

Data-Driven Mergers: Is it Time to Reform EU Merger Control?

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ABSTRACT

In today's digital economy, a growing number of mergers notified to the European Commission involve the combination of large datasets. This article contributes to the current debate on how data-related concerns should be integrated into EU merger review. In analysing the most relevant data-driven mergers, Section II highlights the anti-competitive effects of big data combinations and addresses the fallacy of relying exclusively on conventional antitrust concepts to assess the data-related theories of harm. Section III advances a series of adaptations and frameworks aimed at facilitating a more comprehensive and refined analysis of the competitive effects of data in merger review. In particular, it argues that the Commission should recognise a separate market for data, shift its focus from market definitions and financial thresholds to the theories of harm, and adopt flexible, forward-facing analyses throughout the merger review. Finally, Section IV asserts that the economic and non-economic privacy-related issues arising from data-driven mergers should be incorporated into merger assessments, and proposes two viable ways of achieving this. This article hopes to demonstrate that although the existing EU Merger Regulation ('EUMR') and merger control frameworks are sufficiently flexible to address the novel issues arising from data concentrations, there is an urgent need for competition authorities to modify the way in which they apply the current EU merger control regime to data-driven mergers.

Keywords: EU merger control, data-driven mergers

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I. INTRODUCTION

We live in the age of big data. The ‘competitive strength’ of an entity is becoming increasingly reliant on the data it has at its disposal.¹ Indeed, data has been described as ‘the lifblood of online platforms and digital businesses’ and the ‘new oil of the internet’.² Yet, even as more entities leverage data and technology to adapt to rapid market changes competition authorities have still been applying traditional, pre-internet ownership models to determine the role of big data as a source of market power.³ As a result, the issues facing the Commission in their assessments of data-driven mergers are often well covered, but the outcomes are frequently criticised.

Beyond the commercial value of data, the emergence of personal data as the ‘new currency’ has reinvigorated the development of privacy and consumer protection laws.⁴ Contrastingly, antitrust authorities have sought to maintain strict boundaries between privacy and competition laws, consistently arguing that ‘any privacy-related concerns flowing from the increased data concentration... do not fall within the scope of EU competition law but within the scope of EU data protection rules’.⁵ Whilst some have commended the Commission’s regulatory restraint, others have criticised this approach for disregarding the consumer-protection function inherent in competition law.

It is recognised that the existing EU merger regulation (‘EUMR’) and merger control frameworks are sufficiently flexible to address the novel challenges arising from big data.⁶ Nonetheless, this article seeks to demonstrate that there is an urgent need for competition authorities to modify the approach in which the current EU merger control regime is applied to data-driven mergers.

Section II examines the existing landscape on which a significant anti-competitive ‘data advantage’ may be established. It evaluates the most relevant data-driven mergers to highlight the potential data-related anti-competitive effects and analyse, retrospectively, the fallacies of relying exclusively on conventional antitrust concepts to review these mergers. Section II submits that the Commission

¹ Inge Graef, *EU Competition Law, Data Protection and Online Platforms* (Wolters Kluwer 2016) 125; Thomas Stuart, ‘Too Little Too Late?’ (2021) 17 *European Competition Journal* 407, 407.

² Marixenia Davilla, ‘Is Big Data a Different Kind of Animal? The Treatment of Big Data Under the EU Competition Rules’ (2017) 8(6) *Journal of European Competition Law & Practice* 370; Meglena Kuneva, ‘Keynote Speech’ (Roundtable on Online Data Collection, Targeting and Profiling, Brussels, 31 March 2009) <https://ec.europa.eu/commission/presscorner/detail/en/SPEECH_09_156> accessed 18 February 2022.

³ Sophie Chesterton, ‘Apple’s Acquisition of Shazam and the Elusive “Data Advantage”’ (2019) 40 *European Competition Law Review* 102.

⁴ Kuneva (n 2).

⁵ *Facebook/WhatsApp* (Case COMP/M.7217) Commission Decision C(2014) 7239 final (3 October 2014) para 164.

⁶ Council Regulation (EC) 139/2004 on the control of concentrations between undertakings (EC Merger Regulation) [2004] OJ L24/1.

has often overlooked the underlying motive for data-driven mergers—data—resulting in a skewed, unrealistic assessment of the merger’s overall impact.

Section III advances a series of frameworks focused on facilitating a more refined and comprehensive analysis of the competitive effects of data in merger review. It argues that the Commission should shift its focus from market definitions and financial thresholds to the theories of harm. In particular, to properly assess the potential anti-competitive effects of data, the Section posits that the Commission should recognise a separate market for data and adopt forward-facing analyses throughout the merger review. The Section considers the relationship between the newly enforced EU Digital Markets Act (“DMA”)⁷ and the EUMR. It commends the DMA for enabling and encouraging competition authorities to review a greater number of digital acquisitions. However, as there are no clear and objective criteria for competition authorities to identify problematic data-driven mergers, the Commission should not overlook the significance of data and should integrate data-related theories of harm into its reviews.

Section IV challenges the Commission’s reliance on consumer and data protection laws to address privacy-related concerns. It highlights that such rules are unequipped to deal with mergers and the monopolistic powers that stem from data concentrations, and proposes two viable ways of incorporating privacy-related issues into merger review. Crucially, this article asserts that the economic and non-economic implications of data privacy on both consumer welfare and the relevant markets should be considered in all merger assessments involving big data.

II. THE COMPETITIVE STRENGTH OF BIG DATA

Section II seeks to demonstrate that a more comprehensive and refined analysis of data in merger review is required. In evaluating the most relevant data-driven mergers, the Section highlights the potential anti-competitive effects of data, and analyses, retrospectively, the fallacies of relying exclusively on conventional anti-trust concepts to assess these mergers.

Section II argues that the lack of scrutiny of data-related theories of harm largely stems from the fallacies of applying narrow, market-by-market assessments and the traditional market foreclosure test. Such reliance has often led to the erroneous conclusion that the datasets collected by digital platforms were fungible.⁸ For instance, in approving *Google/DoubleClick* and *Facebook/WhatsApp*, the Commission assumed that unless there is an overlap between the merging parties’ markets,

⁷ Regulation (EU) 2022/1925 of the European Parliament and of the Council of 14 September 2022 on contestable and fair markets in the digital sector and amending Directives (EU) 2019/1937 and (EU) 2020/1828 (Digital Markets Act) [2022] OJ L265/1.

⁸ Martin Moore and Damian Tambini, *Digital Dominance: The Power of Google, Amazon, Facebook and Apple* (Oxford University Press 2018) 8.

personal data ‘should not prevent or set hurdles for a merger/takeover’.⁹ It is submitted that overlooking the potential anti-competitive effects of data combinations is a short-sighted approach that fails to properly consider the underlying motive for data-driven mergers—that is, data.

A. RECENT DATA-DRIVEN MERGERS: HIGHLIGHTS

(i) *Facebook/WhatsApp*:¹⁰ *Overlooking the Competitive Significance of Data?*

From a data privacy perspective, Facebook’s acquisition of WhatsApp remains highly controversial. Following WhatsApp’s privacy policy changes in 2016 to share WhatsApp user data with Facebook, Italian antitrust authorities fined WhatsApp €3m for data sharing (2017),¹¹ the Commission sanctioned Facebook €100m under article 14(1) EUMR for providing misleading information (2017),¹² Ireland fined WhatsApp €225m for transparency failings (2021),¹³ and Germany banned Facebook from processing WhatsApp data (2021).¹⁴ These scenarios beg the question: did the Commission utilise the best tools when reviewing the merger? Specifically, what were the harmful data-related effects of *Facebook/WhatsApp*, and could they have been better addressed pre-merger?

Before unconditionally clearing the merger after a Phase I review, the Commission focused on the consumer communication services (‘CCS’), social networking services (‘SNS’) and online advertising services (‘OAS’) markets. It neither divided the former two markets further by their intended uses nor,¹⁵ unfortunately, did it recognise a separate market for the ‘provision of data/data analytics services’.¹⁶

In the CCS market, where the main horizontal overlap occurred,¹⁷ the Commission rightly noted that the market shares Facebook would acquire post-transaction was not necessarily ‘indicative of market power’.¹⁸ This follows *Cisco & Messagenet*, where the CCS sector was characterised by ‘frequent market entry’ and ‘short innovation cycles’; hence, market shares may be ‘ephemeral’ and have ‘no

⁹ *ibid* 9.

¹⁰ *Facebook/WhatsApp* (n 5).

¹¹ Competition Policy International (CPI), ‘Italy: Regulator Fines Whatsapp €3m For Data Sharing’ (*CPI*, 6 May 2018) <www.competitionpolicyinternational.com/italy-regulator-fines-whatsapp-e3m-for-data-sharing/> accessed 23 February 2022.

¹² *Facebook/WhatsApp* (Case M.8228) Commission Decision 2017/C 286/06 [2017] OJ C286/6.

¹³ ‘WhatsApp Issued Second-Largest GDPR Fine of €225m’ *BBC* (2 September 2021) <www.bbc.com/news/technology-58422465> accessed 25 March 2023.

¹⁴ Douglas Busvinem, ‘German Regulator Bans Facebook from processing WhatsApp User Data’ *Reuters* (Berlin, 11 May 2021) <<https://www.reuters.com/business/legal/german-regulator-bans-facebook-processing-whatsapp-user-data-2021-05-11/>> accessed 24 March 2023.

¹⁵ For example, WhatsApp offers a ‘more personal and targeted’ experience than Facebook: *Facebook/WhatsApp* (M.7217) (n 5) para 60.

¹⁶ *Facebook/WhatsApp* (M.7217) (n 5) para 72.

¹⁷ *ibid* para 96.

¹⁸ *ibid* para 99.

lasting damage to competition'.¹⁹ The Commission also held that the network effects that raise barriers to market entry/expansion were 'unlikely to be substantially strengthened' as 60-70% of active Facebook Messenger users already used WhatsApp.²⁰ Similarly, regarding the SNS market, as most active WhatsApp users were already Facebook users, the Commission opined, 'competition is unlikely to be negatively affected by the merger'.²¹

In finding WhatsApp user data not exclusive to WhatsApp, the Commission deemed WhatsApp's datasets insufficiently 'unique' and 'essential' to confer Facebook a significant competitive advantage. This article, however, disagrees with the Commission's reliance on the traditional market foreclosure test to assess data-driven mergers. The multi-sided nature of digital platforms enables the collection of large volumes of data through multiple channels (for example, Facebook can gather data from both platform users and businesses that sell through it). Thus, even if data is not explicitly shared for commercial purposes, data in one tech company rarely resides in that company alone.²² Data sharing and multi-homing make it almost impossible for datasets to satisfy the 'unique' asset threshold, rendering efforts to assess the competitive significance of data using the conventional foreclosure test futile. It is therefore unnerving that the Commission did not further investigate why Facebook was willing to pay a staggering \$19bn for WhatsApp if the merger would have had such 'insubstantial' benefits.²³ That *Facebook/WhatsApp* involved almost 1.3bn Facebook users and 600m WhatsApp users reinforces the submission that the Commission's scrutiny (or rather, the lack thereof) of the merger's potential data-related effects failed to reflect the transaction's significance on the digital markets.

To its credit, the Commission did identify two data-related theories of harm that may arise from Facebook's attempts to consolidate dominance in the OAS market: introducing targeted advertising on WhatsApp and leveraging WhatsApp user data to improve Facebook's targeted advertising.²⁴ The Commission (too easily) dismissed these theories on three grounds, each of which will now be challenged.

First, the Commission erroneously believed that WhatsApp would not share its user data with Facebook as this would necessitate changes to its privacy policy. It presumed that such changes would risk WhatsApp users switching to alternative privacy-friendly CCS apps, and naively relied on Facebook's and WhatsApp's promises that users' privacy would not be compromised post-merger. This paper asserts that the Commission appears to have overlooked the spillover effects be-

¹⁹ Case T-79/12 *Cisco Systems Inc and Messagenet SpA v Commission* EU:T:2013:635, paras 64–74.

²⁰ *Facebook/WhatsApp* (M.7217) (n 5) para 140.

²¹ *ibid* para 151.

²² Chesterton (n 3).

²³ Stuart (n 1).

²⁴ *Facebook/WhatsApp* (M.7217) (n 5) para 168.

tween the CCS and OAS markets. It had failed to recognise that the potential revenues generated from online advertising services may outweigh the financial losses from users leaving WhatsApp. Sections II and III, thus, argue that the Commission should have defined a separate market for data. This would have enabled it to holistically consider how Facebook might commercialise the combined datasets (and hence, assess the indirect network effects of data) and the plausible ‘intangible, non-economic injuries’²⁵ (in *Facebook/WhatsApp* privacy degradation) that emanate from data concentrations.

Secondly, the Commission argued that even if Facebook leveraged WhatsApp’s datasets, ‘there will continue to be a large amount of Internet user data that are valuable for advertising purposes and that are not within Facebook’s exclusive control’.²⁶ As discussed, this reasoning too easily dismisses the exclusionary effects of data. It neither considers the cross-side network effects of data nor how the acquired datasets might be used to exploit consumers (see Section IV).²⁷

Thirdly, the Commission asserted that ‘[a]ny privacy-related concerns flowing from the increased concentration of data within the control of Facebook as a result of the transaction do not fall within the scope of EU competition law but within the scope of EU data protection rules’.²⁸ Whilst this ‘justification’ maintains the privacy-antitrust boundary, it disregards how privacy reduction degraded the quality of WhatsApp for users, highlighting how the privacy-as-a-quality competition parameter is being trivialised.²⁹

By 2016, WhatsApp deteriorated users’ privacy. This contradiction to the Commission’s conclusion demonstrates the fallacies of applying the market foreclosure test, relying on the merging entities’ promises at face value, and marginalising privacy-related concerns. Instead, the Commission should have scrutinised the facts presented by the parties, the potential indirect network effects of data, and the merger’s impact on consumer welfare by defining a market for data.

(ii) Microsoft/LinkedIn: Privacy as a Competition Parameter

Unlike *Facebook/WhatsApp*, the Commission enhanced its data-antitrust analysis in *Microsoft/LinkedIn* by recognising privacy as an important competition parameter and examining the data-related theories of harm.³⁰ Its data-related assessments focussed on the online advertising services (‘OAS’), customer relationship management software (CRM) and professional social network (‘PSN’) markets. Regarding the OAS and CRM markets, the Commission applied the traditional market foreclosure test and (unsurprisingly) dismissed all concerns as

²⁵ Stuart (n 1).

²⁶ *Facebook/WhatsApp* (M.7217) (n 5) para 189.

²⁷ Anca Chirita, ‘Data-driven Mergers Under EU Competition Law’ in John Linarelli and Orkun Akseli (eds), *The Future of Commercial Law: Ways Forward for Harmonisation* (Hart Publishing 2019).

²⁸ *Facebook/WhatsApp* (M.7217) (n 5).

²⁹ Stuart (n 1).

³⁰ *Microsoft/LinkedIn* (Case COMP/M.8124) Commission Decision C(2016) 8404 final (20 January 2017).

'large amounts of internet user data... [will] not [be] within Microsoft's exclusive control', and LinkedIn's database was not 'essential' to compete.³¹

The Commission's main concern was the potential foreclosure of the PSN market.³² It found that if Microsoft pre-installed LinkedIn on its Windows PC products and/or integrated LinkedIn into Microsoft Office, this would significantly enhance LinkedIn's visibility, raising barriers to market entry/expansion which, unlike in *Microsoft/Yahoo!*, were unlikely to be sufficiently mitigated by multi-homing or new market entrants as users tend to use apps readily available on their PC or software.³³ *Microsoft/LinkedIn* was, thereby, subjected to behavioural commitments.

Despite acknowledging data as a significant source of market power, this paper asserts that the Commission did not adequately consider the indirect network effects of data. For instance, it casually dismissed some of the PSN respondents' concerns regarding the competitive value of the *combined datasets*, namely that LinkedIn could leverage data to 'map a user's network and recommend with a high degree of precision new relevant LinkedIn connections, thereby increasing the size of LinkedIn's network and user activity'.³⁴

Ironically, however, the Commission noted that even where there is no intention or technical possibility to combine the datasets, 'pre-merger[,] the two companies were competing with each other *on the basis of the data they controlled* ... this competition would be *eliminated* by the merger'.³⁵ Whilst this is a welcomed change,³⁶ the Commission neither explained its somewhat uncharacteristic perspective nor did it define or 'refer to the underlying basis for its definition of a hypothetical market for data',³⁷ contributing to the nebulous understanding of data's significance in merger review.

Nevertheless, the Commission's inclination to integrate privacy considerations into its substantive assessment is positive progress. Regarding the PSN market, the Commission explicitly identified privacy as an important competition parameter.³⁸ Whilst it rightly did not indicate any preferential treatment towards privacy-friendly PSN competitors (preferential treatment is unwarranted as privacy is not the only competition parameter), the Commission could have elaborated on the competitive effects of privacy. In particular, what is the connection between LinkedIn's market power and the anti-competitive level of data collected, or privacy protection users received?

³¹ *ibid* para 276.

³² Chirita (n 27).

³³ *Microsoft/LinkedIn* (n 30) paras 340, 343–344, 347.

³⁴ *ibid* para 324.

³⁵ *ibid* para 179.

³⁶ Stuart (n 1).

³⁷ Moore and Tambini (n 8).

³⁸ *Microsoft/LinkedIn* (n 30) para 350.

Regarding the OAS market, the Commission dismissed all privacy-related concerns as the GDPR would ‘strengthen... existing rights and empower individuals with more control over their personal data’.³⁹ This, however, overlooks the fact that users rarely read privacy policies (see Section IV). Notably, the non-consideration of users’ privacy-related behaviour juxtaposes the Commission’s emphasis on users’ behavioural inertia towards pre-installed products on PCs/software. By adopting a cautionary, yet flexible approach, the Commission distanced itself from the polarised debate on regulating big data. Whilst this Section recognises the deficiency of empirical evidence vis-à-vis privacy in *Microsoft/LinkedIn* (hence, aggressive antitrust enforcement risked stifling *Microsoft/LinkedIn*’s pro-competitive efficiencies), the Commission’s lack of clarification contributed to the privacy-antitrust obscurity.

(iii) *Google/Fitbit: The Interconnected Digital Ecosystem*

The competitive significance of Google’s seemingly innocent acquisition of fitness tracker start-up Fitbit cannot be overlooked. Fitbit’s unique ability to collect a large range of highly-sensitive data—biometric data such as health, and even emotions—24 hours a day presented Google with a lucrative opportunity to leverage data to consolidate dominance and potentially expand into new markets. Given the wide variety of datasets involved, it is submitted that indirect network effects (alongside privacy) should have been the Commission’s focal point. Regrettably, such examinations were minimal.

This Section thus views *Google/Fitbit* as a missed golden opportunity for the Commission to apply the Cr mer Report’s recommendation to assess acquisitions by ‘gatekeeper platforms’ of start-ups active in complementary markets using an ‘ecosystem’ approach.⁴⁰ The Report recognised the need to ‘rethink’ traditional theories of harm where ‘the acquirer operates a multiproduct platform... that benefits from strong positive network effects’; that is, where the potential anti-competitive effects extend beyond foreclosure effects to the ‘strengthening... of the dominance of the ecosystem’.⁴¹ Indeed, with every device or user a big tech company acquires, its ‘vertically integrated [ecosystem]... can realise growth through network effects and obtain unprecedented access to user data’.⁴²

With the great number of markets involved in *Google/Fitbit*, the Commission, as per Cr mer’s recommendation, should have adopted broad market assessments to capture network effects. Instead, the Commission defined markets in

³⁹ *ibid* para 178.

⁴⁰ *Google/Fitbit* (Case COMP/M.9660) Commission Decision C(2020) 9105 final (17 December 2020); Jay Modrall, ‘*Google/Fitbit* – The EU Commission Misses a Step’ (*Kluwer Competition Law Blog*, 17 June 2021) <<http://competitionlawblog.kluwercompetitionlaw.com/2021/06/17/google-fitbit-the-eu-commission-miss-es-a-step/>> accessed 25 February 2022.

⁴¹ Jacques Cr mer, Yves-Alexandre de Montjoye, and Heike Schweitzer, *Competition Policy for the Digital Era* (European Commission 2019) 121.

⁴² European Commission, ‘Preliminary Report – Sector Inquiry into Consumer Internet of Things’ SWD (2021) 144 final, 7.

ways that minimised direct overlaps and applied its traditional, narrow, market-by-market assessment. Moreover, it accepted, in this author's opinion, sub-par behavioural remedies that were rejected by the Australian Competition & Consumer Commission ('ACCC') and criticised by the Competition and Markets Authority ('CMA') Chief Executive, Andrea Coscelli.⁴³

Whilst ten markets were identified, the Commission focused on three (classical) theories of harm. First, Google, being in control of Fitbit's web API, might restrict Fitbit's rivals to Fitbit user data, hindering the growth of the digital healthcare space.⁴⁴ Secondly, Google might degrade the interoperability of competing wrist-worn wearable devices with Android phones.⁴⁵ Thirdly, the combined datasets may significantly enhance Google's targeted advertising services, strengthening its dominance in the online advertising services market.⁴⁶ This may raise barriers to market entry/expansion and lead to market foreclosure.

It is, however, argued that the Commission's assessments are incomplete. Whilst it noted that the combined datasets might confer Google a unique/irreplacable competitive advantage in the online advertising services market, it neither explained nor quantified this advantage.⁴⁷ Moreover, dismissing data-related concerns in digital healthcare, the Commission merely highlighted the availability of other healthcare-related data sources without discussing their substitutability with the 91 metrics recorded by Fitbit.⁴⁸ Additionally, albeit recognising that Google Android might foreclose Fitbit's rivals, it did not discuss Google's data-driven incentives to foreclose. Crucially, the Commission seems to have disregarded the broader network effects. For example, it neither considered Google leveraging its 'very prominent' datasets to establish hegemony in the nascent digital healthcare sector,⁴⁹ nor whether, as the ACCC feared, *Google/Fitbit* might extend the current Google Android/Apple smartphone duopoly to the wrist-worn wearable space.⁵⁰

To a certain degree, Google's behavioural commitments alleviated some of these concerns. Google agreed that it would not: restrict web API users to Fitbit data,⁵¹ use Fitbit user data for Google Ads,⁵² and degrade Android's API's interoperability with Fitbit's competitors.⁵³ However, these remedies do not adequately address the data-related indirect network effects. They even permit Google to discriminate in favour of Fitbit, provided that Google discriminates equally against

⁴³ Andrea Coscelli, 'Ahead of the Curve' (Bannerman Competition Lecture, 9 February 2021) <www.gov.uk/government/speeches/andrea-coscelli-ahead-of-the-curve-bannerman-competition-lecture> accessed 25 February 2022.

⁴⁴ *Google/Fitbit* (n 40) chs 9.3.5, 9.4.2.

⁴⁵ *ibid* ch 9.4.3.

⁴⁶ *ibid* ch 9.3.

⁴⁷ Modrall (n 40).

⁴⁸ *ibid*.

⁴⁹ *ibid*.

⁵⁰ *ibid*.

⁵¹ *Google/Fitbit* (n 40) ch 10.4.2.2.

⁵² *ibid* ch 10.4.2.1.

⁵³ *ibid* ch 10.4.2.3.

all Android app developers (which includes Fitbit's competitors), becoming the first non-discrimination remedy that permits self-preferencing.⁵⁴

Finally, *Google/Fitbit's* indifference to privacy is alarming. The Commission reiterated: privacy concerns are 'not within the remit of merger control and there are regulatory tools better placed to address them'.⁵⁵ Contrastingly, the ACCC alleged that Google's 'assurances on data privacy are not believable'.⁵⁶ Some have attributed the Commission's lack of concern to the Digital Markets Act, which was introduced two days after clearing *Google/Fitbit*.⁵⁷ This paper, however, recognises that such proposition overlooks the fact that the Act cannot block anti-competitive mergers.

(iv) Google/DoubleClick: Dangers of the Indirect Network Effects of Data

The \$3.1bn acquisition of DoubleClick, a leading provider of 'ad serving' tools, transformed Google, an internet search engine and provider of online advertising space, into an advertising powerhouse. It is submitted that *Google/DoubleClick* is one of the earliest antitrust decisions that exemplifies the fallacy of applying the traditional market foreclosure test to assess the value of data.⁵⁸ In its Phase II investigation, the Commission considered whether the combination of Google's datasets on users' search behaviour and DoubleClick's datasets on users' web-browsing behaviour could confer Google a unique data advantage that would enable it to significantly improve its ad targeting services and raise the barriers to market entry/expansion.

Dismissing this issue without any real evaluation, the Commission noted that DoubleClick's data was 'relatively narrow in scope' and 'non-rivalrous' (DoubleClick's data was 'already available to a number of Google's competitors').⁵⁹ It is, however, submitted that this focus on substitutability and the traditional market foreclosure test overlooks the competitive strength of data. For instance, the analytics derived from DoubleClick's data 'can be seen to have facilitated Google Search's ability to give an "illegal advantage to its own comparison-shopping service"'.⁶⁰

This article also supports the former Federal Trade Commission ('FTC') Commissioner Harbour's dissent on *Google/DoubleClick*. She asserted that a more

⁵⁴ Modrall (n 40).

⁵⁵ European Commission, 'Mergers: Commission Clears Acquisition of Fitbit by Google, Subject to Conditions' (IP/20/2484, European Commission 17 December 2020) <https://ec.europa.eu/commission/presscorner/detail/en/ip_20_2484> accessed 26 February 2022.

⁵⁶ Fergus Hunter, 'It is a stretch: ACCC's Sims Questions Google Assurances over Fitbit data' *The Sydney Morning Herald* (19 November 2019) <www.smh.com.au/politics/federal/it-is-a-stretch-accs-sims-questions-google-assurances-over-fitbit-data-20191119-p53by8.html> accessed 24 January 2022.

⁵⁷ Thibault Larger, 'EU Gives Google a Christmas Gift, Clears Fitbit Deal' (*Político*, 5 January 2021) <www.politico.eu/article/eu-gives-google-a-christmas-gift-clears-fitbit-deal/> accessed 26 February 2022.

⁵⁸ *Google/DoubleClick* (Case COMP/M.4731) Commission Decision C(2008) 927 final (11 March 2008).

⁵⁹ *ibid* para 26.

⁶⁰ Case T-612/17 *Google Search (Shopping)* EU:T:2021:763. See also Stuart (n 1).

thorough and forward-thinking analysis should have been conducted, especially vis-à-vis post-merger intentions and the effects of the combined datasets: ‘...the combination of Google and DoubleClick likely will affect the evolution of the entire online advertising market—especially in light of... network effects... The majority’s analysis skims too quickly over these points. Network effects deserve greater attention’.⁶¹

The Commission’s privacy-related response is unsatisfactory. Consistent with the FTC’s decision, the Commission reiterated the clear-cut separation between antitrust and data protection regulation.⁶² Whilst some have argued that data accrual has ‘undoubtedly increased social welfare’,⁶³ there is, nonetheless, the potential of such accrual to inflict consumer harm through enhanced tracking and targeted advertisements. As the European Consumers’ Association (‘BEUC’) warned the Commission: ‘A combined Google/DoubleClick will be a data collection colossus... Post-merger, Google will have the ability and incentive to engage in significantly more intrusive user tracking and profiling than exists today’.⁶⁴

Whilst *Google/DoubleClick* may have arisen ‘too early for data experts to be articulate about the monetisation of data’,⁶⁵ by attributing privacy concerns to data protection regulators, the Commission appears to have disclaimed responsibility (see Section IV).

(v) *Microsoft/Yahoo!: Search Business—Data: The Path to Innovation?*

The acquisition of Yahoo!’s internet search and search advertising businesses by Microsoft, owner of internet general search Bing and online advertising interface adCenter, was a unique opportunity for the Commission to evaluate a transaction involving a complex two-sided market.⁶⁶

In Europe, Google was dominant in the universal search market with 90–100% shares, followed by Microsoft (20–30%) and Yahoo! Search (10–20%).⁶⁷ Contrastingly, Yahoo!’s and Microsoft’s combined market shares in the search and search advertising markets were below 10%. The Commission, thus, had to balance between increasing the concentration from three to two players in the internet

⁶¹ *Google/DoubleClick* FTC File No 071-0170 (2007) Dissenting Statement of Commissioner Pamela Jones Harbour, 4 <www.ftc.gov/sites/default/files/documents/public_statements/statement-matter-google/doubleclick/071220harbour_0.pdf> accessed 24 January 2022.

⁶² *Google/DoubleClick* (n 58) para 368.

⁶³ Daniel L Rubinfeld and Michal S Gal, ‘Access Barriers to Big Data’ (2017) 59 *Arizona Law Review* 339, 381.

⁶⁴ Letter from the BEUC to the Commission (18 December 2007) <www.europarl.europa.eu/cms-data/183971/20080130ATT20137EN.pdf> accessed 24 January 2022.

⁶⁵ Chirita (n 27).

⁶⁶ *Microsoft/Yahoo! Search Business* (Case COMP/M.5727) Commission Decision C(2010) 1077 (18 February 2010).

⁶⁷ *ibid* para 103.

search market characterised by innovation and high barriers to entry, and increasing competition on Google.⁶⁸ Accepting Microsoft's argument that access to Yahoo!'s user search requests would improve the accuracy of its search engine's results, the Commission favoured the merger's pro-competitive effects, in that it would increase competition against Google, and unconditionally cleared the transaction. This decision highlights the importance of also considering pro-competitive effects of data combinations.⁶⁹ However, one could question whether Yahoo! Search provides better services than before; primarily, whether any significant innovation has taken place.⁷⁰ Hence, this article cautions against assuming that the merged entity will continue to invest in innovation post-transaction and emphasises the need for greater empirical evidence on data effects (see Section III).

Competition law strives to protect aggregate consumer welfare. However, the Commission has consistently dismissed the 'theoretical' post-merger possibility of targeted advertising (*Facebook/WhatsApp*) and degradation of product quality (*Microsoft/Yahoo!*) without evaluating the potential consumer harm. The most plausible explanation for this bifurcation is that resolving issues on product quality and targeted advertising 'is primarily the mission of consumer law'.⁷¹ I, however, contend that exclusive reliance on consumer protection law erroneously assumes that consumer law is equipped to deal with monopolistic power and mergers, and ignores the consumer-protection function inherent in competition law (see Section IV).

B. CONCLUSION

From merely acknowledging the potential anti-competitive effects of merged datasets in *Google/DoubleClick* (2008) to incorporating privacy into merger review in *Microsoft/LinkedIn* (2016) and engaging with the theories of harm arising from the indirect network effects of data in *Google/Fitbit* (2020), competition authorities are increasingly recognising the role of big data as a source of market power. However, as highlighted above, the Commission's approach may still be criticised on numerous fronts.

First, it is submitted that the Commission seems to lack a sense of urgency in addressing data-related theories of harm; it has often, somewhat naively, overlooked the competitive strength of big data. Ever since *Google/DoubleClick*, it became clear that the traditional market foreclosure test cannot adequately evince the competitive significance of data combinations as it is almost impossible for datasets to be 'unique' and 'essential'. Dismissing the potential data-related harm

⁶⁸ Teresa Vecchi, Jerome Vidal, and Viveca Fallenius, 'The Microsoft/Yahoo! Search Business case' (*Commission Competition Policy Newsletter*, 2010) <https://ec.europa.eu/competition/publications/cpn/2010_2_8.pdf> accessed 24 February 2022.

⁶⁹ Hanna Stakheyeva and Fevzi Toksoy, 'Merger Control in the Big Data World: to Be or Not to Be Revisited?' (2017) 38 *European Competition Law Review* 265.

⁷⁰ Chirita (n 27).

⁷¹ *ibid.*

based on the conventional exclusivity test, the Commission has repeatedly disregarded the network effects of data on the different sides of a multi-sided platform. For instance, in *Facebook/WhatsApp*, the Commission appears to have overlooked the spill-over effects between the online advertising services and consumer communications services markets. The lack of consideration (or non-consideration) of network effects also underlines the fallacy of adopting narrow, market-by-market assessments. Yet, it is observed that the Commission remains unwilling to develop in step with rapid market changes and, as evidenced by *Google/Fitbit*, continues to rely on these two conventional antitrust approaches—the traditional market foreclosure test and narrow market assessments.

The Commission's data assessments require refinement, especially to evaluate the indirect network effects of data. Continued reliance on the above-mentioned conventional concepts risks approving anti-competitive mergers. To remedy this, the Commission should define a separate market for data to *holistically* consider all sides of a multi-sided platform when assessing the potential anti-competitive and exploitive effects of combined datasets (see Section III).

As a final note, the Commission is well-positioned to address the privacy-related theories of harm. Unfortunately, it rarely chooses to do so, leaving the privacy aspects of data-driven mergers obscure. It is asserted that neither consumer nor data protection laws are equipped to deal with monopolistic power and mergers; thus, there is a need to develop clear privacy-antitrust frameworks (see Section IV).

III. NEED TO RE-ASSESS THE EUMR

A number of lessons can be drawn from Section II. When analysing data-driven mergers, the Commission has to tread cautiously between unnecessarily lowering the applicable legal standard and restricting commercial freedom. Section III recognises that the existing EUMR and merger control frameworks are sufficiently flexible to address the novel challenges arising from big data. As Schmidt notes, there is no self-contained digital sector 'with unique market characteristics that lends itself to specific regulation'.⁷²

Nonetheless, Section III argues that there is an urgent need for the Commission to modify the way it applies the EUMR to data-driven mergers. It is submitted that less emphasis should be placed on market definitions and financial thresholds, and more importance be attributed to data-related theories of harm. Given the dynamic nature of digital markets, forward-facing analyses should be adopted throughout the merger review; however, in the absence of empirical evidence, the Section cautions against assuming that entities will be incentivised to innovate post-merger. Finally, this Section evaluates the relationship between the

⁷² Hedvig Schmidt, 'Taming the Shrew: Is There a Need for a New Market Power Definition for the Digital Economy' in Björn Lundqvist and Michal Gal (eds), *Competition Law for the Digital Economy* (Edward Elgar Publishing 2019).

EUMR and the DMA, which entered into force in November 2022. The DMA should be commended as it facilitates the review of a greater number of digital acquisitions. However, as there are no clear and objective criteria for competition authorities to identify problematic data-driven mergers, my submission remains that the Commission should not overlook the significance of data and should include data-related theories of harm in its reviews. Data privacy and protection concerns are evaluated independently in Section IV.

A. MARKET DEFINITIONS: A STEP TOWARDS HOLISTIC MERGER ASSESSMENTS

Defining the relevant markets is the essential first step for antitrust enforcement in many jurisdictions, including the EU and the US. It aims to identify the competitive constraints on an entity's behaviour to increase prices or reduce output or quality, and requires the determination of both the relevant geographical and product markets.⁷³

(i) *Geographical Market*

The Commission often adopts a conservative approach here. Whilst admitting that the scope of data-driven markets could be global, it often defines it as EEA-wide or national instead.⁷⁴ Section III recognises that this approach is logical for most digital markets. For instance, given language barriers, cultural differences and national preferences, the boundary for the online search advertising market is (rightly) national in scope.⁷⁵ However, in digital markets where 'yesterday is already history',⁷⁶ a forward-facing approach should also be considered. As the expansion of a business in the digital economy is often driven by dynamic innovation and facilitated by the non-necessity of physical infrastructure, there are virtually no geographical boundaries for doing business.⁷⁷ Hence, it is submitted that the Commission should also embrace an industry-broad view by considering other geographical markets, including the potential expansion locations post-transaction.⁷⁸

⁷³ Richard Whish and David Bailey, *Competition Law* (10th edn, Oxford University Press 2021).

⁷⁴ Stakheyev and Toksoy (n 69).

⁷⁵ eg *Microsoft/Yahoo!* (n 66); *Google/DoubleClick* (n 58).

⁷⁶ Stakheyev and Toksoy (n 69).

⁷⁷ Adelaida Afilipoaic, Karen Donders, and Pieter Ballon, 'The European Commission's Approach to Mergers Involving Software-Based Platforms: Towards a Better Understanding of Platform Power' (2022) 46(5) *Telecommunications Policy* 102288 <www.sciencedirect.com/science/article/pii/S0308596121001920> accessed 25 January 2023.

⁷⁸ Stakheyev and Toksoy (n 69).

(ii) Product Market

Defining digital product markets is not straightforward and, again, markets beyond the parties' pre-merger activities should be considered.⁷⁹ The Commission has spent considerable effort examining each potentially narrower relevant market, but has consistently left the 'exact market definition... open,'⁸⁰ contributing to the nebulous understanding of digital platforms.⁸¹ It is argued that identifying the potential data-related effects requires assessing mergers holistically; this section aims to advance a framework to achieve this.

(iii) All Sides of the Platform Must be Considered

Entities with multi-sided platforms often degrade the quality of their 'zero-priced' products/services to maximise revenues on another market, for instance, Facebook reducing WhatsApp's privacy to invest in advertising. Given market interdependencies, should a market definition encapsulate all products/services a multi-sided platform offers?

The Commission often defines markets narrowly, minimising direct overlaps between sub-markets (for instance, defining an e-book retail market instead of an online retail market).⁸² Identifying sub-markets should be the starting point. As various substitutes exist for different user groups on an overarching platform, defining a single market is neither a systematic nor accurate way of identifying competitive constraints. However, to account for indirect network effects, it is reiterated that all sides of the multi-sided platform(s) must be considered.

(iv) Substitutability Test For 'Free' Products or Services

Digital products/services are often 'free'. Hence, the conventional price-centric means of defining markets, such as the SSNIP (Small but Significant Non-transitory Increase in Price) test, cannot be properly applied. This subsection stresses that absent monetary price, the lack of comparable criterion may lead to an overly broad/narrow market.

For example, in *Facebook/WhatsApp*, the Commission assumed that WhatsApp would not degrade privacy for fear of users switching to alternative privacy-friendly platforms (Threema and Telegram).⁸³ Contrastingly, WhatsApp deteriorated its privacy policy to share user data with Facebook and remained a market leader (WhatsApp had 1.2bn active users/month (2017), up from 600m

⁷⁹ *ibid.*

⁸⁰ See eg *Facebook/WhatsApp* (M.7217) (n 5) para 33; *Microsoft/Yahoo!* (n 66) para 81; *Microsoft/LinkedIn* (n 30), para 87.

⁸¹ Chirita (n 27).

⁸² *E-Book MFNs and Related Matters (Amazon)* (Case AT.40153) Commission Decision 2017/C 264/06 [2017] OJ C264/7.

⁸³ *Facebook/WhatsApp* (M.7217) (n 5).

users during the merger). How? It is submitted that by assessing the privacy-quality parameter independently, the Commission had failed to adequately consider other non-price parameters—namely, network sizes—when deciding whether users actually consider Threema and Telegram substitutes to WhatsApp. As Esayas notes, when selecting messaging apps, the primary criteria for users is whether they can reach others.⁸⁴ Indeed, ‘the size of user base... is of... critical value to customers.’⁸⁵ Thus, that Threema (approximately 400,000 active users) and Telegram (approximately 50 million active users) offered similar privacy policies as pre-merger WhatsApp does not necessarily suggest that they can constrain WhatsApp’s post-merger privacy behaviour.⁸⁶

It is argued that China’s Supreme Court’s decision in *Qihoo v Tencent* provides helpful guidance on assessing the demand-side substitutability of ‘free’ products/services.⁸⁷ In *Qihoo*, to determine whether non-integrated instant messaging services and integrated instant messaging services were substitutes, the Court applied the ‘Small but Significant Non-transitory Decrease in Quality’ (‘SSNDQ’) test and established the ‘majority and important rule’.⁸⁸ The rule provides that when identifying substitutes, authorities must determine whether there are ‘adequate users who would regard a specific good as an alternative... based on the core demand of majority users and from the perspective of the key attributes of goods’.⁸⁹ Hence, the Commission in *Facebook/Whatsapp* should have asked whether, given both the network sizes and privacy policies, an adequate number of users would consider Telegram and Threema as close substitutes of WhatsApp.⁹⁰

(v) *Market for Data*

There is a debate, particularly following *Facebook/WhatsApp*, on whether to define a separate product market for data or data analytics.⁹¹ The Commission often underestimates the role of data as a key merger driver, resulting in a skewed assessment of the merger’s overall impact. Whilst the SSNDQ test may help gauge the substitutability of ‘free’ products/services at a surface level, it does not adequately assess the value and impact of data combinations. As the Crémer report

⁸⁴ Samson Esayas, ‘Data Privacy in European Merger Control: Critical Analysis of Commission Decisions Regarding Privacy as a Non-Price Competition’ (2019) 40 *European Competition Law Review* 166 .

⁸⁵ *Facebook/WhatsApp* (M.7217) (n 5) para 129.

⁸⁶ Mike Butcher, ‘Telegram Claims 50M Monthly Active Users, Seems to Be Attracting Teams’ (*TechCrunch*, 8 December 2014) <<https://techcrunch.com/2014/12/08/telegram-claims-50m-monthly-active-users-seems-to-be-attracting-teams/#:~:text=Telegram%20Claims%2050M%20Monthly%20Active%20Users%2C%20Seems%20To%20Be%20Attracting%20Teams,-Mike%20Butcher%40mikebutcher&text=Telegram%2C%20the%20messaging%20app%20startup.post%20by%20the%20company%20today>> accessed 1 February 2022.

⁸⁷ *Qihoo 360 v Tencent QQ* (Supreme People’s Court of China, unreported decision, 16 October 2014).

⁸⁸ Huang Wei, ‘Relevant Market Definition and Market Dominance Identification in 3Q War’ (2015) 11 *Competition Policy International* 66.

⁸⁹ *ibid.*

⁹⁰ Esayas (n 84).

⁹¹ Davilla (n 2).

highlights, it is unclear how the SSNDQ test could be applied in practice.⁹² For instance, as the report questions, what level of quality degradation would amount to a 5-10% price increase for authorities to assess if the hypothetical monopolist would remain profitable?⁹³ It is, thus, submitted that the SSNDQ test is more of a conceptual guide than an objective criterion that could be applied by competition authorities.⁹⁴ To shift the focus to the theories of harm, this subsection argues that the Commission should define a market for data to investigate how the acquired datasets might be commercialised, and the potential effects of such commercialisation.⁹⁵ This would help competition authorities capture the extensive network effects and ‘intangible, non-economic injuries’ that may emanate from data monopolisation.⁹⁶

Google’s acquisition of Nest Labs (Google’s second-largest acquisition, unconditionally cleared by the FTC) supports this proposition. *Google/Nest Labs* illustrates how the existing key antitrust concepts, namely price-centric analysis and narrow market-by-market assessments, cannot adequately capture the cross-side network effects of data. Here, simply acquiring the same types of data Google already possessed, or was capable of extracting, was not the issue. Instead, the value was in acquiring data that Google did not have the reach to capture—consumers’ ‘offline behaviour’ in their homes—to strengthen Google’s position in the online search advertising market.⁹⁷ From a price-centric analysis, *Google/Nest* is ‘pro-competitive’ as it reduces the prices of thermostats. This, however, disregards the strategic merger driver: ‘the competitive significance of Google acquiring this data from many consumers’ homes to their already large dataset’.⁹⁸ Absent a market for data, the cross-side effects of data are often left unscrutinised, creating a legal gap. Crucially, it is submitted that the Commission’s non-assessment of *Google/Nest* (which, arguably, involves a wider variety of datasets than *Google/Fitbit*; hence, may pose greater anti-competitive effects than *Google/Fitbit*) evinces the Commission’s current sentiment of pushing data to the backseat and overlooking data’s competitive strength. Beyond facilitating the economic assessments of data, recognising a data market would also enable competition authorities to capture and analyse a merger’s potential to exploit consumers’ data, for example, through privacy degradation and online price discrimination (see Section IV below).

The Commission has, nevertheless, distinguished between data as an input product and data that is traded as a separate product. *Telefonica/Vodafone/EE/JV*

⁹² Crémer (n 41).

⁹³ *ibid.*

⁹⁴ OECD, ‘The Role and Measurement of Quality in Competition Analysis’ (Policy Roundtables DAF/COMP(2013)17, OECD June 2013) <www.oecd.org/competition/Quality-in-competition-analysis-2013.pdf> accessed 25 January 2023.

⁹⁵ Jan Kupčík and Stanislav Mikeš, ‘Discussion on Big Data, Online Advertising and Competition Policy’ (2018) 39 European Competition Law Review 393.

⁹⁶ Stuart (n 1).

⁹⁷ *ibid.*

⁹⁸ Maurice Stucke and Allen Grunes, *Big Data & Competition Policy* (Oxford University Press 2016), 125.

concerned the JV's potential to create a unique and essential database for mobile advertising service providers, and foreclose the data analytics services market.⁹⁹ Unfortunately, the Commission dismissed this matter, concluding that there were other 'strong' market players that traded datasets.¹⁰⁰

It is argued that a separate market for data should be defined where the merger involves large quantities of data and/or it is clear that the merger's underlying motive is the potential/actual acquisition of significant datasets. Close coordination between competition authorities, data protection regulators and data experts would assist in capturing such mergers. The publication of guidelines vis-à-vis when a merger involving big data should be notified would also be ideal.

Alternatively, some have stressed that data is an 'essential facility'; thus, competition authorities should apply data access remedies to *both* horizontal and non-horizontal data-driven mergers. Whilst these remedies would facilitate the entry and expansion of digital markets, such mergers are problematic from a privacy policy perspective as they involve sharing user data with third parties.¹⁰¹ Thus, instead of obligating entities to share user data with competitors, this article favours blocking such mergers or applying alternative behavioural remedies (see Section III.D below).

Overall, recognising a market for data would empower a more thorough analysis of data concentrations, and 'better reflect reality',¹⁰² as digital companies often 'derive value from data far beyond the initial purposes for which the data had been collected',¹⁰³ and mergers are 'increasingly motivated by underlying datasets'.¹⁰⁴ This subsection attributed the Commission's lack of forward-facing assessments, such as in *Facebook/WhatsApp* and *Google/DoubleClick*, to its static approach to market definitions;¹⁰⁵ this must be changed and defining a market for data presents a way to implement this change.

⁹⁹ *Telefonica/Vodafone/Everything Everywhere/JV* (Case COMP/M.6314) Commission Decision 2013/C 66/04 [2012] OJ C66/5, para 549.

¹⁰⁰ *ibid* para 558.

¹⁰¹ Kupčik and Mikeš (n 95).

¹⁰² Pamela Jones Harbour and Tara Koslov, 'Section 2 in a Web 2.0 World: An Expanded Vision of Relevant Product Markets' (2010) 76 *Antitrust Law Journal* 773.

¹⁰³ *ibid*.

¹⁰⁴ Stuart (n 1). Indeed, the OECD reported that the number of data-driven mergers more than doubled between 2008–2012 (European Data Protection Supervisor (EDPS), *Report of Workshop on Privacy, Consumers, Competition and Big Data 2 June* (11 July 2014) <https://edps.europa.eu/sites/default/files/pub-lication/14-07-11_edps_report_workshop_big_data_en.pdf> accessed 24 March 2023).

¹⁰⁵ *ibid*.

B. MARKET POWER: IS A VALUE-OF-TRANSACTION TEST NEEDED?

Often driven by short innovation cycles, the Commission has consistently recognised that ‘high market shares [in digital markets] are not particularly indicative of competitive strength’.¹⁰⁶ It is not always the turnover, but the datasets and other resources, such as, technology to mine data, that determine a company’s value (this partially explains the rise of ‘killer acquisitions’). Recognising that purely turnover-based jurisdictional thresholds may create a ‘legal gap’, the Commission considered introducing a ‘value-of-transaction test’.¹⁰⁷ It is submitted that value-of-transaction thresholds should not be implemented. Rather, when determining an entity’s market power, the Commission should shift its focus to the theories of harm instead.

Undoubtedly, a transaction’s value may stipulate the merger’s importance, whereby a higher transaction price may suggest higher market potential. As nascent undertakings are unlikely to be revenue-generating, the Commission may, under the existing EUMR regime, be excluded from reviewing certain anti-competitive mergers, including mergers involving start-ups with great potential to develop innovative ways to harvest big data. Thus, value-of-transaction thresholds may enable the Commission to capture ‘killer acquisitions’.

However, as merging parties themselves fix the transaction price, they may manipulate payment structures to lower the target’s valuation.¹⁰⁸ Furthermore, value-of-transaction thresholds may be broadly defined, creating uncertainties and delays in the notification process. The need for value-of-transaction thresholds should also be considered alongside the EUMR’s existing case referral system under articles 4(5) and 22 EUMR.¹⁰⁹ These articles provide that concentrations without a Union dimension (i.e., the proposed merger does not meet the turnover thresholds under article 1 EUMR) can be investigated by the Commission upon request by the Member State(s) or undertakings concerned. Indeed, *Facebook/WhatsApp* and *Apple/Shazam* were referred to the Commission under articles 4(5) and 22 EUMR respectively. Hence, on balance, there is no need for a value-of-transaction test.

¹⁰⁶ See eg *Apple/Shazam* (Case COMP/M.8788) Commission Decision C(2018) 5748 final (6 September 2018).

¹⁰⁷ ‘Consultation on Evaluation of Procedural and Jurisdictional Aspects of EU Merger Control’ (*European Commission*, 2016), <https://competition-policy.ec.europa.eu/public-consultations/2016-merger-control_en> accessed 21 April 2022.

¹⁰⁸ Stakheyeva and Toksoy (n 69).

¹⁰⁹ *ibid.*

C. DATA DRIVEN MARKETS: A PRO-COMPETITIVE OR ANTI-COMPETITIVE REGIME?

The Commission's theory of harm assessments demonstrate a significant degree of consistency with its substantive guidelines and between different cases. The Commission is primarily concerned with horizontal overlaps (i.e., effects of the combined datasets) and vertical foreclosure theories (i.e., whether the merged entity would restrict competitors' access to datasets and whether such restriction would result in a significant impediment to effective competition).

Certainly, applying clear, uniform and predictable standards when assessing data-related theories of harm is valuable from a policy perspective.¹¹⁰ However, as stressed in Section II, the Commission should refrain from relying on conventional antitrust concepts. For example, by applying the traditional market foreclosure test, data-related issues were often dismissed not because there was no potential for concern, but rather, the data was either not 'unique' or 'inessential' to compete.¹¹¹ Instead, given the unique, multi-sided nature of each digital platform, the competitive effects of merged datasets should be evaluated on a fact-specific basis and extreme caution must be exercised before relying on legal precedents.

On the other hand, it is acknowledged that, rather than posing a problem, data might be construed as a potential justification for data-driven mergers. However, the use of data-based efficiency defences remains limited under EU law.¹¹² The only case was *TomTom/TeleAtlas*, where the parties argued that customer feedback data would enhance the quality of maps post-transaction.¹¹³ The Commission, unfortunately, did not opine on this argument; it declared the merger not anti-competitive, regardless of the supposed efficiencies.

Nonetheless, innovation-based justifications have been considered. Whilst there 'is scope for a wide range of benefits for both firms and consumers from the use of data',¹¹⁴ it is submitted that the 'innovation offence' must be scrutinised.¹¹⁵ Indeed, in *Microsoft/Yahoo!*, the Commission assumed that Microsoft could and would leverage the merged datasets to foster greater competition against Google, stimulating innovation in the search engine market. However, from a consumer's perspective, it is doubtful whether any significant innovation-based achievements

¹¹⁰ Ben Holles de Peyer, 'EU Merger Control and Big Data' [2018] 13 *Journal of Competition Law and Economics* 787.

¹¹¹ See eg *Microsoft/LinkedIn* (n 30); *Apple/Shazam* (n 108); *Google/DoubleClick* (n 58).

¹¹² of the US.

¹¹³ *TomTom/TeleAtlas* (Case COMP/M.4854) Commission Decision C(2008) 1859 (14 May 2008) paras 245–250.

¹¹⁴ CMA, 'CMA Publishes Findings on the Commercial Use of Consumer Data' (*Gov.uk*, 17 June 2015) <www.gov.uk/government/news/cma-publishes-findings-on-the-commercial-use-of-consumer-data> accessed 31 January 2022.

¹¹⁵ Stephen Kinsella, 'The Innovation Offence' (*Chillin'Competition*, November 2016) <<https://chillingcompetition.com/2016/11/14/the-innovation-offence-by-stephen-kinsella/>> accessed 31 January 2022.

can be noted.¹¹⁶ Additionally, raising ‘innovation justification(s)’ risks the Commission accepting obscure and/or speculative data-related theories of harm (for example, the combined datasets may enable the merged entity to create a new, competitive product, foreclosing rivals).¹¹⁷ This article therefore emphasises the need for greater empirical evidence on the competitive effects of data for the Commission make informed decisions.

This article also cautions against relying exclusively on the general defining characteristics of digital markets, namely, dynamic competition and rapid innovation,¹¹⁸ to assume that the merged entity would be incentivised to innovate post-transaction. Instead, there should be greater reliance on empirical analysis. For example, the unusually stable, oligopolistic online advertising market, dominated by Google and Facebook, seems to contradict the typical assumption that digital markets are driven by short innovation cycles.¹¹⁹

Empirical evidence on the competitive effects of data remains scarce. However, the controversies regarding the Commission’s merger decisions, and consumers’ dissatisfaction with certain post-merger effects, stress the need for empirical evidence when identifying counterfactual scenarios and assessing potential anti-competitive effects.¹²⁰

D. REMEDIES

There should be a gradual shift towards behavioural remedies, as increasingly applied in data-driven mergers, including *Google/Fitbit* and *Microsoft/LinkedIn*. Traditionally, purely behavioural remedies were viewed as complex, expensive and relatively ineffective as they require ongoing monitoring. Nonetheless, they seem warranted in digital mergers where access to platforms, intellectual property rights and data are likely more important to preserve competition than the transfer of physical assets.¹²¹ This view is echoed by European Commissioner Margrethe Vestager, who notes that the issue in digital mergers may not be platform sizes, but access to important input services, such as key technology.¹²² Rather than breaking up incumbents, competition authorities should attach greater consideration to remedies that ensure interconnection and interoperability between competing firms to encourage innovation. For example, the Commission could allow

¹¹⁶ Chirita (n 27).

¹¹⁷ Davilla (n 2).

¹¹⁸ Kupčik and Mikeš (n 95).

¹¹⁹ Thomas Hoppner, ‘Defining Markets for Multi-Sided Platforms: The Case of Search Engines’ (2015) 38 *World Competition* 349.

¹²⁰ Pauline Affeldt and Reinhold Kesler, ‘Big Tech Acquisitions — Towards Empirical Evidence’ (2021) 12 *Journal of European Competition Law & Practice* 471.

¹²¹ Thomas Wilson, ‘Merger Remedies – Is It Time to Go More Behavioural?’ (*Kluwer Competition Law Blog*, 21 February 2020) <<http://competitionlawblog.kluwercompetitionlaw.com/2020/02/21/merger-remedies-is-it-time-to-go-more-behavioural/>> accessed 4 February 2022.

¹²² Afilipoaic, Karen Donders, and Pieter Ballon (n 77).

a rival social network to interoperate with Facebook and, perhaps, offer a non-advertising-financed social network to Facebook users, without the latter losing their ability freely use Facebook.¹²³ Thus, although the Commission has already been applying behavioural remedies, it is submitted that the Commission should consider applying bolder strategies, subject to consumer and data protection regulations, to foster innovation whilst preserving competition.

As the European Data Protection Supervisor ('EDPS') opines,¹²⁴ antitrust enforcement should adopt a holistic approach when consumer welfare and data protection issues are involved. However, on the grounds of privacy, data access remedies should only be used if strictly necessary. Whilst data may facilitate the entry and expansion of digital markets, data access remedies may duplicate the function of data protection regulation (see Section IV.A.(iii) below) and raise additional privacy-related problems, such as data portability.¹²⁵ Hence, this article favours remedies aimed at access to platforms, patents and technology.

E. THE DIGITAL MARKETS ACT

(i) *The Digital Markets Act is here*

The EU's Digital Markets Act (DMA) is landmark law that aims to increase market contestability and fairness in the digital economy.¹²⁶ It imposes a list of *ex-ante* obligations and prohibitions on large online platforms—'gatekeepers'—that provide at least one of the ten types of digital services (such as digital advertising, search engines and social media), known as 'core platform services'.¹²⁷ Despite being hailed 'revolutionary' by some academics and practitioners, the implications of the DMA might not be as major as one might be led to believe.¹²⁸ This subsection specifically addresses the relationship between the EUMR and DMA. It is submitted that whilst the DMA complements the EUMR, the DMA, like the latter, does

¹²³ Pierre Larouche and Alexandra de Stree, 'The European Digital Markets Act: A Revolution Grounded on Traditions' (2021) 12 *Journal of European Competition Law & Practice* 554.

¹²⁴ EDPS, *Preliminary Opinion on Privacy and Competitiveness in the Age of Big Data: The Interplay Between Data Protection, Competition Law and Consumer Protection in the Digital Economy* (March 2014) para 32 <https://edps.europa.eu/sites/edp/files/publication/14-03-26_competition_law_big_data_en.pdf> accessed 24 March 2023.

¹²⁵ de Peyer (n 110).

¹²⁶ Christophe Carugati, 'Which Mergers Should the European Commission Review Under the Digital Markets Act?' (*Bruegel*, 9 December 2022) <www.bruegel.org/policy-brief/which-mergers-should-european-commission-review-under-digital-markets-act#_ftnref5> accessed 30 January 2023; Larouche and de Stree (n 123) 542.

¹²⁷ Regulation (EU) 2022/1925 (n 7).

¹²⁸ Larouche and de Stree (n 123). See also: Björn Lundqvist 'The Proposed Digital Markets Act and Access to Data: A Revolution, or Not?' (2021) 52 *International Review of Intellectual Property and Competition Law* 239.

not rely on clear and objective criteria to identify problematic data-driven mergers.¹²⁹ Hence, the Commission should not overlook the significance of data and should integrate forward-facing theories of harm in its reviews.

(ii) *The Relationship Between the EUMR and the DMA*

As a starting point, it is worth highlighting that the DMA does not define gatekeepers based on their alleged monopolistic power. This allows lawmakers to foster greater antitrust enforcement in digital markets by bypassing the slow and complex process of defining markets based on the gatekeeper's alleged monopolistic power.¹³⁰ Moreover, as the obligations imposed on gatekeepers by the DMA are also present in the merger assessments' remedies, having the obligations codified would make the merger review process more efficient.¹³¹ As Monti comments, the DMA overcomes 'the slowness by which antitrust cases proceed...'.¹³² It is hoped that with the newly adopted DMA, there would be an increase in the number of merger reviews in the digital sector.¹³³

However, the DMA does not provide an objective framework for competition authorities to identify the anti-competitive strategies pursued by incumbents. Such strategies include acquiring potentially threatening firms to throttle any disruption.¹³⁴ It is argued that the DMA's response to strategic acquisitions, that is, obligating gatekeepers to inform the Commission of all their intended acquisitions,¹³⁵ is a relatively weak provision.

Whilst the absence of a fixed criteria allows the Commission to review any merger involving a gatekeeper, it also creates risks of over-enforcement of unproblematic mergers, inefficient allocation of resources for both competition authorities and gatekeepers, and legal uncertainty.¹³⁶ Even with guidance from the DMA, proving the actual reasoning behind a merger and assessing its potential effects is

¹²⁹ Carugati (n 126).

¹³⁰ *ibid.*

¹³¹ *ibid.*

¹³² Giorgio Monti, 'The Digital Markets Act – Institutional Design and Suggestions for Improvement' (2021) TILEC Discussion Paper 2021-04, 1 <<https://dx.doi.org/10.2139/ssrn.3797730>> accessed 30 January 2023.

¹³³ Of the 1,149 mergers involving potential DMA gatekeepers from 1987 to July 2022, the Commission reviewed only 21. Most mergers fell below EU and national merger control thresholds because of the low or non-existent turnover of the merger target. Carugati (n 126).

¹³⁴ By now it has become clear that Facebook's acquisitions of WhatsApp and Instagram are cases of this strategy, as the recent US States and FTC antitrust cases against Facebook demonstrates (*FTC v Facebook Civil Action 20–3590* (DC Dist Ct); *New York v Facebook Civil Action 20–3589* (DC Dist Ct)). As the DMA Impact Assessment notes, killer acquisitions would disrupt innovation. It specifically mentions that gatekeepers divert their resources away from research and development and towards mergers, to compete 'for the market'. At the same time, it is known that as 'a significant amount of innovation is driven by disruptive firms,' the law 'seeks to protect the competitive process by which disruptive firms challenge the status quo.' See European Commission, 'Impact Assessment Report' SWD(2020) 363 final, pt 1–2, paras 279, 280, 282–3, 322.

¹³⁵ DMA, art 14.

¹³⁶ Carugati (n 126).

difficult.¹³⁷ These two factors are particularly pertinent in where the data held by the target company lacks substitutability as such merger would either aim to improve the acquired target or pre-empt rivals from obtaining the data.¹³⁸ Thus, to identify the potential anti-competitive effects of a merger, competition authorities would still need to analyse each referred merger on a case-by-case basis and adopt forward-facing analyses throughout the review.

Arguably, by working in tandem with article 22 EUMR,¹³⁹ the DMA could become a workaround to the notification thresholds. However, even with the Commission's authority review to strategic acquisitions, a lacuna remains in the current merger control regime.¹⁴⁰ As Louche contends, many questions remain unaddressed, such as which theory of harm would justify blocking digital acquisitions, and which standard of proof should apply (balance of probabilities or balance of harms).¹⁴¹

On balance, the Commission's ability and incentive to review a greater number of digital acquisitions, via the DMA, to avoid under-enforcement is commendable. The DMA, in combination with article 22 EUMR, is a helpful tool that allows competition authorities to 'capture' and review a greater number of data-driven mergers. However, given the complexities and dynamics of digital markets, there is still yet to be a clear framework for competition authorities to identify problematic mergers.¹⁴² Therefore, it remains that the Commission should not overlook the significance of data and should include forward-facing data-related theories of harm in its merger reviews.

F. CONCLUSION

Section III sought to fill the gaps that were unaddressed by the Commission in its merger decisions. Derived from the existing EU merger control regulation and guidelines, Section III advanced numerous frameworks and adaptations aimed at facilitating a more comprehensive and refined analysis of the potential anti-competitive effects of big data. It first stressed the need to consider a market for data to capture the theories of harm stemming from the indirect network effects. It then highlighted the secondary role market shares and other financial thresholds should play when assessing digital markets; the primary focus should be the data-related theories of harm instead. Finally, the Section considered the impact of the DMA on EU merger control and argued that the Commission should

¹³⁷ Afilipoaic, Karen Donders, and Pieter Ballon (n 77).

¹³⁸ Michael L Katz, 'Multisided Platforms, Big Data, and a Little Antitrust Policy' (2019) 54 *Review of Industrial Organization* 695.

¹³⁹ Guidance on the application of the referral mechanism set out in Article 22 of the Merger Regulation to certain categories of cases [2021] OJ C113/1. Under art 22 of the EUMR, a Member State may request the Commission to review a transaction that affects trade between Member States, and threatens to significantly affect competition (established on a prima facie basis).

¹⁴⁰ Larouche and de Streel (n 123).

¹⁴¹ *ibid.*

¹⁴² Carugati (n 126).

not overlook the significance of data and should integrate data-related theories of harm into its reviews. Overall (and perhaps, most crucially), Section III reiterated the need for the Commission to adopt a flexible, thorough and forward-facing approach, encompassing all sides of the platform, when assessing the potential effects of data concentrations.

IV. PRIVACY AND DATA PROTECTION

It is clear that the Commission has spent considerable effort evaluating the intricacies of data analytics and theories of harm through the lenses of the traditional economic analyses of horizontal and vertical (input) foreclosure effects. Whilst data is increasingly recognised as a source of market power, privacy-related consumer harm remains a blind spot in merger assessments.¹⁴³ Nonetheless, as privacy is often the price paid for a product/service today, it is attracting significant attention from competition authorities.

There are at least two emerging approaches for incorporating data privacy and protection concerns into antitrust assessments. The first, shared by both the European Commission and US FTC, argues that privacy can be a non-price competition parameter that may harm consumer welfare.¹⁴⁴ The second argues that data privacy is a fundamental right and competition authorities are responsible for assessing how a merger might directly affect this right.¹⁴⁵ It is submitted that both approaches are viable and useful for assessing data-driven mergers.

A. PRIVACY AS A NON-PRICE COMPETITION PARAMETER

Despite the emerging consensus of the need to consider privacy in merger review, questions remain as to how competition in privacy manifests. This Section attempts to address these questions. Section IV.A.(i) maps out the privacy-related theories of harm. Section IV.A.(ii) confronts the difficulties of defining the relevant markets. Whilst it is not necessary to quantify privacy degradation to incorporate it into merger assessments (*Microsoft/LinkedIn*), Section IV.A.(iii) evaluates how conjoint analysis may assist in measuring such harm. Finally, Section IV.A.(iv) highlights the fallacies of relying exclusively on data protection regulations to resolve the potential privacy-related anti-competitive effects of data concentrations. It is argued that the economic and non-economic implications of privacy must be considered in all mergers involving big data.

¹⁴³ Esayas (n 84).

¹⁴⁴ *ibid.* See also Dissenting Statement of Commissioner Pamela Jones Harbour (n 61).

¹⁴⁵ Chirita (n 27).

(i) Theories of Harm

At its core, competition policy is concerned with market power that may harm consumer welfare.¹⁴⁶ Ironically, the Commission's current approach largely disregards the potential detrimental data-related effects on consumers.¹⁴⁷ A key reason for this is the lack of clear and workable privacy-related theories of harm and seeks to remedy this.

In competition law, consumer welfare is determined by price, quantity and factors such as product quality, choice and innovation.¹⁴⁸ Where goods/services are 'free', the conventional reliance on price as the chief competition parameter deteriorates, and quality becomes the essential and significant measure of competition (*Microsoft/Yahoo!*)¹⁴⁹. Thus, underlying the recognition of privacy as a competition parameter is that privacy can be an element of product quality, consumer choice or innovation, and a merger could reduce the incentives to compete on these parameters.¹⁵⁰

Facebook/WhatsApp highlights some lessons on the privacy-as-a-quality parameter. First, despite noting that privacy is 'becoming increasingly valued' by consumers,¹⁵¹ the Commission refrained from properly examining whether the merger would reduce privacy. This reluctance might be attributed to the subjectivity of product quality. Quality is difficult to measure and may raise 'imprecise and complex comparisons'.¹⁵² Moreover, assessing the ultimate impact of privacy degradation is complex as increased data access may enable the online platform to enhance other functionalities, improving its overall product quality.¹⁵³

Secondly, when acknowledging the potential introduction of targeted advertisements on WhatsApp, the Commission did recognise, albeit implicitly, that increased data collection and/or the abandonment of WhatsApp's end-to-end encryption might reduce privacy.¹⁵⁴ Dismissing these matters on the assumption that privacy degradation would induce users to leave WhatsApp, the Commission seems to have overlooked the spill-over effects between the online advertising services and consumer communication services markets. Therefore, whilst it is not strictly the Commission's responsibility to cross-examine the business rationale for a merger, Section IV posits that a retrospective analysis of *Facebook/WhatsApp*

¹⁴⁶ Esayas (n 84).

¹⁴⁷ Elias Deutscher, 'How to Measure Privacy-related Consumer Harm in Merger Analysis? A critical reassessment of the EU Commission's merger control in data-driven markets' (2018) EUI Working Paper LAW 2018/13, <https://cadmus.eui.eu/bitstream/handle/1814/58064/WP_2018_13.pdf?sequence=1> accessed 7 January 2022.

¹⁴⁸ Guidance on the Commission's Enforcement Priorities in Applying Article 82 of the EC Treaty to abusive exclusionary conduct by dominant undertakings [2009] OJ C45/7, para 19.

¹⁴⁹ *Microsoft/Yahoo!* (n 66) para 101.

¹⁵⁰ Esayas (n 84).

¹⁵¹ *Facebook/WhatsApp* (M.7217) (n 5) para 87.

¹⁵² Deutscher (n 147).

¹⁵³ *ibid.*

¹⁵⁴ *Facebook/WhatsApp* (M.7217) (n 5) para 184, para 174.

stresses the need for competition authorities to consider both the transacting parties' incentives to maintain their privacy standards post-merger and the actual revenues that could be gained from degrading privacy to invest in other markets.

Recognising privacy as an important competition parameter, *Microsoft/LinkedIn* endorsed the approach of framing privacy as a significant element of consumer choice. The Commission held that the potential foreclosure effects (see Section II) might marginalise existing professional social network competitors (for example, XING) that offer better privacy protection than LinkedIn, restricting consumer choice vis-à-vis privacy.¹⁵⁵ Based on the Commission's comparisons of XING's and LinkedIn's privacy policies, this paper highlights two observations.

First, the privacy-quality theory of harm is not limited to volume, quality and variety of data collected; it includes users' ability to control their data and make informed decisions.¹⁵⁶ Users are offered increased privacy (suggesting better quality products/services) where privacy policies are more 'unambiguous' and consent can be 'freely given' (XING).¹⁵⁷ Companies can compete on consent by, for example, requesting users to accept the company's privacy policies by ticking a box (XING), instead of assuming users' acceptance when they click the 'join now' button (LinkedIn).¹⁵⁸ Secondly, it is not always necessary to quantify privacy degradation to incorporate it into merger review.¹⁵⁹ As *Microsoft/LinkedIn* demonstrates, not all potential privacy-related harms are difficult to identify, and the classical anti-competitive conducts (in *Microsoft/LinkedIn*, tying/bundling) can raise privacy-related harm. Hence, privacy can be integrated into the existing antitrust frameworks.

Some have rejected the privacy-antitrust relationship. Notably, they argue that increased data access would lead to substantial pro-competitive efficiencies and that the 'relationship between privacy and quality... is purely subjective' as different consumers value privacy differently.¹⁶⁰ However, these arguments overlook the fact that considering privacy does not prevent the Commission from balancing privacy's potential anti-competitive effects against the transaction's efficiencies. Hence, it seems 'unwise to ignore an increasingly important parameter of competition... for the mere sake of simplicity'.¹⁶¹ Additionally, there are methodologies (see below) to measure privacy-related consumer harm, enhancing the accuracy of merger assessments vis-à-vis privacy.

Overall, this discussion demonstrates that privacy-related theories of harm may arise from (non-exhaustive list): increased user data/engagement, abandonment of privacy-enhancing technology (for example, end-to-end encryption), and

¹⁵⁵ *Microsoft/LinkedIn* (n 30) para 350.

¹⁵⁶ Esayas (n 84).

¹⁵⁷ *Microsoft/LinkedIn* (n 30) para 350.

¹⁵⁸ *ibid.*

¹⁵⁹ Esayas (n 84).

¹⁶⁰ James Cooper, 'Privacy and Antitrust: Underpants Gnomes, the First Amendment, and Subjectivity' (2013) 20 *George Mason Law Review* 1129, 1135–1138.

¹⁶¹ de Peyer (n 110).

consent.¹⁶² Importantly, the express application of the privacy-as-a-quality parameter theory in *Microsoft/LinkedIn* evinces the theory's maturity entails that such discussions are no longer limited to academia.

(ii) *Market Definition*

Having discussed how competition in privacy might arise, it follows to address the difficulties of defining the relevant markets. In particular, when are two firms considered competitors based on privacy, and thereby, of interest to competition law?

In general, similar products/services are considered to compete more fiercely than dissimilar products/services. This approach appears to apply to competition in privacy.¹⁶³ For instance, Tucker argues that privacy considerations are only 'cognizable' where 'the merging firms are significant rivals because of their competition on privacy and a large share of customers regard the merging parties as offering the best products as a result of their approaches to privacy'.¹⁶⁴ The Commission seems to echo Tucker's view when identifying the differences in WhatsApp's and Facebook Messenger's privacy standards as factors that made the platforms complementary instead of competitors.¹⁶⁵ This assumption can be challenged on two grounds.

First, it overlooks the potential of dissimilarities in privacy to exert competitive pressures on the merging entities. Economically, as all platforms strive to promote data security, privacy is a competition parameter regardless of the amount or type of data collected.¹⁶⁶ Accordingly, a dissimilar, attractive-to-users privacy offering will naturally influence other entities to adopt a similar/enhanced offering. For example, imitating WhatsApp, post-merger Messenger introduced end-to-end encryption 'to make Messenger your primary messaging platform'.¹⁶⁷ Whilst this implies that the merger did not eradicate Facebook's incentives to compete on privacy, it suggests that WhatsApp did impose competitive constraints on Facebook, prompting it to compete on privacy-enhancing technology.¹⁶⁸

Secondly, the Commission overlooked the competitive constraints an incumbent (Facebook) may impose on a smaller firm that offers better data privacy (WhatsApp). In the absence of empirical evidence, it is difficult to attribute WhatsApp's privacy degradation directly to the merger; nevertheless, the removal of Facebook's competitive constraints on WhatsApp may have encouraged

¹⁶² Esayas (n 84).

¹⁶³ *ibid.*

¹⁶⁴ Darren S Tucker, 'The Proper Role of Privacy in Merger Review' [2015](2) CPI Antitrust Chronicle <<https://ssrn.com/abstract=2614046>> accessed 4 January 2022.

¹⁶⁵ *Facebook/WhatsApp* (M.7217) (n 5) para 102.

¹⁶⁶ Esayas (n 84).

¹⁶⁷ Kate Conger, 'Facebook Messenger Adds End-to-End Encryption in a Bid to Become Your Primary Messaging App' (*TechCrunch*, 8 July 2016) <<https://techcrunch.com/2016/07/08/messenger-adds-end-to-end-encryption/>> accessed 4 January 2022.

¹⁶⁸ Esayas (n 84).

WhatsApp to alter its privacy policy.¹⁶⁹ The Commission should have assessed the extent the merger, by removing WhatsApp or Facebook as an important competitive constraint, would have enabled the merged entity to internalise the potential losses ensuing from consumers leaving WhatsApp owing to privacy reduction.¹⁷⁰ Without the merger, WhatsApp might not have degraded its privacy policy for fear of facing substantial revenue losses. The dangers of underestimating the competition arising from products/services with dissimilar privacy standards are well encapsulated by former FTC Commissioner Harbour:

Absent pressure from competitors who might provide more attractive alternatives to privacy-prioritizing consumers, a dominant firm might rationally choose to innovate less vigorously around privacy or, perhaps, to dole out privacy-protective technologies to the marketplace more slowly.¹⁷¹

None of these observations suggests that the Commission should or would have reached a different decision had it considered them. Instead, this subsection hopes to have highlighted some lessons and demonstrated the lack of proper frameworks for privacy-related antitrust issues. As the EDPS suggests, data protection norms could assist in identifying the competitive attributes of privacy.¹⁷² Indicators of increased privacy, for instance, reducing user data collected (articles 5(1)(c) and 9 GDPR)¹⁷³ and implementing default privacy protection features (article 25(2) GDPR),¹⁷⁴ may serve as a baseline in recognising the relevant competition parameters, and hence, spot relevant competitors.¹⁷⁵

The above analyses relate to overlooking the potential competition from dissimilarities. *Facebook/WhatsApp* can be equally critiqued for overestimating the competition from products/services with similar privacy policies. By assessing the privacy-quality parameter independently, the Commission's assumption that Threema and Telegram were substitutes of WhatsApp (see Section II) stresses the need for broader merger assessments, namely, a balanced consideration of other non-price parameters (such as network sizes) that may attract privacy-prioritising users.¹⁷⁶

¹⁶⁹ *ibid.*

¹⁷⁰ Facebook can recapture WhatsApp's consumer losses through increased user engagement on Messenger and/or enhanced targeted advertising.

¹⁷¹ Dissenting Statement of Commissioner Pamela Jones Harbour (n 61).

¹⁷² EDPS, *EDPS Opinion on Coherent Enforcement of Fundamental Rights in the Age of Big Data* (Opinion 8/2016, 23 September 2016) <https://edps.europa.eu/sites/edp/files/publication/16-09-23_bigdata_opinion_en.pdf> accessed 24 March 2023.

¹⁷³ Parliament and Council Regulation (EU) 2016/679 on the protection of natural persons with regard to the processing of personal data and on the free movement of such data [2016] OJ L119/1 (GDPR).

¹⁷⁴ *ibid.*

¹⁷⁵ Esayas (n 84).

¹⁷⁶ *ibid.*

In essence, an evaluation of consumers' actual behaviour towards privacy degradation would have yielded a more accurate analysis of the role of privacy as a source of market power. It is in this context that the need to recognise a separate market for data and apply the SSNDQ test should be reiterated.

(iii) *Measuring Privacy-Related Consumer Harm*

The argument that privacy should be considered in merger assessments raises questions on how privacy-related harm can be measured. Specifically, when does privacy degradation become anti-competitive?

Antitrust authorities have emphasised, almost exclusively, using qualitative methods to measure privacy-related consumer harm.¹⁷⁷ For example, French and German regulators have suggested using privacy rules as a qualitative benchmark, the breach (or potential breach) of which would signal anti-competitive conduct.¹⁷⁸ However, this may duplicate the function of data protection regulation. Moreover, a merger might degrade privacy without violating privacy rules (see, for example, the comparison between LinkedIn and XING in *Microsoft/LinkedIn*). These observations do not suggest that quantitative analyses should be disregarded; they merely highlight that privacy rules may not be an ideal benchmark.

Alternatively, regulators may apply conjoint analysis to measure the potential privacy degradation quantitatively in monetary terms. Drawing parallels with *Qihoo*, Deutscher proposes a compelling three-step approach to administer this.¹⁷⁹ First, competition regulators could identify the product's/service's price and non-price attributes and their attributive levels. For example, in *Facebook/WhatsApp*, 'privacy' is an attribute of consumer communications services, and 'full profile disclosure; basic profile disclosure; no disclosure; etc' are privacy's attributive levels. Secondly, regulators could bundle, based on the merger's potential effects, different attributes, and attributive levels to 'create' the post-merger product/service. Thirdly, a sample of consumers could allocate 'utility points' to each product 'created' by the Commission, suggesting their preferences. From this, the Commission could estimate the relative importance of each attribute and attributive level is for consumers through multi-variable regressions.¹⁸⁰ It could weigh the 'utility point' changes in response to variations in attributes/attribution levels, with the 'utility point' changes in response to changes in monetary price. This would enable competition authorities to gauge the monetary value of certain non-price attributes of the product/service, such as privacy.

However, it is recognised that, like the SSNDQ test, conjoint analyses do not adequately account for all sides of a multi-sided platform. It does not measure

¹⁷⁷ Deutscher (n 147).

¹⁷⁸ *ibid.*

¹⁷⁹ *ibid.*

¹⁸⁰ *ibid.*

the revenues that could be gained from degrading privacy to invest in other markets.¹⁸¹ Thus, whilst conjoint analyses would provide useful insights into entities' incentives to maintain/enhance/degrade privacy post-merger, it remains crucial to define a data market to evaluate the indirect network effects and potential exploitation of consumer data.

(iv) *The Privacy Fallacy*

The lack of clear privacy-related theories of harm largely stems from the orthodox assumption that privacy is not an antitrust concern and should be properly addressed by data protection regulations.¹⁸² Subsection (iv) identifies three key fallacies of relying on such assumption.

First, unlike merger control, the merging parties are not required to obtain approval from data protection authorities. Accordingly, any privacy-related assessments can only be found within merger control; furthermore, only antitrust authorities can condition a transaction's clearance to compliance with other regulations, including privacy laws.

Secondly, even if data protection regulators do spot any potentially significant privacy-related consumer harm, they do not have jurisdiction to block the transaction or subject it to suitable remedies.

Thirdly, platforms may be fully compliant with data protection and privacy rules and still degrade privacy. Indeed, *Microsoft/LinkedIn* stressed that although privacy regulations will restrict an entity's ability to access and process data, competition law nonetheless applies to any anti-competitive effects arising from, for instance, the entity's lawful attempts to access user data.¹⁸³ A retrospective analysis of *Facebook/WhatsApp* supports this submission.

Following its 2016 privacy changes, WhatsApp did not lose a significant number of users to 'less intrusive' messaging platforms.¹⁸⁴ This outcome can be attributed partially to users' behavioural considerations that limit users' ability to leverage privacy regulations to impose effective competitive constraints on an entity's privacy changes. Although data protection rules require companies to inform users about the type of data collected and why, users hardly read these policies.¹⁸⁵ Even when they do, data policies are obscure and full of legalese.¹⁸⁶ It would take a user approximately 244 hours/year to read the policies of each viewed website.¹⁸⁷ In the rare case where a user understands the policies, other behavioural consid-

¹⁸¹ Esayas (n 84).

¹⁸² Deutscher (n 147).

¹⁸³ *Microsoft/LinkedIn* (n 30) paras 177–179, 255, 375.

¹⁸⁴ *Facebook/WhatsApp* (M.7217) (n 5) para 174.

¹⁸⁵ Per the 2015 Eurobarometer survey, only 18% fully read privacy statements.

¹⁸⁶ Chirita (n 27).

¹⁸⁷ Aleecia M McDonald and Lorrie Faith Cranor, 'The Cost of Reading Privacy Policies' (2008) 4 *Journal of Law and Policy for the Information Society* 543.

erations may impair him/her from reacting competitively (the ‘privacy paradox’).¹⁸⁸ For example, privacy-sensitive users may disclose risky information when faced with the immediate benefits of disclosure (for example, unlocking new functionalities).¹⁸⁹ Furthermore, default settings make it difficult for users to detect privacy degradation and switch platforms.¹⁹⁰ Thus, unless users understand what, how and why data is being collected from them, they are unable to discipline an entity’s privacy behaviour.

The way WhatsApp notified users of its privacy degradation also reflects the increasingly prevalent business practice of leaving data subjects in the dark. For instance, WhatsApp applied default settings to its privacy policy—users who do not want to share their data with Facebook had to ‘uncheck the box’. However, a closer scrutiny of WhatsApp’s policy reveals that even if a user opts out, his/her mobile number will be shared for Facebook’s non-advertisement-related purposes, such as, fighting spam.¹⁹¹ This illustrates how companies can exploit users’ behavioural conduct through sophisticated policies and defaults.¹⁹²

It is recognised that other regulatory measures, such as unfair competition or consumer protection rules, may intervene where merger review fails to consider such factors. However, this does not excuse the Commission’s shortcomings. As the Commission’s conclusion was based on users’ ability to exert effective constraints on WhatsApp’s post-merger behaviour (i.e., by leaving WhatsApp), it should have considered whether actual consumer behaviour supports this conclusion.¹⁹³ Competition authorities should reinforce their evaluations with consumer surveys or research on behavioural economics before assuming that privacy rules are capable of equipping users with the tools to impose effective competitive constraints on an entity’s privacy practices.¹⁹⁴

The Commission’s over-reliance on privacy policies may have contributed to the perpetuation of ‘dysfunctional equilibrium’, which, per economist Farrell, is the combination of consumers’ cynicisms about businesses’ privacy promises and businesses’ lack of incentives to make such promises.¹⁹⁵ For example, from WhatsApp’s privacy deterioration, market entrants may learn that they are unable to significantly affect consumer demand by ‘making privacy-protective promises’ as users are unlikely to read them. Conversely, users may assume that entities will

¹⁸⁸ This paradox refers to the discrepancy between consumers’ stated privacy preferences and actual privacy-related behaviour. It is worth noting that applying conjoint analyses would enable antitrust authorities to consider the ‘privacy paradox’ as such analyses examine consumers’ behaviour rather than their stated preferences.

¹⁸⁹ Alessandro Acquisti, Laura Brandimarte, and George Loewenstein, ‘Privacy and Human Behaviour in the Age of Information’ (2015) 347 *Science* 509.

¹⁹⁰ *ibid.*

¹⁹¹ Esayas (n 84).

¹⁹² *ibid.*

¹⁹³ *ibid.*

¹⁹⁴ *ibid.*

¹⁹⁵ Joseph Farrell, ‘Can Privacy be Just Another Good?’ (2012) 10 *Journal on Telecommunications and High Technology Law* 251.

not protect their data (to monetise them instead), regardless of former privacy promises.¹⁹⁶ These phenomena contribute to the dysfunctional equilibrium. Escaping the equilibrium is difficult as it demands drastic behavioural changes, which likely requires actions from large digital players and/or regulators. It is submitted that competition law appears well positioned to protect consumer interests and prevent the nascent competition in privacy from being hindered.¹⁹⁷ Without merger control, competition on privacy will hardly mature.

Some argue that merger control and privacy law pursue different, or at least only partially overlapping, objectives.¹⁹⁸ Merger control seeks to promote economic efficiency and a well-functioning internal market, whereas privacy law aims to protect personal data. Thus, commingling competition and privacy issues may distort the doctrine of merger control—it may ‘shift antitrust law’s focus away from efficiency and alter its relatively predictable and transparent application’.¹⁹⁹ Whilst reviewing mergers in close co-ordination with data protection authorities may prolong the process, it is justifiable on consumer welfare grounds.

B. PRIVACY AS A FUNDAMENTAL RIGHT

This approach, initially proposed in *Google/DoubleClick*, urges authorities to block mergers that endanger an individual’s right to data protection, unless it is subjected to privacy safeguards.²⁰⁰ As this proposition does not concern purely antitrust issues, both the CJEU and Commission have rejected it, stressing that privacy is beyond the scope of EU competition law.²⁰¹ However, this section argues that article 21(4) EUMR may and should be applied as a solution of last resort to protect consumers’ privacy as a matter of public interest.

The main big data concerns in consumer relations (security breaches,²⁰² companies’ inability to rely on consumer’s consent,²⁰³ and discriminatory treatment)²⁰⁴ can be reconciled to a breach of the fundamental right to privacy when interpreted as the right to informational self-determination and the right to control personal data.²⁰⁵ Consequently, the fragility of free and informed consumer

¹⁹⁶ Esayas (n 84).

¹⁹⁷ *ibid.*

¹⁹⁸ de Peyer (n 110).

¹⁹⁹ Maureen Ohlhausen and Alexander Okuliar, ‘Competition, Consumer Protection, and the Right [Approach] to Privacy’ (2015) 80 Antitrust Law Journal 121, 153.

²⁰⁰ Esayas (n 84).

²⁰¹ See C-238/05 *Asnef-Equifax v Asociación de Usuarios* [2006] ECR I-11125, para 63; *Google/DoubleClick* (n 58); *Facebook/WhatsApp* (M.7217) (n 5).

²⁰² David C Vladeck, ‘Consumer Protection in an Era of Big Data’ (2016) 42(2) Ohio Northern University Law Review 493, 500, 506-507.

²⁰³ GDPR, art 6(1)(a).

²⁰⁴ Damiano Canapa, ‘Mergers, Data Markets and Competition’ in Joe Cannataci, Valeria Falce, and Oreste Pollicino (eds), *Legal Challenges of Big Data* (Edward Elgar Publishing 2020) 7–8.

²⁰⁵ Stefano Rodotà, ‘Data Protection as a Fundamental Right’ (Reinventing Data Protection, International Conference, Brussels, 12–13 October 2007) 2; Canapa (n 209).

It is recognised that sentence two of article 21(4) states: ‘public security, plurality of the media and prudential rules shall be regarded as legitimate interests’. The lack of direct recognition of privacy as a legitimate interest can, nevertheless, be overcome by applying the last paragraph of article 21(4),²¹⁴ which requires ‘any other public interest’ to be communicated to the Commission for an evaluation on a case-by-case basis. Whilst ‘other public interest’ grounds have ‘only very rarely been invoked’,²¹⁵ digital markets could be recognised as a strategic sector, especially as many digital platforms can be used for mass surveillance or profiling purposes by governments and private actors.²¹⁶

Further support for qualifying privacy as a legitimate interest can be found in the Charter of Fundamental Rights of the European Union and the European Convention on Human Rights, articles 7 and 8 respectively,²¹⁷ which recognise privacy and data protection as fundamental rights. As fundamental rights, it would be in the public interest for competition authorities to consider mergers that raise privacy concerns. Accordingly, article 21(4) EUMR can be seen as a means by which the Commission can satisfy its obligation to uphold the fundamental right of privacy. Through enhanced coordination between distinct regulatory agencies, using competition law, consumer protection and data protection as complements would provide more effective enforcement against privacy concerns in big data.²¹⁸

C. CONCLUSION

Section IV aimed to demonstrate that the economic and non-economic implications of privacy must be considered in all mergers involving large quantities of data. From a purely antitrust perspective, *Microsoft/LinkedIn* affirmed that privacy can be a significant competition parameter as it is increasingly valued by consumers. Whilst the Commission has not substantiated or clarified this mere acknowledgement, it is submitted that greater co-ordination between competition, consumer and data protection authorities would greatly assist in examining the competitive effects of privacy in merger review. Such co-ordination would also empower the development of urgently needed privacy-antitrust frameworks.

Whilst the Commission is unlikely to denounce its strict boundaries between competition and data protection laws anytime soon (as evidenced by the reiteration of such division in *Google/Fitbit*), Section IV stressed that consumer and data protection regulators cannot address the privacy-related aspects of data-

²¹⁴ *ibid.*

²¹⁵ Vivien Rose and David Bailey (eds), *Bellamy & Child: European Union Law of Competition* (7th edn, Oxford University Press 2013), 568–569.

²¹⁶ Chirita (n 27). See also Ira S Rubinstein, ‘Big Data: The End of Privacy or a New Beginning?’ (2013) 3 *International Data Privacy Law* 74.

²¹⁷ Charter of Fundamental Rights of the European Union [2012] OJ C326/391, art 7; European Convention on Human Rights (signed 4 November 1950, entered into force 3 September 1953) 213 UNTS 221, at 8.

²¹⁸ Canapa (n 204) 5.

driven mergers as they are unequipped to deal with mergers and the monopolistic powers that stem from data concentrations.

The likelihood of the Commission recognising privacy as a fundamental right is even lower as it is a non-economic concern, and ‘other public interest’ grounds under article 21(4) EUMR have only rarely been invoked. Nonetheless, as the exploitation of personal data may cause significant consumer harm, such as through online price discrimination and targeted advertising (see above), privacy should be considered a matter of public interest protected by the Lisbon Treaty. Blocking mergers on public interest grounds would, inevitably, attract unwarranted criticisms for being based on politics, rather than on economic considerations.²¹⁹ However, merger decisions are often economic and political decisions; over the last decade, they were ‘only exceptionally based on legal interpretation’.²²⁰ Thus, there is no reason why privacy cannot and should not be addressed under competition law. By refraining from considering privacy, competition authorities are disclaiming their responsibility to uphold consumers’ fundamental right to data privacy and protection.

V. CONCLUSION

This article has sought to demonstrate the urgent need to modify the way in which the existing EU merger control regulations and frameworks are applied to data-driven mergers. In analysing the most relevant data-driven mergers, Section II recognised the fallacy of applying the traditional market foreclosure test and narrow market-by-market assessments to determine the competitive value of data. These conventional concepts cannot properly address the novel characteristics of data and digital markets; hence, the potential anti-competitive effects of data concentrations—in particular, cross-side network effects and privacy degradation—have often been overlooked.

Section III advanced a series of adaptations and frameworks aimed at facilitating a more refined and comprehensive analysis of data in merger review. In particular, the Section argued that to properly assess the data-related theories of harm, the Commission should define a market for data and adopt forward-facing analyses throughout the merger review. Whilst the DMA facilitates the review of a greater number of digital acquisitions, the significance of data must still not be overlooked by competition authorities.

Finally, Section IV emphasised the need to incorporate privacy concerns into all merger assessments involving big data. Privacy should not only be recognised as a significant competition parameter (*Microsoft/LinkedIn*); it should also be considered a fundamental right that is protected by the Lisbon Treaty. As only competition law can address mergers and the monopolistic powers that stem from

²¹⁹ *ibid.*

²²⁰ *ibid.*

data combinations, Section IV submitted two viable approaches to integrate privacy into merger review.

As we now live in the ‘age of surveillance capitalism’ where users are ‘no longer customers, but... the raw material that power the digital economy’²²¹, it is hoped that the ongoing efforts to understand and regulate the use of data will escalate quickly to empower competition authorities to hold existing and future dominant platforms accountable to the consumer harm arising from this new market of big data.

²²¹ Stuart (n 1).