, administrative work, communication, or the like may be ameliorated, are helpful for the well-being of a democracy. In contrast with technology's rapid evolution, the debate around democracies' inefficiency will likely resurface in the coming years. As technology speeds on and lawmakers and civil society are catching up to these developments, this may open room for political figures that are inclined towards autocracy. At present, democracy is already vulnerable to the lure of strongman or -woman leadership. In a digitally accelerated future this risk may increase, especially if an electorate's fears of technological changes grow.

¹⁰⁹ the advantage of the first mover

Furthermore, critique and regulatory approaches occur ex-post. Any attempts to hedge in technology tend to happen only once harm has been done or problems occur. It is a reactive process. To a certain extent, this makes sense: nobody can predict the future and lawmakers cannot regulate based on speculation. As the speed of technology increases and will do so relentlessly with functional gains from machine learning processes, the gap between technology and the forces that may curtail its effects – academics, critics, activists, and regulators – grows. There is also a gap in competency: as technologies become increasingly complex, lawmakers and users alike struggle to stay updated and understand the workings and implications of the technologies they are using.¹¹⁰

There are two ways to resolve this temporal friction between democracy and tech: aligning timelines by either slowing down technology or accelerating democracy or creating a buffer or framework around democracy that allows it to keep its own temporality. While useful, critique and regulation alone will not support the key tenets of democracy in the future. The second approach is more supportive. To safeguard democracy in and adapt it to the digital age, civil society and governments need to proactively formulate principles and create legal structures for technology and its interaction with human life, society, and democracy that create a buffer or framework around democracy that still leaves room for technological innovation.

¹¹⁰ This chasm was evident during Mark Zuckerberg’s 2018 senate hearing, when one of the senators asked him how the company made money if users were not paying for the service, to which Mark Zuckerberg replied dryly: “Senator, we run ads” (Stewart, 2018). At the time, Facebook’s ad-based revenue model was already well-established.

7.2. Democratic Principles for Technology

There is a burgeoning industry of tech criticism. In part, rightly so. To make a change, one must first understand a phenomenon. However, the intellectual and academic industry of tech criticism plays a part in maintaining the narrative. As Lovink (2022) argues, the flood of critique of the internet at large contributes to the status quo. Critique without proposals for solutions is overwhelming and tiring. In this case, critics often play to the interests of the tech industry by analyzing shortcomings and problems in a way that is still inside the discursive space that technologists have created. It is by participating in a game inside the playing field(s) technologists have drawn that we are contributing to and maintaining the status quo.

What is the role of political theory in a setting like this? I have dedicated a large portion of this dissertation to the power of images and their effects on Instagram, as well as the structural underpinnings of Instagram as a representation of our current reality in digital technology. In the previous section on the anti-enlightenment undercurrent of technology, I arrive at the conclusion that we are witnessing a backward bend of the arch of history to power structures and levels of autonomy that were thought to be long behind us. Technology at present is operating on non-democratic, anti-enlightenment foundations. The technofeudal proposal, as clickbait-inducing as it sounds, offers a helpful lens of abstraction to better understand the inequities and threats to individual and collective autonomy in the current era. By using a historical perspective and drawing up parallels to the medieval social, economic, and political order, the shortcomings of today's digital capitalism (or neo-feudalism) become more visible. In the previous section, I argued that algorithmic recommender systems gradually and over time undermine an individual's mental autonomy on a slippery slope towards a state that in Kant's terms can be considered immaturity. With view to our consciousness and overall conditions of existence, we are at risk of regressing into a state of the socio-political order that was characterized by a reduction of individual agency and economic possibilities, as discussed by the technofeudalists' proposal. As democratic institutions are made up of people and ultimately reflect the reality of these people, these developments are concerning for the health and robustness of democracies.

To remedy the above, I am formulating a theoretical framework on how to rebalance the relationship between digital technology and democracy. Under the assumption that technology is a human made artifact and as such implicitly political because it creates an order of some form (Winner, 1980, p. 123), I suggest a different possibility for technological structuring as it relates to our social and our political reality. Albeit, as the previous sections of this thesis have shown, undoing the damage existing decision-making in the creation processes of technology

has done is difficult, there is always the chance to make a change and take a different route. The democratic principles sketched out in this section are an effort to restack the odds in favor of democracy further upstream and to distribute the benefits and challenges of the outcomes of tech more evenly in society. Anticipating what the future may hold is impossible. What is possible is to learn from the status quo and set a framework that is informed by and avoids the reproduction of the present shortcomings.

Adrian Daub (2021a) has pointed out that the technological determinism that is the heart of many Silicon Valley narratives is another form of discursive power. Repeated often enough either in the form of tech leader hagiography, online and media hype, or the retelling of the problematic aspects of technology and the power struggles between the spheres of tech, politics, culture, and society by tech critics, this fortifies the discursive mode and thus power relationships of the status quo. Theoretical desiderata thus ideally avoid fortifying the existing discourse.

Two things are necessary to exit and change the status quo, before even discussing regulations and democratic principles for democracy: a change of the discourse around technology, and society and politics, as well as a reimagining of our collective relationship with it. The first section of this dissertation has demonstrated not only the power of images but also – implicitly – the power of imagination, the creation of images in our minds. Presently, collective conversations around technology and our imaginations of it have been captured by an overarching sense of power and fatalism at the invisible hand of tech companies that create all-encompassing digital markets. Reporting and conversations around ChatGPT in the beginning of 2023 have demonstrated a discourse on technology that, yet again, resides on two sides of the same coin, technological determinism. ChatGPT was either lauded as a technological breakthrough that would change everything as part of the incoming wave of generative AI technologies or as a detriment to human culture, learning, creativity, and the like. Both considerations are united by the underlying assumption of the certainty of this technology’s addition to our lives and that we have little to no influence or power on how we use ChatGPT or the effects it will have. This approach does not equal the negation of all reasonable evaluation or making predictions on larger technological trends. It is highly unlikely that we will return to the pre-algorithmic or -AI age. Yet, on either side of the coin, all these narratives share a similar motif: the inevitability of technological change and a sense of helplessness around how to deal with it in an empowered, sovereign manner.

Democratic principles for technology encourage an active role in shaping our relationship with technology, while acknowledging upstream settings like regulatory or financial incentives that

have contributed to the state of tech at present. I will not propose regulatory measures because regulations are a (necessary!) reactive mechanism to the problems created by tech companies. The concrete design of regulations is also more suitably addressed in the field of legal scholarship. Instead, I focus on proactive measures that redefine and reimagine our collective relationship with tech, place more authority back into the hand of the political individual who is active on these platforms, the citoyen, and define a framework around technology wherein technology serves the purposes of democracy. All these can then be translated into regulation or legislation, where possible or desired.

My approach is this: if challenges in the relationship of technology and democracy are created further upstream (Winner, 1980, p. 125 f.), solutions that create a more sustainable and equal relationship between technology and democracy also need to move further upstream. In more practical terms: considering the regulatory breeches by companies like Uber, Facebook’s disastrous effects on politics and societies globally, and the tech industry’s cavalier dwelling in regulatory grey zones, regulation can only be one part of the equation. Fundamentally, healthy societies and democracies of the future require a redrawing of the playing field and – in Instagram therapist parlance – boundaries. They also require a means for democratic stewardship of technologies like algorithms and AI, that can have such profound effects on the social, economic, cultural, and political fabric without any control mechanisms for the democratic sovereign. If our everyday lives are not to be governed by non-elected, non-representative entities like algorithms and AI as well as the companies that own them, it is paramount to create principles that preemptively lower the risk that this occurs.

I formulate five key desiderata for democratic principles for technology. These are to safeguard and support democratic society in the future. They are not *per se* democratic in nature, for example through a plebiscite. They are pre-democratic conditions for the digital age and based on the findings from the analysis of Instagram in this dissertation. The intention behind these principles is to prevent a further disintegration of democracy and set a framework that supports healthy democracies in the future^{111,112}.

¹¹¹ New or updated principles may need to be found over time, as technologies continue to evolve and the social order alongside with it. These principles are very suitable for application to a variety of subfields of technology. Yet, the case may arise in the future where they are meeting their limitations.

¹¹² Srinivasan and Ghosh (2022) call for a new social contract for technology. Their argument is similar to mine, that we urgently need a recalibration of technology’s role in the world to safeguard the health of individuals, societies, and democracies. However, their recommendations focus on the US and remain at policy level and do not deliver a more abstract contribution to democracy theory as my approach intends to do.

The five democratic principles for democracy are:

1. Technology must respect, protect and promote human dignity.
2. Technology must respect, protect, and promote mental autonomy.
3. Individuals must own their data and have control over it.
4. Technology must respect privacy.
5. Technology must be equally accessible.

At the heart of these five desiderata is the intent to change the current internet architecture (Lovink, 2022, p. 17) and realign it with democracy and human dignity. If the current architecture of the internet and digital technologies rests on exploitative, oligopolistic or monopolistic, manipulative, and anti-enlightenment power structures, the aim of these principles is to suggest a path for tipping the scales towards a better, more democratic, and dignified path for technology in the future. The five principles above provide solutions to invert the current dynamic and find a way out of the technofeudal tendencies at present. At heart, their cause is to reclaim human dignity in the age of technology – human dignity that disavows treating individuals as means to ends of whichever cause.

Regulation is not a part of the considerations above for two reasons: first, there are existing antitrust laws that can be leveraged to ensure competition and second, regulation is a means to a normative end. Current tech companies leverage data extraction and algorithms to ensure their powers. Any longer-term proposals need to address these roots. However, I will discuss regulative approaches among other ideas at the end of this section for completeness' sake.

1. Technology must respect, protect, and promote human dignity.

The foundational democratic principle of technology centers on human dignity. Conventionally, dignity is a moral value thought of as inherent to a human person and hence, based on their dignity a human being deserves to be treated with respect (Sensen, 2011, p. 148). "Human dignity is an innate worth or status that we did not earn and cannot forfeit" (Hill, 2014, p. 215). The concept of dignity was pivotal for the Universal Declaration on Human Rights (McCradden, 2008, p. 655), rose in prominence in constitutions in the first three decades of the 20th century (ibid., p. 665), and has become widely used in national constitutions since World War II (Shulziner & Carmi, 2014, p. 461). Aside from liberty and equality, dignity is a necessary condition for democracy, because citizens require dignity in order to govern themselves (Ober, 2012, p. 827). It is not enough that citizens are free, but they need to be willing and able to act as free citizens (ibid.). It is also not enough that they are equal, but that their standing be high (ibid.). If dignity is innate to a human and a condition for democracy, the first and key principle

of democratic use of technology must be that technology must respect, protect, and promote human dignity.

Kant is often defined as a key originator of the concept of human dignity (Bayefsky, 2013, p. 811), even if readings of his concept of dignity are subject to scholarly debate and interpretation (McCradden, 2008, p. 559). A Kantian concept of dignity is an unconditional and incomparable worth without an equivalent (Hill, 2014, p. 215). In the Categorical Imperative, Kant “[...] tells us to treat humanity in each person never merely as a means, but always as an end in itself” (*ibid.*). Thus, human beings cannot be treated as simply means to an end. Furthermore, the concept of “[...] dignity most closely associated with Kant is the idea of dignity as autonomy: that is, the idea that to treat people with dignity is to treat them as autonomous individuals able to choose their destiny” (McCradden, 2008, p. 659 f.).

Applying these considerations of Kant’s concept of dignity to the relationship of technology with democracy, citizens of a democracy need to be autonomous and have dignity in the digital age. Current technology, especially platforms and developments in technofeudalism invert the categorical imperative, treating people as means to an end defined by business and market interests. In doing so, all regard for an individual’s personal sphere, mental autonomy, autonomy over their data, and the well-being of an association of people, i.e. a society, is suspended in favor of economic imperatives. Developments in the past few years have shown that the underbelly of the internet, despite promises of fun, entertainment, and ease, operates on the premise that data is everything and human users can be goaded into the types of behavior desired by platform owners through efficient use of algorithms and persuasive technologies that undermine mental autonomy.

This is in direct opposition to a Kantian definition of dignity, the call for individuals as well as institutions to avoid treating persons as means to an end (*ibid.*, p. 220). This also includes socially desirable ends (*ibid.*). From this concept of dignity two key criteria for ensuring the well-being of a democracy in relationship to technology can be defined: first, democratic use of technology respects the dignity of an individual, promotes, and protects it and second, technology cannot be used in a way so that individuals lose their dignity – even if the outcome is socially desirable.

In Sensen’s (2011, p. 6 and 143) reading of Kant’s concept of dignity, dignity is not the name for a value but becomes a relation, when one thing is raised above another. What is raised above which other thing depends on the context this concept is applied to (*ibid.*, p. 144). This could entail raising one subject over others, such as prioritizing or assigning more dignity to

mathematics than other sciences. In this interpretation of Kant’s work on dignity, Sensen (ibid.) states that dignity is an expression for something having an elevated standing and not merely a relative value. It has a higher absolute inner value (ibid.).

In the case of democratic principles for technology, the requirement of respecting, protecting, and promoting human dignity then is not only a moral imperative, but also an intentional choice of elevating human dignity over the requirements of technological production. Avoiding treating people as a means to an end is only half the rent. Democratic uses of technology elevate human dignity above technology and its objectives.

2. Technology must respect, protect, and promote mental autonomy.

Mental autonomy, the freedom to think and decide for ourselves without intervention, is a cornerstone for individual dignity and a founding block for exercising our rights as members, citizens of a democracy. Functioning processes of democratic deliberation rest on an individual’s ability to participate in them freely and cogently. This is especially the case because considering the often-high conceptual demands democratic theories make on citizens. Deliberation rests on voicing competing perspectives freely with the intention to further a cause and find and formulate public opinion on an issue. To do so successfully and truly reflect the intent of the deliberative process – people with equal representation coming together to deliberate in the public sphere – a truly democratic process requires an exchange of minds that have arrived at their conclusions on their own. Mental autonomy, to arrive at one’s own conclusions in the privacy of one’s own mind, is a prerequisite for successful deliberation and democratic processes. It is the precursor for not only our existence as independent individuals, but also for a functioning democratic sphere.

Digital technology and especially social media thus far have delivered important and helpful lessons for the purpose of safeguarding the future of democracy. Platform structures, rampant data collection, and algorithmic content and product promotion turn individuals, democratic citizens in the political sphere into subjects of structures that undermine an individual’s ability to participate in a deliberative process and exercise their rights with full autonomy. This is the risk technofeudalism and any other related concepts and terminology, that analyze the shift in power that has taken place in digital capitalism¹¹³, pose to democracy. The status quo of digital technology impacts an individual’s ability to access information freely, in a balanced way, and out of their own volition. Algorithmic content delivery ensures that an individual sees whatever keeps them most engaged at the point in time when they are most likely to engage with a piece

¹¹³ neofeudalism, surveillance capitalism, cognitive capitalism, etc.

of content. Furthermore, when tapping into neurochemical pathways, tech companies toy with an individual's sovereignty to decide the conditions under which they may choose to view content. Hooking users and nurturing them on the path to compulsion is the antithesis of free procurement of information and independent processing in the privacy of one's own mind.

Learnings from the current era of technology show that the right to freedom of thought, even though it is already enshrined implicitly or explicitly in many laws, needs greater prominence in the public and political discourse on technology. Beyond their legal dimension, freedom of thought and mental autonomy are foundational principles of democratic interaction and as such require to be protected, respected, and promoted by tech companies. For functioning democracies in the present and future, incursions into an individual's right to mental autonomy by tech companies (or any other entity, for that matter) need to be null and voided.

The right to mental autonomy and freedom of thought is the foundational element of an individual's personal agency, their ability to participate in the democratic process, and for democracy to represent the will of the people, the democratic sovereign, more closely. It deserves utmost protection and requires greater recognition in political science scholarship on digital capitalism as well as a prominent role in theorizations of democracy for the future. Never before have technologies existed that enable manipulation at a mass level as precisely and predictably as they do today. Approaches to regulate the manipulation itself do not promise assured outcomes. Present challenges to democracy arise from the underlying structures of the economic and technological fabric; that is: technologies that view people as means to an end.

3. Individuals must own their data and have control over it.

Data is a key resource in the global economy. Data has become the chief commodity companies and governments alike vie for as data has become a form of capital in the digital economy (Viljoen, 2021, p. 578). Individuals navigate a maze of data-harvesting in their everyday lives, from cookie consent banners to platform practices of data extraction, and complex terms and conditions. Pressed for time and devoid of legal scholarship, an average overwhelmed person will most likely shrug, click on accept, and move on with their lives, if they want to use a service. In the background, data brokers, streaming services, reward apps, and the like purchase and sell personal data without an individual's awareness. Depending on legislation in a jurisdiction, consent to data harvesting, sharing and brokerage may likely be given through accepting lengthy terms and conditions or through not explicitly opting out of non-essential modes of data collecting and processing, for example in the case of cookie

banners. Consumers are at a loss here because of the power asymmetries in digital markets and their reliance on platforms in their daily lives. Furthermore, concerns about data ownership need to extend into the political sphere, as well, because questions of data ownership and control reorganize the relationship between an individual and the state. Furthermore, control of and access to large amounts of data can be a political concern on a national and international level.

Understanding data and its place in contemporary society, economy, and politics is complex. First, it is unclear what constitutes data ownership. For example: individuals produce data by interacting with data-harvesting systems. Data is as much a process as it is an absolute. Data analysis systems make data visible but require individual actions and interactions with these systems to create them. Even simple data like a date of birth or someone's name are administrative creations in the world. At which part of this process does individual ownership over data end and do aspects of co-creation that put data ownership into the sphere of a company or commons structure begin? Or does all data belong to the individual because they create it through their actions and lives, ultimately?

Hummel et al. (2021, p. 547) identify two spheres of debate in data ownership: “[...] the redistribution of material resources and the socio-cultural recognition of data subjects.” Data ownership, in their definition (*ibid.*) is an expressive resource for articulating and negotiating claims in both aforementioned spheres. Furthermore, there are two approaches to conceptualize data in the context of legal reform that are helpful for understanding the concept of data for political theory – propertarian and dignitarian reform proposals (Viljoen, 2021, p. 583 f.). Propertarian concepts of data reform understand data as an alienable right to labor or property that can be sold, dignitarian concepts view data as an extension of data-subject selfhood and seek to strengthen individual rights over data ownership as a consequence (*ibid.*). Viljoen (*ibid.*, p. 584) suggests a third variant: data as a democratic medium, that conceptualizes data's ability to cause social harm, requiring a commitment to collective forms of ordering data in institutions. Her proposal views data not as an individual, but a democratic medium that is tied to macro-level, social interests (*ibid.*, p. 638)¹¹⁴. In this proposal, data becomes a relational matter. Furthermore, there are legal proposals that question whether property rights, ownership over data, are the correct framework for conceptualizing data (Hummel et al., 2021, p. 568).

¹¹⁴ This approach is relevant for public-interest use of data, for example in municipal projects where individual interests need to be balanced with collective ones. Under this framework, an individual may need to give up their data for the collective benefit.

How can political theory view this? As Viljoen (2021, p. 584) remarks, data raises questions on individual and collective ownership, as well as its distribution and benefits. In the case of matters of communal or collective well-being, an individual's ownership or control over their own data may need to be deprioritized over the meso- or macro-level interest. However, this leads to a slippery slope argument on encroaching ever more deeply into an individual's sphere for the – in some cases supposed – common good that obfuscates the detrimental consequences abuse of data can have on individual and collective well-being, as evidenced by the current critical debate on tech companies. Furthermore, theoretical approaches cannot assume that governments or public actors will act in good faith when it comes to data stewardship and governance. The NSA scandal or the redirection of technologies designed to combat COVID-19 to law enforcement and intelligence services globally have shown that public actors are not immune to data abuse, either (Burke et al., 2022). Additionally, there also is an increasing overlap between commercial data harvesting and government. In the early 2000s, the NSA purchased telephone data in bulk from companies like AT&T and Verizon (Gellman, 2020). Fog Reveal, an app used in law enforcement, is another example for this. The app relies on advertising identification numbers that are culled from smartphone apps that target ads based on a person's movement and interest, like Waze or Starbucks, among others (Burke & Dearen, 2022a). Advertisement IDs are unique numbers assigned to a mobile phone that enable individual tracking and identification of a device, but not the name of its owner (Burke & Dearen, 2022b). Fog Reveal then buys this data and law enforcement uses the app's services to access so-called “patterns of life” of individuals that can be determined with the geolocation data from commercial apps (Burke & Dearen, 2022a). In essence, Fog Reveal allows for mass tracking and surveillance of individuals on a budget powered by advertisement data. Both examples show that the boundaries between markets and governments are fluid.

Once generated, data can travel and be aggregated into bigger and more abstract models of analysis and surveillance. Big data and algorithmic analyses can impact the life worlds of individuals, their access to loans and jobs, privacy, freedom from discrimination, and freedom to execute their constitutional rights like freedom of expression or freedom of assembly. These downsides and challenges need to be carefully weighed against any upside or collective benefit of data processing. Furthermore, current practices of data production raise the question of reasonable consumer expectations when it comes to their data privacy. If somebody buys IoT (Internet of Things) household items and devices, what is a reasonable expectation of data gathering in this context? From a semantic point of view, usage of the term “data mining” is revealing. Who does one mine data from and under which conditions?

All the above pose pressing questions to democracy theory. How can one assure dignity (in the Kantian sense) for individuals who are moving through systems set up to mine them for data? Imagine, as well, the challenge for democratic processes in an era where, through increasing datafication, citizens can watch their privacy melt in front of their eyes. If individuals become more transparent through public, surveillance, and commercial data-gathering, the information gathered may impact their ability to participate in the democratic process. What if, for example, data gathering revealed uncomfortable personal secrets, shameful events, or other instances that may cause the loss of an individual’s social standing or acceptance¹¹⁵? This may further inhibit an individual’s willingness or ability to fully participate in deliberative or political processes. Aside from that, in current usages of data analysis, search engine algorithms have shown to discriminate against minorities (Noble, 2018), big data models can negatively impact career, insurance and credit opportunities, as well as the working conditions of an individual (O’Neill, 2016).

Fundamentally, the question of data in a democracy raises the question of the role of an individual in relationship to the collective. Where data processing models are applied inadequately, they can remove dignity, opportunity, and means of participation from a person. In the case of public data gathering, accountability and responsible data stewardship are key to maintain the balance in a delicate relationship between an individual’s privacy and the greater good of a society one belongs to. Recent examples of surveillance activities and data migrating between agencies (as in the case of COVID-19 measures (Burke et al., 2022)) have shown a substantiate disregard for transparent and responsible public use of data. The grand challenge of any public (and private) data collection regime is how to support and maintain an individual’s agency. In a world, where algorithms, public agencies, and tech companies might know as much or more about you than yourself, an individual is threatened with a loss of agency and autonomy. The more you know about somebody, the easier it is to manipulate them, as the history of social media in the past years has shown – especially in the case of Cambridge Analytica.

To reverse this dynamic and confer more power back to the democratic sovereign, democratic usage of data puts control and ownership of data back into the hand of the individual. Widespread public and private data-driven surveillance cannot be the grounds for democratic collaboration and idea-finding. It is challenging, nearing impossible to create societies based on cooperation and mutual acceptance, an important quality for democracies, for example when it comes to the respect and protection of minority rights, based on a foundation of widespread surveillance. Data thus needs to be considered a private good of an individual that

¹¹⁵ Referencing the framework of morality, not legality here.

can only be created and accessed with the individual's consent. Following the *dignitarian* approach, this implies that data is an extension of the personal sphere that must be strengthened and protected. Furthermore, this approach also requires protection from harm or disadvantages for those who choose to abstain from sharing data.

4. Technology must respect privacy.

Privacy, the sphere where one can expect to be completely unobserved in one's acts and thoughts (Sætra, 2019, p. 3), is eroding, melting away in the digital age. In the digital age, privacy encompasses two layers: being left alone as well as the collection, storage, and use of personal information (Nissim & Wood, 2018). Privacy is an important virtue in a democratic society, as collecting sensitive personal information lends tremendous power to governments and corporations (Debrabander, 2020, p. 10). In the present, the data layer and moral layer of privacy are intertwined. Without data privacy, there is no personal privacy:

“Political philosophers and theorists have long warned that privacy is a prime target of ruling powers, who would happily invade it in order to subdue or control us. What’s new today is that we the citizens join in its destruction – actually, we are the principal agents of its demise.” (ibid., p. 9).

Presently, privacy is giving way to a confessional culture on the internet (ibid., p. 11). Studying Instagram in this dissertation demonstrated that exposure of the self for personal branding purposes is paramount and pervasive on the internet. There is a social expectation built into the culture of social media to share freely from spheres that were previously considered sacrosanct: the home, family, one's body, and children, for example.

In the relationship between privacy and government, political theorists have long warned that government access to personal data can create immense power and conditions for abuse and oppression (ibid., p. 10). Even though outrage after data scandals briefly creates attention on privacy issues, the media moves on quickly and the issue moves to the back of the list of political and public priorities. Even though citizens might want to protect their data more, many might not know how – and even then, there is a sense of suspicion that they may not evade government surveillance, especially considering Edward Snowden's revelations on the NSA's intelligence activity (ibid.).

In an unexpected twist to previous scholarship and debates, corporations and individuals become actors in the field of surveillance and privacy in the digital age. In the model of surveillance capitalism (Zuboff (2019a), tech companies build their business models on data processing based on surveillance regimes. This confers mass surveillance powers not only to the government but to businesses, as well. Current online culture is adding fuel to this fire, as

users have been feeling compelled and encouraged to share details of the minutiae of their days and lives out of their own volition. Or rather, this is a cocreation between individuals under the guise of an online culture that prioritizes self-branding and elements of celebrity with tech companies' incentives to coax more data out of people – openly and covertly.

Privacy, once an important tenet in the relationship between an individual and the state is under pressure in these circumstances. Furthermore, a person must redetermine the locus and stature of privacy in their relationship with corporations and other persons, as well. This is a three-dimensional meltdown of privacy in the age of the internet and digital technologies, inviting comparisons with a rising reality of Bentham's panopticon. Bentham's hope was that if it was implemented in a variety of fields across society, people would be motivated to behave morally, work diligently, and become better people all around (Debrabander, 2020, p. 12). We are witnessing the first elements of a such panopticonist culture online, already. Online public shaming, cancel and call out culture, and the like make pointing out another – famous or not – person's flaws, past errors, and problematic aspects a team sport of social media investigations and commentary. What users in this dynamic overlook is that this creates a culture where everyone could be up next for public investigation by the online commentariat. This significantly stifles the requirement for deliberation and expression of one's own thoughts and opinions online:

“Privacy is a key ingredient allowing individuals to feel safe reaching out to others, and contributing to a democratic government devoted to serving the people” (ibid., p. 35).

Privacy is the space we need to remain comfortable and productive members of society (ibid.).

Furthermore, this dynamic in tandem with considerations on the growing power of tech companies' data collection, necessitate a right to be forgotten on the internet. In Europe, a such right was effectively introduced with a requirement for search engine operators to remove links to personal information from search results (EUR-Lex, 2023). Privacy in this context also means to be able to shield one's past from the public view on the internet, especially considering that social media users may not have been aware of the full extent of the consequences of their data sharing online in the beginning stages of social media two decades ago.

Privacy structures an essential element of the relationship among individuals and an individual and the state. In the present age of surveillance capitalist business models, privacy also must structure the relationship of an individual with corporations. “Privacy provides that crucial space where we can be self-determining individuals, in tune with our unique wants, values, and designs – where we feel safe and emboldened to contemplate and cultivate them”

(Debrabander, 2020, p. 34). The well-being of a democracy and individuals relies on privacy as a principle to shield one's innermost sphere. Only with privacy can we cultivate the relationships we need and form opinions, deliberate, and participate in public life. Taking lessons from the era of web 2.0, surveillance capitalism, and technofeudal models, future concepts of technology use need to respect and protect this essential feature structuring human relationships and relationships between people and the state as well as corporations. A relinquishing of privacy renders people objects of surveillance (ibid., p. 25). Destroying privacy in totalitarian states even is an act of violence to coerce and terrify citizens (ibid.). With privacy threatened, personhood is at stake (Debrabander, 2020, p. 23).

Privacy plays a key role for the functioning of a democratic social and political order. Furthermore, it can be viewed as an aggregate public good that is constructed through the combined and sustained actions of most individuals (Sætra, 2020, p. 1). If we conceive of privacy as this aforementioned key element of a functioning democracy and accept that it is something that is not just in the sphere of an individual but co-created socially, it becomes more evident that privacy deserves, requires protection, respect, and its promotion in the digital age. The loss of privacy poses too great of a risk to the well-being of a functioning democratic system. At present, tech companies' incentive structures – through consent and manipulation – lead users to sharing enormous amounts of data. These data then can also wander into the hand of public institutions through data brokers (Burke & Dearen, 2022b). Privacy is a political matter here for two reasons: in their direct relationship through its role in creating a boundary between the state and the individual and in their indirect relationship through commercial data that is passed on to public actors.

This present state of technology informs the fourth democratic principle for technology: that technology must respect privacy. Too much is at stake with the loss of privacy in front of governments and corporations. A loss of privacy also means a loss of trust in interaction with others. Privacy is essential for democratic deliberation. For a person to be able to partake in a public, deliberative discourse, they need the privacy of their own minds (and maybe homes) to intuit their own needs, opinions, and positions. Without privacy, a person will struggle to fulfill this essential step and their democratic rights. How is one supposed to vote in accordance with the volitions of their own mind without intervention, if one does not enjoy privacy? Technology in the present and future needs to respect and protect privacy on a data and individual level to ensure the functioning of democracy.

5. Technology must be equally accessible.

When the internet first arrived, it garnered great hopes that it would act as a catalyst for democratization across the globe. Finally, there was a way for people to connect directly and easily, for people to voice their opinions in the digital public sphere, and for humanity to come together in the digital ethers. Little remains of this optimism, as digital technologies have not turned out to be beacons of equality.

Digital divides limit or promote an individual's ability to partake in the use of digital resources. Digital inequalities can relate to disparities in access, actual use, and use efficacy of digital tools (Vassilakopoulou & Hustad, 2021, p. 1). Equal access to technology, thus, is an infrastructure matter as much as it relates to skills and education. Participating in society requires equal access to the internet and all further future technologies. At present, concepts of equal accessibility are encapsulated by the principle of net or network neutrality, “[...] the idea that internet service providers (ISPs) should treat all data that travels over their networks fairly, without improper discrimination in favor of particular apps, sites or services [...]” (EFF, 2023a). With future developments in AI in mind, a concept of equal access to technology needs to transcend net neutrality to apply to AI, as well as other future technologies.

Democracy rests on the principle that its members are equals – equally valuable, with equal access to rights, and equal duties. Present and future technological developments ought to honor and promote these principles. An example from the present: assuming that online social networks, blogs, and other internet fora are elements of a changing public sphere where democratic deliberation takes place, unequal access or a lack of knowledge and skills about how to use them diminishes an individual's ability to exercise their democratic rights. The same applies to AI tools and future technology, not only in communication. Wherever a technology impacts an individual's ability to participate fully in the democratic process, it is paramount to make this tool accessible under the guise of a type of tech neutrality as the next developmental step of net neutrality.

Furthermore, as Vassilakopoulou and Hustad (2021, p. 1) pointed out, access to technology is not the sole factor in determining digital divides. For full participation in society and democracy, individuals and users of technology also need to understand how to apply it – and efficiently so. Beyond socioeconomic factors determining access, motivation, personality, and skills also determine digital divides (ibid., p. 5). Even with theoretically equal access to digital technologies, there may still be differences in skills due to education and training or because of difficulties in operating a technology for people with disabilities (ibid., p. 9). Factors such as

age or whether an individual is part of a marginalized population group can further affect digital divides – even though in the case of age, the digital divide varies (ibid., p. 7).

Access to digital and future technologies needs to be two-part. Democratic principles for technology need to acknowledge socioeconomic and socio-technological factors in access to technologies like net neutrality but also infrastructure like accessibility of connection¹¹⁶. Access needs to be possible in theory and from a technological standpoint. Beyond this technological prerequisite, democratic access to technology needs to consider training and skilling individuals. This also includes education on intentional use of technologies, data protection, and digital well-being. Truly overcoming digital divides and enabling equal access to technology for the sake of democratic participation also includes, requires agency to determine the right amount of technology in one's own life, as well as the ability to truly grant informed consent when using a technology, for example when it comes to data collection. Furthermore, one's chosen level of technology access cannot be grounds for disadvantages. Irrespective of future choices on connectedness and use of digital technologies, individuals need to be granted the same political and social rights of participation. This will likely be more prominent in the field of neurotechnologies. In a functioning democracy that respects an individual's agency and dignity, choices on whether to participate in a technology or not must be truly free and require informed consent. Any reality, as is already foreshadowed in the present with the far-reaching market powers of platforms, where individuals need to consent to the use of a platform for fear of missing out on economic, social, or political opportunities or even losing part of their rights is a violation of democratic principles for technology. The choice on whether to use a technology or not must be truly free, especially as they encroach ever further into our most private domains.

A Democratic Framework for the Development and Use of Technology

All five of these democratic principles for technology weave together a fabric of norms and create a framework that can help in decision-making regarding the development and use of technologies. Some examples on their practical meaning in light of the challenges discussed in the previous sections: Current forms of platform capitalism require change because they violate several of the principles stipulated above such as data ownership, rights to privacy, human dignity, and mental autonomy, creating an imbalance in the public sphere that affects the robustness of democracy, as well.

¹¹⁶ One example for this are rural-urban technological divides.

Consider the case of outsourcing decision-making to technologies. Neil Postman (1993, p. 115) describes the lure of transferring decisional power to the computer in a way that can also apply to algorithms and AI:

"Because of its seeming intelligence and impartiality, a computer has an almost magical tendency to direct attention away from the people in charge of bureaucratic functions and toward itself, as if the computer were the true source of authority."

Outsourcing decision-making to a technology can be a convenient way to abscond responsibility. Doing so allows for a transfer of human agency to the all-knowing capabilities of the algorithm and AI, creating a deity-like power in human lives. Outsourcing decisions to algorithms without any avenue for genuine human appeal violates the requirements for human dignity and mental autonomy for democratic uses of technology. When an entity that has not been voted for and is owned by individuals or a corporation with business interests attached to it, this not only creates undemocratic conditions but also societal disruptions that then can influence democratic participation. Societal disruptions through algorithms and AI can occur through unequal access to opportunities, unequal access to understanding how to use and leverage them most efficiently, and through creating unequal conditions in the sphere they are applied to, as this dissertation has demonstrated in the case of platform companies. When you cannot appeal to the algorithm or an AI-based decision, you are reduced to the data somebody else or an entity has collected on you, reducing human existence to code that then becomes law. In this context, O'Neill (2016, p. 8) points out that the effects of tech-based decision-making tend to affect groups with lower socio-economic standing. Those well-connected enough need not refer to the machine to gain access to credit, good insurance rates, jobs, or a spot at a top university. This risks the creation of a world where true social and political power exist beyond the reproach of machine-based decision-making, again violating the principles of human dignity in relationship with technology.

The intention behind these five principles is to further democratic understanding of technology and how technology can be designed in a way to enhance this form of government that is increasingly under pressure. The five principles are also aimed at helping citizens and people understand and redefine their role as well as the role of the collective and society in relationship to technology. They are intentionally simple and straight-forward to allow for broader receptivity and expansion, where required or necessary. In the past decades, discourses on technology have been shaped by the owners and creators of technology, promising ease, efficiency, and optimization while fortifying the narrative of technological determinism. Later, in the period of techlash, that we are in at the time of writing this dissertation, the public discourse on technology has focused on its shortcomings and harms to individuals and society. It is

important to recognize what has not been working to remedy it and correct imbalances of power. However, we also urgently need a new story around technology, human meaning in the world, and the role of democracy. This is especially the case in an age of authoritarian tendencies (Repucci & Slipowith, 2022) and the lure of introducing efficiency and actuarial thinking into all areas of our life through technology.

Lastly, these principles help in refuting the anti-enlightenment tendencies of current technology. Tech that respects human dignity, mental autonomy, ownership of data as an extension of personality, privacy, and equal access fortifies the core and simple tenet of enlightenment that Kant (1784/2023, p. 1) postulated: emergence from self-imposed immaturity. In the case of the current tech landscape, immaturity has two aspects: cultivated immaturity through the current modus operandi of tech products and a measure of self-imposed immaturity in Kant’s sense, when individuals accept the status quo of technology in their lives with a shrug. Change in the technological sphere and its relationship with individuals and society needs to wrest individuals’ cultivated immaturity from the grasp of tech companies. Change also needs to come from the individual level, recognizing the current dynamics and demanding that technology needs to do more than just serve conveniences, whose conditions we accept with an overwhelmed shrug.

Further Suggestions – Acceptability Across Ideologies, Alternative Startup Funding, Antitrust Regulation, and Governance of AI and Algorithms

The above democratic principles for technology align with Weissenbacher’s (2018, p. 294) helpful concept of “acceptability across ideologies”. They are a helpful lens for evaluating the role of a technology for the future. When developing a technology, Weissenbacher (*ibid.*) suggests asking yourself: “Would I be comfortable with this technology in the hands of my least favorite politician, my ideological opponent, or someone with a different and opposing religious worldview?” Specifically, he suggests asking this question before and while developing a technology, not after the fact. His recommendation is addressed to technologists and their role in shaping the world, rejecting technological determinism. If technologies are social artifacts, then it matters that the people creating them evaluate their impacts. At present, there is a huge deficit in ethical awareness in the technology industry. True change in this sphere can only come through a change in its culture, overall.

Achieving this is challenging, because it requires a course correction in the culture of technology and the financial models behind it. At present and over the past decades, the tech industry has yielded huge financial benefits to investors, founders, and employees alike. As an

employee of a tech company, having stock options as part of employee compensation can mint millionaires or make a difference that is significant enough to buy a home, for example. Tech is a dynamic industry where one can create generational wealth rather quickly – if one picks the right team. At the level of investment funds and their limited partners, the greatest challenge to change is that venture capital’s financial model asks for and rewards taking huge risks. With these outrageous bets come incentives to do what it takes to achieve valuations, growth, and market dominance – all in service to returning investments and not always in service to the common good. Just as the tide has turned in consumers who now place greater value on corporate social responsibility, a turning of the cultural tide in the tech industry could create enough impetus for change – especially in the realm of consumer products. On the other hand, as studying the underlying mechanisms of Instagram has shown, this is an era where technological possibilities for persuasion and manipulation are much more far-reaching than ever before. Unless tech companies follow the principle for protecting, respecting, and promoting mental autonomy, there might be several avenues to circumvent independent decision-making in customers. The best case to happen here is a turning of the cultural tide that makes tech companies and their environment decidedly uncool to diminish an inflow of employees and returns for startups.

That still does not solve the role of financial incentives in the tech world. Potentially, there might be a future need for regulation for the venture capital sector that realigns the financial incentives with the incentives of a state and democratic governance. It is important to bear in mind that venture capital also fulfills a necessary role in the current startup ecosystem. Technology companies – especially so-called DeepTech companies that, for example, create new energy technologies – require capital injections. Oftentimes, these projects are too risky or too far out for capital injections from conventional financial institutions. It is a combination of an unhealthy culture that focuses on its own mythologization and politics, conjunct with the mindset that you can solve any social problem with technology, if you only try hard enough, and the financial incentives around it that has created the current challenges. Some form of investment will likely remain necessary, but what it looks like might need to change.

At present, outside options to financing the growth of new startups already exist. These more patient forms of capital like the Calm Company Fund or Climate KIC’s *TransCap Initiative* support innovation through financialization models that prioritize sustainable growth – in economic and environmental terms. Public actors like the European Investment Fund (EIF) presently provide support to impact funds (EIF, 2023). However, to create a true change in the financial incentives around startup investing and thus a remedying force to the financial

conditions of the technology world, greater support of alternative fund models by public funds that act as limited partners may be helpful.

Further, existing laws should be applied more thoroughly in the arenas of antitrust and competition laws when it comes to tech companies. In a platform economy, large and impactful companies exert significant market power, as discussed in the previous sections of this thesis. Companies like Google, Amazon, or Facebook/Meta are quasi-monopolists or are active in an oligopoly market that not only creates significant influence within their own markets and sphere of influence but also outside of them, as platforms tend to dominate surrounding markets, as well. Whether or not these companies breach antitrust law is a nuanced legal matter. However, this deserves a closer investigation.

In Europe, the EU Commission has been active in the realm of antitrust investigations for over a decade. It opened an antitrust investigation against Google's shopping practices in 2010 (Hausfeld, 2023). While the Commission reached a decision in 2017, the judicial process is still ongoing with Google's appeal in process at the European Court of Justice (InfoCuria, 2023). Recently, the EU Commission has opened an investigation into possible anticompetitive conduct by Google and Meta on agreements in online advertising (EC, 2022). Furthermore, the EU passed the Digital Markets Act (DMA) which will be in effect in May 2023 (EC, 2023; Hausfeld, 2023). The DMA aims to curb the power of platforms (so-called “gatekeepers” in the parlance of this law), establishing obligations for them for example allowing “[...] business users to access the data that they generate in their use of the gatekeeper's platform” (EC, 2023), and preventing platforms from tracking end users outside of their core service (ibid.). To ensure these rules, the European Commission will carry out market investigations (ibid.).

In the US, the Federal Trade Commission (FTC) has filed an antitrust complaint against Facebook (Brandom & Kelly, 2021). The complaint alleges that Facebook has engaged in a systematic strategy to eliminate threats to its monopoly by acquiring its rival Instagram in 2012 and WhatsApp in 2014 (FTC, 2020). The FTC's complaint's aim is for Facebook/Meta to sell off Instagram and Facebook, prohibit the company from imposing anticompetitive conditions on software developers, and require a prior approval for any future mergers and acquisitions (ibid.). While contested, the FTC's efforts show that there is a growing awareness and willingness to act in order to curb the market powers of tech companies in Europe and North America. In both cases, the EU and US, there have been ongoing debates on tech companies' breaches of antitrust laws, whether these companies are monopolies or not, and how to apply existing laws in the context of these companies (Hovenkamp, 2021; Khan, 2017).

On a further note, measures to require more transparency and insights into algorithms may be helpful for the robustness of democracy in the digital age, as well. Algorithms and AI are somewhat of a black box, because it is not always clear how the program arrives at a certain outcome (Schneider, 2019). Algorithms are also value-laden (Kraemer et al., 2011, p. 251), considering that they are artefacts and a reflection of social construction and interactions. The preferences of software designers, the owners of an algorithm, as well the context and values the creators of algorithms move in can have an influence on not only what an algorithm is used for but also how it is designed on a conceptual and computational level (*ibid.*). Algorithms can affect how people interact, associate, and think, intensify decision-making based on actuarial logic, and support the consolidation of power of the people who control them (Burrell & Fourcade, 2021, p. 213). Given their profound effect and the rapid advancement of AI technologies, these technologies (as well as future ones) require a forum for public intervention and co-stewardship. Many industries are regulated and governed by a public body, for example for the approval of medicine. Creating an oversight board for AI and algorithms can help wrest power from the owners of technology and place more of it in the hands of the public sphere. If algorithms and AI can play decisive roles in governing an individual’s access to opportunities, services, finances, and social participation, among other things, they have far-reaching effects on the social fabric and the constituents of a democracy. Thus, it is a key factor that they are audited by a governing board and with the support of ordinary citizens that could be similar to jury duty in the United States or the *Schöffengericht* in Germany, where laypeople nominated and voted on by a local commission work as volunteer judges over the course of a five-year term. In the case of algorithmic, AI, or technological governance, positions of lay evaluators of algorithms in the governing board could also be included as part of public voting in the regular election cycle. Public participation in algorithmic governance like this would increase transparency and create more agency in administration and control of the technologies that increasingly govern our lives.

8. Instagram’s Lessons on the Relationship of Technology and Democracy

What is Instagram and how can we think about it from the perspective of political theory? What is political about Instagram beyond images with political subject matter? To answer this question, I applied an interdisciplinary approach matching Instagram’s dual character of image material and medium for dissemination. An in-depth investigation of Instagram has long been overdue considering the reach and impact of this image centric platform two billion people regularly use. The sheer number of Instagram users demonstrates that studying the platform is important in and of itself.

Instagram plays a profound role in our life as the section on the power of the images, photography, and visual cultures on Instagram highlights. Foundationally, I accept and follow theories of the image that ascribe images with agency and a potential to become independent actors, like Bredekamp’s (2021) *Image Act*. This is important to delineate the special role Instagram plays in comparison with other social media platforms. As a platform where users share photos and visual material, Instagram is special because it provides a framework for communication where the power of images unfolds in ways unlike other big social media networks that are text-based (Twitter) or offer combinations of text and media (Facebook).

On the platform, photographs retain pre-digital functions such as the preservation of memories. At the same time, these functions also shift and get reimagined for the digital sphere, for example through the instantaneous mnemonic function of posting one’s attendance of a concert. Overall, images on Instagram are vehicles for self-branding practices in the attention economy that lead to a commodification of the self, our experience, and lived environment to attract attention and as many glances as possible. This can then be converted into social and cultural capital (followers, likes, engagement), as well as economic capital (for example sponsored content, ads, merchandise). Visual culture practices such as sharing travel and nature photos are informed by these greater trends and currents on the platform. Average, non-influencer users still follow similar visual conventions and aesthetics as their microcelebrity counterparts do. Visual hegemonies present themselves on Instagram – depending on certain subcultures – the reason why so much content in certain niches looks so much alike (in addition to the mediating effect of the algorithm).

On Instagram, self-branding is pervasive. In the case of influencers, it is a tactic of microcelebrity. In turn, celebrity thrives on the currency of self-commodification. With clever use of images, technically every Instagram user has the chance to accrue the necessary

attentional capital on their profile to turn their posting activity into an economic opportunity. This, however, leads to two consequences: image materials and photographs that conform to the perceived tastes of the masses, often creating very bland, repetitive iconographies, and a drive to share ever more parts of one’s life to create the novelty, performed or real authenticity, and excitement required to garner digital attention.

Cultural tendencies as well as self-branding strategies on Instagram lead to a fundamental shift from a representational to presentational cultural regime in line with Marshall’s (2020) findings. This is a dynamic that plays out beyond Instagram. However, following cultural studies and art history scholarship, Instagram stands out among the other social media apps due to the power of the images that can be shared on platform. Instagram thus becomes a different driver in this process than Twitter or Facebook, for example. This is evident in branding practices of stores or restaurants that are optimized for instagramability and social sharing of aesthetically appealing tablescapes and interior designs. Paradoxically enough, customers who take a photo of a restaurant or store, tag the establishment, and share it on Instagram, perform unpaid advertising work on behalf of these businesses. They have paid for their meal and perform unpaid labor on top of that. Doing so, users continue to weave a transactional culture of communication and sharing photographs on the platform that is more like a constant advertorial for the self and others than communication. Photography here becomes a tool to commodify the world and one’s experience in it.

Societally, we have now practiced these presentational and commodifying regimes for over a decade on Instagram and even longer on other social media platforms. This was a gradual development and the advertising and entrepreneurial landscape on social media networks including Instagram have changed over the years. And yet, a decade’s worth of using photographs for self-branding and commodifying experience, all to garner attention in the attention economy, has long-term, subtle, and gradual effects on the social fabric. Marshall (*ibid.*) describes this in his hypothesis of a societal and cultural shift from regimes of representation to presentation that affects the underpinnings of democratic societies and structures that were built on the former.

Reckwitz (2020) takes this further and posits that in a cultural environment – again, mediated through images and used by two billion people – that focuses on self-branding, other, more atomizing tendencies emerge. He posits the concept of the singularity that describes not only how we strive for everything in our lives to be singular, special but also how this isolates individuals, because it leads to commodifying behavior and isolation, atomization in society.

Images on Instagram are thus political beyond political subject matter in their aggregate usage and the cultural, social, and economic practices that surround them.

Instagram is also a medium and I spent the second major section of this thesis exploring how the underlying conditions in the production of technology products interact with society. Borne from the techno-optimist and technocratic culture in Silicon Valley, platforms like Instagram reflect the spirit of the environment that created them. This includes monetization and business models, choices in the user experience, as well as choice architectures built into digital products, among others. Venture capital funding with its requirements for outsize returns exacerbate this in the case of Instagram as well as many other web 2.0 apps and companies. These businesses prized user growth above monetization, thus creating pressure to generate revenue at a later point in the company’s trajectory. Ad-based revenue models emerged to solve this, fueled by data-harvesting practices that are encroaching on all aspects of our life, as Shoshana Zuboff (2019) demonstrates in her work on *Surveillance Capitalism*. Data plays a special role in consolidating and fortifying the power of so-called platform companies – digital companies that create multi-actor markets they come to own and dominate through intentional market design. On the platform, every interaction is measured, monitored, and used to align the goals of the user with that of the platform and its owner.

In the case of Instagram, visual culture practices and widely shared efforts in self-branding in the attention economy provide economic and communicative opportunities on the one hand but are truly informed by the underlying logic of the platform. When a user shares photos on Instagram, they may think they are doing so for themselves. Most likely, they are engaging in this behavior due to the prevalent modus operandi of self-branding as well as the goals of the platform that its users are conforming to. Individuals may not consciously align their actions with a platform’s goals. However, technological means such as persuasive technology and manipulation allow platforms to create this goal alignment gradually and covertly. In the case of Instagram, these goals may be data collection and maximizing time of an individual user on the platform to optimize ad services for paying clients. Algorithms are tools platforms use to steer content delivery in a news feed according to these practices, as well.

All the above poses several challenges for democracy, as described through two approaches I used to account for the different aspects of Instagram with its two-fold focal points of content and medium. Visual cultures on Instagram are a contemporary extension of the *Culture Industry* (Horkheimer & Adorno, 2006). While media and technological conditions have changed since the 1940s, when the authors wrote their essay, the underlying tendencies are still the same. All the pretty pictures users post on Instagram obfuscate and maintain the

existing economic order. They do so with the users’ active participation when they scroll, post, comment, and like on these platforms.

However, this does not explain how Instagram may affect democracy in a more direct way. Applying Habermas’ (1991) *Structural Transformation of the Public Sphere*, including its 2022 update, we find that social media has contributed to decisive changes in the public media and deliberation architecture. Not only have social media dissolved the shared public sphere of traditional media into sub-publics online, but they have also changed how we deliberate together. Habermas’ theory of the public sphere presupposes reason as the foundation of deliberation and a shared epistemic interest in whatever is the subject of a debate and discussion. When communication on Instagram and social media platforms is undermined by algorithmic distribution, where the algorithm decides which information might be most interesting with little to no means of input for a user, and when our modus operandi on Instagram and elsewhere is shifting to self-branding, we not only do not have the means to meet and interact freely without algorithmic interference anymore, but also navigate an environment where many communicative acts are fueled by a transactional, commoditizing logic. This undermines the democratic process Habermas envisions.

Furthermore, I disagree with Habermas’ assertion that platform practices may be important but less meaningful than other factors he discusses more extensively in his 2022 update of *The Structural Transformation of the Public Sphere*. Algorithmic distribution of content, persuasive technologies, and cognitive manipulation all share the same throughline of business and economic practices in digital capitalism that favor monopolistic or quasi-monopolist actors such as platforms. When every element of communication – from what and how users share, to where they do so, and who gets to see what they have shared – is mediated by economic motifs in an environment that optimizes market design along the interests of the platform, this poses fundamental challenges to the well-being and functioning of democracies.

I posit that the practices in the digital economy at present reflect a deeply anti-enlightenment momentum of technology that encroaches on mental autonomy through behavioral modification techniques such as dopamine hacking. This creates structural challenges in the tech landscape that are best described by the technofeudal proposal. Technofeudalism is a term that emerged in the early 2020s and describes the creation and establishment of rentier economies across large swaths of the internet for the benefit of the few who control them. When users post photos on Instagram, akin to the feudal system, they perform all the work of maintaining the platform, making it interesting and valuable for others to use with their content, while also creating ever more data on user behavior to be analyzed and sold by Meta or other

tech companies. Thus, users perform work in a double sense: through posting and through the data collected that requires users’ actions on and interaction with a platform.

Both, the encroachment on mental autonomy and technofeudalism, pose great challenges to democracy. Simply put, we cannot expect democracies to function and thrive, when technology products undermine individual reason, as well as create structures in the economic sphere that are diametrically opposed to the informational environment a democracy needs. You cannot expect to maintain healthy democracies in a communicative and economic environment with increasingly feudal tendencies.

To remedy this, I formulate five democratic principles for technology. These principles are like mathematical axioms or meta norms and can inform legislation, regulation, as well as business and technological decisions of tech entrepreneurs. They are a foundational framework, not a regulative proposal, because the challenges described highlighted the need for a more proactive approach in defining the relationship between technology and democracy. This is especially the case at the dawn of a new digital age with rapid advancements in AI that will bring further acceleration to technological processes. These democratic principles for technology are a learning from the past to improve the future of humanity’s relationship with technology. Despite all the challenges social media, platforms, and surveillance capitalism, among other phenomena, have created, they can serve us to create a more intentional relationship with technology that supports individual, societal, and democracy’s well-being

This dissertation also has some conceptual limitations. Borrowing broadly from other disciplines comes with the risk of decontextualizing rich academic debates and histories between terminologies and concepts. This is inevitable, because – borrowing from Habermas’ (1991, p. xvii) preface to *The Structural Transformation of the Public Sphere* – when fusing together aspects of different eras of research and specialization, scarcely anyone will be able to master several disciplines in depth.

However, this thesis on Instagram, approaching technology and the multitude of its effects on the individual and collective experience from the point of view of a political theorist, needs to account for the various touch points Instagram has with different aspects of democratic reality such as communication, participation, opinion-forming, and the culture at large. For the study of something as multi-layered as Instagram, interdisciplinary approaches can yield greater insights to arrive at a meta-level theorization than political science alone can achieve. The merit of this dissertation lies in the multi-faceted theorization it provides on a significant lacuna, the theorization of the world’s fourth largest social network in the field. It far exceeds the scope

of existing research in the discipline that primarily focuses on Instagram use by political leaders and parties that is insightful, yet limited, because of its repeated focus on similar research questions (Instagram use by x person or political party in y country).

Yet, the broader an approach and the more interdisciplinary its nature, the more one must also accept and account for limitations in this approach. Simply put, one cannot know everything about everything. Yet, weaving together different disciplines creates a new tapestry of understanding. The interdisciplinary aspect of this dissertation offers points of departure for domain specialists to use the threads woven in this work and continue them with deeper explorations. The same applies for the five democratic principles for technology I formulated. I intend them as a point of departure for debate on democracy’s role in the digital age. A truly democratic concept for locating technology in our lives and society cannot spring from the mind of one person. However, a single person can offer a starting point, an initiation of a deliberative process to home in on the nature of the present challenges and find solutions to them.

9. Conclusion: Technology and Democracy at the Dawn of a New Era

At the end of the long 2010s, an era bookended by two global disruptions, the global financial crisis of 2008 and the COVID-19 pandemic in 2020, this dissertation looks back on the transformative changes digital and social media had on all aspects of individual and social existence during this long decade. This is not hyperbole. As this study of Instagram has demonstrated, platforms affect all areas of our lifeworld: how we think about ourselves, present ourselves, communicate, interact with others, the preferences and worldview we develop, and how we conceptualize the social and politics, among others. Some of these effects are contingent upon the image materials consumed on Instagram, others are affected by the underlying dynamic of data harvesting and algorithmic content curation in the platform economy.

While the public has long been aware of the multitude of effects the digital transformation can have on individuals, culture, and politics, only now, at the beginning of the 2020s, the longer-term consequences of social media and platform models are coming to light. Now, the effects of the changes in digital capitalism in the 2010s and the societal and political transformations they have created are becoming evident. Much is in flux. The path of future evolutions in defining the relationship of technology and democracy as well as of technology and the individual is not clear, presently.

Digital technologies in the past decade have initiated a change to the foundations of societies. They affect the public sphere, where individuals meet to formulate and exchange ideas as a part of democratic deliberation. They have changed the way we think about ourselves in relationship with others. The underpinnings of society have moved from the individual to emerging singularities, people as brands competing with each other for eyes and ears in the attention economy.

All this changes how we think about ourselves and our place in the world. What is the self at the intersection of the individual and the singularity brand? What does personhood mean in an age of ubiquitous online profiles that can act as branded extensions of the self? How do these selves come together and where can we continue to write the story of democracy – and the story of us, humans? In an environment mediated by algorithms serving the logic and interests of proprietary platform markets, digital forces are chipping away at mental autonomy. How does one know whether what one likes is truly a reflection of one’s own interests instead of having been trained to like something by the algorithm?

To an observer of technology critique, it can feel like this segment of academia and media is not producing much but more bad news. Current storytelling around technology in the social sciences, media, and culture is often bleak, bordering on dystopian. This is contrasted by the tech industry’s enthusiasm for their own creations. In the tug of war between technologists and those who criticize them, so far, the tech sector has led the charge. They are faster, cooler, and offer a vision of ease and convenience. Yet, all this incurs a cost, and not just that of a SaaS¹¹⁷ subscription model. Techno-Cassandras may repeat this time and again, yet so far to little avail. We know about Instagram’s harm to the mental health of young people, especially girls, as well as Facebook’s indifference to disruptive events such as the Cambridge Analytica scandal. Despite public repentance rituals in the aftermath of these events or when yet another whistleblower leaks new, frustrating information on the wrongdoings of these companies, little changes. The commentariat writes, things stay the same. Too strong are the pull of convenience and quasi-monopolistic powers these companies exude.

At the dawn of a new age in technology with the advent of the widespread proliferation of AI technologies, humanity is in urgent need of an overhaul of its cultural practices surrounding not only tech critique and analysis but also its relationship with technology overall. It is to be expected that technological affordances of AI systems will speed up the deployment of even more technology, for example by making software engineering more efficient. Just like the currently available technologies of which I reviewed Instagram for this dissertation, AI holds great promises for great leaps in human ability as well as the danger of cataclysmic effects. Dealing with technology is increasingly becoming a high-stakes gamble with great rewards and gigantic downsides. The scales of reach and impact have changed and continue to change. Not only can a single Instagram profile reach millions but a company with less than 100,000 employees operates and has insights into the communication streams of billions as is the case with Meta.

Further, as parts of this dissertation have shown, we are in the middle of the process of redefining the role of the self and its relationship with the social, the collective. The concept of personhood is underwritten, maybe hollowed out by brandification, a turn to the presentational, and an existence as a singular entity, a singularity as Reckwitz (2020) suggests. Together with the epochal changes to communication in the digital public sphere, this may seem like a dark cloud looming over the future of democracy.

¹¹⁷ Software as a Service, a common revenue model for software businesses where you pay a monthly subscription fee to access a program.

Well aware that I, too, am part of the commentariat on the current state of technology, I want to share some closing thoughts that project a different path for the direction of humanity’s relationship with technology. The long 2010s in many ways reshaped our lives from the ground up at the intersection of socio-economic developments and technology. Critics, academics, the media, and engaged users have spent – and will continue to – considerable amounts of time and analysis on understanding what exactly happened and what it means. Technology analysis in the present is multi-layered. Thus, it benefits from inter- and multidisciplinary approaches.

All our existing and continuous learnings on the shortcomings and disasters of the past decade can also serve as beacons of inspiration. On the verge of significant societal and social changes with the arrival of AI, looking back can create robust resources to create a better, more democratic future with technology. It is precisely through examining what has not worked that we can derive lessons and formulate a vision or visions for what good, helpful, supportive, positive usage of technology in modern societies can look like.

Discourses on tech products have long been dominated by two sides of the same coin, technological determinism. Technologists and critics assume the course of technology as given and all spheres of human interaction and creation as subjects of technological developments – the former applaud them; the latter deplore them. What if there was a different path? I assume that the lack of more widespread individual changes to technology usage and short cycles of outrage about tech companies’ practices with little consequences also have to do with the lack of a more positive vision for what we want technology to do for us¹¹⁸. After all, what is the point of managing one’s social media habits more intentionally, if the next best available outcome seems just less bad than the status quo?

We are in a crisis of imagination, especially a social and political one. In the early 2020s, we are experiencing the effects of post-democracy, post-capitalism, and maybe even the post-individual¹¹⁹. What comes after “after”? The disillusionment that accompanies much technology analysis in the present, including parts of the critique in this dissertation, needs to give way to something new. We urgently need a reinvigoration and reimagination of three things:

- 1) the role of the individual in the greater social fabric, as it is changing and evolving,
- 2) the purpose and value of democracy in the digital age, and
- 3) the relationship of humanity with technology.

¹¹⁸ There are other factors that come into play here, too, like habitualized, short outrage-cycles in the overall news cycle as a function of the attention economy, for example.

¹¹⁹ – considering the atomizing tendencies of personal branding as well as the dynamic of singularities Reckwitz (2020) introduced.

These challenges are intertwined at this moment in time and affected by developments in digital, data-driven, algorithmic technologies with overwhelming market powers. We need to rethink them and proactively create a vision that steers us out of the murky waters of rising technofeudalistic tendencies and into the balmy, crystalline seas of societies where life, culture, work, the economy, politics, and the functioning of the democratic system are supported, enhanced by technology. It is time to reconsider how technology can be, as Steve Jobs said, bicycles for the mind (Yarow, 2010). In the age of AI, how can we make technologies a bicycle to extend, enliven, and enrich the journey of humanity?

These are, admittedly, gargantuan tasks. Yet, there is great creative potential in the works and imagination of countless academics, technologists, writers, thinkers, makers, artists, and individuals who engage with these matters on an everyday level. We all do, in a way. I believe there are no thresholds to participation in this transformative project.

What matters most is that we create a relationship with technology that is truly beneficial to humanity.

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11. Literature

Aaker, J., & Chang, V. (2009). *Obama and the Power of Social Media and Technology*. <https://www.gsb.stanford.edu/faculty-research/case-studies/obama-power-social-media-technology>

Abidin, C. (2017). #familygoals: Family Influencers, Calibrated Amateurism, and Justifying Young Digital Labor. *Social Media + Society*, 3(2), 1-15.

Acosta, M. (2020). Activismo Feminista en Instagram. El Caso de la Campaña Nacional Por el Derecho al Aborto Legal Seguro y Gratuito en Argentina / Feminist Activism on Instagram. The Case of the National Campaign for the Right to Safe and Free Legal Abortion in Argentina. *Perspectivas de la comunicación*, 13, 29-46.

Adorno, T. W. (1983). *Prisms*. MIT Press.

Adorno, T. W. (1991). *The Culture Industry. Selected Essays on Mass Culture*. Routledge.

Ahmad, N. (2020). Celebrification of Politics: Understanding Migration of Celebrities into Politics Celebrification of Celebrity Politicians in the Emerging Democracy of Indonesia. *East Asia*, 37(1), 63-79.

Ahmadi, A., Fakhimi, S., & Ahmadi, Y. (2022). Instagram Celebrities and Positive User Responses. The Mediating Role of User "Like". *Journal of Contemporary Marketing Science*, 5(1), 65-80.

Akpan, B. (2020). Classical and Operant Conditioning—Ivan Pavlov; Burrhus Skinner. In B. Akpan & T. J. Kennedy (Eds.), *Science Education in Theory and Practice: An Introductory Guide to Learning Theory* (pp. 71-84). Springer International Publishing.

Alimardani, M. (2022). *Protest, Social Media, and Censorship in Iran* [Interview]. CSIS, Center for Strategic & International Studies. <https://www.csis.org/analysis/protest-social-media-and-censorship-iran>

Alloa, E. (2016). Iconic Turn: A Plea for Three Turns of the Screw. *Culture, Theory and Critique*, 57(2), 228-250.

Alter, A. (2017). *Irresistible. The Rise of Addictive Technology and the Business of Keeping Us Hooked*. Penguin Random House.

Amoruso, S. (2014). #Girlboss. Portfolio / Penguin.

Anderson, A. (2021). "Networked" Revolutions? ICTs and Protest Mobilization in Non-Democratic Regimes. *Political Research Quarterly*, 74(4), 1037-1051.

Anderson, P. (2013). *Passages from Antiquity to Feudalism*. Verso.

Andreessen, M. (2020, 18.4.2020). It's Time To Build. <https://a16z.com/2020/04/18/its-time-to-build/>

Ardèvol, E., Martorell, S., & San Cornelio, G. (2021). Myths in Visual Environmental Activism Narratives on Instagram. *Comunicar*, 68, 59-70.

Armstrong, C. (2012). Automatism and Agency Intertwined: A Spectrum of Photographic Intentionality. *Critical Inquiry*, 38(4), 705-726.

Arnesson, J. (2022). Influencers as Ideological Intermediaries: Promotional Politics and Authenticity Labour in Influencer Collaborations. *Media, Culture & Society*, 0(0).

Arnheim, R. (1974a). *Art and Visual Perception: A Psychology of the Creative Eye*. University of California Press.

Arnheim, R. (1974b). On the Nature of Photography. *Critical Inquiry*, 1(1), 149-161.

Artifact. (2023). *Artifact*. Retrieved 16.2.2023 from <https://artifact.news>

Asís, R. d. (2022). On the Neurights Proposal. *DERECHOS Y LIBERTADES: Revista de Filosofía del Derecho y derechos humanos*(47), 51-70.

Azhar, A. (2022). *Exponential. Order and Chaos in an Age of Accelerating Technology*. Penguin Random House.

Azoulay, A. (2010). What Is a Photograph? What Is Photography? *Philosophy in Photography*, 1(1), 9-13.

Baader, H. (2003). Iconic Turn. In U. Pfisterer (Ed.), *Metzler Lexikon Kunsthissenschaft: Ideen, Methoden, Begriffe* (pp. 143-146). J.B. Metzler.

Bachmann-Medick, D. (2016). Chapter VII: The Iconic Turn/Pictorial Turn. In *Cultural Turns* (pp. 245-278). De Gruyter.

Bailard, C. S. (2014). *Democracy's Double-Edged Sword: How Internet Usage Changes Citizens' Views of Their Government*. Johns Hopkins University Press.

Bains, S. (2019, 18.3.2019). Theranos and the Cult of Personality in Science and Tech. <https://blog.oup.com/2019/03/theranos-cult-of-personality-science-tech/>

Barandiaran, X., Unceta, A., & Peña, S. (2020). Political Communication in Times of a New Political Culture. *Revista ICONO* 14. *Revista Científica De Comunicación Y Tecnologías Emergentes* 18(1), 256-282.

Barberá, P. (2020). Social Media, Echo Chambers, and Political Polarization. In J. A. Tucker & N. Persily (Eds.), *Social Media and Democracy: The State of the Field, Prospects for Reform* (pp. 34-55). Cambridge University Press.

Barcio, P. (2017, 8.11.2017). Capturing the Transience of Time - The Photography of Hiroshi Sugimoto. <https://www.ideelart.com/magazine/hiroshi-sugimoto>

Barlow, J. P. (1996/2023). *A Declaration of the Independence of Cyberspace*. Electronic Frontier Foundation. Retrieved 13.2.2023 from <https://www.eff.org/cyberspace-independence>

Barnby, J. M., Bell, V., Deeley, Q., & Mehta, M. A. (2020). Dopamine Manipulations Modulate Paranoid Social Inferences in Healthy People. *Translational Psychiatry*, 10(214), 1-13.

Barcas, S., & Selbst, A. D. (2016). Big Data's Disparate Impact. *California Law Review*, 104(3), 671-732.

Barthes, R. (1982). *Camera Lucida. Reflections on Photography*. Hill and Wang.

Bast, J. (2021a). Managing the Image. The Visual Communication Strategy of European Right-Wing Populist Politicians on Instagram. *Journal of Political Marketing*, 1-30.

Bast, J. (2021b). Politicians, Parties, and Government Representatives on Instagram: A Review of Research Approaches, Usage Patterns, and Effects. *Review of Communication Research*, 9, 193-246.

Bate, D. (2010). The Memory of Photography. *photographies*, 3(2), 243-257.

Bayefsky, R. (2013). Dignity, Honour, and Human Rights: Kant's Perspective. *Political Theory*, 41(6), 809-837. <https://doi.org/10.1177/0090591713499762>

Beckert, T. E. (2018). Autonomy and Its Assessment. In R. J. R. Levesque (Ed.), *Encyclopedia of Adolescence* (pp. 355-362). Springer International Publishing.

Beckett, T. E. (2007). Cognitive Autonomy and Self-Evaluation in Adolescence: A Conceptual Investigation and Instrument Development. *North American Journal of Psychology*, 9(3), 579-594.

Behrens, R. (2004). *Kulturindustrie* (Vol. 15). transcript.

Bellavitis, C. (2016). Do Interest Rates Affect Venture Capital Investments? *Academy of Management Proceedings*, 2016(1), 11572.

Belleflamme, P., & Peitz, M. (2021). *The Economics of Platforms: Concepts and Strategy*. Cambridge University Press.

Bellinetti, C. (2022, 29.6.2022). Roger Fenton & His Pioneering Crimean War Photography. *Art & Object*. <https://www.artandobject.com/news/roger-fenton-his-pioneering-crimean-war-photography>

Belting, H. (2011). *An Anthropology of Images: Picture, Medium, Body*. Princeton University Press.

Bengtsson, S., & Johansson, S. (2022). The Meanings of Social Media Use in Everyday Life: Filling Empty Slots, Everyday Transformations, and Mood Management. *Social Media + Society*, 8(4), 1-11.

Benjamin, W. (1969). The Work of Art in the Age of Mechanical Reproduction (H. Zohn, Trans.). In H. Arendt (Ed.), *Illuminations* (pp. 1-26). Schocken Books (digital reproduction retrieved from the MIT). <https://web.mit.edu/allanmc/www/benjamin.pdf>

Benjamin, W. (1972). A Short History of Photography. *Screen*, 13(1), 5-26.

Benjamin, W. (2008). *The Work of Art in the Age of its Technological Reproducibility and Other Writings on Media*. The Belknap Press of Harvard University Press.

Benovsky, J. (2014). The Limits of Photography. *International Journal of Philosophical Studies*, 22(5), 716-733.

Berger, J. (1972). *Ways of Seeing*. BBC and Penguin Group.

Berkowitz, M. (2016). On Photography: Walter Benjamin. *Jewish Quarterly*, 63(1), 71-73.

Berman, R., & Katona, Z. (2020). Curation Algorithms and Filter Bubbles in Social Networks. *Marketing Science*, 39(2), 296-316.

Bernardez-Rodal, A., Requeijo Rey, P., & Franco, Y. G. (2022). Radical Right Parties and Anti-Feminist Speech on Instagram: Vox and the 2019 Spanish General Election. *Party Politics*, 28(2).

Bernstein, J. M. (1991). Introduction. In J. M. Bernstein (Ed.), *The Culture Industry. Selected Essays on Mass Culture*. Routledge.

Best, M. L., & Keegan, W. W. (2009). The Internet and Democracy: Global Catalyst or Democratic Dud? *Bulletin of Science, Technology & Society*, 29(4), 255-271.

Beyes, T. (2022). Staying with the Secret: The Public Sphere in Platform Society. *Theory, Culture & Society*, 39(4), 111-127.

Bimber, B., & Gil de Zúñiga, H. (2020). The Unedited Public Sphere. *New Media & Society*, 22(4), 700-715.

Blumler, J. G., & Kavanagh, D. (1999). The Third Age of Political Communication: Influences and Features. *Political Communication*, 16(3), 209-230.

Boehm, G. (2007). *Wie Bilder Sinn erzeugen. Die Macht des Zeigens* (3rd Edition ed.). Berlin University Press.

Borbón, D., & Borbón, L. (2021). A Critical Perspective on NeuroRights: Comments Regarding Ethics and Law. *Frontiers in Human Neuroscience*, 15, 1-4.

Bossetta, M., & Schmøkel, R. (2023). Cross-Platform Emotions and Audience Engagement in Social Media Political Campaigning: Comparing Candidates’ Facebook and Instagram Images in the 2020 US Election. *Political Communication*, 40(1), 48-68.

Botes, M. (2022). Autonomy and the Social Dilemma of Online Manipulative Behavior. *AI and Ethics*, 1-9.

Boulianne, S. (2009). Does Internet Use Affect Engagement? A Meta-Analysis of Research. *Political Communication*, 26(2), 193-211.

Boulianne, S. (2015). Social Media Use and Participation: a Meta-Analysis of Current Research. *Information, Communication & Society*, 18(5), 524-538.

Boulianne, S., Koc-Michalska, K., & Bimber, B. (2020). Right-Wing Populism, Social Media and Echo Chambers in Western Democracies. *New Media & Society*, 22(4), 683-699.

Boulianne, S., & Larsson, A. O. (2023). Engagement with Candidate Posts on Twitter, Instagram, and Facebook During the 2019 Election. *New Media & Society*, 25(1), 119-140.

Bourdieu, P. (1986). The Forms of Capital. In J. G. Richardson (Ed.), *Handbook of Theory and Research for the Sociology of Education* (pp. 241-258). Greenwood Press.

Bourdieu, P. (1990). *Photography: A Middle-Brow Art*. Polity Press.

Bourzac, K. (2010, 4.10.2010). Tapping the Powers of Persuasion. *MIT Technology Review*. <https://www.technologyreview.com/2010/10/04/200160/tapping-the-powers-of-persuasion/>

Brand, S. (2013). *Stewart Brand's Whole Earth Catalog, the Book that Changed the World* [Interview]. The Guardian. <https://www.theguardian.com/books/2013/may/05/stewart-brand-whole-earth-catalog>

Brandom, R., & Kelly, M. (2021, 19.8.2021). FTC Says Facebook Has Been a Monopoly ‘Since at Least 2011’ in Amended Antitrust Complaint. *The Verge*. <https://www.theverge.com/2021/8/19/22627032/ftc-facebook-amended-antitrust-complaint-monopoly-instagram-whatsapp>

Bratcher, N. A., Farmer-Dougan, V., Dougan, J. D., Heidenreich, B. A., & Garris, P. A. (2005). The Role of Dopamine in Reinforcement: Changes in Reinforcement Sensitivity Induced by D1-Type, D2-Type, and Nonselective Sopamine Receptor Agonists. *J Exp Anal Behav*, 84(3), 371-399.

Bredenkamp, H. (2007). Thomas Hobbes’s Visual Strategies. In P. Springborg (Ed.), *The Cambridge Companion to Hobbes’s Leviathan* (pp. 29-60). Cambridge University Press.

Bredenkamp, H. (2020). *Der Leviathan. Das Urbild des modernen Staats und seine Gegenbilder. 1651-2001* (5 ed.). De Gruyter.

Bredekamp, H. (2021). *Image Acts: A Systematic Approach to Visual Agency* (2 ed.). De Gruyter.

Breidbach, O. (2007). Sehen Wissen: Bemerkungen zu Horst Bredekamps Konzept einer historischen Bildwissenschaft. *Philosophische Rundschau*, 54, 85-95.

Britannica. (2023a). Carte-de-Visite. In *Encyclopedia Britannica Online Edition*.

Britannica. (2023b). Flickr. Retrieved 10.3.2022 from <https://www.britannica.com/topic/Flickrcom>

Bronsvort, I., & Uitermark, J. L. (2021). Seeing the Street Through Instagram. Digital Platforms and the Amplification of Gentrification. *Urban Studies*, 59(14), 2857-2874.

Brooks, G., Drenten, J., & Piskorski, M. J. (2021). Influencer Celebrification: How Social Media Influencers Acquire Celebrity Capital. *Journal of Advertising*, 50(5), 528-547.

Bruns, A. (2019). Filter Bubble. *Internet Policy Review*, 8(4).

Bublitz, J.-C. (2020). The Nascent Right to Psychological Integrity and Mental Self-Determination. In A. von Arnauld, K. von der Decken, & M. Susi (Eds.), *The Cambridge Handbook of New Human Rights: Recognition, Novelty, Rhetoric* (pp. 387-403). Cambridge University Press. <https://www.cambridge.org/core/books/cambridge-handbook-of-new-human-rights/nascent-right-to-psychological-integrity-and-mental-selfdetermination/FA344915753F3B4999FF6B65CBF70E3F>

Bublitz, J. C. (2013). My Mind Is Mine! Cognitive Liberty as a Legal Concept. In E. Hildt & A. Francke (Eds.), *Cognitive Enhancement* (pp. 233-264). Springer. <http://neuroethik.org/wp-content/uploads/2014/08/Bublitz-Draft-My-mind-is-mine-Cognitive-Liberty-as-a-Legal-Concept-2013.pdf>

Bucher, T. (2012). Want to Be on the Top? Algorithmic Power and the Threat of Invisibility on Facebook. *New Media & Society*, 14(7), 1164-1180.

Burhan, R., & Moradzadeh, J. (2020). Neurotransmitter Dopamine (DA) and its Role in the Development of Social Media Addiction. *Journal of Neurology & Neurophysiology*, 11(7), 1-2.

Burke, G., & Dearen, J. (2022a, 27.9.2022). Senators Push To Reform Police's Cellphone Tracking Tools. *The Associated Press*. <https://pulitzercenter.org/stories/senators-push-reform-polices-cellphone-tracking-tools>

Burke, G., & Dearen, J. (2022b, 1.9.2022). Tech Tool Offers Police 'Mass Surveillance on a Budget'. *The Associated Press*. <https://pulitzercenter.org/stories/tech-tool-offers-police-mass-surveillance-budget>

Burke, G., Federman, J., Wu, H., Pathi, K., & McGuirk, R. (2022, 21.12.2022). Police Seize on COVID-19 Tech to Expand Global Surveillance. *The Associated Press*. <https://apnews.com/article/technology-police-government-surveillance-covid-19-3f3f348d176bc7152a8cb2dbab2e4cc4>

Burrell, J., & Fourcade, M. (2021). The Society of Algorithms. *Annual Review of Sociology*, 47(1), 213-237.

Bush, S. S., Erlich, A., Prather, L., & Zeira, Y. (2016). The Effects of Authoritarian Iconography: An Experimental Test. *Comparative Political Studies*, 49(13), 1704-1738.

Cabrera-Méndez, M., Cisternas Osorio, R., López-Navarrete, A. J., & Díez-Somavilla, R. (2021). Misleading Discourse on Instagram: A Multimodal Study of Latin American Presidential Candidates in the Face of COVID-19. *Anàlisi*(64), 27-47.

Caliandro, A., & Graham, J. (2020). Studying Instagram Beyond Selfies. *Social Media + Society*, 6(2), 1-7.

Carinci, M. T., & Dorssemont, F. (2021). Introduction. In M. T. Carinci & F. Dorssemont (Eds.), *Platform Work in Europe. Towards Harmonisation?* Intersentia.

Carman, T. (2012). Foreword. In M. Merleau-Ponty (Ed.), *Phenomenology of Perception* (pp. vii-xvi). Routledge.

Carr, C. T., & Hayes, R. A. (2015). Social Media: Defining, Developing, and Divining. *Atlantic Journal of Communication*, 23(1), 46-65.

Carson, B. (2020, 1.8.2020). The Next 'Mafia'? Mapping the Alumni of Square. *Protocol*. <https://www.protocol.com/newsletters/pipeline/square-founders-alumni-mafia?rebellitem=4#rebellitem4>

Chaffee, S. H., & Kanihan, S. F. (1997). Learning About Politics From the Mass Media. *Political Communication*, 14(42), 421-430.

Chafkin, M. (2021). *The Contrarian. Peter Thiel and Silicon Valley's Pursuit of Power*. Penguin Press.

Chayka, K. (2016, 7.8.2016). Same Old, Same Old. How the Hipster Aesthetic Is Taking Over the World. *The Guardian*. <https://www.theguardian.com/commentisfree/2016/aug/06/hipster-aesthetic-taking-over-world>

Cinelli, M., De Francisci Morales, G., Galeazzi, A., & Quattrociocchi, W. (2021). The Echo Chamber Effect on Social Media. *Proceedings of the National Academy of Sciences*, 118(9), 1-8.

Cohen, R., Newton-John, T., & Slater, A. (2017). The Relationship Between Facebook and Instagram Appearance-Focused Activities and Body Image Concerns in Young Women. *Body Image*, 23, 183-187. <https://www.sciencedirect.com/science/article/pii/S1740144517302450>

Comninel, G. (2000). English Feudalism and the Origins of Capitalism. *The Journal of Peasant Studies*, 27(4), 1-53.

Constine, J. (2019, 10.4.2019). Instagram Now Demotes Vaguely "Inappropriate" Content. *TechCrunch*. <https://techcrunch.com/2019/04/10/instagram-borderline/>

Copp, T., & O'Brien, M. (2022, 8.12.2022). Pentagon Cloud Contract to Be Shared by Google, Amazon, Microsoft and Oracle in \$9 Billion Deal. *Fortune*. <https://fortune.com/2022/12/08/pentagon-cloud-contract-to-be-shared-by-google-amazon-microsoft-and-oracle-in-9-billion-deal/>

Cornelio, G. S., & Roig, A. (2018). Selfies and Cultural Events: Mixed Methods for the Study of Selfies in Context. *International journal of communication (Online)*, 2773-2792.

Costello, D., & Iversen, M. (2012). Introduction: Photography Between Art History and Philosophy. *Critical Inquiry*, 38(4), 679-693.

Cotter, K. (2018). Playing the Visibility Game: How Digital Influencers and Algorithms Negotiate Influence on Instagram. *New Media & Society*, 21(4), 895-913.

Cotter, K., & Reisdorf, B. C. (2020). Algorithmic Knowledge Gaps: A New Dimension of (Digital) Inequality. *International Journal of Communication*, 14, 745-765.

Cox, J. (2018, 14.5.2018). Leaked Documents Show How Instagram Polices Content to Prevent 'PR Fires'. *Vice*. <https://www.vice.com/en/article/59qpbk/leaked-instagram-content-moderation-guidelines>

Crawford, K. (2015). Can an Algorithm Be Agonistic? Ten Scenes from Life in Calculated Publics. *Science, Technology, & Human Values*, 41(1), 77-92.

Cross, K., & Peck, J. (2010). Editorial: Special Issue on Photography, Archive and Memory. *photographies*, 3(2), 127-138.

Crouch, C. (2019). *Gig Economy: Prekäre Arbeit im Zeitalter von Uber, Minijobs & Co.* edition suhrkamp.

Curran, N. M., & Jenks, C. (2022). Gig Economy Teaching: On the Importance and Dangers of Self-Branding in Online Markets. *Applied Linguistics*(amac019).

Dahlgren, P. (2005). The Internet, Public Spheres, and Political Communication: Dispersion and Deliberation. *Political Communication*, 22(2), 147-162.

Dahlgren, P. M. (2021). A Critical Review of Filter Bubbles and a Comparison with Selective Exposure. *Nordicom Review*, 42(1), 15-33.

Daniel, M. (2004). *Roger Fenton (1819-1869)*. The MET, Metropolitan Museum of Art. https://www.metmuseum.org/toah/hd/rfen/hd_rfen.htm

Daub, A. (2020). *What Tech Calls Thinking. An Inquiry Into the Intellectual Bedrock of Silicon Valley*. Farrar, Straus and Giroux (FSG).

Daub, A. (2021a, 29.08.2021). *Adrian Daub: Silicon Valley – ein Tal der Vordenker? | Sternstunde Philosophie | SRF Kultur* [Interview]. SRF. <https://www.youtube.com/watch?v=OkZbeSdL0>

Daub, A. (2021b, 30.9.2021). Wealth Creators. *Logic*. <https://logicmag.io/kids/wealth-creators/>

Davies, H., Goodley, S., Lawrence, F., Lewis, P., & O'Carroll, L. (2022, 10.7.2022). Uber Broke Laws, Duped Police and Secretly Lobbied Governments, Leak Reveals. *The Guardian*.

<https://www.theguardian.com/news/2022/jul/10/uber-files-leak-reveals-global-lobbying-campaign>

Davies, H. C. (2018). Redefining Filter Bubbles as (Escapable) Socio-Technical Recursion. *Sociological Research Online*, 23(3), 637-654. <https://doi.org/10.1177/1360780418763824>

Davis, A. (2010). New Media and Fat Democracy: The Paradox of Online Participation. *New Media & Society*, 12(5), 745-761.

Davis, M., & Xiao, J. (2021). De-Westernizing Platform Studies: History and Logics of Chinese and U.S. Platforms. *International Journal of Communication*, 15, 103-122.

De Angelis, G. (2021). Habermas, Democracy and the Public Sphere: Theory and Practice. *European Journal of Social Theory*, 24(4), 437-447.

De Filippi, P., & Hassan, S. (2018). Blockchain Technology as a Regulatory Technology: From Code Is Law to Law Is Code. *arXiv*. <https://arxiv.org/pdf/1801.02507.pdf>

De Veirman, M., Cauberghe, V., & Hudders, L. (2017). Marketing Through Instagram Influencers: The Impact of Number of Followers and Product Divergence on Brand Attitude. *International Journal of Advertising*, 36(5), 798-828.

Dean, J. (2020a). Communism or Neo-Feudalism? *New Political Science*, 42(1), 1-17.

Dean, J. (2020b, 12.5.2020). Neofeudalism: The End of Capitalism? *Los Angeles Review of Books*. <https://lareviewofbooks.org/article/neofeudalism-the-end-of-capitalism/>

Dean, J. (2022). Same as it Ever Was? *Sidecar - New Left Review*. <https://newleftreview.org/sidecar/posts/same-as-it-ever-was>

Debord, G. (1970). *Society of the Spectacle*. Radical America and Black & Red.

Debrabander, F. (2020). *Life After Privacy. Reclaiming Democracy in a Surveillance Society*. Cambridge University Press.

Debray, R. (1995). The Three Ages of Looking (translated by Eric Rauth). *Critical Inquiry*, 21(3), 529-555.

Deibert, R. (2019). The Road to Digital Unfreedom: Three Painful Truths About Social Media. *Journal of Democracy*, 30(1), 25-39. <https://www.journalofdemocracy.org/articles/the-road-to-digital-unfreedom-three-painful-truths-about-social-media/>

del Castillo Aira, I., & Iturbe Tolosa, A. (2021). Masculinidad, Cuerpo y Nación en la Comunicación Visual de Santiago Abascal (Vox) en Instagram en 2020. Análisis de la Imagen del Ámbito Privado en su Cuenta Personal. *Cultura, Lenguaje y Representación*, 26, 83-105.

Demopoulos, A. (2023, 18.1.2023). Free the Nipple: Facebook and Instagram Told to Overhaul Ban on Bare Breasts. *The Guardian*. <https://www.theguardian.com/technology/2023/jan/17/free-the-nipple-meta-facebook-instagram>

DiMaggio, P., Hargittai, E., Neuman, W. R., & Robinson, J. P. (2001). Social Implications of the Internet. *Annual Review of Sociology*, 27(1), 307-336.

Dimitrova, D. V., & Matthes, J. (2018). Social Media in Political Campaigning Around the World: Theoretical and Methodological Challenges. *Journalism & Mass Communication Quarterly*, 95(2), 333-342.

Dixon, S. (2023). *Number of Full-Time Meta (formerly Facebook Inc.) Employees from 2004 to 2022*. Statista. <https://www.statista.com/statistics/273563/number-of-facebook-employees/>

Dobkiewicz, P. (2019). Instagram Narratives in Trump's America: Multimodal Social Media and Mitigation of Right-Wing Populism. *Journal of Language and Politics*, 18(6), 826-847.

Dodds, R., & Butler, R. W. (2019). The Enablers of Overtourism. In R. Dodds & R. W. Butler (Eds.), *Overtourism* (pp. 6-21). De Gruyter.

Dogruel, L., Facciorusso, D., & Stark, B. (2022). 'I'm Still the Master of the Machine.' Internet Users' Awareness of Algorithmic Decision-Making and Their Perception of its Effect on Their Autonomy. *Information, Communication & Society*, 25(9), 1311-1332.

Donath, M. (2001). *Demokratie und Internet. Neue Modelle der Bürgerbeteiligung an der Kommunalpolitik - Beispiele aus den USA*. Campus Verlag.

Douglas, T., & Forsberg, L. (2021). Three Rationales for a Legal Right to Mental Integrity. In S. Ligthart, D. van Toor, T. Kooijmans, T. Douglas, & G. Meynen (Eds.), *Neurolaw*:

Advances in Neuroscience, Justice & Security (pp. 179-201). Springer International Publishing. https://doi.org/10.1007/978-3-030-69277-3_8

Driessen, S. (2022). Campaign Problems: How Fans React to Taylor Swift’s Controversial Political Awakening. *American Behavioral Scientist*, 66(8), 1060-1074.

Dubois, E., & Blank, G. (2018). The Echo Chamber Is Overstated: The Moderating Effect of Political Interest and Diverse Media. *Information, Communication & Society*, 21(5), 729-745.

Dubois, E., Minaeian, S., Paquet-Labelle, A., & Beaudry, S. (2020). Who to Trust on Social Media: How Opinion Leaders and Seekers Avoid Disinformation and Echo Chambers. *Social Media + Society*, 6(2), 1-13.

Ducci, F. (2020). *Natural Monopolies in Digital Platform Markets*. Cambridge University Press.

Duffy, B. E. (2020). Algorithmic Precarity in Cultural Work. *Communication and the Public*, 5(3-4), 103-107. <https://doi.org/10.1177/2057047320959855>

Duffy, B. E., & Pooley, J. (2019). Idols of Promotion: The Triumph of Self-Branding in an Age of Precarity. *Journal of Communication*, 69(1), 26-48.

Duguay, S. (2016). Lesbian, Gay, Bisexual, Trans, and Queer Visibility Through Selfies: Comparing Platform Mediators Across Ruby Rose’s Instagram and Vine Presence. *Social Media + Society*(April-June), 1-12.

Durand, C. (2020). *Techno-Féodalisme. Critique de l’Économie Numérique*. Zones.

Durand, C. (2022). Scouting Capital’s Frontiers. *New Left Review*, 136. <https://newleftreview.org/issues/i136/articles/cedric-durand-scouting-capital-s-frontiers>

E.L. (2016, 2.2.2016). The New Transatlantic Data “Privacy Shield”. *The Economist*. <https://www.economist.com/the-economist-explains/2016/02/02/the-new-transatlantic-data-privacy-shield>

EC, E. C. (2022). *Antitrust: Commission Opens Investigation Into Possible Anticompetitive Conduct by Google and Meta, in Online Display Advertising*. EC Press Corner. https://ec.europa.eu/competition/presscorner/detail/en/IP_22_1703

EC, E. C. (2023). *The Digital Markets Act: Ensuring Fair and Open Digital Markets*. https://commission.europa.eu/strategy-and-policy/priorities-2019-2024/europe-fit-digital-age/digital-markets-act-ensuring-fair-and-open-digital-markets_en

Economist, T. (2017, 6.5.2017). The World’s Most Valuable Resource Is No Longer Oil, But Data. *The Economist*. <https://www.economist.com/leaders/2017/05/06/the-worlds-most-valuable-resource-is-no-longer-oil-but-data>

Edwards, M. (2022). Comfy Fat Queer Love: Affective Digital Resistance Through Kinship. *Fat Studies*, 1-13. <https://doi.org/10.1080/21604851.2022.2031578>

EFF, E. F. F. (2023a). *Net Neutrality*. <https://www.eff.org/issues/net-neutrality>

EFF, E. F. F. (2023b). Section 230. <https://www.eff.org/issues/cda230>

Egea Medrano, M. A., Garrido Rubia, A., & Rojo Martínez, J. M. (2021). Political Iconography and Emotions in Electoral Campaigns: A Communicative Approach. *Communication & Society*, 34(2), 215-230.

EIF, E. I. F. (2023). *Social Impact Investing*. https://www.eif.org/EIF_for/social-impact-funds/index.htm

Elkins, J. (2012). Introduction. In J. Elkins & M. Naef (Eds.), *What Is an Image?* (pp. 1-18). The Pennsylvania University Press.

ENISA. (2023). *Safe Harbor Privacy Principles*. European Union Agency for Cybersecurity. <https://www.enisa.europa.eu/topics/risk-management/current-risk/laws-regulation/data-protection-privacy/safe-harbor-privacy-principles>

Espada, M. (2023, 22.2.2023). Facebook and Twitter Are Charging for Added Security. Here’s What that Means for You. *TIME*. <https://time.com/6257711/facebook-instagram-twitter-paid-verification/>

Ess, C. (2018). Democracy and the Internet: A Retrospective. *Javnost - The Public*, 25(1-2), 93-101.

EUR-Lex. (2023). *Right to Be Forgotten on the Internet*. <https://eur-lex.europa.eu/EN/legal-content/summary/right-to-be-forgotten-on-the-internet.html>

Evans, O. (2019). Digital Politics: Internet and Democracy in Africa. *Journal of Economic Studies*, 46(1), 169-191.

ExposureLabs. (2020). *The Social Dilemma* <https://www.thesocialdilemma.com>

Eyal, N. (2014). *Hooked. How to Build Habit-Forming Products*. Penguin Random House.

Eyal, N. (2023). The Science Behind How Our Devices Affect Our Brains and Prevent Productivity. <https://community.thriveglobal.com/the-science-behind-how-our-devices-affect-our-brains-and-prevent-productivity/>

Facebook/Meta. (2007). *Facebook Unveils Facebook Ads - Meta*. Retrieved 14.2.2023 from <https://about.fb.com/news/2007/11/facebook-unveils-facebook-ads/>

Farah, T. (2023, 3.3.2023). California's Rare Flowering "Superbloom" at Risk of Being Trampled to Oblivion by Unruly Tourists *Salon*. <https://www.salon.com/2023/03/03/californias-rare-flowering-superbloom-at-risk-of-being-trampled-to-oblivion-by-unruly-tourists/>

Fardouly, J., Willburger, B. K., & Vartanian, L. R. (2017). Instagram Use and Young Women's Body Image Concerns and Self-Objectification: Testing Mediational Pathways. *New Media & Society*, 20(4), 1380-1395.

Farinosi, M. (2022). Deconstructing the Stigma of Ageing: The Rise of the Mature Female Influencers. *European Journal of Cultural Studies*, 0(0).

Farkas, X., & Bene, M. (2020). Images, Politicians, and Social Media: Patterns and Effects of Politicians' Image-Based Political Communication Strategies on Social Media. *The International Journal of Press/Politics*, 26(1), 119-142.

Fatanti, M. N., & Suyadnya, I. W. (2015). Beyond User Gaze: How Instagram Creates Tourism Destination Brand? *Procedia - Social and Behavioral Sciences*, 211, 1089-1095.

Feezell, J. T., Wagner, J. K., & Conroy, M. (2021). Exploring the Effects of Algorithm-Driven News Sources on Political Behavior and Polarization. *Computers in Human Behavior*, 116.

Feldman, J., & Musih, N. (2022). Selfies in Auschwitz: Popular and Contested Representations in a Digital Generation. *Memory Studies*, 1-18.

Fisher, E. (2021). Epistemic Media and Critical Knowledge About the Self: Thinking About Algorithms with Habermas. *Critical Sociology*, 48(7-8), 1309-1324.

Fishkin, J. S. (1991). *Democracy and Deliberation. New Directions for Democratic Reform*. Yale University Press.

Fletcher, A. (2022). Why Computer AI Will Never Do What We Imagine It Can. *Narrative*, 30(1), 114-137.

Flusser, V. (2000). *Towards a Philosophy of Photography*. Reaktion Books Ltd.

Fogg, B. (1998). Persuasive Computers: Perspectives and Research Directions. *CHI '98: Proceedings of the SIGCHI Conference on Human Factors in Computing Systems*,

Fogg, B. (2003). Introduction. In B. Fogg (Ed.), *Persuasive Technology* (pp. 1-13). Morgan Kaufmann.

Fogg, B. (2023). *Fogg Behavior Model*. <https://behaviormodel.org>

Foroughi, B., Griffiths, M. D., Iranmanesh, M., & Salamzadeh, Y. (2022). Associations Between Instagram Addiction, Academic Performance, Social Anxiety, Depression, and Life Satisfaction Among University Students. *International Journal of Mental Health and Addiction*, 20(4), 2221-2242.

Fouquaert, T., & Mechant, P. (2022). Making Curation Algorithms Apparent: A Case Study of 'Instawareness' as a Means to Heighten Awareness and Understanding of Instagram's Algorithm. *Information, Communication & Society*, 25(12), 1769-1789.

Franck, G. (2005). Mental Capitalism. In M. Shamiyeh (Ed.), *What People Want: Populism in Architecture and Design* (pp. 99-114). Birkhäuser Basel.

Fried, M. (2005). Barthes's Punctum. *Critical Inquiry*, 31(3), 539-574.

Frier, S. (2020). *No Filter. The Inside Story of Instagram*. Simon & Schuster.

FTC, F. T. C. (2020). *FTC Sues Facebook for Illegal Monopolization*. Federal Trade Commission. <https://www.ftc.gov/news-events/news/press-releases/2020/12/ftc-sues-facebook-illegal-monopolization>

Furman, K. (2022). Epistemic Bunkers. *Social Epistemology*, 1-11.

García-Beaudoux, V., & Slimovich, A. (2021). Hard-Public Information and Soft-Private Information Posted by Candidates on Instagram During the 2019 Argentinian Electoral Campaign. *Perspectivas de la comunicación*, 14, 11-48.

Gastil, J., & Davies, T. (2020). Digital Democracy: Episode IV—A New Hope*: How a Corporation for Public Software Could Transform Digital Engagement for Government and Civil Society. *Digital Government: Research and Practice*, 1(1), 1-15.

Geiß, S., Magin, M., Jürgens, P., & Stark, B. (2021). Loopholes in the Echo Chambers: How the Echo Chamber Metaphor Oversimplifies the Effects of Information Gateways on Opinion Expression. *Digital Journalism*, 9(5), 660-686.

Gellman, B. (2020, 24.5.2020). Inside the NSA’s Secret Tool for Mapping Your Social Network. *Wired*. <https://www.wired.com/story/inside-the-nsas-secret-tool-for-mapping-your-social-network/>

Ghaffary, S., & Heath, A. (2022, 27.7.2022). The Facebookification of Instagram. *Vox*. <https://www.vox.com/recode/23274761/facebook-instagram-land-the-giants-mark-zuckerberg-kevin-systrom-ashley-yuki>

Gil de Zúñiga, H., & Chen, H.-T. (2019). Digital Media and Politics: Effects of the Great Information and Communication Divides. *Journal of Broadcasting & Electronic Media*, 63(3), 365-373.

Gil de Zúñiga, H., Weeks, B., & Ardèvol-Abreu, A. (2017). Effects of the News-Finds-Me Perception in Communication: Social Media Use Implications for News Seeking and Learning About Politics. *Journal of Computer-Mediated Communication*, 22(3), 105-123.

Gilardi, F., Gessler, T., Kubli, M., & Müller, S. (2022). Social Media and Political Agenda Setting. *Political Communication*, 39(1), 39-60.

Gitlin, J. M. (2018, 22.2.2018). Car Companies Are Preparing to Sell Driver Data to the Highest Bidder. *Ars Technica*. <https://arstechnica.com/cars/2018/02/no-one-has-a-clue-whats-happening-with-their-connected-cars-data/>

Glasius, M., & Michaelsen, M. (2018). Illiberal and Authoritarian Practices in the Digital Sphere. *International Journal of Communication*, 12, 3795-3813.

Godfread, P. (2011). Recent Developments in Section 230 Immunity Cases. *Business Lawyer*, 67(1), 369-372.

Golbeck, J., Robles, C., & Turner, K. (2011). *Predicting Personality with Social Media* CHI '11 Extended Abstracts on Human Factors in Computing Systems, Vancouver, BC, Canada.

Gombrich, E. H. (1972). The Visual Image. *Scientific American*, 227(3), 82-97.

Gordon, R. (2022, 27.10.2022). 3 Questions: How AI Image Generators Could Help Robots. *MIT News: On Campus and Around the World*. <https://news.mit.edu/2022/how-ai-image-generators-could-help-robots-yilun-du-1027>

Gotlieb, C. C. (2002). Does the Internet Promote Democracy? *International Federation for Information Processing* [Human choice and computers: Issues of choice and quality of life in the information society]. 17th World Computer Congress/6th International Conference on Human Choice and Computers (HCC-6), Montreal, Canada.

Graham, P. (2004). *Hackers and Painters: Big Ideas from the Computer Age*. O'Reilly.

Graham, P. (2008). Be Good. <http://www.paulgraham.com/good.html>

Gras-Velázquez, A., & Maestre-Brotóns, A. (2021). Spanish Gay Male Subjectivity, Body, Intimacy, and Affect on Instagram. *Sexualities*, 0(0), 1-23.

Grave, J. (2019). The Politics of Pictures: Approaching a Difficult Concept. *Social Epistemology*, 33(5), 442-451.

Greene, D. (2022). Landlords of the Internet: Big Data and Big Real Estate. *Social Studies of Science*, 52(6), 904-927.

Gregory, R. L. (1966). *Eye and Brain: The Psychology of Seeing*. World University Library, McGraw-Hill Book Company.

Griffith, E. (2019, 13.3.2019). “We Know Them. We Trust Them”: Uber and Airbnb Alumni Fuel Tech’s Next Wave. *The New York Times*. <https://www.nytimes.com/2019/03/13/technology/silicon-valley-network-mafias.html>

Gripenstraw, K. (2022). Our Social Media Addiction. *Harvard Business Review*, November-December 2022. <https://hbr.org/2022/11/our-social-media-addiction>

Grundberg, A. (2023). *History of Photography*. Britannica. Retrieved 10.1.2023 from <https://www.britannica.com/technology/photography>

Grusell, M., & Nord, L. (2020). Not so Intimate Instagram: Images of Swedish Political Party Leaders in the 2018 National Election Campaign. *Journal of Political Marketing*, 1-16.

Guthey, E. (2016). Don't Misunderestimate the Donald (Like We Did). *Television & New Media*, 17(7), 667-670.

Haas, I. J. (2016). Political Neuroscience. *University of Nebraska, Faculty Publications: Political Science*, 74, 335-370. <http://digitalcommons.unl.edu/poliscifacpub/74>

Habermas, J. (1991). *The Structural Transformation of the Public Sphere*. The MIT Press.

Habermas, J. (1992/2014). *Faktizität und Geltung. Beiträge zur Diskurstheorie des Rechts und des demokratischen Rechtsstaats* (5 ed.). Suhrkamp.

Habermas, J. (2022a). *Ein neuer Strukturwandel der Öffentlichkeit und die deliberative Politik*. Suhrkamp.

Habermas, J. (2022b). Reflections and Hypotheses on a Further Structural Transformation of the Political Public Sphere. *Theory, Culture & Society*, 39(4), 145-171.

Hansen, M. B. (2008). Benjamin's Aura. *Critical Inquiry*, 34(2), 336-375.

Haq, E.-U., Braud, T., Yau, Y.-P., Lee, L.-H., Keller, F. B., & Hui, P. (2022). *Screenshots, Symbols, and Personal Thoughts: The Role of Instagram for Social Activism*. Proceedings of the ACM Web Conference 2022, Virtual Event, Lyon, France.

Harris, M. (2022, 28.10.2022). Are We Living Under 'Technofeudalism'? *New York Magazine*. <https://nymag.com/intelligencer/2022/10/what-is-technofeudalism.html>

Harris, T. (2017). *The Magic of Persuasive Design*.

Harwell, D. (2022, 02.09.2022). He Used AI to Win a Fine-Arts Competition. Was it Cheating? *The Washington Post*. <https://www.washingtonpost.com/technology/2022/09/02/midjourney-artificial-intelligence-state-fair-colorado/>

Hausfeld. (2023). *The EU Digital Markets Act*. Hasufeld Blog. <https://www.hausfeld.com/en-de/what-we-think/competition-bulletin/a-50-million-has-been-reached-tad-date-dutch-competition-authority-acm-orders-apple-to-adjust-its-unreasonable-app-store-conditions-for-dating-app-developers-1-1-1/>

Haynes, T. (2018). Dopamine, Smartphones & You: A Battle for Your Time. <https://sitn.hms.harvard.edu/flash/2018/dopamine-smartphones-battle-time/>

Heidegger, M. (2002). The Origin of the Work of Art. In J. Young & K. Haynes (Eds.), *Off the Beaten Track* (pp. 1-56). Cambridge University Press.

Heikkilä, M. (2022, 16.9.2022). This Artist Is Dominating AI-Generated Art. And He's Not Happy About it. *MIT Technology Review*. <https://www.technologyreview.com/2022/09/16/1059598/this-artist-is-dominating-ai-generated-art-and-hes-not-happy-about-it/>

Hentsch, A.-K. (2021, 6.8.2021). Instagram-Tourismus: Warum sich immer mehr Orte wehren. *National Geographic*. <https://www.nationalgeographic.de/reise-und-abenteuer/2021/08/instagram-tourismus-warum-sich-immer-mehr-orte-wehren>

Hern, A. (2023, 14.3.2023). Zuckerberg's Meta to Lay Off Another 10,000 Employees. *The Guardian*. <https://www.theguardian.com/technology/2023/mar/14/mark-zuckerberg-meta-layoffs-hiring-freeze>

Hertz, N. (2022). Neurorights – Do We Need New Human Rights? A Reconsideration of the Right to Freedom of Thought. *Neuroethics*, 16(1), 1-15.

Hess, E., & Jokeit, H. (2009). Neurocapitalism. *Eurozine*(24.11.2009). <https://www.eurozine.com/neurocapitalism/>

Hill, C. S. (2009). Visual Awareness and Visual Qualia. In C. S. Hill (Ed.), *Consciousness* (pp. 128-168). Cambridge University Press.

Hill, T. E. (2014). Kantian Perspectives on the Rational Basis of Human Dignity. In D. Mieth, J. Braarvig, M. Düwell, & R. Brownsword (Eds.), *The Cambridge Handbook of Human Dignity: Interdisciplinary Perspectives* (pp. 215-221). Cambridge University Press.

Holland, G., & Tiggemann, M. (2016). A Systematic Review of the Impact of the Use of Social Networking Sites on Body Image and Disordered Eating Outcomes. *Body Image*, 17, 100-110.

Homan, R. W. (2003). Autonomy Reconfigured: Incorporating the Role of the Unconscious. *Perspectives in Biology and Medicine*, 46(1), 96-108.

Horkheimer, M., & Adorno, T. W. (2002). The Culture Industry: Enlightenment as Mass Deception. In N. Gunzelin Schmid (Ed.), *Dialectic of Enlightenment* (pp. 94-136). Stanford University Press.

Horkheimer, M., & Adorno, T. W. (2006). *Dialektik der Aufklärung. Philosophische Fragmente*. Fischer Taschenbuch Verlag.

Hovenkamp, H. (2021). Antitrust and Platform Monopoly. *The Yale Law Journal*, 130(8), 1952-2050.

Hu, L. (2021). Self as Brand and Brand as Self: A 2x2 Dimension Conceptual Model of Self-Branding in the Digital Economy. *Journal of Internet Commerce*, 20(3), 355-370.

Hudson, M. (2012). The Road to Debt Deflation, Debt Peonage, and Neofeudalism. *Levy Economics Institute of Bard College, Working Papers*(708), 1-30.

Hummel, P., Braun, M., & Dabrock, P. (2021). Own Data? Ethical Reflections on Data Ownership. *Philosophy & Technology*, 34(3), 545-572.

Hunt, E. (2016, 7.6.2016). New Algorithm-Driven Instagram Feed Rolled Out to the Dismay of Users. *The Guardian*. <https://www.theguardian.com/technology/2016/jun/07/new-algorithm-driven-instagram-feed-rolled-out-to-the-dismay-of-users>

lenca, M. (2021). On Neurights. *Frontiers in Human Neuroscience*, 15, 1-11.

lenca, M., & Andorno, R. (2017). Towards New Human Rights in the Age of Neuroscience and Neurotechnology. *Life Sciences, Society and Policy*, 13(1), 1-27.

InfoCuria. (2023). C-48/22 P - Google and Alphabet v Commission (Google Shopping). <https://curia.europa.eu/juris/liste.jsf?num=C-48/22&language=en>

Instagram. (2018). *Instagram Community Guidelines* FAQs. Retrieved 27.2.2023 from <https://about.instagram.com/blog/announcements/instagram-community-guidelines-faqs>

Jackson Hole, T. a. T. B. o. (2023). *Live by the Wild Rules*. Jackson Hole Travel & Tourism Board. <https://www.visitjacksonhole.com/sustainability>

Jennings, F. J., Suzuki, V. P., & Hubbard, A. (2021). Social Media and Democracy: Fostering Political Deliberation and Participation. *Western Journal of Communication*, 85(2), 147-167.

Jensen, J. L. (2020a, 2.9.2023). Democracy in the Age of Digital Feudalism. <https://www.emeraldgrouppublishing.com/opinion-and-blog/democracy-age-digital-feudalism>

Jensen, J. L. (2020b). *The Medieval Internet. Power, Politics and Participation in the Digital Age*. Emerald Publishing.

Jin, D. Y. (2015). *Digital Platforms, Imperialism and Political Culture*. Routledge.

Johnston, J. E. (2020). Celebrity, Inc.: The Self as Work in the Era of Presentational Culture Online. *Celebrity Studies*, 11(4), 508-511.

Joint, N. (2005). Democracy, eLiteracy and the Internet. *Library Review*, 54(2), 80-85.

Jonas, H. (1973). Technology and Responsibility. Reflections on the New Tasks of Ethics. *Social Research*, 40(1), 31-54.

Jungherr, A., Rivero, G., & Gayo-Avello, D. (2020). *Retooling Politics: How Digital Media Are Shaping Democracy*. Cambridge University Press.

Jurkowitz, M., & Gottfried, J. (2022, 27.6.2022). Twitter Is the Go-To Social Media Site for U.S. Journalists, but Not for the Public. <https://www.pewresearch.org/fact-tank/2022/06/27/twitter-is-the-go-to-social-media-site-for-u-s-journalists-but-not-for-the-public/>

Just, N., & Latzer, M. (2016). Governance by Algorithms: Reality Construction by Algorithmic Selection on the Internet. *Media, Culture & Society*, 39(2), 238-258.

Justice, C. o. (2023). *The Court of Justice Declares that the Commission's US Safe Harbour Decision Is Invalid*. Court of Justice of the European Union. <https://curia.europa.eu/jcms/upload/docs/application/pdf/2015-10/cp150117en.pdf>

Kamps, J. H. (2015, 25.5.2015). Who Are Twitter's Verified Users? <https://haje.medium.com/who-are-twitter-s-verified-users-af976fc1b032>

Kamruzzaman, M. M. (2022). Impact of Social Media on Geopolitics and Economic Growth: Mitigating the Risks by Developing Artificial Intelligence and Cognitive Computing Tools. *Computational Intelligence and Neuroscience*, 2022, 1-12.

Kant, I. (1784/2023). *An Answer to the Question: What Is Enlightenment?* <https://users.manchester.edu/Facstaff/SSNaragon/Online/texts/318/Kant,%20Enlightenment.pdf>

Keller, U. (2011). Fotofälschung. In U. Fleckner, M. Warnke, & Z. Ulrich (Eds.), *Handbuch der politischen Ikonographie. Band I: Abdankung bis Huldigung* (pp. 360-365). Verlag C.H.Beck.

Keller, U. (2013). The Iconic Turn in American Political Culture: Speech Performance for the Gilded-Age Picture Press. *Word & Image*, 29(1), 1-39.

Khamis, S., Ang, L., & Welling, R. (2017). Self-Branding, ‘Micro-Celebrity’ and the Rise of Social Media Influencers. *Celebrity Studies*, 8(2), 191-208.

Khan, L. M. (2017). Amazon’s Antitrust Paradox. *The Yale Law Journal*, 126(3), 710-805.

Kim, J. J. (2001). Classical Conditioning, Neural Basis of. In N. J. Smelser & P. B. Baltes (Eds.), *International Encyclopedia of the Social & Behavioral Sciences* (pp. 1946-1951). Pergamon.

Kim, Y., & Lee, S. (2022). #ShoutYourAbortion on Instagram: Exploring the Visual Representation of Hashtag Movement and the Public’s Responses. *SAGE Open*, 12(2), 1-14.

Kissas, A. (2022). Populist Everyday Politics in the (Mediatized) Age of Social Media: The Case of Instagram Celebrity Advocacy. *New Media & Society*, 1-20.

Klenk, M., & Hancock, J. (2019). Autonomy and Online Manipulation. *Internet Policy Review*. <https://policyreview.info/articles/news/autonomy-and-online-manipulation/1431>

Kline, R. R. (2001). Technological Determinism. In N. J. Smelser & P. B. Baltes (Eds.), *International Encyclopedia of the Social & Behavioral Sciences* (pp. 15495-15498). Pergamon. <https://www.sciencedirect.com/science/article/pii/B0080430767031673>

Klinger, U., & Russmann, U. (2017). “Beer Is More Efficient than Social Media”—Political Parties and Strategic Communication in Austrian and Swiss National Elections. *Journal of Information Technology & Politics*, 14(4), 299-313.

Kneuer, M. (2016). E-Democracy: A New Challenge for Measuring Democracy. *International Political Science Review*, 37(5), 666-678.

Kosinski, M., Stillwell, D., & Graepel, T. (2013). Private Traits and Attributes Are Predictable from Digital Records of Human Behavior. *Proceedings of the National Academy of Sciences*, 110(15), 5802-5805.

Kosseff, J. (2019). *The Twenty-Six Words that Created the Internet*. Cornell University Press.

Kotkin, J. (2020). *Coming of Neo-Feudalism. A Warning to the Global Middle Class*. Encounter Books.

Kracauer, S., & Levin, T. Y. (1993). Photography. *Critical Inquiry*, 19(3), 421-436.

Kraemer, F., van Overveld, K., & Peterson, M. (2011). Is There an Ethics of Algorithms? *Ethics and Information Technology*, 13(3), 251-260.

Kramer, A. D. I., Guillory, J. E., & Hancock, J. T. (2014). Experimental Evidence of Massive-Scale Emotional Contagion Through Social Networks. *Proceedings of the National Academy of Sciences*, 111(24), 8788-8790.

Krass, U. (2011). Politische Ikonographie. In U. Pfisterer (Ed.), *Metzler Lexikon Kunstwissenschaft: Ideen, Methoden, Begriffe* (pp. 345-347). J.B. Metzler.

Krastev, S., McGuire, J. T., McNeney, D., Kable, J. W., Stolle, D., Gidengil, E., & Fellows, L. K. (2016). Do Political and Economic Choices Rely on Common Neural Substrates? A Systematic Review of the Emerging Neuropolitics Literature. *Frontiers in Psychology*, 7, 1-10.

Kreuzbauer, H. M. (2016). 15. Fotografie: Rhetorizität, Gegenstand und Stilistik. In F. Vidal & A. Scheuermann (Eds.), *Handbuch Medienrhetorik* (pp. 311-330). De Gruyter.

Kriebel, S. T. (2007). Introduction. Theories of Photography: A Short History. In J. Elkins (Ed.), *Photography Theory* (Vol. 2). Routledge.

Kubin, E., & von Sikorski, C. (2021). The Role of (Social) Media in Political Polarization: A Systematic Review. *Annals of the International Communication Association*, 45(3), 188-206.

Kubler, K. (2023). Influencers and the Attention Economy: The Meaning and Management of Attention on Instagram. *Journal of Marketing Management*, 1-17.

Lalancette, M., & Raynauld, V. (2019). The Power of Political Image: Justin Trudeau, Instagram, and Celebrity Politics. *American Behavioral Scientist*, 63(7), 888-924.

Lanier, J. (2010). *You Are Not a Gadget. A Manifesto*. Penguin.

Larsson, A. O. (2017a). Skiing All the Way to the Polls: Exploring the Popularity of Personalized Posts on Political Instagram Accounts. *Convergence*, 25(5-6), 1096-1110.

Larsson, A. O. (2017b). Top Users and Long Tails: Twitter and Instagram Use During the 2015 Norwegian Elections. *Social Media + Society*, April-June, 1-12.

Larsson, A. O. (2021). The Rise of Instagram as a Tool for Political Communication: A Longitudinal Study of European Political Parties and Their Followers. *New Media & Society*, 1-19.

Lavi, L. (2017). *It's a Matter of Time: A Temporal Perspective on Elections and Democracy* [Tel-Aviv University]. Tel Aviv.

Leary, M. G. (2018). The Indecency and Injustice of Section 230 of the Communications Decency Act. *Harvard Journal of Law & Public Policy*, 41(2), 553-622.

Leaver, T., Highfield, T., & Abidin, C. (2019). *Instagram: Visual Social Media Cultures*. Polity.

Lecuyer, C. (2007). *Making Silicon Valley: Innovation and the Growth of High Tech, 1930-1970 (Inside Technology)*. The MIT Press.

Lee, J. A., Lee, S. Y., Ryoo, Y., Kim, W., & Sung, Y. (2022). The Psychological Consequences of Envy on Influencers on Instagram. *Cyberpsychology, Behavior, and Social Networking*, 25(11), 703-708. <https://www.liebertpub.com/doi/abs/10.1089/cyber.2022.0001>

Leiendecker, B. (2018). Of Duck Faces and Cat Beards: Why Do Selfies Need Genres? In J. Eckel, J. Ruchatz, & S. Wirth (Eds.), *Exploring the Selfie: Historical, Theoretical, and Analytical Approaches to Digital Self-Photography* (pp. 189-209). Springer International Publishing.

Lembke, A. (2021). *Dopamine Nation*. Dutton.

Levine, Y. (2018). *Surveillance Valley. The Secret Military History of the Internet*. Public Affairs, Hachette Book Group.

Li, M. (2022). Visual Social Media and Black Activism: Exploring How Using Instagram Influences Black Activism Orientation and Racial Identity Ideology Among Black Americans. *Journalism & Mass Communication Quarterly*, 99(3), 718-741.

Lindholm, J., Carlson, T., & Högväg, J. (2021). See Me, Like Me! Exploring Viewers' Visual Attention to and Trait Perceptions of Party Leaders on Instagram. *The International Journal of Press/Politics*, 26(1), 167-187.

Literat, I., & Kligler-Vilenchik, N. (2021). How Popular Culture Prompts Youth Collective Political Expression and Cross-Cutting Political Talk on Social Media: A Cross-Platform Analysis. *Social Media + Society*, 7(2), 1-14.

Liu, R., & Suh, A. (2017). Self-Branding on Social Media: An Analysis of Style Bloggers on Instagram. *Procedia Computer Science*, 124, 12-20.

Livni, E. (2023, 13.1.2023). What Is Shadow-Banning? *The New York Times*. <https://www.nytimes.com/interactive/2023/01/13/business/what-is-shadow-banning.html>

Loader, B. D., & Mercea, D. (2011). Networking Democracy? *Information, Communication & Society*, 14(6), 757-769.

Lopatto, E. (2022, 27.7.2022). Adam Mosseri Confirms it: Instagram Is Over / Pivot to Video. *The Verge*. <https://www.theverge.com/2022/7/26/23279815/instagram-feed-kardashians-criticism-fuck-it-im-out>

Lopes, D. M. (2012). Afterword: Photography and the “Picturesque Agent”. *Critical Inquiry*, 38(4), 855-869.

López-Rabadán, P., & Doménech-Fabregat, H. (2018). Instagram y la Espectacularización de las Crisis Políticas. Las 5W de la Imagen Digital en el Proceso Independentista de Cataluña. *Profesional de la información*, 27(5), 1013-1029.

López-Rabadán, P., & Doménech-Fabregat, H. (2021). Nuevas Funciones de Instagram en el Avance de la “Política Espectáculo”. Claves Profesionales y Estrategia Visual de Vox en su Despegue Electoral. *Profesional de la información*, 30(2), 1-18.

Lorusso, S. (2019). *Entreprerariat* (Vol. 170). Cultuur Eindhoven, Mondriaan Fund.

Lovink, G. (2021). Notes on the Platform Condition. *Making & Breaking*, 2, 1-5.

Lovink, G. (2022). *In der Plattformfalle. Plädoyer zur Rückeroberung des Internets*. transcript Verlag.

Lury, C., & Day, S. (2019). Algorithmic Personalization as a Mode of Individuation. *Theory, Culture & Society*, 36(2), 17-37.

Lynteris, C., & Stasch, R. (2019). Photography and the Unseen. *Visual Anthropology Review*, 35(1), 5-9.

Lyons, A. C., Goodwin, I., Carah, N., Young, J., Moewaka Barnes, A., & McCreanor, T. (2022). Limbic Platform Capitalism: Understanding the Contemporary Marketing of Health-Demoting Products on Social Media. *Addiction Research & Theory*, 1-6.

Macdowall, L., & Budge, K. (2022). *Art After Instagram: Art Spaces, Audiences, Aesthetics*. Routledge.

Magalhaes, J. C., & Yu, J. (2022). Social Media, Social Unfreedom. *Communications*, 47(4), 553-571.

Mahoney, C. (2022). Is This What a Feminist Looks Like? Curating the Feminist Self in the Neoliberal Visual Economy of Instagram. *Feminist Media Studies*, 22(3), 519-535.

Mahoney, J., Feltwell, T., Ajuruchi, O., & Lawson, S. (2016). *Constructing the Visual Online Political Self: An Analysis of Instagram Use by the Scottish Electorate* Proceedings of the 2016 CHI Conference on Human Factors in Computing Systems, San Jose, California, USA.

Mallaby, S. (2022). *The Power Law. Venture Capital and the Making of the New Future*. Penguin Press.

Mančić, Ž. (2012). Deliberative Democracy and the Internet: Could Online Deliberative Democracy Replace Classical Democracy. *Filozofija i drustvo*, 23(2), 168-186.

Manovich, L. (2017). *Instagram and Contemporary Image*. Lev Manovich under Creative Commons Attribution-NonCommercial-ShareAlike license (CC BY-NC-SA). <http://manovich.net/index.php/projects/instagram-and-contemporary-image>

Markoff, J. (2006). *What the Dormouse Said: How the Sixties Counterculture Shaped the Personal Computer Industry*. Penguin Random House.

Marquart, F., Ohme, J., & Möller, J. (2020). Following Politicians on Social Media: Effects for Political Information, Peer Communication, and Youth Engagement. *Media and Communication*, 8(2), 197-207.

Marr, B. (2023, 23.1.2023). How ChatGPT And Natural Language Technology Might Affect Your Job If You Are A Computer Programmer. *Forbes*. <https://www.forbes.com/sites/bernardmarr/2023/01/23/how-chatgpt-and-natural-language-technology-might-affect-your-job-if-you-are-a-computer-programmer/>

Marshall, P. D. (2020). Celebrity, Politics, and New Media: an Essay on the Implications of Pandemic Fame and Persona. *International Journal of Politics, Culture, and Society*, 33, 89-104.

Marshall, P. D. (2021). The Commodified Celebrity-Self: Industrialized Agency and the Contemporary Attention Economy. *Popular Communication*, 19(3), 164-177.

Mau, D. (2017, 6.4.2017). Paul Smith’s Pink Wall Is an LA Instagram Phenomenon - But Is it Paying Off For Paul Smith? *Fashionista*. <https://fashionista.com/2017/04/paul-smith-pink-wall>

McCarthy, T. (1991). Introduction. In *The Structural Transformation of the Public Sphere* (pp. xi-xiv). MIT Press.

McCarthy-Jones, S. (2019). The Autonomous Mind: The Right to Freedom of Thought in the Twenty-First Century. *Frontiers in Artificial Intelligence*, 2, 1-17.

McCay, A. (2022). Neurorights: The Chilean Constitutional Change. *AI & SOCIETY*, 1-2.

McCradden, C. (2008). Human Dignity and Judicial Interpretation of Human Rights. *European Journal of International Law*, 19(4), 655-724.

McLuhan, M. (1964). The Medium Is the Message. In *Understanding Media: The Extensions of Man* (pp. 1-11). The MIT Press. <https://web.mit.edu/allanmc/www/mcluhan.mediummessage.pdf>

McNamara, A. (1996). Words and Pictures in the Age of the Image: An Interview with W.J.T. Mitchell. *Eyeline*, 30(Autumn-Winter), 16-21.

Meese, J., Gibbs, M., Carter, M., Arnold, M., Nansen, B., & Kohn, T. (2015). Selfies at Funerals: Mourning and Presencing on Social Media Platforms. *International Journal of Communication*, 9, 1818-1831.

Mellado, C. (2022). Roles and Digital Identities on Twitter and Instagram: An Ethnographic Study of Chilean Journalists. *Profesional de la información*, 31(4), 1-16.

Mendieta, E. (2019). Public Sphere. In A. Allen & E. Mendieta (Eds.), *The Cambridge Habermas Lexicon*. Cambridge University Press.

Mendonça, R. F., & Duarte, R. C. (2021). Populism as Parody: The Visual Self-Presentation of Jair Bolsonaro on Instagram. *The International Journal of Press/Politics*, 26(1), 210-235.

Metzinger, T. (2013). The Myth of Cognitive Agency: Subpersonal Thinking as a Cyclically Recurring Loss of Mental Autonomy. *Frontiers in Psychology*, 4, 1-19.

Midjourney. (2023). Midjourney (Website). Retrieved 8.1.2023 from <https://midjourney.com/home/?callbackUrl=%2Fapp%2F>

Miller, M. L., & Vaccari, C. (2020). Digital Threats to Democracy: Comparative Lessons and Possible Remedies. *The International Journal of Press/Politics*, 25(3), 333-356.

Mitchell, W. J. T. (2003). Responses to Mieke Bal's 'Visual Essentialism and the Object of Visual Culture' (2003): The Obscure Object of Visual Culture. *Journal of Visual Culture*, 2(2), 249-252.

Mitchell, W. J. T. (2005). *What do Pictures Want? The Lives and Loves of Images*. The University of Chicago Press.

Mitchelstein, E., Boczkowski, P., & Giuliano, C. (2021). Platform Matters: Political Opinion Expression on Social Media. *Weizenbaum Journal of the Digital Society*, 1(1), 1-26.

Mitrovic, B. (2013). Visuality After Gombrich: The Innocence of the Eye and Modern Research in the Philosophy and Psychology of Perception. *Zeitschrift für Kunstgeschichte*, 76(1), 71-89.

Mittelstadt, B. D., Allo, P., Taddeo, M., Wachter, S., & Floridi, L. (2016). The Ethics of Algorithms: Mapping the Debate. *Big Data & Society*, 3(2).

Moczek, N., Dworschak, U., & Klar, C. (2020). Besucherverhalten im Nationalpark Berchtesgaden - Auswirkungen von Social Media. *Natur und Landschaft*, 95(11), 492-499.

Moffitt, B. (2022). Taking Account of the Visual Politics of Populism. *Polity*, 54(3), 557-564.

Mohamed, S. (2019). Instagram and Political Storytelling Among Malaysian Politicians During the 14th General Election. *Jurnal Komunikasi: Malaysian Journal of Communication*, 35(3), 353-371.

Montalban, M., Frigant, V., & Jullien, B. (2019). Platform Economy as a New Form of Capitalism: A Régulationist Research Programme. *Cambridge Journal of Economics*, 43, 805-824.

Moon, S. J., & Bai, S. Y. (2020). Components of Digital Literacy as Predictors of Youth Civic Engagement and the Role of Social Media News Attention: The Case of Korea. *Journal of Children and Media*, 14(4), 458-474.

Morais, D., Hemme, F., & Reyes, C. (2022). Tap 'Follow' #FitFam: A Process of Social Media Microcelebrity. *Qualitative Research in Sport, Exercise and Health*, 14(2), 289-305.

Morozov, E. (2022). Critique of Techno-Feudal Reason. *New Left Review*, 133/134. <https://newleftreview.org/issues/ii133/articles/evgeny-morozov-critique-of-techno-feudal-reason>

Moss, T. (2019, 18.11.2019). The Geotagging Debate Is Really About Gatekeeping in the Outdoors. *Condé Nast Traveler*. <https://www.cntraveler.com/story/the-geotagging-debate-is-really-about-gatekeeping-in-the-outdoors>

Moxey, K. (2008). Visual Studies and the Iconic Turn. *Journal of Visual Culture*, 7(2), 131-146.

Mueller, M. L., & Farhat, K. (2021). Regulation of Platform Market Access by the United States and China: Neo-Mercantilism in Digital Services. *Policy & Internet*, 14, 348-367.

Mullen, M. (2020). Race, Public Lands and the Debate Over Geotagging. *Wyoming Public Radio*. <https://www.wyomingpublicmedia.org/open-spaces/2020-11-10/race-public-lands-and-the-debate-over-geotagging>

Muñoz, C. L., & Towner, T. L. (2017). The Image Is the Message: Instagram Marketing and the 2016 Presidential Primary Season. *Journal of Political Marketing*, 16(3-4), 290-318.

Názaro, A., Crozzoli, F., & Álvarez-Nobell, A. (2019). Comunicación Política Digital en Instagram. Los Casos de Cristina Fernández de Kirchner y Mauricio Macri en Argentina / Digital Political Communication on Instagram. The Cases of Cristina Fernández de Kirchner and Mauricio Macri in Argentina. *Revista Internacional De Relaciones Públicas*, 9(18), 5-28.

Neckel, S. (2019). The Refeudalization of Modern Capitalism. *Journal of Sociology*, 56(3), 472-486.

Newton, C. (2022, 28.7.2022). Instagram Is Walking Back Its Changes for Now — Adam Mosseri Explains Why. *The Verge*. <https://www.theverge.com/2022/7/28/23282682/instagram-rollback-tiktok-feed-recommendations-interview-adam-mosseri>

Newton, C. (2023, 31.1.2023). Instagram's Co-Founders Are Mounting a Comeback. *Platformer*. <https://www.platformer.news/p/instagrams-co-founders-are-mounting>

Nieborg, D. B., & Poell, T. (2018). The Platformization of Cultural Production: Theorizing the Contingent Cultural Commodity. *New Media & Society*, 20(11), 4275-4292.

Nieto, E. M. (2005). The Value of Photography: Anthropology and Image. *Gazeta De Antropología*, 21.

NightCafe. (2023). *NightCafe: AI Art Generator*. Retrieved 8.1.2023 from <https://creator.nightcafe.studio>

Nissim, K., & Wood, A. (2018). Is Privacy “Privacy”? *Philosophical Transactions of the Royal Society A: Mathematical, Physical and Engineering Sciences*, 376(2128), 1-19.

Noble, S. U. (2018). *Algorithms of Oppression: How Search Engines Reinforce Racism*. NYU Press.

Nour, M. M., Dahoun, T., Schwartenbeck, P., Adams, R. A., FitzGerald, T. H. B., Coello, C., Wall, M. B., Dolan, R. J., & Howes, O. D. (2018). Dopaminergic Basis for Signaling Belief Updates, but not Surprise, and the Link to Paranoia. *Proceedings of the National Academy of Sciences*, 115(43), E10167-E10176.

NUJ, N. U. o. J. (2020). *NUJ Safety Report 2020*. <https://www.nuj.org.uk/resource/nuj-safety-report-2020.html>

Nymoen, O., & Schmitt, W. M. (2021). *Influencer. Die Ideologie der Werbekörper*. edition suhrkamp.

O'Regan, J. K., & Noë, A. (2001). A Sensorimotor Account of Vision and Visual Consciousness. *Behavioral and Brain Sciences*, 24(5), 939-973.

O'Brien, J. (2007, 13.10.2007). The PayPal Mafia. *Fortune*. <https://fortune.com/2007/11/13/paypal-mafia/>

O'Mara, M. (2019). *The Code. Silicon Valley and the Remaking of America*. Penguin Press.

O'Neill, K. (2016). *Weapons of Math Destruction*. Penguin Random House.

O'Regan, V. R. (2014). The Celebrity Influence: Do People Really Care What They Think? *Celebrity Studies*, 5(4), 469-483.

Ober, J. (2012). Democracy's Dignity. *The American Political Science Review*, 106(4), 827-846.

Ockenfels, A. (2013). Marktdesign. In *Gabler Wirtschaftslexikon - Online Edition*.

Oliva, M., Pérez-Latorre, Ó., & Besalú, R. (2015). Celebrificación del Candidato. Cultura de la Fama, Marketing Electoral y Construcción de la Imagen Pública del Político. *Arbor*, 191(775), 1-14.

OpenAI. (2023). *DALL·E 2*. Retrieved 8.1.2023 from <https://openai.com/dall-e-2/>

Oser, J., Grinson, A., Boulianne, S., & Halperin, E. (2022). How Political Efficacy Relates to Online and Offline Political Participation: A Multilevel Meta-Analysis. *Political Communication*, 39(5), 607-633.

Owen, G. S., Freyenhagen, F., Richardson, G., & Hotopf, M. (2009). Mental Capacity and Decisional Autonomy: An Interdisciplinary Challenge. *Inquiry*, 52(1), 79-107.

Pallarés-Navarro, S., & Zugasti, R. (2022). Santiago Abascal's Twitter and Instagram Strategy in the 10 November 2019 General Election Campaign: A Populist Approach to Discourse and Leadership? *Communication & Society*, 35(2), 53-69.

Pariser, E. (2011). *The Filter Bubble: What the Internet Is Hiding from You*. Penguin.

Park, J., Lee, J. M., Xiong, V. Y., Septianto, F., & Seo, Y. (2021). David and Goliath: When and Why Micro-Influencers Are More Persuasive Than Mega-Influencers. *Journal of Advertising*, 50(5), 584-602.

Parmelee, J. H., & Roman, N. (2019). Insta-Politicos: Motivations for Following Political Leaders on Instagram. *Social Media + Society*(April-June), 1-12.

Parmelee, J. H., & Roman, N. (2020). Insta-Echoes: Selective Exposure and Selective Avoidance on Instagram. *Telematics and Informatics*, 52, 101432.

Parsons, S. (2009). Sontag's Lament: Emotion, Ethics, and Photography. *Photography and Culture*, 2(3), 289-302.

Partzsch, L. (2015). The Power of Celebrities in Global Politics. *Celebrity Studies*, 6(2), 178-191.

Patel, N. (2015, 16.1.2015). 90% Of Startups Fail: Here's What You Need to Know About the 10%. *Forbes*. <https://www.forbes.com/sites/neilpatel/2015/01/16/90-of-startups-will-fail-heres-what-you-need-to-know-about-the-10/>

Pearson, L. (2023). *Queen Victoria and Photography*. National Galleries Scotland. <https://www.nationalgalleries.org/art-and-artists/features/queen-victoria-and-photography>

Pellegrino, J. W., Rosinski, R. R., Chiesi, H. L., & Siegel, A. (1977). Picture-Word Differences in Decision Latency: An Analysis of Single and Dual Memory Models. *Memory & Cognition*, 5(4), 383-396.

Pendarovski, S., Pachovski, V., & Andonov, M. (2015). *The Promise of E-Democracy and the Internet: Myths About Digital Agoras?* 10th Annual International Academic Conference on European Integration - European Integration - New Prospects, Skopje, North Macedonia.

Peng, Y. (2021). What Makes Politicians' Instagram Posts Popular? Analyzing Social Media Strategies of Candidates and Office Holders with Computer Vision. *The International Journal of Press/Politics*, 26(1), 143-166.

Petrie, C. (2017). The Internet Versus the State. *Ieee Internet Computing*, 21(2), 102-103.

Piatak, J., & Mikkelsen, I. (2021). Does Social Media Engagement Translate to Civic Engagement Offline? *Nonprofit and Voluntary Sector Quarterly*, 50(5), 1079-1101.

Pierrri, P. (2022). Who Can Still Afford to do Digital Activism? *Weizenbaum Journal of the Digital Society*, 2(2), 1-23.

Pineda, A., Barragán-Romero, A. I., & Bellido-Pérez, E. (2021). Representación de los Principales Líderes Políticos y Uso Propagandístico de Instagram en España. *Cuadernos.info*(47), 80-110.

Pirannejad, A. (2017). Can the Internet Promote Democracy? A Cross-Country Study Based on Dynamic Panel Data Models. *Information Technology for Development*, 23(2), 281-295.

Plantin, J.-C., & Punathambekar, A. (2019). Digital Media Infrastructures: Pipes, Platforms, and Politics. *Media, Culture & Society*, 41(2), 163-174.

Polte, M. (2006). Photography: Irrelevant or Indispensable? Pictorial Science from the Perspective of Photography. *Visual Resources*, 22(2), 143-155.

Porter, A. (2020). The Influence of Intimacy. *Performance Research*, 25(1), 59-62.

Postman, N. (1993). *Technopoly. The Surrender of Culture to Technology*. Vintage Books - a Division of Random House.

Prassl, J. (2018). *Humans as a Service: The Promise and Perils of Work in the Gig Economy*. Oxford University Press.

Prevezanos, K. (2020, 9.8.2020). Photographer Robert Capa: Debunking the Myth. *DW*. <https://www.dw.com/en/wwii-photographer-robert-cap-a-debunking-the-myth/a-54852196>

Prihatini, E. S. (2020). Women and Social Media During Legislative Elections in Indonesia. *Women's Studies International Forum*, 83.

Puppe, H. W. (1979). Walter Benjamin On Photography. *Colloquia Germanica*, 12(3), 273-291.

Quadri, E. (2019). The Future of Democracy in the Digital Age. *The International Spectator*, 54(4), 144-146.

Quevedo-Redondo, R., & Portalés-Oliva, M. (2017). Imagen y Comunicación Política en Instagram. Celebración de los Candidatos a la Presidencia del Gobierno. *Profesional de la información*, 26(5), 916-927.

Quock, R. M. (2022). *Drugs and Behavior*. Washington State University under a Creative Commons Attribution-NonCommercial-ShareAlike 4.0 International License on Pressbooks. <https://opentext.wsu.edu/biopsychological-effects-alcohol-drugs/front-matter/introduction/>

Rainey, S., Martin, S., Christen, A., Mégevand, P., & Fournier, E. (2020). Brain Recording, Mind-Reading, and Neurotechnology: Ethical Issues from Consumer Devices to Brain-Based Speech Decoding. *Science and Engineering Ethics*, 26(4), 2295-2311.

Ranerup, A. (1998, Nov 12-14). Can Internet Improve Democracy in Local Government? [Pdc 98: Proceedings of the participatory design conference]. 5th Biennial Participatory Design Conference, Seattle, Wa.

Rath, M., Trempler, J., & Wenderholm, I. (2013). Das haptische Bild. Körperhafte Bilderfahrung in der Neuzeit. In M. Rath, J. Trempler, & I. Wenderholm (Eds.), *Das haptische Bild. Körperhafte Bilderfahrung in der Neuzeit*. (pp. VII-XV). Akademie Verlag. Ein Unternehmen von De Gruyter.

Reckwitz, A. (2020). The Society of Singularities. In B.-M. Doris, K. Jens, & N. Ansgar (Eds.), *Futures of the Study of Culture* (pp. 141-154). De Gruyter.

Reiffer, P. (2019, 8.7.2019). Photographers, Instagrammers – Stop Being So Damn Selfish and Disrespectful. <https://www.paulreiffer.com/2019/07/photographers-instagrammers-stop-being-so-damn-selfish-and-disrespectful/>

Reinert, J. T. (2013). In-Q-Tel: The Central Intelligence Agency as Venture Capitalist. *Northwestern Journal of International Law & Business*, 33(3), 677-709.

Repucci, S., & Slipowith, A. (2022). *Freedom in the World 2022: The Global Expansion of Authoritarian Rule*. Freedom House. <https://freedomhouse.org/report/freedom-world/2022/global-expansion-authoritarian-rule>

Review, H. L. (2018). Note Section 230 as First Amendment Rule [Article]. *Harvard Law Review*, 131(7), 2027-2048.

Richman, J. (2023, 16.2.2023). Section 230 Is On Trial. Here's What You Need to Know. <https://www.eff.org/deeplinks/2023/02/section-230-trial-heres-what-you-need-know>

Ritzer, G. (2015). Prosumer Capitalism. *The Sociological Quarterly*, 56, 413-445.

Rød, E. G., & Weidmann, N. B. (2015). Empowering Activists or Autocrats? The Internet in Authoritarian Regimes. *Journal of Peace Research*, 52(3), 338-351.

Rodina, E., & Dligach, D. (2019). Dictator's Instagram: Personal and Political Narratives in a Chechen Leader's Social Network. *Caucasus Survey*, 7(2), 95-109.

Rohlinger, D. A., & Brown, J. (2009). Democracy, Action, and the Internet After 9/11. *American Behavioral Scientist*, 53(1), 133-150.

Ronson, J. (2015). *So You've Been Publicly Shamed*. Picador.

Rosenblat, A. (2018). *Uberland: How Algorithms Are Rewriting the Rules of Work*. University of California Press.

Roth, E. (2023, 19.2.2023). Facebook and Instagram Are Testing Selling You Blue Checks for \$12 a Month. *The Verge*. <https://www.theverge.com/2023/2/19/23606268/meta-instagram-facebook-test-paid-verification>

Rubel, A., Castro, C., & Pham, A. (2021). *Algorithms and Autonomy. The Ethics of Automated Decision Systems*. Cambridge University Press.

Rubinstein, D. (2016). What Is Twenty-First-Century Photography? *Philosophy in Photography*, 7(1-2), 155-160.

Russmann, U., & Svensson, J. (2017). Interaction on Instagram?: Glimpses from the 2014 Swedish Elections. *International Journal of E-Politics (IJEPE)*, 8(1), 50-66.

Sætra, H. S. (2019). Freedom Under the Gaze of Big Brother: Preparing the Grounds for a Liberal Defence of Privacy in the Era of Big Data. *Technology in Society*, 58, 1-7.

Sætra, H. S. (2020). Privacy as an Aggregate Public Good. *Technology in Society*, 63, 1-9.

Saltzman, L. (1999). To Figure, or Not to Figure The Iconoclastic Proscription and Its Theoretical Legacy. In M. S. Catherine (Ed.), *Jewish Identity in Modern Art history* (pp. 67-84). University of California Press.

San Cornelio, G., Ardèvol, E., & Martorell, S. (2021). Estilo de Vida, Activismo y Consumo en Influencers Medioambientales en Instagram. *Obra Digital*(21), 131-148.

Sandbye, M. (2014). Looking at the Family Photo Album: A Resumed Theoretical Discussion of Why and How. *Journal of Aesthetics & Culture*, 6(1), 1-17.

Savvides, S. C. (2022). The Disconnect of Funding From Wealth Creation. *World Economics Journal*, 23(2), 1-19.

Schewe, E. (2018, 26.12.2018). How the Brownie Camera Made Everyone a Photographer. *JSTOR Daily*. <https://daily.jstor.org/how-the-brownie-camera-made-everyone-a-photographer/>

Schneider, S. (2019, 04.11.2019). Will AI Become Conscious? A Conversation with Susan Schneider. *Princeton University Press Blog*. <https://press.princeton.edu/ideas/will-ai-become-conscious-a-conversation-with-susan-schneider>

Schor, J. B. (2020). *After the Gig: How the Sharing Economy Got Hijacked and How to Win it Back*. University of California Press.

Seaver, N. (2018). Captivating Algorithms: Recommender Systems as Traps. *Journal of Material Culture*, 24(4), 421-436.

Seeliger, M., & Sevignani, S. (2022). A New Structural Transformation of the Public Sphere? An Introduction. *Theory, Culture & Society*, 39(4), 3-16.

Seitz, B. M., Blaisdell, A. P., & Sharpe, M. J. (2021). Higher-Order Conditioning and Dopamine: Charting a Path Forward. *Frontiers in Behavioral Neuroscience*, 15, 1-10.

Selva-Ruiz, D., & Caro-Castaño, L. (2017). The Use of Instagram as a Political Communication Channel by Spanish Deputies: The Humanization Strategy in the “Old” and the “New” Politics. *El Profesional de la Información*, 26(5), 903-915.

Senft, T. M., & Baym, N. K. (2015). What Does the Selfie Say? Investigating a Global Phenomenon. *International Journal of Communication*, 9, 1588-1606.

Sensen, O. (2011). *Kant on Human Dignity*. De Gruyter. <https://doi.org/doi:10.1515/9783110267167>

Shah, A. (2020). *The Effect of Instagram Influencers on Vacation Destination Choice* Auckland University of Technology]. <https://openrepository.aut.ac.nz/server/api/core/bitstreams/ceea9e93-7bef-4607-a6b1-80dfc98ed0ae/content>

Shandler, R., Gross, M. L., & Canetti, D. (2019). Can You Engage in Political Activity Without Internet Access? The Social Effects of Internet Deprivation. *Political Studies Review*, 18(4), 620-629.

Shearer, J., & Maurer, H. (2002). Is Democracy Possible in the Internet? *Journal of Universal Computer Science*, 8(3), 396-407.

Shiner, B., & O’Callaghan, P. (2021). Introduction to a Comparative Study of the Right to Freedom of Thought. *European Journal of Comparative Law and Governance*, 8, 107-111.

Shulziner, D., & Carmi, G. E. (2014). Human Dignity in National Constitutions: Functions, Promises and Dangers. *The American Journal of Comparative Law*, 62(2), 461-490.

Skinner, B. F. (1937). Two Types of Conditioned Reflex: A Reply to Konorski and Miller. *The Journal of General Psychology*, 16(1), 272-279.

Sloan, R. H., & Warner, R. (2021). *The Privacy Fix. How to Preserve Privacy in the Onslaught of Surveillance*. Cambridge University Press.

Šmelhausová, J., Riepe, C., Jarić, I., & Essl, F. (2022). How Instagram Users Influence Nature Conservation: A Case Study on Protected Areas in Central Europe. *Biological Conservation*, 276, 1-14.

Smith, A. (2009, 15.4.2009). The Internet's Role in Campaign 2008. <https://www.pewresearch.org/internet/2009/04/15/the-internets-role-in-campaign-2008/>

Smith, N. (2021, 22.6.2021). Interview: Marc Andreessen, VC and Tech Pioneer. <https://noahpinion.substack.com/p/interview-marc-andreessen-vc-and>

Smith, S. (2021, 11.10.2021). How Much Does 'Instagram Face' Really Cost? Vice. <https://www.vice.com/en/article/m7e8yy/how-much-does-instagram-face-really-cost>

Smith, S. P. (2021). Landscapes for "Likes": Capitalizing on Travel with Instagram. *Social Semiotics*, 31(4), 604-624.

Smith, T. (2022). *Iconomy: Toward a Political Economy of Images*. Anthem Press.

Snyder, J., & Allen, N. W. (1975). Photography, Vision, and Representation. *Critical Inquiry*, 2(1), 143-169.

Sommaggio, P., Mazzoca, M., Gerola, A., & Ferro, F. (2017). Cognitive Liberty. A First Step Towards a Human Neuro-Rights Declaration. *BioLaw Journal - Rivista di BioDiritto*(3), 27-45.

Sontag, S. (2005). *On Photography*. RosettaBooks.

Spawning. (2023). *Have I Been Trained* Website. Retrieved 8.1.2023 from <https://haveibeentrained.com>

Srinivasan, B. (2022). *The Network State. How to Start a New Country*. <https://thenetworkstate.com>

Srnicek, N. (2017). *Platform Capitalism*. Polity Press.

Staab, P. (2020). *Digitaler Kapitalismus. Macht und Herrschaft in der Ökonomie der Unknappheit*. edition suhrkamp.

Staab, P., Sieron, S., & Piétron, D. (2022). Counter-Hegemonic Neoliberalism. Making Sense of EU Platform Regulation. *Weizenbaum Journal of the Digital Society*, 2(1), 1-18.

Staab, P., & Thiel, T. (2022). Social Media and the Digital Structural Transformation of the Public Sphere. *Theory, Culture & Society*, 39(4), 129-143.

Staddon, J. E., & Cerutti, D. T. (2003). Operant Conditioning. *Annu Rev Psychol*, 54, 115-144.

Stanton, A. (2022). Sober Masculinity and Nurturing Femininity: A Gendered Analysis of the Syrian Presidency Instagram Account. *Place Branding and Public Diplomacy*, 18(4), 346-356.

Statista. (2023). *Most Popular Social Networks Worldwide as of January 2023, Ranked by Number of Monthly Active Users*. Retrieved 12.2.2023 from <https://www.statista.com/statistics/272014/global-social-networks-ranked-by-number-of-users/>

Steinberg, M., & Li, J. (2017). Introduction: Regional Platforms. *Asiascape: Digital Asia*, 4, 173-183.

Steinert, S., & Dennis, M. J. (2022). Emotions and Digital Well-Being: On Social Media's Emotional Affordances. *Philosophy & Technology*, 35(2), 1-12.

Stewart, E. (2018). Lawmakers Seem Confused About What Facebook Does — And How to Fix it. *Vox*. <https://www.vox.com/policy-and-politics/2018/4/10/17222062/mark-zuckerberg-testimony-graham-facebook-regulations>

Stier, S., Bleier, A., Lietz, H., & Strohmaier, M. (2018). Election Campaigning on Social Media: Politicians, Audiences, and the Mediation of Political Communication on Facebook and Twitter. *Political Communication*, 35(1), 50-74.

Stobierski, T. (2020, 12.11.2020). What Are Network Effects? *Harvard Business School Online's Business Insights Blog*. <https://online.hbs.edu/blog/post/what-are-network-effects>

Stolzoff, S. (2018, 1.2.2018). The Formula for Phone Addiction Might Double As a Cure. *Wired*. <https://www.wired.com/story/phone-addiction-formula/?ref=the-stanford-review>

Street, J. (2004). Celebrity Politicians: Popular Culture and Political Representation. *The British Journal of Politics and International Relations*, 6(4), 435-452.

Ström, T. E. (2022). Capital and Cybernetics. *New Left Review*, 135. <https://newleftreview.org/issues/ii135/articles/timothy-erik-strom-capital-and-cybernetics>

Stulberg, R. B. (1973). Heidegger and the Origin of the Work of Art: An Explication. *The Journal of Aesthetics and Art Criticism*, 32(2), 257-265.

Suárez-Carballo, F., Martín-Sanromán, J.-R., & Martins, N. (2021). An Analysis of Feminist Graphics Published on Instagram by Spanish Female Professionals on the Subject of International Women's Day (2019-2020). *Communication & Society*, 34(2), 351-367.

Sun, H. (2022). The Irresponsibility of Technology Companies. In H. Sun (Ed.), *Technology and the Public Interest* (pp. 104-120). Cambridge University Press.

Susser, D., Roessler, B., & Nissenbaum, H. (2019). Technology, Autonomy, and Manipulation. *Internet Policy Review*, 8(2), 1-22.

Szalontay, M. (2021, 2.12.2021). How Venture Capital Can Approach ESG. *Forbes*. <https://www.forbes.com/sites/forbesfinancecouncil/2021/12/02/how-venture-capital-can-approach-esg/>

Szebeni, Z., & Salojärvi, V. (2022). "Authentically" Maintaining Populism in Hungary – Visual Analysis of Prime Minister Viktor Orbán's Instagram. *Mass Communication and Society*, 25(6), 812-837.

Taneja, H. (2019, 22.1.2019). The Era of "Move Fast and Break Things" Is Over. *Harvard Business Review*. <https://hbr.org/2019/01/the-era-of-move-fast-and-break-things-is-over>

Tarnoff, B., & Weigel, M. (2020). *Voices from the Valley. Tech Workers Talk About What They Do - and How They Do It*. Farrar, Straus and Giroux (FSG).

Terren, L., & Borge-Bravo, R. (2021). Echo Chambers on Social Media: A Systematic Review of the Literature. *Review of Communication Research*, 9, 99-118.

Tesin, A., Pivac, T., Besermenji, S., & Obradovic, S. (2022). Exploring the Influence of Instagram on Travel Destination Choice. *The European Journal of Applied Economics*, 19(1), 66-80.

The MET, M. M. o. A. (2023). *Photography and the Civil War, 1861–65*. The Metropolitan Museum of Art. https://www.metmuseum.org/toah/hd/phcw/hd_phcw.htm

Theocharis, Y., & Quintelier, E. (2016). Stimulating Citizenship or Expanding Entertainment? The Effect of Facebook on Adolescent Participation. *New Media & Society*, 18(5), 817-836.

Thiel, P., & Masters, B. (2014). *Zero to One: Notes on Startups, or How to Build the Future*. Crown Business.

Thurlow, C. (2021). Liquid Power: Reading the Infinity Pool as a Global Semioscape. *Visual Communication*, 21(1), 123-145.

Tolentino, J. (2019, 12.12.2019). The Age of Instagram Face. *The New Yorker*. <https://www.newyorker.com/culture/decade-in-review/the-age-of-instagram-face>

Totaro, P., & Ninno, D. (2015). Algorithms and the Practical World. *Theory, Culture & Society*, 33(1), 139-152.

Trace, L. N. (2020). *Social Media Guidance* (8.9.2020). Leave no Trace. <https://int.org/social-media-guidance/>

Tramz, M. (2014, 4.2.2014). Magnificent Obsession: How Queen Victoria Influenced Photography. *TIME Magazine*. <https://time.com/3806764/magnificent-obsession-how-queen-victoria-influenced-photography/>

Trevisan, M., Vassio, L., Drago, I., Mellia, M., Murai, F., Figueiredo, F., Silva, A. P. C. d., & Almeida, J. M. (2019). *Towards Understanding Political Interactions on Instagram*. Proceedings of the 30th ACM Conference on Hypertext and Social Media, Hof, Germany.

Tschaepke, M. (2016). Undermining Dopamine Democracy Through Education: Synthetic Situations, Social Media, and Incentive Salience. *Pragmatism Today. The Journal of the Central-European Pragmatist Forum*, 7(1), 32-40.

Turner, F. (2008). *From Counterculture to Cyberculture: Stewart Brand, the Whole Earth Network, and the Rise of Digital Utopianism*. University of Chicago Press.

United States Code, O. o. t. L. R. C. (2023). §230. *Protection for Private Blocking and Screening of Offensive Material*. [https://uscode.house.gov/view.xhtml?req=\(title:47%20section:230%20edition:prelim\)](https://uscode.house.gov/view.xhtml?req=(title:47%20section:230%20edition:prelim))

University, S. (2023). *Stanford Behavior Design Lab.* Stanford University. <https://behaviordesign.stanford.edu>

Ushanova, I., Shustrov, A., Severin, S., & Severin, E. (2021). *Civic Internet Activism Of Modern Russian Youth On Instagram*. European.

Usher, B. (2021). The Celebrified Columnist and Opinion Spectacle: Journalism's Changing Place in Networked Public Spheres. *Journalism*, 22(11), 2836-2854.

Vailshery, L. S. (2022). *Vendor Market Share in Cloud Infrastructure Services Market Worldwide 2017-2022*. Statista. Retrieved 14.2.2023 from <https://www.statista.com/statistics/967365/worldwide-cloud-infrastructure-services-market-share-vendor/>

Valeriani, A., & Vaccari, C. (2016). Accidental Exposure to Politics on Social Media as Online Participation Equalizer in Germany, Italy, and the United Kingdom. *New Media & Society*, 18(9), 1857-1874.

van Dijck, J., & Poell, T. (2013). Understanding Social Media Logic. *Media and Communication*, 1(1), 2-14.

Varoufakis, Y. (2022a, 23.2.2022). Cloudalists: Our New Cloud-based Ruling Class – Project Syndicate Op-Ed. *Project Syndicate* (Retrieved from Yanis Varoufakis' Blog). <https://www.yanisvaroufakis.eu/2022/04/12/cloudalists-our-new-cloud-based-ruling-class-project-syndicate-op-ed/>

Varoufakis, Y. (2022b). *Why the Rise of a New Cloud-Based Ruling Class Is Crushing Democracy*. YouTube. <https://www.youtube.com/watch?v=wNf3dN0VXqE>

Vassilakopoulou, P., & Hustad, E. (2021). Bridging Digital Divides: A Literature Review and Research Agenda for Information Systems Research. *Information Systems Frontiers*, 1-15.

Vélez, C. (2020). *Privacy Is Power: Why and How You Should Take Back Control of Your Data*. Penguin Random House.

Viljoen, S. (2021). A Relational Theory of Data Governance. *The Yale Law Journal*, 131, 573-654.

Voorveld, H. A. M., van Noort, G., Muntinga, D. G., & Bronner, F. (2018). Engagement with Social Media and Social Media Advertising: The Differentiating Role of Platform Type. *Journal of Advertising*, 47(1), 38-54.

Vossen, K. C. (2019). Le Cadrage Politique et l'Ethos de Justin Trudeau sur Instagram : un Storytelling Héroïque Entre Émotion et Celebrity Politics / Political Framing and the Ethos of Justin Trudeau on Instagram: An Heroic Storytelling Between Emotion and Celebrity Politics. *Communiquer*, 26, 1-22.

Waters, J. (2021, 22.8.2021). Constant Craving: How Digital Media Turned Us All Into Dopamine Addicts. *The Observer*. <https://www.theguardian.com/global/2021/aug/22/how-digital-media-turned-us-all-into-dopamine-addicts-and-what-we-can-do-to-break-the-cycle>

Wattal, S., Schuff, D., Mandviwalla, M., & Williams, C. B. (2010). Web 2.0 and Politics: The 2008 U.S. Presidential Election and an E-Politics Research Agenda. *MIS Quarterly*, 34(4), 669-688.

Weare, C. (2002). The Internet and Democracy: The Causal Links Between Technology and Politics. *International Journal of Public Administration*, 25(5), 659-691.

Weigel, M. (2021, 20.12.21). The Making of Peter Thiel's Networks. *The New Republic*. <https://newrepublic.com/article/164768/peter-thiel-networks-contrarian-book-review>

Weissenbacher, A. (2018). Defending Cognitive Liberty in an Age of Moral Engineering. *Theology and Science*, 16(3), 288-299.

Welch, C. (2023, 20.1.2023). Instagram Showed People Too Many Videos Last Year, Admits Adam Mosseri. *The Verge*. <https://www.theverge.com/2023/1/20/23564321/instagram-reels-photos-adam-mosseri-too-many-videos>

Wellman, M. L. (2022). Black Squares for Black Lives? Performative Allyship as Credibility Maintenance for Social Media Influencers on Instagram. *Social Media + Society*(January-March), 1-10.

Weschler, L. (1982). *Seeing Is Forgetting the Name of the Thing One Sees. A Life of Contemporary Artist Robert Irwin*. University of California Press.

West, D. M. (2004). E-Government and the Transformation of Service Delivery and Citizen Attitudes. *Public Administration Review*, 64(1), 15-27.

Wexler, M., Yunzhijun, Y., & Bridson, S. (2018). Putting Context Collapse in Context. *Journal of Ideology*, 40(1), 1-25.

Whitmer, J. M. (2021). "Between a Regular Person and a Brand": Managing the Contradictions of the Authentic Self-Brand. *The Sociological Quarterly*, 62(1), 143-160.

Wieczorek-Tomaszewska, M. (2020). Visual Literacy in Contemporary Culture - Comparative Research. *E-Learning*(12), 195-206.

Wiener, N. (1950). *The Human Use of Human Beings. Cybernetics and Society*. The Riverside Press.

Wiggers, K., & Wilhelm, A. (2022, 7.5.2022). As Interest Rates Rise, Startups and VCs Are Playing a New Game. *TechCrunch*. https://techcrunch.com/2022/05/07/as-interest-rates-rise-startups-and-vcs-are-playing-a-new-game/?guccounter=1&guce_referrer=aHR0cHM6Ly93d3cuZ29vZ2xILmNvbS8&guce_referrer_sig=AQAAABK5vNpchIDFrc_I5gORJvpo7yfw_1xI39Lh1I2X31_KMzDi1zad0Er3gT44PyvQI92pSoDITYMEITCNwOdZj59SpT7ibRmWK_5Ty98eISZ0vd5R3aSo47PF_YcF8ASEhO5s8KI2a7KG6Vf5fNfilo7vLjHFaodVcasUkRfUtY61

Wing Kosner, A. (2012, 4.12.2012). Stanford's School of Persuasion: BJ Fogg on How to Win Users and Influence Behavior. *Forbes*. <https://www.forbes.com/sites/anthonykosner/2012/12/04/stanfords-school-of-persuasion-bj-fogg-on-how-to-win-users-and-influence-behavior/>

Winner, L. (1980). Do Artifacts Have Politics? *Daedalus*, 109(1), 121-136.

Wizard, B. (2023a). *The Behavior Wizard. Easy Access to Powerful Strategies*. Retrieved 3.3.2023 from <http://www.behaviorwizard.org/wp/>

Wizard, B. (2023b). *GreenSpan Behaviors Preview*. <http://www.behaviorwizard.org/wp/all-previews-list/GreenSpan-behaviors-preview/>

WSJ, T. W. S. J. (2021). *The Facebook Files*. Retrieved 12.2.2023 from <https://www.wsj.com/articles/the-facebook-files-11631713039>

Yarchi, M., Baden, C., & Kligler-Vilenchik, N. (2021). Political Polarization on the Digital Sphere: A Cross-Platform, Over-Time Analysis of Interactional, Positional, and Affective Polarization on Social Media. *Political Communication*, 38(1-2), 98-139.

Yarow, J. (2010, 8.12.2010). Cool Old Video: Steve Jobs Explains Why The Computer Is A Bicycle For The Mind. *Business Insider*. <https://www.businessinsider.com/cool-old-video-steve-jobs-explains-why-the-computer-is-a-bicycle-for-the-mind-2010-12>

Ye, Z. (2022). Review Essay: When We Talk About Platforms and Culture, What Are We Talking About? *Media, Culture & Society*, 44(1), 185-190.

Yuste, R., Goering, S., Arcas, B. A. y., Bi, G., Carmena, J. M., Carter, A., Fins, J. J., Friesen, P., Gallant, J., Huggins, J. E., Illes, J., Kellmeyer, P., Klein, E., Marblestone, A., Mitchell, C., Parens, E., Pham, M., Rubel, A., Sadato, N., . . . Wolpaw, J. (2017). Four Ethical Priorities for Neurotechnologies and AI. *Nature*, 551(7679), 159-163.

Zang, L., Xiong, F., & Gao, Y. (2019). Reversing the U: New Evidence on the Internet and Democracy Relationship. *Social Science Computer Review*, 37(3), 295-314.

Zhuravskaya, E., Petrova, M., & Enikolopov, R. (2020). Political Effects of the Internet and Social Media. *Annual Review of Economics*, 12(1), 415-438.

Ziewitz, M. (2016). Governing Algorithms: Myth, Mess, and Methods. *Science, Technology, & Human Values*, 41(1), 3-16.

Zuboff, S. (2015). Big Other: Surveillance Capitalism and the Prospects of an Information Civilization. *Journal of Information Technology*, 30(1), 75-89.

Zuboff, S. (2019a). *The Age of Surveillance Capitalism. The Fight for a Human Future at the New Frontier of Power*. Profile Books.

Zuboff, S. (2019b, 9.6.2019). The Surveillance Threat Is Not What Orwell Imagined. *TIME*. <https://time.com/5602363/george-orwell-1984-anniversary-surveillance-capitalism/>

Zuiderveen Borgesius, F. J., Trilling, D., Möller, J., Bodó, B., de Vreese, C. H., & Helberger, N. (2016). Should We Worry About Filter Bubbles? *Internet Policy Review*, 5(1).

Zulli, D. (2018). Capitalizing on the Look: Insights into the Glance, Attention Economy, and Instagram. *Critical Studies in Media Communication*, 35(2), 137-150.