What Next for the Horizontal Merger Guidelines?*

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On 9 July 2021, President Biden issued an executive order that included the following statement:

To address the consolidation of industry in many markets across the economy, as described in section 1 of this order, the Attorney General and the Chair of the FTC are encouraged to review the horizontal and vertical merger guidelines and consider whether to revise those guidelines.¹

On 18 January 2022, the Department of Justice (“DOJ”), and the Federal Trade Commission (“FTC”) “launched a joint public inquiry aimed at strengthening enforcement against illegal mergers” and issued a detailed Request for Information on Merger Enforcement (“RFI”).²

This article offers recommendations on how best to update the current Horizontal Merger Guidelines (“HMGs”) which were issued in 2010 by the DOJ and the FTC (the “Agencies”).³

Why Revise the Horizontal Merger Guidelines Now?

The impetus to update the HMGs seems primarily to be based on the view that competition has declined in recent years in the American economy. President Biden’s executive order states that “over the last several decades, as industries have consolidated, competition has weakened in too many markets, denying Americans the benefits of an open economy and widening racial, income, and wealth inequality.” These concerns apply to labor markets, not just product markets. According to the executive order, it is the policy of the Biden Administration to enforce the antitrust laws “especially in labor markets” along with certain specified product markets.

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² The White House. Executive Order on Promoting Competition in the American Economy (July 9, 2021), Section 5(c).


⁴ U.S. Department of Justice and the Federal Trade Commission, Horizontal Merger Guidelines (August 19, 2010). We do not address updating the 2020 Vertical Merger Guidelines, which were withdrawn by the FTC in September 2021 but remain in place at the DOJ. Our recommendations apply whether or not the Agencies choose to issue a single updated set of guidelines covering both horizontal and vertical mergers.
We have reviewed the evidence about trends in competition in the American economy very closely.\textsuperscript{4} As we read the primary research results, the overall evidence from merger retrospectives supports the conclusion that many consummated mergers have lessened competition,\textsuperscript{5} including mergers that escaped Hart-Scott-Rodino review.\textsuperscript{6} Few mergers are investigated, still fewer challenged,\textsuperscript{7} and litigated challenges are focused on mergers with enormous increases in concentration in markets already dominated by no more than two or three firms.\textsuperscript{8} While such anticompetitive mergers should be blocked, these patterns suggest that mergers in many highly concentrated markets were allowed to move forward.\textsuperscript{9} At the same time, some research suggests that much of the growing share of U.S. economic activity accounted for by large businesses may result from highly efficient “superstar” firms growing at the expense of other, perhaps less-efficient, firms, a competitive outcome that can improve welfare.\textsuperscript{10} That competitive process has been fueled by massive advances in information technology, the growing importance of intangible assets, and globalization.\textsuperscript{11} Consistent with this, increases in concentration at the national sector level were in many cases associated with decreases in concentration in more local geographies and at the level of relevant antitrust product markets.\textsuperscript{12}

We believe the empirical evidence strongly supports a tightening of overall merger enforcement.\textsuperscript{13} The observed trends in concentration, price/cost margins, and profits are no doubt

\begin{itemize}
  \item \textsuperscript{8} See infra notes 30 and 32 and associated discussion in the text.
  \item \textsuperscript{9} This may reflect inadequate budgets at enforcement agencies; see Michael Kades, \textit{The state of U.S. federal antitrust enforcement}, (Wash. Ctr. For Equitable Growth, Sept. 2019), and does not capture settled challenges. Tightening merger enforcement guidelines without substantially increasing agency budgets is unlikely to mitigate any underenforcement.
  \item \textsuperscript{11} E.g., Nicolas Crouzet and Janice Eberly, \textit{Understanding Weak Capital Investment: the Role of Market Concentration and Intangibles} (NBER Working Paper No. 25869, 2019).
  \item \textsuperscript{12} C. Lanier Benkard, Ali Yurukoglu, and Anthony Zhang, \textit{Concentration in Product Markets} (NBER Working Paper No. 28745, April 2021) (median concentration levels in consumer products have declined since the mid-1990s, reflecting modest declines in concentration for the most highly concentrated product markets at the start of that period); Esteban Rossi-Hansberg, Pierre-Daniel Sarte, and Nicholas Trachter, \textit{Diverging Trends in National and Local Concentration}, 35 NBER MACROECONOMICS ANNUAL 115 (2020) (showing declines in concentration measured at the local level across most sectors).
\end{itemize}
the result of underenforcement against mergers in some markets, and pro-competitive growth by large efficient firms in others. But even in markets where current high levels of concentration reflect past growth by more efficient firms that are successfully harnessing economies of scale and scope, close scrutiny of acquisitions is needed to prevent market leaders from acquiring actual or potential rivals whose growth might otherwise put competitive pressure on incumbents. The Biden Administration’s call to strengthen merger enforcement, in part by updating the HMGs, can serve this goal, as did the 2010 revisions. Our recommendations take as given that the updated HMGs should and will articulate a more assertive merger enforcement policy.\(^\text{14}\)

Given limited space, we focus our recommendations for revising the HMGs to strengthen merger enforcement on three main areas. While these are only a subset of revisions that should be considered, we believe implementing them would substantially improve merger enforcement. First, we suggest several ways that the HMGs can strengthen the structural presumption in a manner consistent with sound economics and with how the courts have been analyzing mergers in recent decades. Most important, the HMGs can do more to explain how and why the Hypothetical Monopolist Test (“HMT”), embraced by the courts for decades as a method to define relevant markets, often leads to quite narrow markets. They also can add presumptions based solely on increase in concentration caused by the merger, to address unilateral harms that currently may escape redress. Second, we recommend that the HMGs elaborate on how the Agencies determine whether a merger may substantially lessen dynamic competition, which includes potential competition and innovation. The historical emphasis of merger law on static market structure has made it unduly difficult for the government to challenge mergers that may lessen dynamic competition. Updated HMGs can help fix this historical oversight. Third, merger enforcement has not paid enough attention to how mergers may lessen competition among employers to hire workers. We suggest that the updated HMGs include a new section, Mergers of Competing Employers, to explain how the Agencies assess such harms to workers.\(^\text{15}\)

**Guiding Principles**

The purpose of the HMGs is to “describe the principal analytical techniques and the main types of evidence on which the Agencies usually rely to predict whether a horizontal merger may substantially lessen competition” (HMGs, §1). Historically, the Guidelines have been written with three audiences and goals in mind: (1) to inform the business community, so as to deter anti-competitive mergers without imposing unnecessary costs on other mergers; (2) to participate in a dialogue with the courts, so as to further the development of the case law; and (3) to provide a handbook to Agency staff, so as to guide them in how best to investigate horizontal mergers.

Three principles have governed all previous updates of the Guidelines.\(^\text{16}\)

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\(^\text{14}\) For one set of proposals along these lines, see Steven Salop and Fiona Scott Morton, The 2010 HMGs Ten Years Later: Where Do We Go From Here? 58 REV. INDUS. ORG. 81 (2021).

\(^\text{15}\) FTC Chair Lina Khan has signaled her interest in labor markets: “...do the guidelines adequately assess whether mergers may lessen competition in labor markets, thereby harming workers?” Remarks of Chair Lina M. Khan Regarding the Request for Information on Merger Enforcement (18 January 2022), p.3.

\(^\text{16}\) Some of the history of the merger guidelines is provided in Carl Shapiro, The 2010 Horizontal Merger Guidelines: From Hedgehog to Fox in Forty Years, 77 ANTITRUST L.J. 701 (2010).
• **Law Enforcement**: The Guidelines address a law enforcement activity, so they must be broadly consistent with the case law, even when they seek to influence the evolution of the case law in the common law tradition.

• **Transparency**: The Guidelines should accurately reflect how the Agencies will actually investigate mergers and make enforcement decisions.

• **New Learning**: The Guidelines should reflect the accumulation of Agency experience, including the most current and reliable economic evidence and analytical techniques.

These three principles should govern the current update of the Guidelines. Departing from the first by adopting merger enforcement policies unlikely to be accepted by the courts would imperil the extraordinary status of the Guidelines as a document prepared by government enforcers that the courts, and even merging parties, have generally accepted as a valid guide rather than a piece of advocacy. Departing from the second principle would violate basic norms of good government. The Agencies should be prepared to adhere to whatever they put in the updated HMGs. And departing from the third would miss an opportunity to improve merger enforcement based on changes in the American economy and based on new learning.

The Agencies have reaffirmed that they intend to follow these three principles. The RFI states that the merger guidelines “are under review to ensure that they (1) reflect current learning about competition based on modern market realities, and (2) faithfully track the statutory text, legislative history, and established case law around merger enforcement.”

**Strengthening the Structural Presumption**

For nearly sixty years, merger enforcement has relied heavily on the presumption that mergers that substantially increase concentration in highly concentrated markets are illegal. However, the strength of the structural presumption has declined in the past 45 years. We support efforts to facilitate the ability of the government to establish its prima facie case. Updated HMGs can help do that, so long as they are convincing and adhere to the Law Enforcement principle (above), avoiding any marked inconsistency with established case law.

The challenge is how to update the structural presumption to reflect the dramatic changes that have taken place in the American economy since 1963, when the Supreme Court established the presumption in *Philadelphia National Bank*. Manufacturing now accounts for a much smaller share of GDP; intellectual property and intangible assets play a much bigger role in giving firms market power, especially in high-tech and digital markets; and product differentiation is the norm, not the exception. These changes have transformed merger enforcement. The bulk of

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18 United States v. Philadelphia National Bank, 374 U.S. 321 (1963) at 363 (“…a merger which produces a firm controlling an undue percentage share of the relevant market, and results in a significant increase in the concentration of firms in that market, is so inherently likely to lessen competition substantially that it must be enjoined in the absence of evidence clearly showing that the merger is not likely to have such anticompetitive effects.”).
merger investigations in the past 20 years have centered around unilateral effects, not coordinated effects, which dominated merger analysis 50 years ago.

Updated HMGs can help merger enforcement adjust to today’s economy by modifying how the Hypothetical Monopoly Test is performed to better reflect the economics of unilateral effects and by introducing a presumption based solely on the increase in concentration caused by a merger. Such a presumption would be well-grounded in both economic theory and empirical evidence demonstrating the predictive value of changes in concentration for post-merger price increases and output reductions.\(^\text{20}\)

**Market Definition and the Hypothetical Monopolist Test**

One promising route to stronger merger enforcement is to build on the changes made in the HMGs in 2010 by clarifying that proper application of the Hypothetical Monopolist Test can and should lead to quite narrow markets.\(^\text{21}\) Those changes, which were well grounded in economics, have proved invaluable to the Agencies when they have litigated mergers over the past decade. Litigated cases often turn on whether the courts accept the relevant markets proposed by the Agencies. They often did so during the past decade, giving the government a high win rate in litigated mergers.\(^\text{22}\)

We recommend that the Agencies simplify the HMT and shed the idea that the HMT is a precise algorithm that leads to a single, correct relevant market. This can be achieved by emphasizing the following statement from Section 4.1.1 of the 2010 HMGs as the governing principle: “The Agencies may evaluate a merger in any relevant market satisfying the test.”\(^\text{23}\) This change will better reflect actual practice and avoid distracting detours that arise when the merging parties ask why the Agencies selected one qualifying relevant market rather than another.

The HMGs should further explain that when looking to see if the structural presumption applies, the Agencies focus their attention on candidate relevant markets that include competing products sold by both merging firms. The presence or absence of other relevant markets in which there is no overlap between the merging firms is irrelevant for this purpose. Building relevant markets around an overlap of concern focuses attention on the direct loss of competition that will result from the merger.

If the two overlap products alone satisfy the HMT – based on the very same calculation that the Agencies routinely perform to evaluate unilateral price effects – then they alone constitute a


\(^{21}\) See Section 4.1.1 and especially Example 5: “Groups of products may satisfy the hypothetical monopolist test without including the full range of substitutes from which customers choose.” Narrow markets may include markets for targeted customers.


\(^{23}\) This simplification includes eliminating the language in Section 4.1.1 indicating that the Agencies “normally” include products in a certain order based on the magnitude of revenue diversion, and Example 6. The statement that the Agencies “usually” use the smallest relevant market satisfying the HMT also should be softened to “often,” for the reason given, i.e., because the share of more distant substitutes “often” overstates their significance.
relevant market.\textsuperscript{24} The merger will create a monopoly in that narrow, two-product relevant market. The 2010 HMGs already point this out, but this idea will be easier to utilize if the Guidelines explicitly state that relevant markets can be built around an overlap of concern.

\textbf{Example 5A:} Example 5 in the 2010 HMGs explains how Product A and B may satisfy the HMT and thus form a relevant product market. A merger combining Products A and B would be a merger to monopoly in that market. Suppose that Product X is just slightly more distant from Product A than is Product B, so a hypothetical monopolist controlling Products A and X would raise both of their prices by 10 percent. Then Products A and X also form a relevant market, and a merger combining Products A and X would be a merger to monopoly in that market. This is a correct and informative application of the HMT, notwithstanding that one could also define a broader relevant market containing Products A, B, and X.

These updates to the HMT will allow the Agency to establish its \textit{prima facie} case for mergers where unilateral price effects are likely to arise. The economic basis for this approach is very strong.\textsuperscript{25} These updates would continue the process of unifying and reconciling the market definition part of merger analysis with the evaluation of unilateral price effects.\textsuperscript{26}

The Agencies will then have the discretion to define broader markets as needed when they go to court in order to address other more qualitative evidence that the courts use to delineate relevant markets. Section 4 of the HMGs already anticipates that tensions can arise between markets defined using the HMT and broader collections of products that are may reflect common industry usage: “Relevant antitrust markets defined according to the hypothetical monopolist test are not always intuitive and may not align with how industry members use the term ‘market.’”

The HMGs should explain that relevant markets do not \textit{partition} products, with each product properly belonging in just one relevant market. As one example, relevant markets can be nested. The Agencies have brought enforcement actions involving nested markets, with harm clearer in a narrower market that is nested inside a broader market. The HMGs should articulate that principle. They also should explain that the most informative relevant market(s) typically depend on the transaction under study.

The HMGs should address “cluster markets,” i.e., situations in which the Agencies define a relevant product market that includes a collection of products that are often sold together but are \textit{not} substitutes for each other. For example, in hospital mergers the FTC often alleges a relevant product market for “general acute care inpatient hospital services.” One rationale for defining cluster markets is purely practical: market shares may be much easier to measure for the cluster

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\item[$\textsuperscript{24}$] The RFI points in this direction, noting that “the tests for an antitrust market can often be satisfied using direct evidence of likely effects.” (\textit{supra} note 2, p. 3)
\item[$\textsuperscript{25}$] \textit{See} Nocke and Whinston, \textit{supra} note 20, and Joseph Farrell and Carl Shapiro, \textit{Antitrust Evaluation of Horizontal Mergers: An Economic Alternative to Market Definition}, 10 BEJ. THEORETICAL ECON. (2010).
\item[$\textsuperscript{26}$] In addition, the Agencies could add material relating to unilateral price effects indicating that the Agencies often conclude that mergers that create significant upward pricing pressure will lead to significant unilateral price effects, unless there is evidence that product repositioning or entry would deter or counteract those effects. That change might smooth the path for the Agencies to win in court \textit{without} invoking the structural presumption.
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than for individual components. Aggregating in this way produces reliable and informative market shares if competitive conditions are similar for the different items in the cluster.\footnote{An entirely different analysis applies if the Agency is alleging a market for bundles, in which suppliers must offer most or all the components in the bundle to compete effectively.}

The HMGs also should be updated to explain how to handle markets in which the price is zero.\footnote{The HMGs should explain that outputs, not revenues, are used to measure market shares in these markets.} This comes up in markets where firms offer free products or services to consumers and earn their revenue from advertising. In these situations, a group of products satisfies the HMT if a hypothetical monopolist controlling that group of products would significantly lower \textit{quality}. Here “quality” can refer to any non-price dimension of the product valued by consumers, such as policies that protect consumers’ privacy by limiting if or how data generated by their transactions will be used. Closely related, the HMGs need to explain how relevant markets are defined for multi-sided platforms. These issues are raised in the RFI.\footnote{Question 11(c) in the RFI asks: “How should the guidelines approach market definition in zero-price markets, negative-price markets, or markets without explicit prices? Can ‘quality’ and other characteristics play the same role as price in market definition?”}

They merit attention and space in the revised guidelines.

\textbf{Market Concentration Thresholds}

In 2010, there was a yawning gap between the HHI thresholds found in the HMGs and the Agencies’ actual enforcement policy. The 1992 HMGs stated: “Where the post-merger HHI exceeds 1800, it will be presumed that mergers producing an increase in the HHI of more than 100 points are likely to create or enhance market power or facilitate its exercise.” However, the average post-merger HHI for litigated mergers from 2000 to 2010 was a whopping 6535, and the average increase in the HHI was 1987, vastly above the 100 level in the 1992 HMGs.\footnote{See Table 2 in Shapiro and Shelanski, supra note 22. See also Federal Trade Commission, \textit{Horizontal Merger Investigation Data: Fiscal Years 1996-2011} (January 2013) (showing very few enforcement actions in markets with a post-merger HHI of less than 2400, among mergers that received second requests from the FTC, except for grocery markets and oil markets).}

When the HMGs were updated in 2010, the Agencies sought to substantially narrow this gap. The goal was to tighten merger enforcement by raising the HHI thresholds, focusing attention and resources on the mergers most likely to harm competition, and assertively enforcing at those new levels, thereby deterring firms from proposing mergers well above the new enforcement thresholds. However, in part due to resource constraints, the Agencies did not succeed in reducing the HHI levels of litigated mergers by very much. The average post-merger HHI for litigated mergers from 2010 to 2020 was 5805, and the average increase in the HHI was 1938.\footnote{Id.}

These data suggest that merger enforcement over the past twenty years has failed to stop some firms from attempting mergers to duopoly or even monopoly, well beyond the levels presumed to be anticompetitive. Worse yet, the parties proposing such mergers often are sufficiently optimistic about their chances in court that they are willing to litigate rather than abandon the transaction when facing a DOJ or FTC challenge.

Moreover, merging parties often argue that mergers not in the Red Zone (currently a post-merger HHI greater than 2500 and an increase in the HHI of 200 or more) are presumptively legal. That was not the intention of the Yellow Zone in the 2010 HMGs (a post-merger HHI between 1500
and 2500 and an increase in the HHI of 100 or more, or a post-merger HHI of more than 2500 and increase in HHI of 100 to 200). The 2010 HMGs state that mergers in the Yellow Zone “potentially raise significant competitive concerns and often warrant scrutiny.” The Agencies should make very clear that mergers falling in the Yellow Zone are not presumptively legal.

What more should be done? One approach would be for the Agencies to retain the 2010 HHI levels and consistently enforce at those levels, both in the Red Zone and, when appropriate, the Yellow Zone. That alone would involve a significant tightening of merger enforcement, which would require substantial additional resources. However, it would not address concerns that the drift in merger enforcement prior to 2010 created an overly permissive policy toward mergers in what became the Yellow Zone after 2010. Therefore, if resources permit, the Agencies also should consider lowering the HHI thresholds for the Red Zone and enforcing at those new levels. We do not offer specific new HHI threshold levels here, partly because we do not believe the empirical literature is clear on what those should be. But we do offer several specific suggestions for expanding the structural presumption in ways that reflect Agency experience, economic evidence and economic theory, and are consistent with evolving case law.

- **Presumption Based on the Increase in HHI Alone:** We recommend that the Agencies adopt a presumption against mergers that increase the HHI by 200 or more in cases where the theory of harm is based on unilateral effects.\(^{32}\)

  A test based on the increase in the HHI is strongly supported by economic theory.\(^{33}\) The increase in the HHI is equal to \(2S_1S_2\), where \(S_1\) and \(S_2\) are the market shares of the merging firms. If Diversion Ratios are proportional to market shares, the increase in the HHI is a measure of the extent of direct competition between the merging firms that is eliminated by the merger.

  Furthermore, the 2010 HMGs laid the groundwork to support this change. Section 6.1 in the 2010 HMGs states: “The Agencies rely much more on the value of diverted sales than on the level of the HHI for diagnosing unilateral price effects in markets with differentiated products.” The increase in the HHI is linked to the value of diverted sales.\(^{34}\)

- **Restoration of the Leading Firm Proviso:** We recommend a presumption against a merger between a firm with at least 50 percent market share and a firm with at least a 1 percent market share.\(^{35}\)

  The 1982 Merger Guidelines contained the following Leading Firm Proviso: “the Department is likely to challenge the merger of any firm with a market share of at least 1

32 The RFI invites presumptions that depend on the theory of harm. “Would the inclusion of multiple alternative presumptions better reflect the diversity of transactions and evidence presented by the modern economy.” (RFI, supra note 2, p.5)

33 See Nocke and Whinston, supra note 20, and Farrell and Shapiro, supra note 25.

34 We also would support a presumption against mergers that create significant upward pricing pressure, as recommended by Salop and Scott Morton, supra note 14. The 2010 HMGs point in that direction but do not explicitly state such a presumption. Now that unilateral effects and upward pricing pressure are well established, a presumption based on significant upward pricing pressure would be a much smaller step forward. The RFI invites such an approach, asking: “Should the guidelines identify thresholds for customer diversion and margins that, solely or together, create a presumption of competitive harm from certain mergers?” (RFI, supra note 2, p. 4)

35 We also favor a presumption against mergers between a dominant firm and a significant potential competitor. See below.
percent with the leading firm in the market, provided that the leading firm has a market share that is at least 35 percent and is approximately twice as large as that of the second largest firm in the market.” This provision was dropped in 1992, when a more extensive treatment of unilateral effects was added.

Competition is often harmed when a dominant firm acquires one of its rivals, even a small one. Normally, the dominant firm has abundant internal capabilities, so the acquisition is not needed for it to be a strong competitor.

We tentatively suggest these 50 percent/1 percent levels, but our central point is to use a lower threshold for the structural presumption for mergers involving the leading firm in the market.\(^{36}\) The post-merger HHI associated with a 50 percent + 1 percent merger is over 2500, but the increase in the HHI is only 100, so this merger would not trigger a presumption that is based on an increase of 200 or more in the HHI (although a 50 percent + 2 percent merger would).

In these cases, the target firm’s projected market share will often be more informative than its historical share. Projections made in advance of merger discussions are particularly informative. The Agencies should express skepticism of projections prepared by the merging parties in anticipation of litigation.

- **Sliding Scale:** We recommend that the Agencies explicitly state that stronger and more convincing evidence is needed to rebut the structural presumption, the larger is the post-merger HHI and the increase in the HHI.

Such a statement would build naturally on what the 2010 HMGs already say: “The higher the post-merger HHI and the increase in the HHI, the greater are the Agencies’ potential competitive concerns and the greater is the likelihood that the Agencies will request additional information to conduct their analysis.” Stronger language here is warranted, especially given that the courts are already applying a sliding scale.

Lastly, we would like to stress that one can only measure market concentration after a relevant market has been defined. In the real world of merger litigation, Agency success hinges far more on the courts accepting the government’s proposed markets than on the HHI thresholds. That is why the 2010 HMGs explained in detail how the HMT can lead to narrow markets. Twelve years later, strengthening merger enforcement likely rests much more on increasing enforcement resources and explaining the implications of the HMT than on lowering the HHI thresholds.

**Dynamic Competition**

The structural presumption applies to mergers between firms that are current competitors, but share-based analysis has very limited ability to identify and protect future competition. The 2010 HMGs took three steps to address this shortcoming. First, Section 5.2 states: “The Agencies may project historical market shares into the foreseeable future when this can be done reliably.” Second, Section 5.3 states: “In analyzing mergers between an incumbent and a recent or potential entrant, to the extent the Agencies use the change in concentration to evaluate competitive effects, they will do so using projected market shares.” Third, Section 6.4 addresses unilateral effects on “Innovation and Product Variety,” a topic not developed in earlier Guidelines.

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\(^{36}\) Salop and Scott Morton, *supra* note 14 make a similar recommendation, without specific thresholds.
Updated HMGs should build on these advances and explain in much greater detail how the Agencies diagnose a lessening of dynamic competition. We use this term to encompass two distinct ways in which a merger may lessen future competition. First, a merger may cause harm through future unilateral effects, even if it will not cause immediate unilateral effects. Second, a merger may reduce the incentives of the merging firms to innovate by making investments in new and improved products, production processes, or business models. For a recent, excellent example of how the HMGs might treat harm to future competition, see Section 5, “Potential and Dynamic Competition,” in the U.K. CMA’s Merger Assessment Guidelines. 

Protecting dynamic competition is inherently challenging. The fundamental problem is that incumbent firms often find it more profitable to acquire potential rivals than to compete against them. Therefore, the Agencies and the courts must be alert to the danger that merging firms will stymie effective merger enforcement by combining at a relatively early date, when the evidence a loss of dynamic competition is less clear, especially to those outside the industry. The D.C. Circuit recognized a very similar concern in the Microsoft case. Both the Clayton Act and the Sherman Act provide authority for the Agencies to challenge mergers that lessen competition from nascent, disruptive firms. In the merger context, the greatest danger arises when an incumbent firm with substantial market power seeks to merge with a potential competitor. One promising way to prevent incumbent firms from acting on their anticompetitive incentives is to prohibit mergers that may substantially lessen future product-market competition, even if such future rivalry cannot yet (when the merger is proposed) be shown to be more likely than not. The Supreme Court already has recognized that future competition is probabilistic and that antitrust law protects future competition that might arise (but might not). This approach is very much consistent with the goal of “arresting mergers at a time when the trend to a lessening of competition in a line of commerce was still in its incipiency.” It also fits with Herbert Hovenkamp’s view of how incipiency tests should be used in antitrust law: “The appropriate use of incipiency tests is to

37 Question 7 in the RFI asks about Potential and Nascent Competition. “What changes in standards or approaches would appropriately strengthen enforcement against mergers that eliminate potential competition?” (RFI, supra note 2gilb, p. 6)
38 See, e.g., Giulio Federico, Carl Shapiro, and Fiona Scott Morton, Antitrust and Innovation: Welcoming and Protecting Disruption, in INNOVATION POLICY AND THE ECONOMY, 20, 125-190 (Josh Lerner and Scott Stern, eds., 2020) (developing this concept and explaining how future unilateral effects and innovation effects can be assessed).
39 COMPETITION AND MARKETS AUTHORITY, MERGER ASSESSMENT GUIDELINES, March 2021 (UK).
40 This is a very general and robust economic principle. This same principle explains why we see pay-for-delay deals in the pharmaceutical industry. For an early articulation of this basic principle, see Richard Gilbert and David Newbery, Preemptive Patenting and the Persistence of Monopoly, 72 AM. ECON. REV. 514 (1982).
41 United States v. Microsoft Corp., 253 F.3d 34, 79 (D.C. Cir. 2001). Acknowledging the inherent uncertainty of nascent competitive threats, the court concluded that imposing a high burden of plaintiffs “to reconstruct the hypothetical marketplace absent a defendant’s anticompetitive conduct would only encourage monopolists to take more and earlier anticompetitive action.”
43 FTC v. Actavis, 570 U.S. 136 (2013) (even a “small risk” of future competition “constitutes the relevant anticompetitive harm”).
prevent certain bad outcomes early when antitrust rules make it difficult or impossible to prevent them later.”

Given the inevitable evidentiary challenges the Agencies face when they challenge mergers based on a loss of dynamic competition, we urge the Agencies to emphasize in the updated HMGs that they focus on the ability and incentive of the merged firms to invest and introduce competing products in the future. If the merging firms are two of a small number of firms that have the ability and incentive to make such investments in a defined area, the merger may well lessen dynamic competition, even if neither firm has a specific plan to introduce a product that will compete against the other. The merging firms will likely argue that such future effects are “speculative,” but that merely highlights why the HMGs need to explain that merger enforcement in dynamic markets does not require a specific prediction of how the market will evolve, which is typically not possible. Especially for cases involving potential competition and innovation, the Agencies should emphasize “the congressional intent that merger enforcement should interdict competitive problems in their incipiency and that certainty about anticompetitive effect is seldom possible and not required for a merger to be illegal.” The HMGs also can explain the types of evidence that the Agencies rely upon to identify mergers that may harm dynamic competition. We next sketch out some ways that might be done.

**Future Unilateral Effects**

Future unilateral effects are unilateral effects that will not arise until some point in the future. The typical merger in which future unilateral effects arise is one between a strong incumbent firm and a potential entrant. For clarity, our discussion refers to that fact pattern.

Future unilateral effects are very much like conventional unilateral effects, except (a) they will not occur for some period of time, and (b) they will only occur probabilistically.

**Example:** Firm A designs and sells the leading modem chip used in mobile devices, earning substantial operating profits. Firm B, which designs and sells other types of chips, is developing a modem chip. If those development efforts are successful, Firm B’s modem chip will provide substantial new competition for Firm A’s modem chip. The merger of Firm A and Firm B will cause future unilateral effects. Whether these effects are substantial depends on the likelihood that Firm B will successfully complete the

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46 Assistant Attorney General Jonathan Kanter has invited updates along these lines. “In a dynamic, multi-dimensional economy, the static formalism of market definition may not always be the most reliable tool for assessing the potential harm from mergers.” *Modern Competition Challenges Require Modern Merger Guidelines* (18 January 2022).

47 The RFI (supra note 2, p. 6) asks whether the analysis should focus on whether one merging firm (a) is contemplating entry into a market where the other firm has substantial market power, (b) is well situated to enter, or (c) is simply capable of entering. We recommend focusing on one merging firm’s ability and incentive to enter and compete against the other merging firm in a market where that firm is dominant, not on whether it is currently planning to do so.

48 HMGs, supra note 3, Section 1.

49 The U.K. Guidelines explain that a merger eliminates potential competition when “entry or expansion by either or both merging firms may have resulted in new or increased competition between them.” ¶5.1

50 The “potential entrant” could also be a current market participant that is developing a new and improved product. We use the term “potential entrant” for clarity, but we do not intend to rule out that fact pattern.
development of its modem chip and the extent of competition between the two modem chips in that event. Evidence about Firm B’s plans and prospects for its modem chip will be highly relevant to those two issues, as will be evidence about how Firm A assesses the threat posed by Firm B’s modem chip to the profits Firm A is earning on its modem chip.

Empirical evidence has mounted that large, successful firms often grow by expanding into adjacent product markets or geographic markets. Indeed, this expansion explains the why we are seeing increases in concentration in many sectors of the economy together with decreases in concentration in relevant markets within those sectors. This same evidence should serve as a warning that mergers between firms in adjacent markets can eliminate potential competition. With large firms now controlling a greater share of economic activity, often earning substantial profits that would be threatened by disruptive entrants, the ability of the Agencies to stop mergers that eliminate potential competition is now more important than ever. There is a small but growing body of empirical evidence on acquisition of potential competitors,\textsuperscript{51} and acquisitions of potential competitors have been of particular concern in the tech space.\textsuperscript{52}

The Agencies and the courts face two central challenges in cases involving future unilateral effects. First, it may be difficult to assess the likelihood that the product under development will ever be introduced. Second, unlike conventional unilateral effects cases, it will typically not be possible to estimate diversion ratios based on the available evidence. That makes it far more difficult to assess the magnitude of the future unilateral effects.

The Agencies should emphasize that a merger between a dominant incumbent and a potential entrant is likely to cause future unilateral effects if the potential entrant has the incentive and ability to compete with the incumbent through entry into the market, especially if that entry involves the introduction of a disruptive product or business model. Such acquisitions will often “tend to create a monopoly.” The HMGs should identify the types of evidence the Agencies usually rely upon to make this assessment. Pre-merger business plans, forecasts, and strategy discussions are especially important. Econometric quantification will rarely be feasible. Attempts by the potential entrant to walk away from its pre-merger entry or expansion plans when the Agencies investigate the merger should be viewed with great skepticism, as should attempts by the incumbent to play down the threat it faces.

The Agencies should state that they are likely to challenge a merger based on future unilateral effects if one merging firm is selling a successful and profitable product and the other is credibly developing a new product that significantly threatens those profits. Harm to competition does not require that successful introduction of the new product be highly likely, much less certain.

\textit{Harm to Innovation}

Competition is a dynamic process. Indeed, the greatest benefits to the public from competition arguably result from the dynamic process by which firms invest to develop new and improved

\begin{itemize}
  \item[\textsuperscript{51}] E.g., Colleen Cunningham, Florian Ederer, and Song Ma, \textit{Killer Acquisitions}, 129 J. Pol. Econ. 649 (2021); Wollmann (2019) and Wollmann (2021), \textit{supra} note 6.
\end{itemize}
products, business models, and methods of production. Mergers can undermine that process. We refer to such adverse effects as *harm to innovation*.

**Example:** In the previous example, suppose that Firm B must make substantial risky investments to develop its new modem chip. The merged firm will have reduced incentives to undertake these investments because many of the sales of Firm B’s modem chip would come at the expense of Firm A’s modem-chip business. The merger also will reduce Firm A’s incentive to improve its own modem chips by removing the competitive pressure from Firm B. The merger will thus harm innovation in modem chips. These effects are largest if Firm A faces few other actual or potential modem-chip rivals.

Critically, mergers can cause an immediate harm to innovation even if the actual product-market competition that they eliminate is *nascent*, i.e., will not arise for some time and is probabilistic. Stopping incumbent firms from acquiring nascent competitors is particularly problematic in innovative markets, where such mergers can threaten both the competitive process by which firms contest future sales and the innovation pipeline.

These basic ideas can be found in the 2010 HMGs. Section 6.4 explains that “curtailment of innovation could take the form of reduced incentives to continue with an existing product-development effort or reduced incentive to initiate development of new products.” But much more can and should be done, given the importance of innovation to economic growth.

Updated HMGs should significantly expand the discussion of innovation to reflect advances in economic learning and the accumulation of Agency experience. The overarching principle is that mergers can harm competition by reducing the contestability of future sales. The main motivation for a profitable incumbent to innovate is to protect its market position, and the main motivation for an entrant to innovate is to disrupt the market and capture sales from incumbents. A merger between a strong incumbent and a potential entrant can undermine both of these incentives. These ideas have been well understood by economists studying innovation for decades, but they have not been fully implemented in the HMGs or in merger enforcement.

**Mergers of Competing Employers**

Antitrust law acknowledges that competitive markets are essential to protect not only consumers of products and services, but also suppliers to firms, including workers. Economists and antitrust enforcers have increasingly recognized that mergers between firms that compete to employ workers may harm workers by substantially lessening competition in relevant labor

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54 Hemphill and Wu, *supra* note 42.

55 Carl Shapiro, *Competition and Innovation: Did Arrow Hit the Bull’s Eye?* in The Rate & Direction of Economic Activity Revisited (Josh Lerner and Scott Stern, eds., NBER, 2012) (explaining that innovation incentives are strongest when future sales are contestable among multiple firms well-positioned to innovate).


markets. Workers may be especially vulnerable to reductions in competition, as typical low labor supply elasticities may give remaining employers considerable market power over wages.

The approach to analyzing competitive overlaps in labor markets has many analogs to those used for product markets. Section 12 of the 2010 HMGs, which discusses Agency approaches to evaluating potential harm from mergers of competing buyers, should be accompanied by a new section or subsection that makes explicit the inclusion of labor market harms and describe how the Agencies will assess that possibility.

Market power in labor markets may arise from monopsony power, through which firms can profitably restrict hiring to force lower wages, benefits, or non-wage compensation, including working conditions. Alternatively, it may be exercised through bargaining leverage, imposing lower compensation on workers, possibly without employment effects.

Question 9 in the RFI asks about Monopsony Power and Labor Markets. Part (b) asks: “How should the guidelines treat a merger that may generate monopsony power, but does not substantially lessen competition in any output market?” Section 12 of the 2010 HMGs answers this question.

The Agencies do not view a short-run reduction in the quantity purchased as the only, or best, indicator of whether a merger enhances buyer market power. Nor do the Agencies evaluate the competitive effects of mergers between competing buyers strictly, or even primarily, on the basis of effects in the downstream markets in which the merging firms sell. Example 24: Merging Firms A and B are the only two buyers in the relevant geographic market for an agricultural product. Their merger will enhance buyer power and depress the price paid to farmers for this product, causing a transfer of wealth from farmers to the merged firm and inefficiently reducing supply. These effects can arise even if the merger will not lead to any increase in the price charged by the merged firm for its output.

This important principle should be retained and extended to the context of labor markets.

Many labor markets may be substantially more narrow in geographic scope than are corresponding product markets, and the ability of workers to move from one employer or occupational category to another may be difficult to evaluate. Job postings and hiring records may help to construct diversion measures and identify groups of workers who are particularly dependent upon competition between the merging firms. The Hypothetical Monopsonist Test can be applied to help define the affected labor markets, with consideration given both to the geographic reach of labor markets and to disparate effects across different occupations affected by the merger.

The Agencies should affirm that the structural presumption applies to labor markets. That said, there is no a priori reason to expect that numeric thresholds based on product markets will necessarily be the most accurate predictions of labor market harm. The Agencies should consider whether the empirical economic evidence supports different levels for the HHI-based thresholds

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59 E.g., Marinescu and Hovenkamp, supra note 57.
for labor and product markets, recognizing that the burgeoning academic literature and ongoing Agency experience will inevitably help refine these over time.

For many mergers, potential product market and labor market harms will be concomitant. This is especially likely in cases where both product and labor markets are local and there are workers with skills that are specific to a small number of local employers, making them vulnerable to elimination of an independent employer, as may occur for specialized health care workers in hospital mergers.\textsuperscript{60} Because a merger is illegal if it may substantially lessen competition in any relevant market, the Agency need not include all harmed markets in a complaint, and a challenge could be made on the basis of either product or labor market harms, or both. In other situations, firms may compete in the same labor pool but not necessarily the same product market. This can lead to anticompetitive effects in labor markets regardless of any effects on product market competition. A merger between a hospital and a nearby skilled nursing facility might be an example of this, reducing local competition to hire nurses but not harming competition in any product market. Or it may be that geographic differences in labor and product markets give rise to labor market harm even when product market competition is not substantially affected.

**Example:** Firms A and B manufacture products that do not directly compete with one another, so their merger does not pose the risk of product market harm. However, they each employ the same type of specialized skilled workers, and several of their facilities are in local markets where they are two of a small number of employers competing for those workers. The merger will substantially lessen competition for this group of workers in these local labor markets and will depress total compensation for these workers.

Given scarce enforcement resources, it may be most effective to identify early in investigations situations where labor and product markets are not aligned, and focus labor market investigations on those where there is no product market harm. Understanding the nature of labor market competition also may be important in assessing whether proposed divestiture remedies fully remediate competitive concerns; for example, by ensuring divestiture locations are chosen to maintain robust employer competition, or that such settlements are rejected if there is no divestiture that preserves both product market and labor market competition.

Lastly, the guidelines should make clear that employment, compensation, or workplace quality reductions that result from eliminating *competition* between employers are merger-specific harms and cannot be claimed as a cognizable merger efficiency.\textsuperscript{61}

**Conclusion**

We encourage the DOJ and the FTC to update the Horizontal Merger Guidelines in a manner that builds on the advances made in 2010 and reflects the accumulation of evidence that merger enforcement has been too lax in recent decades. To be effective, updated Guidelines must clearly explain how the Agencies investigate and analyze horizontal mergers in a way that will be convincing to the courts as they seek to determine whether a merger “may substantially lessen competition.” We emphasize (1) how the Hypothetical Monopolist Test can properly lead to narrow relevant markets in which market concentration can be measured, (2) how mergers may

\textsuperscript{60} Prager and Schmitt, *supra* note 58.

\textsuperscript{61} Hemphill and Rose, *supra* note 57, at 2082.
substantially lessen future competition even if they do not substantially increase current market concentration, and (3) how mergers of competing employers can harm workers.

As highlighted in the RFI, a number of additional topics are ripe for updating based on past experience and new learning. Though space limitations preclude detailed discussion here, we would highlight these additional topics:

- **Coordinated Effects:** The Agencies could do more to explain the industry conditions under which the Agencies are likely to find that a merger may lessen competition based on coordinated effects. For example, Jonathan Baker and Joseph Farrell suggest that “a detailed competitive effects analysis should turn on whether the coordinated effects concern principally involves purposive or nonpurposive strategic conduct.”

- **Efficiencies:** The Agencies could signal greater skepticism about the prevalence of cognizable efficiencies, especially for mergers that otherwise present competitive problems. Skepticism is warranted because there is no robust body of empirical evidence showing that most mergers realize cognizable efficiencies. Updated HMGs could restore language from the 1982 Guidelines, which stated that any efficiencies must be proven by “clear and convincing evidence” and that efficiencies are only considered in “extraordinary cases” that would otherwise be “close cases.” The Agencies could be especially skeptical of claimed efficiencies for mergers that “tend to create a monopoly.”

- **Serial Acquisitions:** The Agencies could explain how they handle serial acquisitions, where a series of acquisitions by a single firm over time may substantially lessen competition, even if no individual acquisition does. One approach would be to challenge a whole series of acquisitions that collectively harms competition, including a number that have been consummated, when some threshold of harm is reached.

- **Settlements:** Updated HMGs might address the deep connections between how the Agencies analyze horizontal mergers and how they assess proposed remedies. They could explain the circumstances under which the Agencies disfavor settlements of anticompetitive mergers, and why. In many cases, the Agencies evaluate a merger together with a remedy that the merging parties have proposed, either during the investigative phase or the litigation phase. Updated HMGs could discuss the Agencies’ experience with various remedies, both structural and behavioral, including remedies that failed to protect competition. They could state, for example, that while contracts can mitigate the anticompetitive effects of a merger in the short term, they are not a substitute for competition, especially over the longer term. Updated HMGs could clearly enunciate the principle that eliminating competitive overlaps does not itself remediate harm; an acceptable remedy must restore the competition that would otherwise be eliminated by

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63 See Rose and Sallet, *supra note 7*.

64 See Section V.A of the 1982 Merger Guidelines, “Efficiencies.”

65 In *United States v. AT&T*, 916 F.3d 1029 (2019), the D.C. Circuit even credited letters sent out by AT&T, one week after the DOJ went to court to stop the merger, “irrevocably offering” to engage in arbitration for seven years.
the merger. The guidelines could apply this principle to explain why there is a strong presumption that acceptable divestitures involve a coherent collection of assets and capabilities with a proven track record of competing effectively. They also could explain why this principle means that in practice there may be no remedy, short of stopping the merger altogether, that will prevent the harm from an anticompetitive merger.