
DIGITAL MARKETS AND COMPETITION LAW: RETHINKING TRADITIONAL ANTITRUST APPROACHES

Malika Tiwari, JRF, Government New Law College, Devi Ahilya Vishwavidyalaya, Indore

ABSTRACT

With the tremendous growth of digital markets over time, numerous antitrust matters have surfaced. These matters have been decided by the antitrust authorities on the basis of different economic theories that mark the digital markets and existing factors for delineation of relevant markets. However, these factors have either grown obsolete or have been rendered insufficient in keeping the market power of tech giants under control. Lately, digital platforms have been surpassing the antitrust scrutiny, given the objective of enhancement of consumer surplus that the present antitrust law entails, as well as the contemporary approach of measuring the same largely in terms of availability of low priced products and services in the market. The activities of digital platforms are being assessed from the perspective of their immediate implications, with insufficient consideration of their potential long-term effects. The same suggests the impending danger of these platforms gaining insurmountable market dominance and becoming indispensable for the consumers, eventually culminating in monopolization.

The present research discusses numerous economic considerations for assessing competition in digital markets. Further, it enlists and describes the current factors used for the delineation of relevant markets in light of three major antitrust matters namely the Microsoft/LinkedIn Case, the Google Android Case and the WhatsApp Pay case, coupled with the contemporary challenges that have surfaced. Lastly, it highlights the need of emphasizing certain other factors for judging the anti-competitive effects in matters involving dominant digital platforms.

INTRODUCTION

Matters involving platform products or services are based on complex technologies. Consequently, they pose numerous additional challenges to the already existing challenges and difficulties in dealing with antitrust matters, including the incapacity of the judiciary to deal with such technical products or services, and the differentiation in their pricing structures and considerations.¹ The problems of inapplicability of some economic theories to digital markets that are applicable to traditional markets have given way to high degree of uncertainty.² Further, the enormous amounts of data that digital platforms have access to has raised privacy concerns for the consumers.³

One of the cardinal and most conspicuous issues manifested in all the contemporary antitrust matters is the determination of relevant markets. With the mounting interpretations of relevant markets differing from case to case, drawing a broad analysis of these markets with respect to varied products has been an imperative requirement, especially in the wake of the absence of any specified and comprehensive definition regarding the same.⁴ With every distinct type of product or service offered in the market, distinct considerations need to be made and relevant economic principles are to be analysed.

The term 'Relevant Market', as defined under Section 2(r) of the Competition Act, 2002, refers to the market determinable by the Competition Commission of India with reference to 'relevant product market' and 'relevant geographic market' or both.⁵ The former can be elaborated to include those products and/or services that can be referred to as perfect substitutes or close substitutes in the eyes of the consumers,⁶ having regard to their attributes, prices, intended uses.⁷ Further, the latter refers to the geographical area marked with homogenous conditions with respect to competition, wherein these products and/or services are dealt with, and which entails significant competitive pressure among the underlying

¹ Tyler A Baker & Mark S Ostrau, *Antitrust Issues of Particular Relevance to High-Technology Industries*, GLOBAL COMPETITION REVIEW (2006), https://assets.fenwick.com/legacy/FenwickDocuments/US_High_Technology.pdf.

² Lina M. Khan, *Amazon's Antitrust Paradox*, 126 YALE L.J. 710, 713 (2017).

³ *Privacy and Security concerns in Big Data* D.T.A. (5th Dec., 2016), https://disruptivetechnoan.com/big_news/st-privacy-and-security-concerns-in-big-data/.

⁴ Robert W. Werth, *Determination of the Relevant Product Market*, 26 OHIO ST. L.J. 241, 241 (1965).

⁵ M.M. Govindarajan, *Relevant Market under Competition Act, 2002*, TAX MANAGEMENT INDIA (May 14, 2015), https://www.taxmanagementindia.com/visitor/detail_article.asp?ArticleID=6256.

⁶ Daria Kostecka-Jurczyk, *Determination of the Relevant Market as a Criterion of Assessment of Concentration Effects in the Practice of Antitrust Authorities*, 2 WROCLAW REVIEW OF LAW, ADMINISTRATION & ECONOMICS 129, 130 (2012).

⁷ Competition Act, 2002 Section 2(t).

competitors.⁸ The same is subject to the caveat that the conditions prevailing in the said geographical market can be differentiated from that prevailing in neighbouring areas.⁹

In light of the continuously emerging and developing digital markets, the current approach towards deciding antitrust matters and for determining relevant markets in these matters is proving to be insufficient in various aspects. Tech giants are resorting to innumerable anti-competitive tactics so as to achieve greater market power. Moreover, the antitrust authorities are basing their decisions majorly on the Chicago School approach of enhancement of consumer welfare.¹⁰

The present research argues that the updation of the competition law and the approach of antitrust authorities are imperative in order to prevent anti-competitive activities in the future. Chapter I of the research puts forth a general understanding of the digital platform markets, Chapter II highlights the economic aspects and considerations with respect to these markets, along with the manner in which these aspects shall be dealt with, Chapter III depicts an analysis of the delineation of relevant markets in three significant antitrust matters, and the implications thereto, Chapter IV presents few contemporary challenges that taint the digital markets, and Chapter V furnishes the conclusion and few suggestions to tackle these contemporary challenges.

I. UNDERSTANDING DIGITAL PLATFORM MARKETS

As defined by the European Commission, online platforms refer to programs that cater to multi-sided markets, using internet service for connecting different classes of consumers with each other, for the purpose of value creation for these users.¹¹ These platforms function on the basis of underlying algorithms and high volumes of data, and are rather complicated to understand in totality. Over the years, digital platforms have experienced a tremendous accretion in terms of their usage and growth.

These platforms can be broadly categorized as social media platforms (Instagram and WhatsApp), e-commerce websites (Flipkart and Amazon), search engines (Google and Bing)

⁸ Commission Notice on the Definition of relevant Market for the Purposes of Community Competition Law, O.J.E.C., [https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:31997Y1209\(01\)&from=DA](https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:31997Y1209(01)&from=DA)

⁹ The Competition Act, No. 12 of 2003, INDIA CODE § 2(s) [2002].

¹⁰ Mark Glick, *How Chicago Economics Distorts "Consumer Welfare" in Antitrust*, INETECONOMICS (July, 2019), https://www.ineteconomics.org/uploads/papers/WP_99-Glick-Consumer-Welfare.pdf.

¹¹ UNCTAD Secretariat, *Competition issues in the Digital Economy*, U.N.C.T.A.D. (July, 2019), https://unctad.org/system/files/official-document/ciclpd54_en.pdf.

and application stores (Google Play Store).¹² Delineation of relevant market in antitrust matters involving digital platforms calls for the consideration of various economic factors including switching costs, network effects, cross-platform elasticity, bundling, leveraging, behavioural tendencies, foreclosure effects and numerous other aspects.¹³

Over the years, competition authorities all over the world have struggled with the technical nature of digital platforms as well as with the differences in the applicability of economic concepts in the brick and mortar world as compared to the digital markets. In some cases, the authorities vehemently failed in correctly defining the relevant market for digital platforms, reference being made to the infamous Apple E-book case. In the said case, the relevant product market for deciding the allegations of predatory pricing levelled against Amazon to be that of all the e-books and not the best-seller e-books.¹⁴ The same was criticized on the ground that Amazon was recouping losses incurred in best-seller e-book market by charging higher prices on other products, and that the authorities could have conveniently pointed out the existence of predatory pricing had the defined relevant market been of best-seller e-book market.¹⁵ Therefore, particular approaches for delineating the relevant market for digital platforms has not been unanimously accepted by all.

Nevertheless, the economic principles based on which the market shall be delineated in digital platforms has largely been laid down by the judicial authorities in foreign jurisdictions and have been readily accepted by the Indian Judiciary.¹⁶ However, the same has been done in light of the Chicago School approach of allowing all the market activities, except the ones that are prohibited per se, that entail the enhancement of consumer welfare in the market,¹⁷ with utter disregard to their probable future ramifications.

It is pertinent to note that high technology markets and digital platform markets are observing tremendous growth. Every new entry in this market is seen by the antitrust authorities as consumer welfare enhancing and hence, is generally not looked at with sceptic. Research suggests that the trends in digital platform markets require the authorities to side-line the pure

¹² *Id.*

¹³ *Market Definition – Digital Economy*, EE & MC, <https://www.ee-mc.com/expertise/digital-economy/market-definition-digital-economy.html>.

¹⁴ *United States v. Apple Inc.*, 952 F. Supp. 2d 638 (S.D.N.Y. 2013).

¹⁵ Lina M. Khan, *Amazon's Antitrust Paradox*, 126 YALE L.J. 710, 765 (2017).

¹⁶ Payal Chatterjee & Shashank Gautam, *Competition Law in India vs USA and EU*, N.D.A., http://www.nishithdesai.com/fileadmin/user_upload/pdfs/New_Competition_Law_in_India_vs_USA_and_EU.pdf.

¹⁷ Mark Glick, *How Chicago Economics Distorts "Consumer Welfare" in Antitrust*, INETECONOMICS (July, 2019), https://www.ineteconomics.org/uploads/papers/WP_99-Glick-Consumer-Welfare.pdf.

consumer-welfarist approach and adopt an approach that takes into consideration the likely future anti-competitive effects of various activities in these markets. Even the economic concepts used to establish anti-competitive effects in digital markets shall be strictly seen and the possibilities of such effects in the near future shall necessarily be prevented.

II. ECONOMICS OF DIGITAL PLATFORM MARKETS

Professor Michael Porter in his Five Forces Model mentions the requirement of securing one's business by analysing the Threat of New Entries in the market.¹⁸ He states that firms should aim at making efforts for establishing entry barriers in the markets that they operate in, so as to gain and retain a competitive advantage.¹⁹ However, resorting to such activities might invoke antitrust inquiries and investigations.

When examined in light of digital platform markets, it is vehemently argued that securing entry barriers for firms which enjoy first-mover advantage is relatively easier as measured against the same for firms in the traditional brick and mortar setup. Further, the incentive of the firms in digital markets to increase prices pursuant to a horizontal merger is rather astonishing and needs thorough consideration of antitrust authorities. Moreover, the two-sided nature of these platforms and the ensuing network effects render the enhancement of competition in the digital market a far-sighted goal.

A. Digital Markets and Unilateral Effects Theory

As above-mentioned, high-technology markets are marked by highly differentiated products and pricing structures. The markets characterized by these elements entail the application of the economic concept of 'unilateral effects'.²⁰ According to the basic understanding of economics of Antitrust, there are rare possibilities of price collusion or co-ordination among entities dealing in highly differentiated products,²¹ due to the varied cost factors that result in incomparable price considerations, as well as the possibilities of differences in economies of scale and scope that the aforesaid entities possess with respect to these products.

¹⁸ Porter's Five Forces - Understanding Competitive Forces to Maximize Profitability, MIND TOOLS, https://www.mindtools.com/pages/article/newTMC_08.htm.

¹⁹ Dario Maisto, *Strategy and Competition in the Platform Economy*, <https://isg-one.com/consulting/articles/strategy-and-competition-in-the-platform-economy>.

²⁰ Malcolm B. Coate & Shawn W. Ulrick, *Unilateral Effects Analysis in Differentiated Product Markets: Guidelines, Policy, and Change*, REV. IND. ORGAN. 48, (2016).

²¹ Michael Alexander Raith, *Product Differentiation, Uncertainty and Price Coordination in Oligopoly*, LSE THESES (1996), <http://etheses.lse.ac.uk/1439/1/U091667.pdf>.

Undoubtedly, differentiated products involve differences at every step of the related business activities, from acquiring raw materials to storing the finished products and the marketing activities involved. However, it is pertinent to note that the same is not a straightjacket rule, applicable in each and every situation.²² Economists argue that in digital platform markets, even though the products are differentiated, a merger may actually result in a rise in prices. This happens when the products offered by merging entities are the primary and the subsequent choices of consumers,²³ and it is extremely difficult for the other market players to alter these preferences of the consumers even though their products may be functional substitutes of those of the merging entities.²⁴ For instance, if product M and product N in digital platform markets are close functional substitutes in the eyes of consumers as compared to other rival products in these markets, and the entities dealing with M and N decide to merge, there is incentive for the merged entity to mark-up the prices of the product M. This is because a shift to the substitute product by consumers as a result of the marked-up price of their first preference would essentially mean an increase in the sales of product N. Further, consumers are unwilling to shift to products X and Y in the same market because these products are highly differentiated from products M and N in the eyes of the consumers. Therefore, the profits eventually remain in the hands of the merged entity.

Therefore, every proposed merger shall be strictly viewed with the lens of unilateral effects before being approved by the antitrust authorities. Even the slightest possibility for a merger to bring about these effects shall render the merger proposal as disallowed by the authorities.

B. Digital Markets and Multi-Homing

Multi-homing with respect to antitrust matters, as against single-homing, refers to the ability and the tendency of users in a market to use multiple platforms providing same products or services.²⁵ Therefore, when consumers use more than one social networking sites, search engines and video game consoles, they are said to multi-home. Multi-homing helps reduce the impact of Network Effects in digital markets, for the use by consumers of multiple

²² Tyler A Baker & Mark S Ostrau, *Antitrust Issues of Particular Relevance to High-Technology Industries*, GLOBAL COMPETITION REVIEW (2006), https://assets.fenwick.com/legacy/FenwickDocuments/US_High_Technology.pdf.

²³ Charles E. Biggio et al., *Whole Foods' Impact on Unilateral Effects*, G.C.P. (2008), <https://www.wsgr.com/images/content/1/6/161/wholefoods0908.pdf>.

²⁴ Herbert J. Hovenkamp, *Analyzing Horizontal Mergers: Unilateral Effects in Product Differentiated Markets*, S.S.R.N. (2009), https://scholarship.law.upenn.edu/cgi/viewcontent.cgi?article=2804&context=faculty_scholarship.

²⁵ Vardit Landsman & Stefan Stremersch, *Multihoming in Two-Sided Markets: An Empirical Inquiry in the Video Game Console Industry*, 75 J. MARK. 39, 39 (2011).

platforms implies the creation of value for all these platforms, as against the creation of value for single or for few dominant platforms.²⁶

The propensity to multi-home highly depends upon the switching costs and reputational effects. High cost of switching from one service to another on digital platforms, as well as the high reputation enjoyed by particular firms in digital platform markets, encourage single-homing.²⁷ The likelihood of consumers making an optimal and informed choice between different available platforms by investing time in carrying-out research and enquiries is next to nil.²⁸ At the same time, low switching costs, low search costs and high product differentiation encourage the consumers to multi-home.²⁹ High degree of multi-homing in a market fosters healthy market competition and keeps the prices offered by different platforms in check.

However, single-homing is not solely the indicator of low degree of market competition in the market. Predominance of single-homing in digital markets might also imply that the products or services offered by other competitors are not up to the mark, that resorting to multi-homing is costly for consumers, or that different consumer groups have different internal preferences.³⁰ Nevertheless, the analysis of single-homing and multi-homing and the reasons behind the prevalence of any of the two in a particular digital platform market is imperative to establish market dominance.

Therefore, any trace of the possibility of single-homing in a digital market shall necessarily invoke inquiries and investigations so as to determine the reason behind the same. If the reason emerges out to be the dominance of a particular digital platform in that market, measures must be taken to curb the same. It is true that antitrust law does not condemn dominance. Rather, it condemns the abuse of dominance. However, there is a dire need to increase the level of scrutiny and strictness when it comes to digital platforms, for these platforms have a tendency to circumvent the law to great extents.

²⁶ Charlotte Slaiman, *Why Dominant Digital Platforms Need More Competition*, CIGI (Apr. 13, 2020), <https://www.cigionline.org/articles/why-dominant-digital-platforms-need-more-competition>.

²⁷ Nester Duch-Brown, *The Competitive Landscape of Online Platforms*; JRC Digital Economy, E.U. (2017), <https://ec.europa.eu/jrc/sites/jrcsh/files/jrc106299.pdf>.

²⁸ Charlotte Slaiman, *Why Dominant Digital Platforms Need More Competition*, CIGI (Apr. 13, 2020), <https://www.cigionline.org/articles/why-dominant-digital-platforms-need-more-competition>.

²⁹ *Rethinking Antitrust Tools for Multi-Sided Platforms*, OECD (2018), <https://www.oecd.org/daf/competition/Rethinking-antitrust-tools-for-multi-sided-platforms-2018.pdf>.

³⁰ *Rethinking Antitrust Tools for Multi-Sided Platforms*, OECD (2018), <https://www.oecd.org/daf/competition/Rethinking-antitrust-tools-for-multi-sided-platforms-2018.pdf>.

C. Digital Markets and Economies of Scale and Scope

Unlike the traditional physical markets which entail supply economies of scale, digital markets observe demand economies of scale implying an accretion in value with an increase in number of consumers.³¹

Digital markets are characterized by high fixed cost of production and negligible or significantly low variable cost of production. Therefore, pursuant to initial up-front fixed expenditures, which can be referred to as sunk costs, it is relatively easier for firms operating in digital markets to grow and operate at low cost of production.³² Since Network Effects, as discussed in the next chapter, are the cardinal determinants of the profitability of digital platforms, economies of scale are demand driven, i.e. it rises as more and more consumers join the platform.³³ Here, the underlying economic logic is that with larger output and minimal variable costs, the average cost of production falls and hence, the producer is able to make higher profits.³⁴

Moreover, firms in digital markets operate on the basis of large amounts of data, which can be leveraged by them to enter into well-performing adjacent markets, culminating in economies of scope. Therefore, costs can further be reduced by spreading them across different enterprises through vertical integrations.³⁵

Firms enjoying economies of scale and scope in digital markets and operating at low cost of production, render it difficult for new players to enter the market, thus creating high barriers to entry.³⁶ Further, existing competitors that fail to match this level of economies of scale and scope are eventually driven out of the market. Therefore, analysing market power and dominance in digital markets essentially requires the consideration of the economies of scale and scope at which firms are operating in that market.

³¹ Michael G. Jacobides et al., *Platforms and Ecosystems: Enabling the Digital Economy*, WE FORUM (Feb., 2019), http://www3.weforum.org/docs/WEF_Digital_Platforms_and_Ecosystems_2019.pdf.

³² Geoffrey Parker & Marshall Van Alstyne, *Digital Platforms and Antitrust*, S.S.R.N., https://papers.ssrn.com/sol3/papers.cfm?abstract_id=3608397.

³³ Geoffrey Parker & Marshall Van Alstyne, *Digital Platforms and Antitrust*, S.S.R.N., https://papers.ssrn.com/sol3/papers.cfm?abstract_id=3608397.

³⁴ Vera Demary & Christian Rusche, *The economics of platforms*, IW-Analysen 123 (2018), <https://www.econstor.eu/bitstream/10419/182531/1/1031227806.pdf>.

³⁵ Committee for the Study of Digital Platforms, *Report*, CHICAGO BOOTH (1 July, 2019), <https://som.yale.edu/sites/default/files/CompetitionDigitalPlatformsStigler19.pdf>.

³⁶ Ariel Ezrachi & Maurice E. Stucke, *How Data-Opoloes are Dissipating the Internet's Potential*, PRO-MARKET, <https://promarket.org/wp-content/uploads/2018/04/Digital-Platforms-and-Concentration.pdf>.

If the authorities establish that some firms existing in digital markets are operating at high economies of scale and scope, even the slightest possibility of high entry barriers in that market shall evoke immediate actions on their part. Here, the authorities shall strictly disallow vertical integrations, suggest divestitures, or provide the requisite benefits to the new entrants to come at par with the incumbent firms.

D. Network Effects Theory and First-Mover Advantage in Digital Markets

According to the Network Effects Theory, the value of a product or service increases for all the consumers as a result of more and more consumers using such product or service.³⁷ In other words, network effects signify the impact that an additional user has on the value of a particular product or service for its existing consumers.³⁸ The theory of Network Effects holds true for digital platforms, for one cannot deny that a social media platform gains higher utility and value as more people start using it. This is an example of Direct Network Effects.³⁹

Indirect Network Effects on the other hand entail the increase in value of a product for the users on one side of a platform with an increase in the number of users on the other side of the platform.⁴⁰ Therefore, this theory is applicable in two-sided market platforms, for a surge in number of newspaper readers is beneficial not for the readers but for the advertisement publishers, as recognized in the Times Picayune case.⁴¹ The same is true for the digital market as digital platforms serve as a link between advertisers and users, thus, depicting the two sides of the consumer market that they possess.⁴² The case of *Ohio v. American Express*, wherein the US Supreme Court held that the increase in prices on one side of Amex card market (the merchants' side) triggered a negative effect on the other side of the market (the users' side), is a leading example of Indirect Network Effect Theory.⁴³

³⁷ D'Arcy Coolican & Li Jin, *The Dynamics of Network Effects*, ANDREESSEN HOROWITZ, <https://a16z.com/2018/12/13/network-effects-dynamics-in-practice/>.

³⁸ David Evans & Richard Schmalensee, *Network Effects: March to the Evidence, Not to the Slog*, M.I.T (27 Aug., 2017), <https://mitsloan.mit.edu/shared/ods/documents/?PublicationDocumentID=4243>.

³⁹ Catherine Tucker, *Network Effects and Market Power: What Have We Learned in the Last Decade?*, ANTITRUST 72, 72 (2018).

⁴⁰ Nicholas L. Johnson, *What are Network Effects?*, APPLICO, <https://www.applicoinc.com/blog/network-effects/>.

⁴¹ *Times-Picayune Publishing Co. v. United States*, 345 U.S. 594 (1953).

⁴² Srishti Suresh, *Broadening Perspectives in the Age of Digital Markets: The Need For a Renewed Approach*, THE CBCL BLOG (19 July, 2020), <https://cbcl.nliu.ac.in/competition-law/broadening-perspectives-in-the-age-of-digital-markets-the-need-for-a-renewed-approach/>.

⁴³ *Ohio v. American Express*, 138 S. Ct. 2274.

Overall, the profits of the platform running entities and thereby, the quality of these platforms, improve as the number of consumers using them shoots up.⁴⁴ Digital platform markets may exhibit both direct and indirect network effects, with indirect network effects being particularly significant in multi-sided platforms.⁴⁵ Network effects when combined with the first-mover advantage, which refers to an edge that a company secures over other players by being the first to introduce a particular commodity or a service to a market,⁴⁶ result in invincible entry barriers for new players wanting to enter the same digital market.⁴⁷ Therefore, there are high probabilities for firms enjoying dominant position in these markets to become monopoly power over time, or to share the market with few other dominant players and hence, form an oligopolist.⁴⁸

Furthermore, the presence of Indirect Network Effects in digital platform markets makes them susceptible to tipping. Tipping refers to the propensity of market competitors to quit the market, pursuant to a particular rival gaining a competitive edge.⁴⁹ Consequently, a single firm, which was earlier a competitor, now becomes a dominant player in the market in the absence of other competitors.⁵⁰ The inability to cope with strong positive network effects in favour of a particular firm, and the tendency of even minor changes to trigger such network effects, acts as disincentive for these competitors to continue in the digital platform market.

Whatever be the case, anti-competitive effects in digital markets can be well-expected and hence, scrutiny of the same shall be stricter and harsher, in the future interests of the consumers.⁵¹

E. Leveraging and Foreclosure in Digital Markets

Generally observed as ‘Conglomerate Effects’, mergers in digital markets between platforms that do not share the same products and/or services give way to bundling.⁵² Quite often,

⁴⁴ David Evans & Richard Schmalensee, *Network Effects: March to the Evidence, Not to the Slog*, M.I.T (27 Aug., 2017), <https://mitsloan.mit.edu/shared/ods/documents/?PublicationDocumentID=4243>.

⁴⁵ *Id.*

⁴⁶ Fernando Suarez & Gianvito Lanzoll, *The Half-Truth of First-Mover Advantage*, H.B.R. (April, 2005), <https://hbr.org/2005/04/the-half-truth-of-first-mover-advantage>.

⁴⁷ Timothy Bresnahan, *Network Effects and Microsoft*, S.I.E.P.R. (Aug., 2001), <http://www-siepr.stanford.edu/papers/pdf/00-51.pdf>.

⁴⁸ *Id.*

⁴⁹ Jean-Pierre Dube et al., *Tipping and Concentration in Markets with Indirect Network*, WHARTON (1 July, 2007), https://marketing.wharton.upenn.edu/wp-content/uploads/2016/10/tipping_indirect_network_effects_09_97.pdf.

⁵⁰ Dheeraj Awasthi, *The Implications of Network Effects for Competition Law*, IPLEADERS (7th Jan., 2019), <https://blog.ipleaders.in/implications-network-effects-competition-law/>.

⁵¹ Nester Duch-Brown, *The Competitive Landscape of Online Platforms; JRC Digital Economy*, E.U. (2017), <https://ec.europa.eu/jrc/sites/jrcsh/files/jrc106299.pdf>.

companies essentially functioning in a particular part of the digital market might aim at merging with another such company, which may or may not provide the same product or service. The underlying motive behind such an Act might be to utilise the dominant position in one part of digital market to tap the other.⁵³ This is referred to as leveraging, a technique of entering new markets by virtue of use of the dominant position in the existing market. On the other hand, foreclosure refers to the abusive activities resorted to by a firm by using its products in one line of the business to disadvantage the rivals present in another line of business.⁵⁴

Although not in every case, these tactics constitute anti-competitive activities in the market, substantially hampering the competition and hence, are essentially taken account of while determining relevant market in antitrust matters related to digital platforms. The antitrust authorities shall mandatorily monitor such tendencies of digital platforms and take preventive measures, rather than curative measures.

III. DELINEATING RELEVANT MARKET IN DIGITAL PLATFORMS

The surfacing of cases of market dominance abuse, anti-competitive activities and impending mergers, to be dealt by the antitrust authorities as per the “By Effects” doctrine, necessitates the determination of relevant market, in order to assess the actual power that a particular firm is exercising in the market.⁵⁵ Delineating relevant market for digital platforms is rather challenging owing to the innumerable economic considerations to be accounted for. The present chapter discusses three leading cases and the delineation of relevant markets in each of these cases, so as to highlight the factors and principles that are presently being considered for the determination of relevant market for digital platforms.

A. The Microsoft/LinkedIn Case

One of the initial cases dealing with the instant issue was the Microsoft/LinkedIn case. In 2016, Microsoft Corporation proposed the deal of all-stock acquisition of LinkedIn Corporation. Concerns were raised in the case with respect to the probable negative effects on

⁵² Roundtable on Conglomerate Effects of Mergers, OECD (June, 2020), [https://one.oecd.org/document/DAF/COMP\(2020\)2/en/pdf](https://one.oecd.org/document/DAF/COMP(2020)2/en/pdf).

⁵³ Emilia Franke, *The Leveraging Theory as a Tool in EC Merger Control*, L.U.B. (2007), <https://lup.lub.lu.se/luur/download?func=downloadFile&recordId=1557527&fileId=1564351>.

⁵⁴ Turkey: Competition and Antitrust, MONDAQ, <https://www.mondaq.com/advicecentre/content/1654/Market-Foreclosure#:~:text=The%20Guidelines%20provide%20a%20definition,%2C%20to%20consumers%20disadvantage%E2%80%9D>.

⁵⁵ Antitrust Standards of Review: The Per Se, Rule of Reason, and Quick Look Tests, BONALAW, <https://www.businessjustice.com/antitrust-standards-of-review-the-per-se-rule-of-reason-and-quick.html>.

the competition in the professional social network (PSN) services market.⁵⁶ Although the two firms dealt in closely related markets, their common market pertained mostly to that of platform advertising. For the purposes of defining relevant market in the case, the Commission heeded the PSN services market, the platform advertising services market and customer relationship management (CRM) software solutions.⁵⁷

The incentive for Microsoft to bundle its Office with the services offered by LinkedIn in hiring/recruitment area, or to link communication services it offer through Skype with LinkedIn, was analysed by the Commission. Eventually, stating that such bundling as aforesaid will be of interest merely for the consumers involved in recruitment processes, the Commission observed that there is little incentive for foreclosing activities by Microsoft, for enough competition exists from other firms operating in the recruitment services market.

Professional Social Networking Services Market – The Commission aimed at determining the propensity of Microsoft to put the competitors of LinkedIn at a disadvantageous position by using its significant market power in Operating Systems market to gain competitive edge for LinkedIn. This could have been done by commencing the pre-installation of LinkedIn on Windows Personal Computers. The result would have been high switching costs for consumers. Further, behavioural traits suggested that consumers are highly unlikely to make efforts to download another application when one is pre-installed. With the belief that these anti-competitive effects are highly probable and will generate entry barriers for new entrants, the Commission gave a go-ahead to the merger deal subject to some preventive covenants.

In light of the argument that Social Networking Services are different from PSN Services, for the former is used merely to share some information but the latter involves sharing professional information about oneself with the aim of enhancing contact base. Therefore, SN and PSN were treated as non-substitutable services present in distinct markets.

Further, the Commission observed that the foreclosure effects will be aggravated as a result of growth in customer base of LinkedIn pursuant to the merger, owing to the concept of Network Effects. This will lead to market tipping, for competitors will tend to pull away once LinkedIn gains competitive advantage that they are unable to cope with. With respect to

⁵⁶ Michele Giannino, *Microsoft/LinkedIn: What the European Commission said on the competition review of digital market mergers*, S.S.R.N. (21 July, 2017), https://papers.ssrn.com/sol3/papers.cfm?abstract_id=3005299.

⁵⁷ H. Ercument Erdem, *European Union: European Commission Approves Microsoft's Acquisition of LinkedIn Subject To Conditions*, MONDAQ (15 May, 2017), <https://www.mondaq.com/turkey/maprivate-equity/594136/european-commission-approves-microsoft39s-acquisition-of-linkedin-subject-to-conditions>.

Multi-Homing, the Commission stated that it is highly unlikely, for consumers preferred LinkedIn over other platforms.

Customer Relationship Management Software Solutions Market – The Commission here was to determine whether the competition will be hampered in case Microsoft mandates consumers buying intelligence solutions of LinkedIn to purchase its CRM Software. Stating that both the Corporations enjoy very small share and market power in this market, the Commission allowed the deal.

Online Advertising Services – Observing that the common market for the corporations is not the advertising services, rather it is the non-search advertising services. But yet again, the Commission pointed out the absence of significant market power with the merging entities.

The decision of the Commission clearly shows a leniency in deciding merger cases in digital markets. Nevertheless, the Commission considered the relevant theories of Network Effects, Tipping, Foreclosure, Entry Barriers, Switching Costs and Multi-Homing to reach to conclusions regarding relevant markets and the possible anti-competitive practices in the case. The other relevant markets defined in the case, but did not catch the sceptic eye of the Commission, included Operating Systems on Personal Computers, sales intelligence solutions, productivity software and online recruitment services. This clearly evinces the approach of delineating narrow or subset markets, pursuant to defining a large relevant market, by determining distinct consumer groups within the entire customer base that have differing demands and needs.⁵⁸

B. The Google Android Case

For long, Google has been alleged to give beneficial treatment to its own products, including Google Maps, YouTube, Google News etc., in its search engine results, to the detriment of other platform users and internet publishers.⁵⁹ The only option for an internet publisher wanting to get rid of such preferential treatment is to give up Google products at once, which

⁵⁸ Tyler A. Baker & Mark S. Ostrau, *Antitrust Issues of Particular Relevance to High-Technology Industries*, GLOBAL COMPETITION REVIEW (2006), https://assets.fenwick.com/legacy/FenwickDocuments/US_High_Technology.pdf.

⁵⁹ Vasil Stoykov, *Bringing the EU Competition Rules in the Digital Market – the Commission Decision in the Google Android Case*, 16 SCRIPTED 49, 51 (2019).

will substantially hamper its revenues, Google being the primary search engine in the eyes of present search engine customer base.⁶⁰

In 2018, the Commission put-forth few allegations against Google, with respect to its alleged anti-competitive activities through Android. The allegations that surfaced were regarding the tying of Google's products with mobile devices such that the producers of the latter shall pre-install the former in their respective devices to be able to use other products of Google, and that Google has extended financial incentives to them for the same. Having leading digital products pre-installed in their devices, the consumers have little incentive to download other applications provided by market rivals. The essential consequence of such practices would be loss-making rival platforms and hence, hampered competition in the digital market.

The Commission's decision was largely upheld by the General Court of the European Union in the case of *Google and Alphabet v. Commission*, although the fine was reduced to €4.125 billion. Google's subsequent appeal before the Court of Justice was dismissed in July 2026, thereby confirming the revised fine and the principal findings concerning Google's anti-competitive practices in the Android ecosystem.⁶¹

Three-Sided Market Structure – It is pertinent to note that Android serves three group of consumers namely mobile device producers, mobile device purchasers/users and mobile application developers. The value of mobile applications increases with an increase in the number of mobile purchasers. At the same time, the purchasers value the mobile applications/developers side of the market, for the more the number of developers and applications, the wider the range of products for purchasers to choose from. This proves the flow of indirect network effects from both the sides. The same is true for device producers and application developers, for large number of applications would imply higher value of Android Operating System for producers and vice versa. Similar analogy can be drawn for manufacturers and purchasers.

The Commission defined numerous relevant markets in the case.⁶²

Licensable Smart Mobile Operating Systems Market – The Commission observed that the Personal Computers Operating Systems and the Feature Phones Operating Systems are not

⁶⁰ Joe Lamsesch, *Market Definition in the Google Android Case*, MATHEO (2016), https://matheo.uliege.be/bitstream/2268.2/1812/4/MarketDefinitionGoogleAndroid_LameschJo%c3%a9.pdf.

⁶¹ *Google and Alphabet v. Commission*, Case T-604/18 (2022).

⁶² Commission Decision - Google Android, European Commission (18th July, 2018), https://ec.europa.eu/competition/antitrust/cases/dec_docs/40099/40099_9993_3.pdf.

substitutable with Smart Phones Operating Systems in the eyes of smart phone manufacturers, for the operating system prepared for personal computers and feature phones cannot be used in smart phones. Therefore, there exists no demand side substitutability and they do not fall in the same relevant market. Similarly, the Commission stated that although it is possible for personal computer and feature phone operating system suppliers to shift to making operating systems for smart phones, the same will require different functionalities in light of differing hardware needs for the products. Such shift would necessitate the manufacturers to make distinct investments. Therefore, there exists no supply side substitutability or functional inter-changeability. Further, non-licensable operating systems would constitute a separate relevant market for the reason that they are not freely available to be used by all the manufacturers. However, the Commission pointed out that Tablet Operating Systems will be covered under the relevant product market, for they are essentially the same as that of smart phones.

Android Application Stores (AAS) Market – The Commission reached to the conclusion that AAS and other applications form separate relevant product markets, for the two perform distinct functions. The former facilitate the searching and downloading of the latter. Also, development of the two requires distinct resources and methodologies. Also, Application Store (AS) for AAS is different from AS for any other licensable smart phone operating system. However, AS for Android devices is same as that used for Google Android devices. Therefore, the two will fall in same relevant product market.

General Internet Search Service Market – General search services are essentially different from other internet services, for the former constitutes the link between users and the latter. The latter may include social networking sites, video streaming sites etc. However, general search services on personal computers are substitutable with such services on smart phones, for both yield the same results for users and both are rendered by same online platforms. In fact, the information uploaded and the basic technology is the same.

Non-Operating System Mobile Web Browsers - On similar lines as aforementioned, the Commission observed that it constitutes a separate relevant product market altogether.

Therefore, the Commission adopted the traditional economic tests of demand-side substitutability, supply-side substitutability, functional inter-changeability, two-sided market approach and the concept of bundling so as to determine the relevant product market and indict Google under the antitrust laws. Narrow delineation of market requires ample of

empirical information supporting the claims of the parties. It is pertinent to note that bundling in digital markets and physical markets have different intensities of impact. Bundling in digital markets will have far more implications as compared to that in physical markets given the existence of strong network effects in the former. The same is true for the application of other economic concepts in digital markets. Therefore, these traditional tests may be insufficient when applied in isolation in judging antitrust matters related to digital markets.

C. In Re: Harshita Chawla and WhatsApp Inc., Facebook Inc.

In 2020, information was filed under the Competition Act, 2002 against WhatsApp bringing to light its anti-competitive practices in the Indian Unified Payment Interface (UPI) market.⁶³ The information raised the allegations of the bundling of WhatsApp Messaging Application with WhatsApp Pay and hence, using its dominance in the market for the former so as to coerce its way into the UPI market. It was alleged that the default installation of WhatsApp Pay in its Messaging App is anti-competitive and an unfair imposition and will evoke privacy concerns. Substantiating her allegations, the informant contended the following –

- a) that WhatsApp is a dominant player in the instant messenger application current market;
- b) that Facebook practices targeted advertising to earn revenue and has long been aiming at eliminating its potential and exiting competition, the same being evidenced by its acquisition of Instagram and WhatsApp;
- c) that there are no viable substitutes of WhatsApp in the eyes of consumers, for other apps have very small customer base;
- d) that due to the large customer base and low marginal costs, WhatsApp reaps the benefits of economies of scale.
- e) that WhatsApp sits on piles of data, allowing it to further increase its customer base. It has become a market gatekeeper, preventing new platforms to enter the market.

For the purposes of deciding the case, the Informant put forth two relevant product markets namely “Market for internet-based messaging application through smartphones” and “Market for UPI enabled digital payment applications”. The proposed Geographic Market was the entire territory of India.

⁶³ In Re: Harshita Chawla and WhatsApp Inc., Facebook Inc., C.C.I. (2020), <https://www.cci.gov.in/sites/default/files/15-of-2020.pdf>.

WhatsApp challenged the proposed relevant market, stating the correct market to be the “market for user attention” on the ground that all the digital platforms that function through capturing user attention by offering varied services including social media, content viewing, gaming etc. constitute its competitors. It also contended that the consumers of these services were free to practice multi-homing, for all these services are free of charge. Further, it disregarded all the allegations of market dominance. WhatsApp tackled the allegations of leveraging by arguing that the consumers are not bound to use WhatsApp Pay. Rather, it is merely an added feature and consumers are free to download other UPI Applications.

The Commission observed that WhatsApp is an Over-The-Top (OTT) application used for communication whereas Facebook is a social media platform. Further, all OTT applications are not necessarily substitutable in the eyes of users, for the services provided by different applications may differ. Notably, since these applications offer services free of charge, the usage of SSNIP (Small but Significant Increase in Price) Test for the purpose of defining relevant market is completely ruled out.

However, the application of the functional substitutability test in light of the facts that Facebook and WhatsApp are distinct platforms offering distinct services, clearly culminated in the position that the two are not functionally substitutable. Consequently, the claim of WhatsApp stating the relevant product market to be the “market for user attention” cannot be accepted in this matter, for such market definition is too broad to correctly analyse its anti-competitive activities.

The market definition adopted by the Commission here is the “market for OTT messaging apps through smartphones in India”. Further, the second relevant market definition proposed by the informant was also accepted by the Commission. It was observed that WhatsApp application is characterized by direct network effects and that it, in fact, is a dominant player in the market. The Commission also agreed that the market is marked by high switching costs and that the network effects may indirectly culminate in entry barriers for new players.

Unfortunately, even after the aforesaid admittance with respect to the potential anti-competitive effects of the activities of WhatsApp and the fact that it enjoys substantial market power, the Commission did not condemn its activities. Rather, it held that the pre-installation of WhatsApp Pay does not bind the consumers to its usage. The user has to register itself on the Payments application, agree to the terms and conditions as well as the privacy policy and provide its bank account details, and hence, has to perform numerous steps for enabling the

new app. Further, the incumbent players in the UPI market provide sufficient competition and there exists a bias in the eyes of consumers in favour of them. Therefore, it cannot be presumed that leveraging its dominant position to enter another market will automatically provide a significant market share to WhatsApp in UPI market.

Therefore, the Commission recognized the non-viability of SSNIP tests while determining relevant product markets for digital platforms rendering free services to users. The test of functional substitutability was the primary basis for delineating the market in the present case. However, it is pertinent to note that by setting this precedent, the Commission has given a 'go-ahead' to all the tech-giants, dominant in their respective markets, for resorting to pre-installation bundling activities. Soon, all these digital platforms will come up with similar proposals, which will be readily accepted by the Commission on the ground that the users are not being coerced to use the pre-installed applications.

It is pertinent to note that the Commission's decision was subsequently challenged before the National Company Law Appellate Tribunal (NCLAT). However, this appeal was dismissed for default, and therefore, the NCLAT did not undertake a substantive review of the Commission's reasoning on the permissibility of WhatsApp Pay's pre-installation. Accordingly, the Commission's approach in this regard has not been judicially reversed on merits.

IV. CONTEMPORARY CHALLENGES POSED BY THE DIGITAL PLATFORM MARKETS

It is completely untrue to say that any novel service provided by these dominant players does not create any bias in the minds of the users. One cannot correctly predict the aftermath of various activities in digital markets, especially due to the existence of strong direct and indirect network effects. Notably, the assumption of the Chicago School protagonists that firms are driven by the objective profit-maximization over that of growth has been utterly discarded by digital platforms.⁶⁴ The same can be evidenced by the case of Amazon wherein the investors have supported the pursuit of Amazon of growth over profit-maximization.⁶⁵ In light of the aforesaid, one cannot deny that similar assumptions of the antitrust laws and economic theories that work well for brick-and-mortar world can easily be defeated by the emerging digital markets.

⁶⁴ UNCTAD Secretariat, *Competition issues in the Digital Economy*, U.N.C.T.A.D. (July, 2019), https://unctad.org/system/files/official-document/ciclpd54_en.pdf.

⁶⁵ Lina M. Khan, *Amazon's Antitrust Paradox*, 126 YALE L.J. 710, 713 (2017).

The decision made by the Commission in the WhatsApp Pay case requires immediate reconsideration. When on one hand Google was indicted for pre-installation activities in the Google Android case for the reason that consumers are highly unlikely to download and use other applications when already provided with the top applications, WhatsApp was given a green light to perform the exact same activity. The Commission failed to notice that even if the incumbent players in UPI market are strong competitors, allowing WhatsApp Pay's pre-installation will set the entry barriers high enough to make the entry of new firms a practical impossibility. Further, the precedent as set by the Commission will essentially result in all the dominant players practicing bundling and tying of products merely by deliberately adding few extra steps to be taken for enabling a pre-installed application.

The Chicago School approach has restricted the goals of competitive law merely to the protection of Consumer Welfare.⁶⁶ What is consumer-centric in present is pro-competitive in the eyes of antitrust authorities.⁶⁷ Mulling the matters from this perspective, the authorities fail to consider the fact that digital platforms are incurring losses or are making lower profits in the present with the ulterior objective of gaining insurmountable market power and becoming indispensable for consumers. Their consumer-centric activities are limited to the point of time when the entry barriers are rendered so high and competition so low that even the antitrust authorities would have no option but to sit back, for the market will be devoid of any alternatives. The irony lies in the fact that the price of products and services is considered to be the primary criteria for judging market competition when most of these services are available free of charge to the consumers.

The methods of determining the relevant markets, although still relevant, have started to grow obsolete in light of continuous digital innovation.⁶⁸ True that the traditional methods of cross-platform elasticity, demand-side substitutability, SSNIP Test and functional interchangeability can still be used for the delineation of relevant product markets but the question that surfaces is – Are these considerations enough? Don't the digital markets that are completely different from traditional physical markets, and have successfully disproven

⁶⁶ UNCTAD Secretariat, *Competition issues in the Digital Economy*, U.N.C.T.A.D. (July, 2019), https://unctad.org/system/files/official-document/ciclpd54_en.pdf.

⁶⁷ John Kirkwood & Robert H. Lande, *The Chicago School's Foundation is Flawed: Antitrust Protects Consumers*, SEMANTICS SCHOLAR (2008), <https://pdfs.semanticscholar.org/7428/5a1aefdfc17a26a99d8e71303c2036dc770d.pdf>.

⁶⁸ Oxera, *Market Power in Digital Platforms*, EUROPEAN COMMISSION (13th Sept., 2018), https://ec.europa.eu/competition/information/digitisation_2018/contributions/oxera/oxera_market_power_in_digital_markets.pdf.

numerous economic theories that prove true for the latter, require new approach for determining relevant markets? The answers are disastrous, for no one knows for sure. Nevertheless, it has been argued that factors like conflicts of interest, entry barriers, availability of data, economies of scale, economies of scope, unilateral effects, multi-homing and market tipping shall be strictly accounted for, in addition to market power and product/service prices, for determining relevant markets and for judging anti-competitive effects,⁶⁹ and the smallest of concern regarding negative future ramifications shall evoke harsh measures.

The decision of the Commission for allowing Microsoft and LinkedIn merger pursuant to some preventive covenants for avoiding anti-competitive effects of the same is highly commendable. However, in today's scenario, digital platforms are equipped with highly efficient antitrust legal teams to figure out ways of surpassing the antitrust scrutiny. All anti-competitive effects and ramifications of an activity cannot be foreseen by the Commission. Google's applications still come pre-installed with all android devices and there are rare chances of consumers downloading other applications belonging to Google's rivals. These are sheer realities and shall not be tolerated merely for the reason that a digital entity lacks dominant market power in a particular relevant market. Therefore, the approach should be of stern condemnation of activities having existing or potential anti-competitive effects, as opposed to leniency.

V. SUGGESTIONS AND CONCLUSION

Platforms in digital markets enjoy numerous benefits over the firms operating in physical markets. The delineation of relevant markets for digital platforms has proved to be one of the biggest challenges for antitrust authorities. The same has been done on the basis of the factors that are largely used to delineate relevant markets for traditional brick and mortar world. However, the present scenario calls for further considerations. Antitrust matters shall be seen in light of the Unilateral Effects Theory, in a strict and not lenient manner, so as to determine whether there is incentive to increase prices of products pursuant to merger of digital platforms providing highly differentiated products and the relevant market shall be defined in light of this analysis. Specific behavioural studies shall be conducted in all antitrust matters for determining the tendency of single-homing or multi-homing and direct or indirect network effects. Economies of scale and economies of scope enjoyed by a platform shall also

⁶⁹ Lina M. Khan, *Amazon's Antitrust Paradox*, 126 YALE L.J. 710, 713 (2017).

be taken into account while determining its market power in a relevant market. Any possibility of gatekeeper effects or high entry barriers as a result of an activity shall be strictly dealt with, unlike the WhatsApp Pay case. Further, leveraging, foreclosure, bundling and tying shall be strictly condemned for big digital market platforms. Even if there is some degree of bundling or tying, as evident in the WhatsApp Pay case, the same shall be strictly disallowed. All the aforesaid factors shall be thoroughly analysed in digital markets and even the slightest possibilities of anti-competitive practices in the near future shall be strictly condemned.

There is a dire need to somewhat shift back to the Harvard School approach when it comes to dealing with matters involving digital markets. The extreme uncertainty that digital markets are tainted with calls for the antitrust authorities to practice strictness in deciding matters. The antitrust authorities need to re-think the objectives of competition law, for consumer welfare shall be one of the objectives, and not the only objective of the law. There is a need for antitrust authorities to assume some power with regards to correcting the market structure. It is high time to think for the long-run and the challenging times to come, rather than sticking to the current approach of assessing anti-competitive activities in the future with utter disregard to future possibilities. The law needs to be continuously updated in light of the behavioural tendencies of consumers, as and when innovations hit the market. At this juncture, the antitrust authorities are required to adopt a preventive, rather than a punitive or curative approach, not necessarily for all markets in general, but definitely for digital markets in particular. After all, the future completely lies in the hands of digital platforms of the present.