WITS UNIVERSITY 100 1922 2022 | SOUTHERN CENTRE FOR INEQUALITY STUDIES

PRE-DISTRIBUTION AND OWNERSHIP

SCIS Working Paper | Number 71

PRICE DISCRIMINATION IN MERGER REVIEW IN SOUTH AFRICA: IMPLICATIONS OF RECENT CASE PRECEDENT

Rahma Leuner | February 2025

*Click **here** for an updated version of this paper*

Abstract

Mergers have the potential to give firms access to more data from which to draw insights about consumers. This may help firms to better discern which consumers are price insensitive or captive, or exhibit behavioural biases, that they can exploit by charging them higher prices or nudging them towards higher priced options. Based on recent case precedent, we believe that the transfer or sharing of data or techniques in mergers involving price-discriminating firms may be sufficient for meeting the requirement of merger-specificity without there needing to be an increase in market power. Recent local case precedent also provides insight into when mergers impact on just a small group of consumers are likely to matter. It suggests that the competition authorities in the country should be more concerned where consumers are vulnerable and where access to the services/products is particularly important to this group.

Introduction

Mergers, which are under the purview of competition authorities, have the potential to improve the abilities of firms to exploit particular groups of consumers via price discrimination practices. This is especially true within the context of big data and big data techniques. Terrell McSweeny, a former Commissioner at the U.S. Federal Trade Commission (FTC) and Brian O'Dea (also at the FTC) argued in a 2017 article that price discrimination via pricing algorithms could 'increase the chances that a given merger will harm consumers in some relevant market even if the remaining post-merger competition is sufficient to protect the majority of consumers. They recommended that competition authorities become more vigilant in examining the numerous ways in which specific sets of consumers may be harmed by mergers involving firms that use algorithmic price discrimination.

Long before the advent of the digital economy, antitrust authorities have considered the potential for price-discriminating firms to raise prices to particular captive customer groups as a result of mergers. One of the ways they did this was by defining separate price discrimination relevant markets (or market segments) and then assessing whether the merger would significantly change the market power of the merged entity in each price discrimination market even if the merger would not substantially change its market power for customers in general. For example, consumers, in general, may experience a 7–to-6 change in market structure while a subset to whom firms can charge a separate price (or offer discounts), for example, retailers in a small city, may experience a 3–to-2 merger and so be more susceptible to price rises (or reductions in discounts).

Defining relevant price discrimination markets has explicitly been accommodated in the draft US Horizontal Merger Guidelines (2023) and the European Commission (EC) Market Definition guideline (2003:11). There is also international and local case precedent in which this approach was taken. Mergers in which price discrimination markets were defined in the United States include Staples/Office Depot (1997), in which geographic price discrimination markets were defined and then later the Staples/Office Depot (2016) in which price discrimination markets based on big business customers were defined.[1] Other examples include Quest Diagnostics/Unilap Corporation (2003), Anheuser-Busch InBev SA/NV and Grupo Modelo S.A (2013), Sysco/US Foods (2015a), and Wilhelmson Maritime Services/Drew Marine Group (2018). The EC defined separate price discrimination markets in mergers involving the airline industry (Air France/KLM, 2004; United Airlines/Continental Airlines, 2010; US Airways/American

[1] In the first Staples/Office Depot merger, the FTC found that the merger had the potential to raise prices in areas in which the merging parties were both present as competitors since the merger would substantially change the market power in those regions (there would be a 2-to-1 merger in those regions).The same attempted merger was injuncted in 2016 but because of the impact of the merger on large business customers who required nationwide distribution and a particular combination of services and features, and were likely to face higher prices post-merger.

Airlines, 2014), where separate markets for premium and non-premium customers or time-sensitive and insensitive customers were considered.

Mergers also have the potential to raise prices to captive consumers even without there being an accompanying significant increase in market power facing those customers.[2] This is because gaining access to new data or techniques (the merger-specific change) has the potential to

improve firms' abilities to measure individual consumers' willingness to pay, the extent to which they are aware of and willing to purchase from their competitors, and individual behavioural biases, as well as the ability to exploit these factors. This is within the context of data becoming increasingly available and valuable to firms. In fact, recent case precedent in South Africa provides a legal basis for this approach.

Price discrimination, which involves a transfer between those who are more and less willing to pay as well as from consumers to suppliers, frequently serves to reduce inequality (firms will charge higher prices to affluent consumers than poor consumers since the latter will usually be relatively price sensitive). However, this is not always the case. Price discrimination can result in the most vulnerable facing higher prices (e.g. the sick face higher life insurance premiums, the poor pay higher data prices, those with low literacy get exploited), which could even lead to them being priced out of markets (Bleiberg and West, 2015).[3] In addition, personalised advertising strategies that target the behavioural biases[4] of vulnerable consumers can result in them facing higher prices, lower quality, and fewer choices since consumers are manipulated into purchasing what they do not need and/or at a price higher than their true reservation price at the expense of what would improve their well-being (Stucke and Grunes, 2016:55).

Mergers that improve the abilities of firms to price discriminate can therefore benefit affluent consumers at the expense of vulnerable consumers or vice versa. It is also conceivable that such mergers only present a risk to a small group of consumers whereas the majority of consumers are unlikely to face higher prices

---

[2] Market power is defined in the Competition Act as amended (2018: 18) to be "the power of a firm to control prices, to exclude competition, or to behave to an appreciable extend independently of its competitors, customers or suppliers."

[3] While the focus of this paper is on price discrimination, dynamic pricing is a similar concept (pricing differs by period rather than by consumer), which has been enhanced by the digital economy. For example, there are reports that Amazon rapidly changes its prices in response to competitors' prices and changes in demand (Barnes et al, 2023) and that Uber's prices increase when they are more vulnerable such as when their mobile devices' batteries are close to depletion, lowering the possibility of multi homing (Le Chen, 2015). It also has the potential to both improve equality (e.g. airline tickets at standard prices were previously only within the reach of wealthy consumers) or worsen it (e.g. fewer specials on non-perishable supermarket items at month-end which will likely impact on low-income consumers who live from paycheque to paycheque).

[4] Behavioural advertising strategies include the use of expensive decoys to encourage purchasing up, price steering by restricting options and varying the order of products, increasing complexity to raise search and switching costs, and scarcity marketing to reduce the likelihood of waiting and comparison shopping (Ezrachi and Stucke, 2016a: 3-5).

post-merger. This raises questions about when the effect of such a merger will be substantial enough to meet the Substantial Prevention or Lessening of Competition (SPLC) standard, which is the test that needs to be overcome to justify competition law intervention in South Africa. Based on recent case precedent, we discuss what we believe are the two main criteria that would need to be met when price increases are only likely to affect a small group of consumers.

This article is structured as follows. We first discuss the importance of data in an increasingly digital world. We then explain why we think that a transfer or sharing of data or techniques between merging parties may enhance their abilities to exploit groups of consumers and show that e South African case precedent provides for this theory of merger specificity without the requirement for significant changes in market power. We also set out that, based on recent case precedent, even where a small group of consumers would be harmed following a merger, the SPLC standard would still be met if those consumers are considered to be vulnerable and the goods/services are particularly important for this group.

Before that, it is important to clarify what this article is and is not about. It specifically examines the impact of mergers on end-consumers rather than business customers or intermediaries.[5] It is also focussed on mergers and the context of merger assessment although we recognise that price discrimination concerns can also be addressed in market inquiries and even abuse of dominance cases.[6] Thirdly the issues we raise do not pertain exclusively to digital firms (although they are more likely to raise these issues) and competition authorities should be alive to this issue outside of digital markets as well. Finally, our assessment does not imply that a consideration of the impact of mergers on different price discrimination markets is the only theory worth pursuing in mergers involving the sharing/transfer of data or techniques. There may be other theories of harm, such as exclusionary theories, some of which may be more compelling than this one. This of course depends on the precise details of the case.

The value of data in a changing economy

While data has been collected and assessed across many industries long before the advent of the digital economy (e.g. insurance, airlines, etc.), the digital economy has increased the scale, variety (including behavioural data), useability, and value of data as well as enhanced the sophistication of big data techniques (e.g. data mining, machine learning) which has enabled firms to learn much more from data than was previously conceivable (Stucke and Grunes, 2016). This has, among other things, enhanced the abilities of

---

[5] We note that some of the principles may be applicable for situation such as where customers are small businesses, however this is a topic for further research.

[6] The exploitation of particular consumers may be charged with excessive pricing under a Section 8(a) complaint. It may not be subject to a Section 9 complaint as this provision ordinarily applies to discrimination against intermediate firms rather than consumers.

firms to price discriminate among consumers at the retail level since (i) algorithms allow firms to better predict consumer willingness to pay and reduces the costs of doing so (Gal and Rubinfeld, forthcoming: 28) and (ii) consumers, unlike intermediate firms, may find it difficult to detect that they are being discriminated against (CMA, 2021; Ezrachi and Stucke, 2016a) and cannot easily negotiate (Ezrachi and Stucke, 2016b). In South Africa, consumers already receive personalised prices for mobile data via their mobile apps, and Insurer, Discovery Life, is transparent about using wellness measures through its wellness programme Vitality to determine clients' risk and premiums (Discovery, 2019). Price discrimination has even been observed in industries not typically considered to be prone to personalisation such as supermarkets where personalised supermarket discounts are linked to consumers' loyalty cards that supermarkets use to track grocery spending.

Big data is 'big' in two main ways. Firstly, it has many people in it (i.e. large population sizes). Secondly, it has lots of information about each person in the dataset (i.e. many variables) including rich behavioural data. Large population sizes allow firms to learn about unknown attributes of its current users as well as infer information about individuals not in the dataset with greater confidence. Having access to thousands of data points about customers, including valuable behavioural data in real time, allows firms to both explore more relationships between variables,many of which will not be obvious, and to develop a detailed picture of each customer for whom products can be better tailored and targeted (Stigler Center, 2019: 23). Behavioural data is especially valuable because it provides firms with information about consumers' past behaviour (e.g. search and purchasing patterns), future plans (e.g. planned holidays), and importantly the number of options consumers are aware of and prone to purchasing from.

Big data techniques such as machine learning allow firms to consistently improve the ways in which their algorithms personalise the prices and advertising strategies facing different consumers. Self-learning pricing algorithms allow firms to predict consumers' reservation prices, after which they observe their reactions and adjust predictions thereon (Ezrachi and Stucke, 2016a: 2).[7] Big data techniques also have the potential to determine prices for different consumers depending on whether customers are likely to be aware of and open to purchasing from competing firms as well as their behavioural biases (Ezrachi and Stucke, 2016b: 3). Therefore, even if there are many competing firms offering products and services, firms employing these algorithms may be able to estimate their 'market power' in relation to each consumer. This may serve to differentiate between consumers that are well informed and more poorly informed (Stigler Center, 2019: 36):[8]

[7] The reservation price of purchasers is the highest price that a buyer is willing to pay for a product.

[8] The customization offered by digital firms can also unlock considerable consumer benefits. Consumers can gain access to new products and services tailored to their specific needs, they may face lower search costs, and, again, it may serve to lessen inequality if lower prices are charged to poorer consumers (Chirita, 2018; OECD, 2018).

Machine learning applied to big data may help differentiate well-informed and sophisticated consumers or workers from poorly informed or more naïve consumers, raising the possibility of further exploitation of those least prepared to resist it.

Merger specificity as the change/transfer of data/techniques

Given the increasing value of data, we believe that the combination or transfer of data or techniques between merging parties has the potential to vastly improve the ability of firms to exploit captive consumers. In horizontal mergers, the sharing/transfer of data may improve the firms' abilities to price discriminate by increasing the sample size and by increasing the breadth of data about customers. The latter includes data from the merging parties' other businesses for which they do not have a horizontal overlap as well as assessments of how individual common customers have historically made purchasing decisions across the merging parties (e.g. how responsive common customers have been to discounts offered at one).

In vertical and conglomerate mergers, the ability to price discriminate may be enhanced where one of the merging parties has data or techniques that the other can use to better discriminate across consumers (Chen et al, 2022). Relevant new information includes new information about existing customers and/or expand the sample size to improve the accuracy of discrimination while new techniques could include the capability to implement data mining, machine learning, and artificial intelligence. For example, in the Google/Fitbit merger, Fitbit had fitness data that Google could use to strengthen user profiles and arguably better personalise advertising. A hypothetical example would be a merger between medical schemes administrators and life insurers in South Africa, where life insurers could use medical scheme's claims data to raise life insurance premiums to consumers who they learn are sick via medical aid claims data.[9]

Recent case precedent – in particular, the Constitutional Court's decision in the Mediclinic (Pty) Ltd / Matlosana Medical Health Services (Pty) Ltd (MMHS) merger in 2021 and the Tribunal's prohibition of the Draslovska Holdings A.S / Sasol South Africa Ltd merger, provides a legal basis for not requiring a change in market power to be a pre-requisite for raising the South Afrucan competition authorities' concern. The former appears to be the first case in which the ordinary SPLC standard[10] was differentiated

---

[9] The value of fitness data to insurance companies is illustrated by a 2020 dispute between Liberty Life and Discovery Health, in which Discovery Health unsuccessfully challenged Liberty Life Insurance's use of the Discovery Vitality Status for its Liberty Wellness Bonus which is part of the Liberty Plan. (High Court of South Africa, 2020)

[10] Essentially the SPLC is the same as the more broadly applied Substantial Lessening of Competition (SLC) standard in other jurisdictions.

from the typically accepted requirement of 'an enhancement of market power'. The merger between the hospitals groups would not result in a significant change in market power. Instead, the merger was prohibited on the basis that the target hospital in the merger, MMHS, charged lower tariffs than the acquiring hospital group, Mediclinic, and so patients would no longer have the option of a lower cost hospital in the region post-merger, which was particularly concerning for uninsured patients. In other words, it was the change in transfer of the strategy of higher tariffs from the acquirer to the target firm in this merger that would lead to worse outcomes for consumers, which runs contrary to one of the objectives of competition policy, to protect consumer welfare (Aproskie, 2022).

The Constitutional Court's reasoning for the delinking of the SLPC test from a significant change in market power was rooted in the wording of the Competition Act as amended (2018) itself. The Court (2021: 22) specifically found that the Competition Appeal Court (CAC), which had previously approved the merger:

> *... misdirected itself in a material respect by construing section 12A(1)(a) and (2) of the Act as requiring that a price increase post-merger be shown to be the result of the market share changes, which it termed 'enhancement of market power'. This is not the test required by the Act... All that section 12A requires in this regard is that a determination be made whether there is a substantial prevention or lessening of competition. And this is ordinarily measured with reference to a potential increase in price.*

On this basis, we believe that price increases need not be from changes in market power to present a concern to competition authorities but could stem from other factors such as a sharing/transfer of data or techniques that may enhance the ability of the merged entity to raise prices.

Recently, in February 2024, the Competition Tribunal released its reasons for prohibiting a merger between Dravlovska Holdings A.S and The Sodium Cyanide Business of Sasol South Africa Ltd (2023), which is also instructive. The transaction involved a vertical disintegration. Instead of Sasol having a monopoly upstream and downstream, the merger would result in a separate monopoly upstream (Sasol) and a monopoly downstream (Dravlovska), as Sasol would sell a downstream business responsible for the supply of liquid Sodium Cyanide to Dravlovska. There were no horizontal or vertical overlaps between the merging parties and the merger would not lead to a change in market power (from a reduction in competitive rivalry or increase in concentration). Rather, the merger was prohibited on the basis that Sasol would charge a higher market-related price for key inputs into sodium cyanide (e.g. caustic soda) to Dravlovska post-merger (previously there were lower internal transfer costs), which would in turn result in Dravlovska charging higher prices to domestic gold mining customers downstream. It was the change in market structure rather than a change in market power that would cause harm to customers.

This second merger illustrated that the approach adopted by the Constitutional Court in Mediclinic/MMHS – which was that a change in market power was not a necessary requirement for an SLPC – was not limited only to healthcare or other products and services of similar import. In fact, the Tribunal's interpretation of the Constitutional Court's decision (2021: 54-55) in Mediclinic/MMHS was*:*

we do not understand the majority judgment's approach as necessarily being limited to mergers implicating a right in the Bill of Rights....

On the basis of the aforementioned merger decisions, we do not believe that a change in market power is required from a Competition Law perspective (at least in South Africa) and so where a sharing/transfer of data or techniques for exploiting such data constitutes a merger specific change that allows price discriminating firms to exploit groups of customers, it is in line with precedent to consider this in merger assessment.

When impacts on a small group of consumers matter

As already discussed, there is international case precedent for mergers having been blocked on the basis that just a subset of customers would likely be harmed post-merger (e.g. Staples/Office Depot, 1997). There is an important question arising from this: how will mergers that negatively impact on just a small group of consumers meet the substantiality criteria of the SLPC, if at all? Again, the local case precedent on this issue over the last five years is instructive.

In particular, the Tribunal's ruling in the Mediclinic/MMHS merger (2019) determined that even though only 100-200 patients of MMHS were uninsured (just 2-4% of all patients), the impact of the merger on this group warranted prohibition. Therefore, a likely negative impact on a tiny group of consumers was considered substantial enough to meet the SLPC test and would be enough to outweigh merger-specific pro-competitive effects and efficiencies.[11]

The reasons why both tests were likely met in the Mediclinic/MMHIS merger despite only a small group being at risk is because of (a) the vulnerability of the uninsured group who would be affected (where uninsured patients did not have medical aids to negotiate on their behalf), and (b) the fundamental importance of healthcare, the fact that it is non-discretionary, and its status as a protected Constitutional right, something that was recognised by the Tribunal (2019: 47), CAC (2020a:105), and Constitutional Court (2021:42) in their respective decisions. We do not believe that the negative effect on such a small

[11] Based on Section 12(A)(1)(a) of the Competition Act, the negative impacts of the merger on some would be weighed against the overall efficiencies from the merger (which may include broad efficiencies associated with price discrimination) as well as benefits to other consumers.

group of consumers would have been considered important if non-vulnerable consumers were at risk or if the goods/services involved were of less import.

Under the traditional consumer welfare standard used in merger control, all consumers usually count the same (Stavroulaki, 2022: 120). This is even where higher post-merger prices are likely to be targeted at vulnerable consumers. In reality, price increases facing vulnerable consumers can be expected to have a far more substantial impact than equivalent price reductions facing non-vulnerable consumers (and even market expansion to the same).[12] Not only do higher prices to vulnerable groups risk them being priced out of important markets (such as safety nets like insurance) but they may also reduce their ability to afford a basic basket of goods. The notion of different effects was specifically reflected in the majority Mediclinic/MMHS decision of the Constitutional Court:

Lest we forget, to the overwhelming majority of South Africans, regard being had to our acute economic inequalities, even a 1% fuel or bread price hike probably constitutes a threat to their presumably shallow pockets and survival. And to the vulnerable group of uninsured patients it is even more so with the predicted percentage hike for health care services. It was therefore most unfortunate that the plight of the 100 or 200 uninsured patients that receive treatment from the Potchefstroom or Klerksdorp private multidisciplinary hospitals per year, was not accorded and handled, by the majority, with the necessary sensitivity and concern that their vulnerability cries out for or deserves.

The same sentiment has also been reflected in the CAC's (2020b) decision in relation to the first price gouging case in South Africa against a supplier of masks during the Covid-19 pandemic. The CCSA was reported to have argued that:

price increases which were implemented in an emergency, such as Covid 19 crisis, had a most detrimental impact on poor individuals and families, as well as small businesses, who are already the most vulnerable during such a crisis. These exponential price increases can put basic necessities out of the reach of poor people who desperately need them to protect themselves and their families, and they impose high costs on small businesses seeking to protect their employees.

And in another price gouging case against a pharmacy chain retailer, Dischem, the Tribunal (2020) noted:material price increases of surgical face masks […] would seriously impact vulnerable and poorer consumers even more. Poorer customers would have been excluded from accessing the masks by such

---

[12] The UK's CMA (2018:37) defined vulnerability to be individuals with "characteristics that can lead to greater risks of experiencing problems across a range of markets". These would include but not be limited to low-income, elderly, physically disabled, mentally unwell, and chronically ill individuals. These consumers may have low financial resilience, find switching or negotiating with suppliers challenging (including "psychological and cognitive barriers"), have few options due to low accessibility or simply be completely excluded due to these characteristics.

exorbitant increases, other customers would have spent more on these items as a percentage of their disposable income.

Based on the aforementioned decisions, our view is that the competition authorities in South Africa recognise that the impact of price increases on vulnerable consumers may have a greater effect than would be a commensurate increase in prices to non-vulnerable consumers. On this basis, the vulnerability of the group affected determines the likelihood of passing the SPLC standard, even where the group affected is a relatively small group

There are numerous examples internationally of where price discrimination has adversely affected vulnerable populations including minorities. For example, the UK's Financial Conduct Authority (FCA) found that some motor and home insurance firms targeted with price increases those consumers who were likely to renew their policies each year, disproportionately affecting older consumers and cumulatively resulted in large price increases of at least 100% (FCA, 2020: 1). Angwin et al (2015) found that the price for an online SAT (a test for college admission) preparation service in the United States varied depending on location, which resulted in Asians facing prices 1.8 times that of non-Asians regardless of income. In 2012, the Wall Street Journal reported that online office retailer Staples varied prices by area based on users' distances from rival stores, which lead to people in lower income areas facing higher prices (Valentino-DeVries et al, 2012). Based on petrol station-level data on fuel prices in Western Australia, Mariuzzo and Ormosi (2022) found that areas with lower incomes experienced larger increases in petrol stations' price margins (suggestive of price discrimination across areas) following exit (which include mergers).

There have been news reports of price discrimination entrenching the inequalities of the past in South Africa through, for example, unjustifiably higher interest rates on loans (Moosajee, 2019), and falsely being flagged for fraud (Buthelezi, 2013). The Competition Commission of South Africa (CCSA) found in its Data Services Market Inquiry (DSMI), that mobile data operators price discriminate across different consumers. Smaller data bundles (bundles which the poor can afford) were charged at exploitative Rand per megabyte prices while larger data bundles (which is in the reach of richer consumers) were considerably cheaper on this measure. The difference in prices was explained by the differences in the number of alternatives available to rich and poor consumers in the country (CCSA, 2019: 18):

> *"poorer consumers in South Africa are being unduly exploited relative to wealthier consumers. Furthermore, that this outcome is likely to be in part driven by the lack of competition in the mobile data market and the lack of data alternatives for the poor relative to the wealthy, such as fibre to the home (FTTH) and Wi-Fi in the workplace."*

In addition to consumers being vulnerable, the Mediclinic/MMHS decision by the Constitutional Court (2021) suggests that the importance of the products/services to vulnerable consumers will also help to meet the SPLC test. This case referred specifically to health as a protected Constitutional right, which elevated the impact of likely future price increases on the small group of vulnerable (uninsured) consumers. Our view is that it is probably too narrow an interpretation of the decision to infer that only rights protected by the Constitution would be required to meet the SPLC test. It was not only that health is a constitutional right, but that it is inherently important to vulnerable consumers. The substantiality threshold could also be met where products and/or services play an important role in the participation of vulnerable consumers in the economy such as financial inclusion and affordable telecommunication.

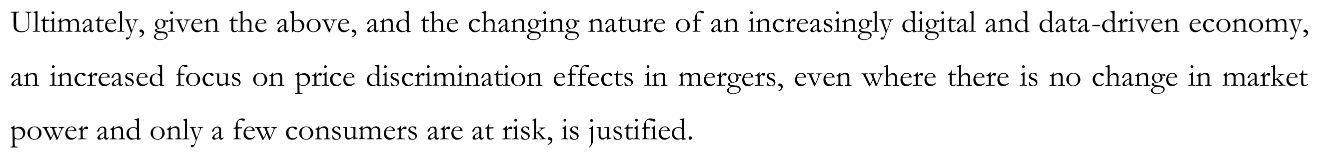
Absent vulnerability of the consumer group affected *and* the importance of the product/service to the vulnerable group, a larger subset of consumers (unlike in the Mediclinic/MMHS merger) would need to be at risk of future price increases to meet the SPLC threshold in South Africa.

Conclusion

Firms' abilities to charge higher prices to vulnerable consumers can have severe consequences in a country like South Africa, where there is extreme inequality, high poverty levels, and a history of discrimination against its majority Black population. Paying higher prices for non-discretionary items when one is living at the margin can impact on the ability of the poor to afford basic necessities and even make the necessary investments (in education, business opportunities, etc) to improve their circumstances. Therefore, assessing the impact of mergers that are likely to result in increased prices to vulnerable consumers is worth the continued and increased attention of the South African competition authorities.

We first argue that mergers may increase the likelihood of firms from raising prices to a few consumers by it increasing market power or as a result of sharing/transferring data, in a world in which data has become increasingly valuable. This is consistent with recent South African case precedent and is not limited to cases where Constitutional rights are under threat.

Our second argument is that even if a small group of consumers are likely to be harmed by a merger (while the majority will not), it is possible that the merger would still reach the threshold for substantiality as per the SLPC test. In our view, the case precedent suggests that two conditions would need to be met. Firstly, the group who are likely to suffer harm ought to be vulnerable. Secondly, the merger ought to impact on the access to particularly important services/products for vulnerable consumers.



Ultimately, given the above, and the changing nature of an increasingly digital and data-driven economy, an increased focus on price discrimination effects in mergers, even where there is no change in market power and only a few consumers are at risk, is justified.

References

Angwin J, Mattu S and Larson J. 2015. 'The Tiger Mom Tax: Asians are nearly twice as likely to get a higher price from Princeton Review', ProPublica, https://www.propublica.org/article/asians-nearly-twice-as-likely-to-get-higher-price-from-princeton-review (Retrieved 18.08.2023)

Aproskie J, 2022. The potential for a broader application of the substantial lessening of competition standard: A South African perspective. Building Blocks for an Inclusive and Resilient Economy, CUTS International.

Barnes O, Georgiadis P and Onita L. 2023. 'The rise of surge pricing: 'It will eventually be everywhere' ', *Financial Times*, 15 September. https://www.ft.com/content/d0e3bcb5-b824-414e-bfac-4c0b4193e9f0 (Retrieved 28.09.2023)

Bleiberg, J and West DM. 2015. 'Could big data lead to unfair treatment of consumers?' *Brookings Techtank*. https://www.brookings.edu/blog/techtank/2015/04/22/could-big-data-lead-to-unfair-treatment-of-consumers/?utm_source=Bruegel(Updates&utm_campaign=656e7da39bBlogs(review(11%2F02%2F2017&utm_medium=email&utm_term=0_eb026b984a-656e7da39b-278510293 (Retrieved 16.05.2023)

Buthelezi L. 2023. Medical schemes reject claim that 'racist' algorithm flags more black doctors for fraud. *Medical Brief*, 28 June.

Chen Z, Choez C, Congz J and Matsushima N. 2022. 'Data-driven mergers and personalization'. *The RAND Journal of Economics* 53(1), 3–31.

Chen L, Mislove A and Wilson C. 2015. Peeking beneath the hood of Uber. *ACM* https://www.khoury.northeastern.edu/home/amislove/publications/Uber-IMC.pdf (Retrieved 28.09.2023)

Chirita AD. 2018. Data-driven mergers under EU competition law. In Linarelli, J and Akseli, O (Eds.), *The future of commercial law: Ways forward for harmonisation*. Oxford: Hart Publishing, 147–184.

Competition and Markets Authority. 2018. Tackling the loyalty penalty: Response to a super-complaint made by citizens advice on 28 September 2018. https://assets.publishing.service.gov.uk/media/5c194665e5274a4685bfbafa/response_to_super_complaint_pdf (Retrieved 11.06.2024).

Competition and Markets Authority. 2021. Algorithms: How they can reduce competition and harm consumers. https://www.gov.uk/government/publications/algorithms-how-they-can-reduce-competition-and-harmconsumers/algorithms-how-they-can-reduce-competition-and-harm-consumers (Retrieved 11.08.2023)

Competition Appeal Court. 2020a. Mediclinic Southern Africa and Matlosana Medical Health Services v Competition Commission of South Africa. 5 February. https://www2.saflii.org/za/cases/ZACAC/2020/3.pdf (Retrieved 02.11.2023)

Competition Appeal Court. 2020b. Babelegi Workwear and Industrial Supplies CC v Competition Commission of South Africa. 18 November. http://www.saflii.org/za/cases/ZACAC/2020/7.html (Retrieved 04.06.2023)

Competition Commission of South Africa. 2019. Data services market inquiry: Final report .https://www.compcom.co.za/wp-content/uploads/2019/12/DSMI-Non-Confidential-Report-002.pdf (Retrieved 17.05.2023)

Competition Tribunal of South Africa. 2019. Mediclinic Southern Africa and Matlosana Medical Health Services. Judgement 22 March 2019. Case LM124Oct16.

Competition Tribunal of South Africa. 2020. Competition Commission v Dis-Chem Pharmacies Limited Competition. Judgement 7 July 2020. Case CR008Apr20.

Competition Tribunal of South Africa. 2023. Competition Commission v Draslovka Holdings A.S. and Sasol South Africa Ltd. Reasons 1 October 2024. Case IM139Dec21

Constitutional Court of South Africa. 2021. Competition Commission of South Africa v Mediclinic Southern Africa (Pty) Ltd and Another. Judgement 15 October 2021. Case CCT 31/20.

Discovery. 2019. 'How Discovery created life insurance that helps you live longer, and healthier'. https://www.discovery.co.za/corporate/smart-money-rewriting-rules-of-insurance (Retrieved 01.11.2023).

District Court of Colombia. 1997. Federal Trade Commission v. Staples, Inc and Office Depot, 970 F.Supp. 1066 (D.D.C. 1997). https://casetext.com/case/ftc-v-staples-inc (Retrieved 10.05.2024)

District Court of Colombia. 2013. United States of America (DOJ) versus Anheuser-Busch InBevSA and Grupo Modelo S.A.B de C.V. https://www.justice.gov/atr/casedocument/file/486311/download

(Retrieved 21.08.2023.

District Court of Colombia. 2015a. Federal Trade Commission v. Sysco Corp., 113 F.Supp. 3d 1, 38–48. https://casetext.com/case/fed-trade-commn-v-sysco-corp-3 (Retrieved 21.08.2023)

District Court of Colombia. 2016. Federal Trade Commission v. Staples, Inc and Office Depot, Civil Action No.1:15-cv-02115. https://www.ftc.gov/legal-library/browse/cases-proceedings/1510065-staplesoffice-depot (Retrieved 10 June 2024

District Court of Colombia. 2018. Federal Trade Commission v. Wilhelm Wilhelmsen, et al, No. 18-cv-00414. https://www.ftc.gov/legal-library/browse/cases-proceedings/171-0161-wilhelm-wilhelmsen-et-al (Retrieved 21.08.2023)

European Commission. 2003. Commission notice on the definition of relevant market for the purposes of community competition law. 372

European Commission. 2004. Case COMP/M.3280 – Air France/KLM. https://ec.europa.eu/competition/mergers/cases/decisions/m3280_en.pdf Accessed 27 August 2023

European Commission. 2010. Case COMP/M.5889 – United Air Lines/Continental Airlines. https://ec.europa.eu/competition/mergers/cases/decisions/M5889_20100727_20310_787579_EN.pdf (Accessed 27 August 2023.

European Commission. 2014. Case COMP/M.6607 – US Airways/American Airlines. https://ec.europa.eu/competition/mergers/cases/decisions/m6607_2259_2.pdf (Retrieved 27.08.2023)

Ezrachi A and Stucke ME. 2016a.The rise of behavioural discrimination. *Oxford Legal Studies Research Paper 54*. Oxford.

Ezrachi A and Stucke ME. 2016b. Virtual competition: The promise and perils of the algorithm-driven economy. *Harvard University Press*. Cambridge. Massachusetts.

Federal Trade Commission. 2003. Quest Diagnostics/Unilap Corporation. No. c_4074. https://www.ftc.gov/sites/default/files/documents/cases/2003/02/ftc.gov-uestanalysis.htm (Retrieved 21.08.2023)

Financial Conduct Authority. 2020. General insurance pricing practices: Final report. https://www.fca.org.uk/publication/market-studies/ms18-1-3.pdf (Retrieved 18.08.2023)

Gal MS and Rubinfeld D [forthcoming] Algorithms, AI and mergers. Antitrust Law Journal.High Court of South Africa, 2020

High Court of South Africa. Discovery Ltd, Discovery Life Ltd and Discovery Vitality (Pty) Ltd. http://www.derebus.org.za/wp-content/uploads/2020/08/Discovery-Ltd-and-Others-v-Liberty-Group-Ltd-2020-4-SA-160-GJ.pdf (Retrieved 28.09.2023)

McSweeny T and O'Dea B. 2017. The implications of algorithmic pricing for coordinated effects analysis and price discrimination markets in antitrust enforcement. Antitrust 32(1), 75–81

Moosajee N. 2019. 'Fix AI's racist bias. Mail and Guardian', 14 March. https://mg.co.za/article/2019-03-14-fix-ais-racist-sexist-bias/ (Retrieved 23.11.2023)

OECD. 2018. Personalised pricing in the digital era. https://one.oecd.org/document/DAF/COMP(2018)13/en/pdf (Retrieved 23.01 2023)

South Africa. 2018. Competition Act as amended (18 of 2018). Pretoria: Republic of South Africa. https://www.compcom.co.za/wp-content/uploads/2021/03/Competition-Act-A6.pdf (Retrieved 21.08 2023)

Stigler Center Committee for the Study of Digital Platforms. 2019. Market structure and antitrust subcommittee report draft. https://research.chicagobooth.edu/-/media/research/stigler/pdfs/market-structure---report-as-of-15-may-2019.pd (Retrieved 26.01.2023)

Stucke ME and Grunes AP. 2016. *Big data and competition policy*. Oxford University Press. Oxford. United Kingdom.

U.S. DOJ and FTC. 2023. Draft merger guidelines. https://www.justice.gov/d9/2023-07/2023-draft-merger-guidelines_0.pdf (Retrieved 29.10.2023)

Valentino-DeVries J, Singer-Vine J and Ashkan S, 2012. 'Websites vary prices based on users' information'. *Wall Street Journal*, 24 December.