



DOI:10.1145/3469104

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Economic and Business Dimensions

A European Union Approach to Regulating Big Tech

Considering a new regulatory proposal for addressing digital market competition concerns.

THE RISE OF big tech in the last two decades is remarkable. The so-called GAFAM (Google, Apple, Facebook, Amazon, and Microsoft) now top other companies in terms of world market capitalization—replacing oil, gas, and financial services. Potential abuse of market power has prompted European Union (EU) to regulate big tech.

The competitive landscape in technology markets in the 1990s and 2000s gave rise to platform markets dominated by Internet giants.^{5,6} Concerns have grown that big tech firms will abuse their market power to protect and improve their market position at the expense of their competitors, consumer choice, and welfare.

Digital platform business models rely on the interaction of different user characteristics. Business users, advertisers, app developers, and external producers of goods and services use

platform intermediaries' services to interact with individual users/consumers and vice versa. Advertisers are attracted by platforms that can efficiently match them with many consumers. App developers design software applications for app stores that put them in touch with significant demand. Consumers

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visit online marketplaces where they can find variety and quality of supply. The largest platforms become gatekeepers for given Internet activities such as online search, social media exchange, and e-commerce. They control the gates that agents of each side must pass through to reach the other side.

To reduce abuse of platforms' market power that allows gatekeepers to extract unwarranted rents, regulators in Europe have responded through antitrust investigations. In the Google Shopping case,² Google Search was fined for self-preferencing, because by promoting its own services to consumers, it distorted competition by making it difficult for competitors to reach consumers. The practice of tying Microsoft's Internet Explorer to the Windows operating system was similarly found to be anticompetitive.³ Amazon is currently under investigation for using non-public business data from independent sellers



who sell on its marketplace to benefit Amazon's own retail business, directly competing with those third-party sellers.^a Apple is currently under scrutiny for setting disproportionately high fees to businesses that seek to participate in its App Store.^b Abuse of market power can also take place at the demand side. For example, in a controversial case, Germany's General Cartel Office concluded Facebook abused its market dominance by harvesting information from its users and combining user personal data from Facebook and WhatsApp without user consent.^c

The main regulatory body in the EU is the European Commission, the executive branch of the Union. It is responsible for proposing legislation and implementing decisions and EU treaties. It is in charge of the EU market competition enforcement and it closely coordi-

ates with national competition authorities at the EU member states that have a more country-specific focus on their enforcement duties.

The European Commission announced the Digital Markets Act (DMA) in late 2020 to regulate digital platforms like GAFAM. This new approach relies on before-the-fact investigation of business practices to assess wrongdoing. DMA imposes general obligations on what platforms can and cannot do when interacting with users. It prohibits self-preferencing, imposes serious limitations on bundling and tying practices, constrains platforms from using information provided by competitors to their own benefit, restricts excessive fees for market participants, and limits gatekeepers from combining of data across platforms without an opt-out option. In addition, the DMA also specifies the obligation of platforms to allow business users and consumers to transport platform-stored data to competitor firms in a continuous and real-time manner, following the principles of the General Data Protec-

tion Regulation (GDPR). It aims in this way to reduce the great data advantage of big platforms and the resulting information asymmetries.

The DMA also defines a framework for authorities to perform their enforcement tasks more effectively by accessing data and information located at platforms' infrastructure, and examining platforms' algorithmic systems. This is an important innovation in antitrust enforcement, as investigations in digital markets, are often in "unknown territory" without access to vital objective information to properly assess the impact of the business practice under question.

The DMA ultimately makes digital markets more contestable, reducing entry costs and increasing competition and consumer welfare. Incumbent platforms have more incentives to innovate and improve the quality of their services as they feel more threatened by new entrants and smaller competitors that find sufficient market space to develop their own businesses. They contribute to the fair allocation of the created value, and reduce big platform tendencies

a Press release by the European Commission (Nov. 10, 2020); <https://bit.ly/3zaT0Gd>

b Press release by the European Commission (Apr. 30, 2021); <https://bit.ly/3g3wc3E>

c Press release by the German General Cartel Office (Feb. 7, 2019); <https://bit.ly/2RxSGjU>



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to extract disproportional rents.

But, there is room for improvement in achieving these goals. First, consumer choice and multihoming among on-line providers require frameworks that enable data portability and interoperability in practice. For this to happen, complementary rules must provide clarity and standards over effective data and information sharing. A mechanism is needed that allows free flow of data across disparate digital ecosystems, in keeping with data protection rules.⁴ The DMA must be accompanied by such a mechanism to reduce the advantages of gatekeepers.

Second, DMA's obligations could consider specifics of the gatekeepers' business models. Business practices might incorporate efficiency gains for business users and consumers depending on the model in place.¹ For example, self-preferencing is welcome if it helps users quickly reach what they are looking for or encourages better service. In general, practices associated with benefits from economies of scale and scope might outweigh potential abuse in specific cases and therefore should be allowed.

The EU's new regulatory proposal thoroughly addresses competition concerns in digital markets. It arguably leads the way for global platform regulation. Improvements in its current form and development of complementary instruments can make it the state of the art in platform regulation and an example for other jurisdictions to follow. ■

References

1. Cabral, L. et al. The EU Digital Markets Act. Publications Office of the European Union, Luxembourg, 2021, doi:10.2760/139337, JRC122910.
2. European Commission decision of 27 June 2017 relating to a proceeding under Article 102 of the Treaty on the Functioning of the European Union and Article 54 of the EEA Agreement. Case AT.39740—Google Search (Shopping); <https://bit.ly/3g0yJf0>
3. European Commission Decision of 6 March 2013 relating to a proceeding on the imposition of a fine pursuant to Article 23(2)(c) of Council Regulation (EC) No 1/2003. Case COMP/39.530—Microsoft (Tying); <https://bit.ly/2Sj5JQm>
4. Parker, G., Petropoulos, G., and Van Alstyne, M.W. Digital Platforms and Antitrust (May 22, 2020); <https://bit.ly/3v2mCCv>
5. Report of the Digital Competition Expert Panel. Unlocking Digital Competition. UK HM Treasury (2019); <https://bit.ly/2TQLGQ5>
6. Stigler Committee on Digital Platforms. Final Report (Sept. 2019); <https://bit.ly/3iysdOa>

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