SELF-PREFERENCING AND COMPETITIVE DAMAGES: A FOCUS ON EXPLOITATIVE ABUSES

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Self-Preferencing and Competitive Damages:  
A Focus on Exploitative Abuses* 

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Abstract 
Conceived as a theory of competitive harm, self-preferencing has been at the core of recent  
European landmark cases (e.g., Google Android, Google Shopping). In the context of EU  
competition law, beyond the anti-competitive leveraging effect, self-preferencing may lead to  
vertical and horizontal exclusionary abuses, encourage exploitation abuses, and generate  
economic dependence abuses. In this paper, we aim at characterizing the various forms of self- 
preferencing, investigating platforms’ capacity and incentives to do so through their dual role,  
by shedding light on the economic assessment of these practices in an effects-based approach.  
We analyze the different options for remedies in this context, by insisting on their necessity,  
adequacy, and proportionality. 

Keywords  
self-preferencing, antitrust, regulation, European Union competition law, exploitative abuse,  
Digital Markets Act  

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Conceived as a theory of competitive harm, self-preferencing has a specific status in European Union competition law. This practice underpins the Commission’s decision in Google Shopping, which was issued by the European Commission (the Commission hereafter) in June 2017.1 This decision was upheld by the EU General Court in November 2021.2 Google was charged with privileging the results of its Google Shopping price comparison service over competing comparators and applying only to the latter a demoting algorithm that had the effect of degrading their positions in the natural search results.

Self-preferencing also underpins part of the Android decision, issued in July 2018.3 In this case, the practice takes the form of pre-installation of certain Google apps. For the company, pre-installation does not prohibit the use of third-party applications, but is a way of cross subsidizing the free operating system. In the Commission’s view, this is a way of favoring its own applications at the expense of those developed by rivals.

Self-preferencing is also at the core of the European Commission’s ongoing case against Amazon,4 and a recent decision by the Italian competition authority against the same company.5 The Italian decision has something in common with the two European decisions in the Google case: Amazon is blamed for using its dominant position to advantage one of its upstream activities. The need for independent sellers to have access to the Buy Box leads them to contract with Amazon for their logistics services. Indeed, opting for Fulfilment by Amazon (FBA) would make it more likely, in the eyes of independent merchants that they would be eligible for this service, which is seen as critical to success on the marketplace. However, the more sellers entrust their logistics to the dominant platform, the less competing logisticians benefit from a sufficient volume of business to amortize their fixed costs.

Self-preferencing can be an instrument of anti-competitive leveraging, as it may come from the online search market to the price comparison market or from mobile operating systems to smartphone applications. In this case, it can be from marketplaces to supply chains. It is a question of extending dominance to an upstream market through a distortion induced on a dominated downstream market.

The objections against Amazon notified by the Commission in the fall of 2020 bring into play the same logic. Amazon has a dual role being both a marketplace bringing together independent sellers and a market player distributing its own products. Insofar as it has an informational

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1 EU Commission, AT.39740 Google Search (Shopping), 27 June 2017.
2 EU General Court, Judgment in Case T-612/17, Google and Alphabet v Commission (Google Shopping), 10 November 2021.
4 EU Commission, AT.40462 Amazon, Statement of objections, 10 November 2020.
5 Autorità Garante della Concorrenza e del Mercato (Italian Competition Authority), A528, 9 December 2021.
advantage over sellers and controls the recommendation algorithm, the platform can supplant its complementors by favoring its own offers.6

As presented in this way, the self-preferencing strategy seems to be reduced to a leveraging strategy as exemplified in EU case law by the tying practices implemented by Microsoft between the operating system and the Internet browser.7 The tools they mobilize could distinguish current self-preferencing strategies: they often rely on algorithmic manipulations that are particularly difficult to characterize. They would raise questions about the contestability of dominant positions – by encouraging competitive lock-in strategies – and problems of distortion of competition (e.g., fairness). They also appear in the draft Digital Markets Act (DMA) presented in December 2020 in its blacklisted practices (e.g., its don’ts).8 The manipulation of algorithms leading to unequal treatment of own and third party offers would be prohibited. Comparable requirements already exist in the P2B Regulation of June 2019.9

However, is self-preferencing limited to leveraging strategies for dual role platforms and should it be prohibited per se?

Self-preferencing may take forms other than leveraging, such as indirect predatory strategies and exploitative abuses. The Italian Amazon case illustrates the first strategies. Outsourcing their logistics to Amazon pushes independent sellers to opt for single homing and Amazon’s growing market share in logistics reduces the competitiveness of other logistics providers. This penalizes competing platforms in two ways. The horizontal crowding-out effect is indirect: it is induced by the reduction in the number of sellers and by the increase in costs and reduction in logistics performance. Firstly, sellers who have entrusted their logistics to the dominant platform have a greater tendency to opt for single homing in order not to duplicate costs. Secondly, competing logistics companies, deprived of an increasing share of traffic, experience diseconomies of scale and scope, and will be increasingly expensive and less efficient. This leads to a reduction in the overall performance of competing marketplaces and thus reduces

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their attractiveness to both independent merchants and consumers. Therefore, self-preferencing can also be a tool for indirect horizontal foreclosure.

A second consequence involves exploitative abuses. The concept of exploitative abuse is specific to EU competition law. The manipulation of algorithms by the platform forces its partners to enter into contracts to improve their visibility or to subscribe to ancillary services for the same purpose. This results in wealth transfers to the platform.

Consequently, self-preferencing can lead to vertical and horizontal exclusionary abuses, encourage exploitation abuses, and generate economic dependence abuses. However, how would this strategy be characterized in economics and legal terms? First, vertical integration is not always costly in terms of welfare. The fact that a company integrates upstream or downstream stages of the value chain can be beneficial or harmful to consumers, depending on the specific circumstances. A case-by-case analysis is therefore necessary. Second, from a legal point of view, how should self-preferencing be tackled? Should it be analyzed in terms of leveraging? If so, should access to the downstream platform be considered as having indispensable characteristics that would enable to activate the essential facilities doctrine? On the contrary, should one consider that it is up to a dominant undertaking not to distort competition through its behavior on upstream markets? It would therefore be required to ensure equal treatment of all users.

The Google Shopping judgment of the EU General Court illustrates these issues: legal qualification and the balance of effects. Very significantly, the Court does not use the term of self-preferencing. On the contrary, in the Draft DMA, the prohibition of self-preferencing fall under the category of “obligations for gatekeepers susceptible of being further specified,” whereas some scholars such as Luis Cabral and his coauthors even propose to black-list it.

10 For further details on exploitative abuses, see Bruce R. Lyons, The Paradox of the Exclusion of Exploitative Abuse (2007), https://ssrn.com/abstract=1082723. Published in The pros and cons of high prices, Swedish Competition Authority, 2007. “[the firm] might directly harm its customers: for example, by raising prices or limiting its effort to lower costs or develop new or better products. This is known as an exploitative abuse”. For an application of the concept to digital markets and to the protection of consumers against discriminatory prices, see Marco Bottà & Klaus Wiedemann, To Discriminate or not to Discriminate? Personalised Pricing in Online Markets as Exploitative Abuse of Dominance, 50 European Journal of Law and Economics 381–404 (2020). This reference is more consumer-oriented but comparable personalization strategies also apply in P2B relationships.


12 Luís Cabral et al., The EU Digital Markets Act: A Report from a Panel of Economic Experts (2021). Regarding the United States, the American Innovation and Choice Online Act of 11 June 2021 also proposes to prohibit discriminatory conduct by dominant platforms, including a ban on self-preferencing. The bill would
How to deal with such practices that may under some conditions be both discriminatory and welfare enhancing?

Our purpose consists in characterizing these practices and providing illustrations with European examples, investigating the issues of the platforms capacity to do so (mainly through their dual role) and what could be their incentives, shedding a light on the economic assessment of these practices in an effects-based approach relying on industrial organization literature. Eventually, we aim at analyzing what could be the remedies to be proposed in the context of EU competition law enforcement, by insisting on their necessity, adequacy, and proportionality.

I. How to characterize self-preferencing?

In this section, we aim to describe the different forms that self-preferencing strategies can take (see Figure 1 below for a summary). For a dominant player, self-preferencing consists in generating biases that impair the process of competition by the merits on a related market. The EU General Court in the Google Shopping case characterizes the abuse through the recourse to methods different from those governing “normal competition” and that hinder the maintenance of the competition in the market at stake. Concisely, in a typical self-preferencing case, the abusing player is a dominant operator in a downstream market. It can be a marketplace, an operating system, a search engine, a recommendation algorithm, etc. The common feature lies on an open nature to third party services.

The dominant player can be only active in this downstream market or can be vertically integrated (in such a circumstance, it has a dual role). In an ecosystems-based perspective, the more open and the more neutral a platform, the higher its attractiveness for users and the possible valorization of internet traffic. If a platform’s business model is only grounded on data commercialization, the platform has no incentive to discriminate among business users (e.g., as independent sellers in a marketplace, app developers in a mobile operating system, hotels in a booking platforms).

The incentives may change as soon as the platform’s remuneration comes from both the data extracted and commissions paid by platforms’ users. In such a two-sided setting, it can be profitable to distort recommendation algorithms’ results to maximize the commissions paid. It can also make sense to promote periodically some users to foster upstream competition.

prohibit “covered platforms to favor their own products or line of businesses in a manner that materially harm competition.”
Squashing (or audience dispatching) can be profitable for a platform\textsuperscript{13}. For instance, in the advertising market, maximizing revenue from the bid value would not be sustainable in the long run as the whole “ecology” of the platform must be considered. The platform has an interest to maintain an effective competition in auctions by periodically providing an advantage to some bidders. It provides them incentives to stay on the platform, it opens a larger set of proposals for users, and it exerts a pressure on the other bidders.\textsuperscript{14} Such a strategy is based on an ad selection not only based on the bid value but also on an expected click-rate. This last one is used to assess the quality of the results. Indeed, the attractiveness of the search engine for users could be reduced if the ads displayed were of insufficient quality or of insufficient match with the preferences of the users. Maximizing profits on one side of the activity (related to auctions on sponsored links associated to keywords) can lead to low relevance results or poor-quality experiences for users on the second side of the activity. A possible loss of users’ traffic would weaken the business model twice as much: user disaffection would reduce the data flows that the platform can exploit, and a reduction in the number of users would negatively affect the level of auctions. Consequently, there is a theoretical gain associated to a distorted competition. In a self-preferencing based scenario, the distortion also aims at encouraging the disadvantaged bidders to increase the value of their bids to increase their probability to be selected. This can result in an exploitative abuse.\textsuperscript{15}

Consequently, SP strategies may take both the form of exclusionary and exploitative abuses. The EU Amazon and Google Shopping and Android cases illustrate the use of self-preferencing to exclude competitors from upstream markets through algorithmic manipulations or contractual provisions imposed to access to the ecosystem. Here, self-preferencing is seen to implement leveraging strategy by impairing competitors’ access to market. Such an impediment strategy is made easier through two channels. A first one is an asymmetrical access to information that the EU Commission’s statement of objections in the Amazon case illustrates. The platform can accumulate data on the offerings and customers of its complementors and benefits from complete and asymmetric information. The capacity to clone these competing offerings is combined with the one to promote its own offer to their detriment, through for instance demoting strategies or delisting. Several strategies can be implemented ranging from


biased rankings (search and recommendations), discriminated information flows, or even targeted price discrimination (through commission rates for instance).

An example of self-preferencing strategies that can be implemented for smartphone apps is provided by Ariel Ezrachi and Maurice Stucke. They adapt the innovation diffusion model developed by Rogers (2003) to show as dark patterns can be used by the gatekeeper to promote its own app and to deter the adoption of the competing ones. As defined by Luguri and Strahilevitz, dark patterns are user interfaces whose designers knowingly confuse users, make it difficult for them to express their actual preferences, or manipulate them into taking certain actions contrary to their own interests. To sum up a dark pattern can combine bad nudges and bad sludges. The algorithmic manipulation may push a given app and impede the capacity of an alternative one to access the market, whatever their respective merits. Such algorithmic tricks can be implemented for each step of the adoption process (knowledge, persuasion, decision, implementation, and confirmation). For instance, regarding the knowledge one, the platform may put forward its app and simultaneously reduce the information available about its competitors, through demoting type strategies. It can also play at the decision stage: free trials or pre-installation on one hand (e.g., nudge) and friction blocking (e.g., sludge) on the other one. The implementation of self-preferencing through digital dark patterns can be even more effective that platforms are able to implement augmented dark patterns, characterized by personalization and dynamic adjustment to users’ previous choice and observed behavior.

Platforms may have both the capacities (because of their private regulatory and architectural power over their ecosystem) and the incentives to self-prefer. Management sciences literature illustrates several patterns in which a platform can move from cooperation with complementors to competition and possibly a distorted one (refusal to access to the platform – delisting – or impaired visibility – demoting). Such dynamics can be at stake since direct sales may be more profitable than commissions or since the keystone is not satisfied about its complementor’s behavior. Such a non-cooperative approach can be implemented against poorly performing

17 EVERETT M. ROGERS, DIFFUSION OF INNOVATIONS (5 ed. 2003).
19 Regarding the possibility to implement self-preferencing strategies by reducing the capacity of complementors’ products to be accessible for users, see the widget case (Dreamstime.com, LLC v. Google, LLC, 2019 WL 341579 (N.D. Cal. Jan. 28, 2019) as described by Erik N. Hovenkamp, The Antitrust Duty to Deal in the Age of Big Tech, YALE LAW J. (2022).
complementor but also against a business partner that refuses to contract for ancillary services or to single-home.

Such an incentive to self-prefer illustrates specific self-preferencing strategies. It covers indirect exclusionary strategies and exploitative ones. The indirect exclusionary strategy consists in forcing a business partner to opt for a service to leverage its market position not on the relevant market of the complementor but on a vertically related one. For instance, if maximizing its own chance to “win the Buy Box” supposes to opt for an FBA (fulfillment by Amazon), an independent seller can rationally decide to contract with Amazon. It can be efficiency-enhancing for both trading partners and eventually for consumers. However, it can have significant adverse effects on other market players: competing logistics services and competing marketplaces. The higher the share of Amazon marketplace sellers opting for its own logistic service, the more difficult for competitors to amortize their fixed costs and to guarantee an appropriate quality of service. Such exclusionary effects can also be at stake for competing marketplaces. First, independent sellers can be deterred to multi-home to the extend it might lead them to maintain alternative logistics chain to FBA for a marginal share of their sales. Second, the logistics services providers might increase their price to the detriment to small marketplaces to recoup a part of their fixed costs resulting from the traffic drop induced by Amazon strategy.

Eventually self-preferencing can be also a way for the dominant platform to credibly threaten its complementors. As these ones are exposed to a second line injury risk through price discrimination or ranking demoting, they might be obliged to accept unbalanced contractual terms leading to excessive data extraction (favoring future market foreclosure) or wealth transfer (through payments for ancillary services as data analytics or pay for prominence in ranking schemes). The more significant the platform market dominance and the easier its possibility to thwart its own algorithms, the higher the pressure on complementors. The possibility to implement self-preferencing strategies put complementors in a situation of economic dependence from which the platform may abuse. It can have both the incentives and the capacity to do so as Figure 1 illustrates.
II. Economic Conditions for Exploitative Abuses through Self-Preferencing

As argued at the end of the preceding section, an economics’ perspective expects marketplace providers to engage in self-preferencing strategies if two conditions are met: (i) they have the ability/capacity to effectively do so, and (ii) they experience incentives to profitably employ self-preferencing. Within the first condition, the technical ability is easily given as soon as a service has a digital marketplace character or otherwise controls access to information and/or information flows, meaning the marketplace technically acts as a gatekeeper.\(^{22}\)

The economic ability depends on the probability that exploited complements or consumers will leave the marketplace or significantly reduce their activity in it. A gatekeeper who employs self-preferencing strategies must pay a price for doing so.\(^{23}\) Complements like business users of a platform (i.e., sellers on a marketplace) are disadvantaged by the self-preferencing of the marketplace provider (reduced profit options, loss of trust) and, therefore, less willing to contribute to the platform. However, complements contribute value to any marketplace service and enhance the attractiveness of the ecosystem.\(^{24}\) Due to indirect network effects and one-stop shopping preferences, reduced complementor activity decreases the attractiveness of


the service and decreases traffic on the platform – and, moreover, strengthens competing marketplaces. This will harm profits from the intermediation business (irrespective of the specific payment and business model), representing the downside of the self-preferencing trade-off (see Figure 2). A similar mechanism relates to ranking bias as a specific self-preferencing strategy. If items are ranked to promote own upstream goods instead of providing a ranking according to the best possible (data-based) estimation of consumers’ preferences, then consumers are confronted with a sub-optimal ranking service, which in turn reduces their willing-to-pay (or willingness-to-use) and, again, decreases traffic on the platform.25

![Figure 2. The Self-Preferencing Trade-Off](image)

The way that the reactions of complementors and consumers to self-preferencing strategies is depicted in Figure 2 rests on the assumption that neither complementors nor consumers immediately penalize any self-preferencing by fully withdrawing their participation. Instead, with increasing self-preferencing complementors and consumers will gradually and incompletely leave the service and/or reduce their activity. The reasons for this assumption may be (a) imperfect knowledge about self-preferencing and (b) lock-in effects.

(a) Due to imperfect transparency and asymmetric information, complementors and consumers may not immediately realize that self-preferencing strategies are at play. Consumers are rather likely not to realize biased rankings unless the bias becomes

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substantial, and complementors may suffer from asymmetric information and from the lack of transparency aggravating the difficulty to detect self-preferencing.

(b) Even if self-preferencing strategies are known or sufficiently transparent/obvious, consumers and complementors may not immediately withdraw their activity. If the self-preferencing service is sufficiently important for the business of the complementors or the demand of the consumers, then staying on the marketplace may still be better than leaving (lock-in effects). The most obvious case is a marketplace monopoly, in which case complementors or consumers cannot organize their economic activities without the marketplace monopolist. However, economic dependence on a marketplace provider can arise much earlier than dominant positions or even monopoly powers.

Furthermore, lock-in effects may be rooted in prohibitive switching costs, (strategically) blocked inter-operability between alternative services, exclusivity agreements and similar contractual clauses, etc. In essence, whenever competition intensity among providers of similar marketplaces is low, lock-in effects are likely to be substantial.

In summary, the economic ability to self-preference increases with a decreasing probability of detection (by the disadvantaged complementors and consumers) and with increasing lock-in effects.

While the ability to self-preferencing is a necessary condition for this phenomenon to occur, it requires incentives for companies to engage in self-preferencing strategies to be actually relevant, meaning the company must retrieve a certain benefit or profit from self-preferencing. Quite obviously, to benefit from self-preferencing, there must be some second good to the marketplace services that can be self-preferred over competitors’ goods. In other words, a dual role situation sets incentives to produce self-preferencing: if a marketplace service provider also runs a shop on this digital marketplace, then the provider experiences incentives to implement measures and instruments that steer the consumers away from the shops of (upstream) competitors and towards the own shop. Similarly, if marketplace service providers also

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26 See, for an analysis, Oliver Budzinski, Sophia Gaenssle & Nadine Lindstädt-Dreusicke, Data (R)Evolution – The Economics of Algorithmic Search & Recommender Services, in HANDBOOK OF DIGITAL BUSINESS ECOSYSTEMS (Sabine Baumann ed., 2022).


30 For ways how this can be done, see section I “How to characterize self-preferencing?”
produce the goods or the content that is sold on this marketplace, then they experience incentives to distort and restrict competition on the upstream goods’ market by driving demand away from competitors’ goods/contents and directing them towards the own goods/contents. The additional revenues from increased sales of the own upstream good/content are the pay-out for implementing self-preferencing strategies (see the curve profits from self-preferencing in Figure 2).31

Vertical integration is the straightforward way how such a dual role situation comes into play. If providers of a digital marketplace (or any other ranking services, such as search- or recommendation-based) are vertically integrated into the upstream market stage of shops or goods/contents, then they will try to maximize the combined revenues from (i) the downstream marketplace service and (ii) the upstream goods/content sales. Thus, the self-preferencing trade-off between (i) revenue losses on market stage and (ii) revenue increases on market stage becomes a matter of internal calculation within the vertically integrated company. If an increase in self-preferencing yields a higher additional marginal revenue increase in the upstream market than the absolute value of the marginal revenue decrease in the downstream market, then the additional win outdoes the additional loss, and the integrated company will profitably produce self-preferencing (field I in Figure 3). By contrast, if an increase in self-preferencing yields a smaller additional marginal revenue increase in the upstream market than the absolute value of

31 Figure 2 assumes a standard graph based on increasing marginal costs. However, a different slope of the graph or even the extreme case of an exponentially increasing revenue do not change the principal nature of the trade-off as depicted in the figure.
the marginal revenue decrease in the downstream market, then the additional win falls short of the additional loss and the integrated company will rationally not produce self-preferencing (field II in Figure 3). The size and location of fields I and II as well as the optimal self-preferencing point depend on (i) the probability of detecting self-preferencing, (ii) the degree of lock-in effects, and (iii) the revenue structure of the upstream good – and thus will differ from case to case. Notwithstanding, the tradeoff model also shows that imperfect self-preferencing is in many cases more likely the optimum than perfect (maximal) self-preferencing.\textsuperscript{32} Thus, exploitative abuse is clearly a relevant case.

Vertical agreements are an alternative institutional arrangement that yields similar incentives as vertical integration. Thus, the same reasoning holds for contracts between a marketplace service provider and an upstream goods/content-seller (vertical agreements) or similar arrangements of vertical cooperation (vertical agreement surrogates). There is one additional variable, though, which relates to the perfectness of the common profit maximization if mutual information and transparency is not perfect and/or power asymmetries influence the allocation of additional revenues. For these reasons, the situation of a vertical agreement is less stable over time than vertical integration, which may somewhat soften the self-preferencing incentives because the downstream service provider will not want to become dependent on the upstream company and consider that he may still need the upstream competitors as complementors in the future. At the same time, this could favor exploitative abuse through imperfect self-preferencing over exclusionary abuse through self-preferencing.

Furthermore, the literature provides insights on factors promoting the use and extent of self-preferencing strategies beyond the fundamental self-preferencing trade-off (discussed above in section II). For instance, these are:

- higher market power in one of the two market stages.\textsuperscript{33}

\textsuperscript{32} Maximal self-preferencing is optimal if the absolute values of marginal revenue increases in the upstream market are permanently higher than the absolute values of the marginal revenue decreases in the downstream market, for instance, because the former is exponentially increasing (with sufficient slope) or the latter is zero (= no consumer is turning away because of self-preferencing (i.e. in an essential facility monopoly situation) and/or no complementor is reducing beneficial activity in the ecosystem).

- larger insensitivity of consumers to biased rankings, i.e., lower bias elasticity of demand.\textsuperscript{34}
- the exclusive existence of essential “superstar” or “must-have” content/goods because then consumers may find it impossible to avoid the biasing marketplace service.\textsuperscript{35}
- smaller quality differences between the goods/contents from the dual role marketplace provider and the non-integrated third-party sellers because consumers are likely to find it more difficult to detect bias.\textsuperscript{36}
- more saturated or more mature markets.\textsuperscript{37}
- more or more likely options to personalize subscription prices (if they exist).\textsuperscript{38}

The more of these characteristics are given and the higher the extent of that is, the higher is the probability of the occurrence of potentially harmful self-preferencing accompanied by scope for exploitative abuse.

\section*{III. Welfare Effects of Exploitative Self-Preferencing}

The question \textit{if} and \textit{when} self-preferencing strategies cause negative welfare effects motivates a number of recent papers in economic theory.\textsuperscript{39} Andrei Hagiu, Tat-How Teh and Julian Wright directly address this topic by asking: should platforms be allowed to sell on their own marketplaces?\textsuperscript{40} To answer this question, they model an intermediary that runs a digital marketplace for third-party seller products and can choose to additionally act as a retailer himself, i.e. adopting a dual role. If the intermediary adopts a dual role, the products sold under

\begin{footnotesize}
\begin{enumerate}
\item Andrei Hagiu, Tat-How Teh & Julian Wright, \textit{Should Platforms be Allowed to Sell on their Own Marketplaces?}, RAND J. ECON. (2022).
\end{enumerate}
\end{footnotesize}
his own retailer-name are positioned both above and below the goods of the third-party sellers. Their analysis shows that the intermediary experiences strong incentives to adopt a dual role. If the intermediary does so, the margins of the third-party sellers are squeezed (which could be interpreted as an indication for exploitative abuse although the authors do not pursue this route). Furthermore, Hagiu et al. look deeper into the welfare effects of different interventions into this theoretical market. Banning dual role altogether leads to welfare decreases but only if those third-party goods that are superior to the ones of the intermediary are not available through the service anymore because of the dual role ban. For instance, this may happen because the intermediary now fully concentrates on the pure retailer model (and does not offer a marketplace anymore). Otherwise, a dual role ban is welfare-increasing. In the model of Hagiu et al., self-preferencing can happen through two ways: (i) ranking bias and (ii) exploiting information advantages (here: by imitating successful third-party goods, thus reducing the innovation incentives for them). Their analysis shows that banning self-preferencing via ranking bias is always welfare-increasing. Alexandre de Cornière and Greg Taylor further show that weaker interventions like transparency policies improving consumers’ knowledge about the bias yield ambiguous results. By contrast, limiting the imitation of superior third-party goods is welfare-increasing if innovation is cost-efficient. Both interventions are superior to the ban of the dual role (which in Hagiu et al.’s model – due to its assumptions – effectively ends in a de facto ban of the marketplace model itself which drives this result). In summary, exploitative abuse of third-party margins at the expense of welfare are likely to occur under most self-preferencing scenarios.

In a comparable modelling scenario, Yusuke Zennyo shows that self-preferencing of a dual role marketplace provider may enhance welfare if the third-party seller expansion effect through

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41 For an application to Amazon’s incentives to enter a complementor’s products space, see Feng Zhu & Qihong Liu, *Competing with Complementors: An Empirical Look at Amazon.com*, 39 STRATEG. MANAG. J. 2618–2642 (2018). Among others, Amazon is found to be less likely to enter product spaces that require greater seller efforts to grow, suggesting that complementors’ platform-specific investments influence platform owners’ entry decisions.


a lowered commission price\textsuperscript{46} outweighs the third-party seller reduction effect because of their loss of profitability as a consequence of being exploited by the dual role marketplace.\textsuperscript{47} The crucial point here is that the additional profits from increased upstream good sales are invested into enlarging consumer participation of the platform by lowering commission prices for third-party sellers, so that overall lower prices attract more consumers. Thus, non-competing complementors enjoy benefits here (a bit like umbrella effects), whereas competing complementors are exploited. Nevertheless, as Yuta Kittaka and Susumu Sato emphasize, whenever profits from commission revenue are relevant to the marketplace provider, dual role marketplace providers’ incentives to lower commission prices are alleviated as self-preferencing through ranking biases allows to profitably maintain high commission prices because of the market-segmenting effect.\textsuperscript{48} However, if the assumption of strict marketplace monopoly is relaxed, incentives to maintain high commission prices are reduced.\textsuperscript{49} Notably, the models reported here do not include the option of using (discriminating) commission fees as an instrument of self-preferencing (i.e., discriminatingly increasing commissions for goods competing to the own upstream goods) like it is alleged in the cases of Spotify versus AppStore and Epic Games versus AppStore. In summary, Kittaka and Sato find that structural separation (banning the dual role) is more beneficial to competition and welfare than “just” prohibiting self-preferencing behavior.\textsuperscript{50} Simon Anderson and Özlem Bedre-Defolie further add to the analysis of the role of commission prices by introducing percentage commissions on third-part sellers’ turnover as well as allowing for, inter alia, endogenous entry, a competitive fringe and changing product variety.\textsuperscript{51} Their analysis shows that dual role marketplaces lead to higher commission prices for third-party sellers, less product variety, and overall decreasing consumer welfare. In line with Hagiu et al., they conclude that banning dual roles is beneficial if the

\textsuperscript{46} Note that charging commissions to third-party sellers on the marketplace is not the only source of income for a digital marketplace and is not always set above zero. Databased including advertising-based revenues may be of equal or dominant importance, i.e., streaming marketplaces like Spotify selling consumption data analyses upstream to the music producing industry or YouTube relying predominantly on databased targeted advertising. See, inter alia, Oliver Budzinski, Sophia Gaenssle & Nadine Lindstädt-Dreusicke, \textit{Data (R)Evolution – The Economics of Algorithmic Search & Recommender Services}, in \textit{HANDBOOK OF DIGITAL BUSINESS ECOSYSTEMS} (Sabine Baumann ed., 2022).


dominant company reverts to being a pure marketplace therefore but harmful if it switches to a pure retailer model.

Altogether, the literature (which is still young and research is ongoing) shows that self-preferencing by dual role marketplace providers almost always leads to an exploitation of third-party sellers (without perfect foreclosure of the market). It identifies scenarios where this increases consumer welfare and such where it decreases consumer welfare. The welfare-increasing scenarios appear to require more ambitious assumptions (in particular that (i) the own upstream goods are universally better than the third-party seller products, (ii) no negative innovation incentives for third-party sellers result from margin squeezing, and (iii) a market expansion effects results from self-preferencing), though, and seem to be less appropriate to generalize. Especially, the “danger” of losing the presence of any digital marketplace, which drives many of the scenarios where dual roles increase welfare, appears to be unrealistic given the substantial number of digital marketplaces – general ones as well as specialized ones like streaming marketplaces of app stores – and the ongoing entry dynamics. Therefore, the presumption that dual role self-preferencing involves harmful exploitative abuse is generally supported.

Ultimately, the practice of self-preferencing can lead to two types of effects. The first effect leads to leveraging on new markets and this effect is not anticompetitive per se. The second effect deals with a strategy of discrimination. Self-preferencing can lead to crowding out effects vis-à-vis upstream competing platforms, or vis-à-vis business partners that are not exclusively independent sellers. This is an exploitation abuse at the expense of independent sellers who are commercially dependent on the platform to reach their consumers. This dependency can also be seen from the perspective of the multi-sided market literature. Self-preferencing forces firms to engage in single homing (being active on only one platform). However, single homing does not promote competition, for instance because of switching costs, and favors the economic dependence of independent sellers on the platform.

**IV. From Competition law to Regulation of Big Techs: How to Tackle Self-Preferencing**

What results from our analysis of self-preferencing practices by a dominant platform is that the welfare effects of such a practice are far from obvious and may lead to exploitative abuses by the gatekeeper. One should assess the competitive balance of self-preferencing in the light of the characteristics discussed in the previous sections.
In recent years, platforms’ increasing market power has led to a series of anticompetitive cases in the digital arena (see Table 1 in Appendix). The European Commission has focused its attention on how to tackle gatekeepers’ behaviors, either in terms of market power or in terms of imbalances in the relationships between third-party sellers and intermediaries. In this section, we outline the ongoing European legislations. We then propose and discuss a series of possible options to address self-preferencing. If competition authorities wish to assess self-preferencing practices and their potential remedies, the functioning of the algorithms that lead to self-preferencing as well as the data collection methods on which these algorithms rely are crucial. The reviewing process of such cases can then be lengthy and fail to capture the intrinsic dynamics of the issues at stake in the digital space. Thus, one option was to build regulatory instruments adapted to these new challenges. As mentioned in the introduction, the EC proposed the creation of a Digital Markets Act (DMA) with the aim to restore the competitive balances between gatekeeping platforms and new market entrants.

**Platform-to-business relations regulation.** In 2019, the EC introduced a regulation on platform-to-business relations (P2B) aiming to promote fairness and transparency for business users of online intermediation services. The law specifies conditions to improve the transparency on potential restrictions, suspension, and termination of contract, ranking, ancillary goods and services, and differentiated treatment. For instance, the regulation

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53 In several European competition authorities, expert cells dedicated to the digital economy have been created. See, for instance, the French experience in which the competition agency launched a digital economy unit (“The Autorité creates a digital economy unit,” January 9, 2020, https://www.autoritedelaconcurrence.fr/en/press-release/autorite-creates-digital-economy-unit).


55 Alternative reforms exist but there are outside of the scope of this paper. Among others, as defended in a report by Jacques Crémer and his coauthors, one possible solution for reform would be to reverse the burden of proof in favor of the competition authority, or in other words, to “impose on the incumbent the burden of proof for showing the pro-competitiveness of its conduct.” Until now, it is up to the competition authorities to show that an anti-competitive behavior is effective. In the case of dominant platforms, they could be asked to show that their behavior does not harm the various third parties, especially the consumers. This solution also has the merit of relieving the authority’s investigation and analysis work. See *Jacques Crémer, Yves-Alexandre de Montjoye & Heike Schweitzer, Competition Policy for the Digital Era* (2019).


57 Unilateral termination, lack of information on termination, or retention of data related to business user were, among others, examples of what complementors may have experienced from platforms behaviors. For further instances, see the survey conducted for the EC, *Business-to-Business relations in the online platform environment*, European Commission, FWC ENTR/300/PP/2013/FC-WIFO Final Report, 2013. See, also, the public questionnaire for the 2018 Evaluation of the Vertical Block Exemption Regulation, Amazon and the growth in online marketplace sales, Expert Report by James Thomson Partner, Buy Box Experts, Euclid Law, May 2019.
specifies that “providers of online intermediation services shall include in their terms and conditions a description of any differentiated treatment which they give, or might give, in relation to goods or services offered to consumers through those online intermediation services by, on the one hand, either that provider itself or any business users which that provider controls and, on the other hand, other business users. That description shall refer to the main economic, commercial or legal considerations for such differentiated treatment” (art. 7). This P2B regulation deals about reducing the third-party sellers’ economic dependence that may emerge vis-à-vis gatekeeping platforms. When competition authorities address abuses of dominant position, the consumer welfare criterion matters, while when assessing situation of economic dependence, the test should assess the effects of the given practice on the trading partners.58

The Digital Markets Act proposal. The Draft DMA attempts to fill the gaps identified above. The proposed draft is prescriptive about what can and cannot be done. The legislation is expected to be approved in 2022. Competition authorities intervene mainly ex-post and their essence is not about regulating a sector ex-ante,59 even though the Draft DMA proposes monitoring and regulatory powers to better serve competition authorities to deal with digital issues.

First, the Draft DMA defines criteria to delimit the set of monitored platforms, essentially those that would have the “gatekeeper” status.60 Second, for these platforms, it reinforces the authorities’ control possibilities and put some obligations (Art 5. blacklist, Art 6. greylist). For these supervised platforms, several obligations or prohibitions are proposed ex-ante, including

“Amazon has been pressuring the most successful brands to move from a 3P model to a 1P model. The 1P model frequently is not in brands’ best interests, as Amazon will control that 1P relationship. Amazon will have a stronger bargaining position than the brand in that relationship and use it to disadvantage the brand.” (p.14).


60 Art. 3(1) lays out three criteria for designating an undertaking as a gatekeeper and Art. 3(2) provides size-based thresholds for establishing the presumption that an undertaking meets these criteria.
a ban on self-preferencing practices, and an obligation of sharing customer data from their platforms with third parties (Art. 6(1)). Third, all mergers will have to be notified (Art. 12), as well as an obligation for an audit (Art. 13). Fourth, fines will be levied at companies that do not comply with the conditions of the bill. The authorities would also have the possibility of additional remedies following a market investigation. These remedies would have to be proportionate to the infringement committed and would have to be taken, where appropriate, to ensure compliance with the legislation, where no other equally effective remedies exist. These remedies may include behavioral and structural remedies, such as the divestiture of parts of a business (para 64).

Different options for addressing self-preferencing. The Draft DMA provides a ban on self-preferencing by gatekeepers’ platforms. This is a possible solution, but one may deprive consumers of certain pro-competitive effects mentioned above. Indeed, there are several solutions to handling the practice. We outline the main ones, from the most lenient to the most restrictive.

First, a case-by-case approach can address the issue with abuse of dominance investigation. Here, a rule of reason prevails and usually following market investigations, the agency evaluates the incentives for the platform to self-prefer and the effects of the practice on third-party sellers and consumers. On the one hand, this approach is the most flexible, the case-by-case basis allows considering the effects of the practice in relation to certain market characteristics raised above (e.g., higher market power in one of the two market stages, larger insensitivity of consumers to biased rankings, and so on). On the other hand, the proceeding may be lengthy, i.e., from the start of the investigation to the final decision may take several years. However, the balance of pros and cons of such an approach is significantly determined by the specific institutional arrangements in the law, for instance, regarding the allocation of the burden of proof. If the burden of proof is levied on the competition authorities,

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61 The actual wording of Article 6(1)(d) imposes to gatekeepers the duty to “refrain from treating more favourably in ranking services and products offered by the gatekeeper itself or by any third party belonging to the same undertaking compared to similar services or products of third party and apply fair and nondiscriminatory conditions to such ranking”.


63 This option is supported by a group of economics experts. See LUIS CABRAL ET AL., The EU Digital Markets Act: A Report from a Panel of Economic Experts (2021). “We believe self-preferencing is a natural candidate for the “blacklist” of practices to be deemed anti-competitive and per se disallowed.”

enforcement against self-preferencing practices must be expected to be long and semi-successful. By contrast, if the burden of proof is reversed for powerful or gatekeeping companies, i.e., the gatekeepers must prove that their self-preferencing strategy is exceptionally not harmful to competition, fairness, and welfare, then effective enforcement in efficient time frames is considerably more likely.

Second, to avoid a lengthy procedure, the competition authority and the platform can start a negotiated procedure that quickly puts an end to the self-preferencing practice in question while avoiding a financial sanction for the platform. This is still a case-by-case approach that allows for a more flexible response but does not allow for lessons to be learned from the cases studied since there is no in-depth analysis in essence. Furthermore, this approach entails the danger of “deals” reflecting mutual interests of regulators and gatekeepers at the expense of third parties including social welfare.

Third, moving away from a case-by-case solution, one can incorporate per se rules, meaning banning the practice of self-preferencing at all or under certain conditions. The conditions could be the size of the platform in terms of turnover, its market position, or its financial value – like it is aspired to implement in Europe with the DMA. Another more direct approach could consist in eliminating any self-preferencing practice by the gatekeeping platform. Banning self-preferencing per se has its pros but also its cons (see section III). For the pros, the rule protects third-party sellers from being less visible on the platform. It certainly benefits small and mid-level providers with no popular brands. It may also benefit consumers since the average consumer is not well informed and do not usually take time to check the information. Thus, banning self-preferencing leads to reduce leveraging practices and forces platforms to be more transparent and compete on the merits of their products. For the cons, for certain type of products, the platform may offer more reliable service to consumers than other third-party sellers’ options. In a sense, the role of gatekeeper platforms may go beyond that of a simple intermediary. They may be useful for consumers who are not confident accessing digital markets. The platform applies rules and quasi-regulations on the market it creates. Those rules may benefit customers.

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65 Interim measures are an alternative instrument used in national competition law for immediate. Its use in European law could be complementary to the current policy. In the Draft DMA (art. 22), an option for interim measures is mentioned. “In case of urgency due to the risk of serious and irreparable damage for business users or end users of gatekeepers, the Commission may, by decision adopt in accordance with the advisory procedure referred to in Article 32(4), order interim measures against a gatekeeper on the basis of a prima facie finding of an infringement of Articles 5 or 6.”

Fourth, an even stricter solution would be to remove the dual role of the platform. In the economics literature, a structural ban of the dual mode is less effective intervention than behavioral remedies. In other words, any platform that organizes the intermediation of exchanges could not offer its own products that compete with the products of third-party businesses. It carries the advantage over prohibiting self-preferencing practices (see preceding paragraph) that the incentive to implement self-preferencing is eroded and, thus, enforcement would not have to deal with creative re-inventions of new types of self-preferencing. However, the limit of per se rules is that one systematically deprives oneself of any beneficial effects of self-preferencing that have been highlighted by the economics literature (see section III).

Lastly, separation is an alternative to behavioral remedies. There are two types of separation, indeed. Structural separation means operations are divided into separate independent businesses. Another less radical option includes the functional separation that allows for operations to be conducted by subsidiaries of the same company subject to a series of behavioral restrictions (walls, transfer of information, etc.). As Richard Gilbert underlines, three reasons may justify such an option: restoring competition or innovation that has been harmed by conduct or a transaction; deterring any future anticompetitive conducts; opening markets to competition and innovation. However, structural remedies are difficult to implement, and potentially harm corporate, shareholder, and labor interests. Gilbert pleads for this type of solution at the very last resort when substantial anticompetitive effects are likely to be repeated in the future absent the threat of break-up.

According to the current state of the economic analysis of welfare effects, predominantly negative welfare effects must be expected if relevant companies in a digital ecosystem apply self-preferencing practices (see section III). This can be viewed as justifying a per se prohibition of such practices even if it would frustrate some exceptional positive cases. Still, given the novel nature of digital self-preferencing and the dynamic nature of the markets involved, we tend to recommend an effects-based approach, however, with a strong but rebuttable presumption that self-preferencing by companies with gatekeeping power are anticompetitive and welfare-reducing, especially because next to exclusionary also exploitative abuses must be considered. This rebuttable presumption should take the shape of a reversal of the burden of

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67 Andrei Hagiu, Tat-How Teh & Julian Wright, Should Platforms be Allowed to Sell on their Own Marketplaces? RAND J. ECON. (2022). See also section III.
69 Particularly in the context of mergers, separation or unbundling is enjoying a new wave of popularity in the literature, though. See, inter alia, John Kwoka & Tommaso Valletti, Unscrambling the Eggs: Breaking up Consummated Mergers and Dominant Firms, 30 IND. CORP. CHANG. 1286–1306 (2021).
proof: following the principle that the exception should be proved rather than the rule, gatekeepers must provide hard evidence of the beneficial character of their self-preferencing practices (including the absence or over-compensating of competitive damages from exclusionary and exploitative abuses) if they want to escape prohibition. This can be done through the well-established instruments of competition policy in a combination of abuse control prohibiting self-preferencing by powerful companies and (a re-activated and adjusted) merger control preventing the emergence of new gatekeeping power through external growth. Next to re-invigorating vertical merger control, this would also require a broader concept of market power, covering systemic market power in digital ecosystems next to traditional market power concepts without frustrating enforcement by inefficient institutional hurdles (e.g., allocation of burden of proof also for establishing market power presumptions). Alternatively, a regulatory approach like the European DMA-proposal could serve similar ends. While maybe being more effective on the short-run enforcement side, it remains blind towards the emergence of new gatekeeping power, for instance, through mergers and acquisitions and may struggle with innovative forms of self-preferencing due to its more bureaucratic character as an administrative regulation.

### Table 1: The main European digital anticompetitive cases

(European Commission, national competition agencies)

<table>
<thead>
<tr>
<th>Type of anticompetitive practice</th>
<th>Decisions</th>
</tr>
</thead>
<tbody>
<tr>
<td>The combination of personal data</td>
<td>1. The German (2019) Facebook case</td>
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<tr>
<td>Digital platforms’ data advantage over competitors and business users</td>
<td>2. The Google Search (Shopping) case by the European Commission (2017)</td>
</tr>
</tbody>
</table>
4. The Booking cases by the French, Italian and Swedish competition authorities (2015)  
5. The Amazon Marketplace case by the British and the German competition authorities (2013)  
6. The German hotel booking cases against HRS (2012) and Booking (2015) |
| Tying-oriented practices between different services offered by digital platforms | 7. The Google Android case by the European Commission (2018)  
10. Amazon’s conduct granting benefits on its marketplace to retailers using its logistic services, Italy (2021) |
12. The Italian Google Maps / Enel case (2021)  
13. European Commission’s on-going investigation into Apple Pay |
| Other types of exclusionary and exploitative conducts | 14. The Google Search (AdSense) case by the European Commission (2019)  
15. The Apple / Spotify on-going investigation by the European Commission  
16. The Apple / App store on-going investigation by the Netherlands competition authority  
17. The ongoing Amazon/Apple case run by the Italian Competition Authority into brandgating practices  
19. The Amazon Marketplace case by the German competition authority (2019) |
Self-Preferencing and Competitive Damages: A Focus on Exploitative Abuses

Patrice Bougette, Oliver Budzinski & Frédéric Marty