SIE’s Observations on the CMA’s Addendum to the Provisional Findings

I. Introduction

1. This paper, submitted on behalf of Sony Interactive Entertainment LLC (“SIE”), contains observations on the CMA’s Addendum to its Provisional Findings (the “Addendum”), published on March 24.

2. The CMA’s reversal of its position on its consoles theory of harm is surprising, unprecedented, and irrational. The Provisional Findings (“PFs”) assessed a significant body of evidence in the round to support its finding that Microsoft would have the ability and incentive to withhold Activision content, and that this would substantially lessen competition by foreclosing PlayStation. In assessing this body of evidence, the PFs emphasised – consistent with jurisprudence on the CMA’s duty to assess evidence1 – that it is “particularly important in this case to assess the Merged Entity’s incentives to foreclose by considering all the available evidence in the round,” rather than to focus on a single model (PFs, para. 7.399).

3. The Addendum takes a diametrically opposite approach and focuses almost exclusively on a single economic model on which it places “significantly more weight” than other available evidence (Addendum, para. 1.2). That model, which is based on the lifetime value (“LTV”) of an average gamer, is used to estimate Microsoft’s incentives to make Call of Duty exclusive to Xbox. The PFs contained a similar analysis based on then-available LTV data, which found that Microsoft would have “strong incentives to foreclose” (PFs, para. 7.338). The Addendum reaches a different conclusion based on new assumptions and preliminarily concludes that a revised LTV model suggests that “making Call of Duty exclusive to Xbox would result in a significant financial loss for Microsoft post-Merger” (Addendum, para. 1.2), and, as a result, that Microsoft would not have an incentive to withhold Call of Duty.

4. The Addendum does not, however, reverse the PFs’ finding that Microsoft would have the ability to foreclose PlayStation or its determination that such foreclosure would substantially lessen competition. Nor does it call into question other evidence establishing Microsoft’s incentives to foreclose, including the “strategic value to Microsoft” of expanding Game Pass (PFs, para. 7.299)2 and financial modelling considered to be subject to “underestimation” which found that Microsoft’s incentives to

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1 The CMA has an “overriding obligation in the conduct of its obligation” to “ensure that there is a sufficient basis for its decision in light of the totality of the evidence available to it.” See JD Sports Fashion Plc v. CMA [2020] CAT 24, para. 153. See too Merger Assessment Guidelines, CMA129, para. 2.28, which requires CMA to base its conclusions on “all the available evidence assessed in the round.”

2 See too Microsoft’s Response to the CMA’s Phase 1 Decision (October 11, 2022), para 4.2, fourth bullet (“Xbox may differentiate Game Pass by including Activision Blizzard games in Game Pass, whilst not making the titles available in the same manner or at the same time on other subscription services”).
foreclose are “broadly neutral” (i.e., not that Microsoft would make “significant losses,” as the Addendum now suggests). As to Microsoft’s past behaviour following acquisitions, the Addendum does not include any new evidence calling into question the PFs’ original assessment. Rather, it notes that the CMA simply places “less weight” on that evidence.

5. Given that the revised LTV model now assumes paramount significance in the CMA’s assessment, it is essential that it not only be robust, but that it be more robust than other evidence showing Microsoft’s incentive to foreclose. SIE respectfully questions whether this can be the case for any model, in particular given the CMA’s explanation that “quantitative modelling is subject to uncertainties and has to rely on assumptions where information is imperfect,” which “limits the weight we can give this type of evidence” (PFs, para. 7.399). More specifically, reliance on the revised LTV model is unsound because it includes serious conceptual errors that bias the analysis in favour of finding that Microsoft does not have an incentive to foreclose.

6. This paper, which is supported by an economic submission authored by Cornerstone Research provided at Annex 1, shows the following:

- The Addendum’s revised LTV model is vitiated by conceptual errors (Section I).
- The Addendum’s revised discussion of Microsoft’s past acquisitions and strategic objectives cannot be squared with the evidence and the CMA’s previous assessment (Section II).
- The Addendum’s U-turn on the PFs’ findings that Microsoft would have the ability to partially foreclose PlayStation is unsustainable (Section III).

II. The Addendum’s Revised LTV Model Is Vitiated By Conceptual Errors

7. The Addendum’s revised LTV model includes four serious conceptual errors, as expanded by the paper from Cornerstone Research at Annex 1 and summarised below.

8. Error 1: The Addendum understates the gains to Microsoft from foreclosure by around 70%. The revised LTV model appears to be based on platform LTVs for average users (Addendum, para. 4.2). The model understates the gains from foreclosure to Microsoft by a wide margin, because it fails to take into account the following three factors:

- First, highly-engaged Call of Duty users (i.e., the users that the CMA says will switch to Xbox) generate significantly higher spending than average platform users. SIE data show that these highly-engaged Call of Duty users generate about [30%] the platform spend of the average platform user.

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3 PFs, paras. 7.334-7.337, and Appendix E, paras. 26-56.
4 See, e.g., Cornerstone Research, Economic Analysis of Microsoft’s Incentive to Withhold Call of Duty from PlayStation (August 30, 2022), which used SIE data to demonstrate that Microsoft would have a clear incentive to foreclose PlayStation.
Second, using LTVs to measure Microsoft’s gains, while estimating Microsoft’s losses simply by multiplying the losses for one year by 5 (as the Addendum suggests, para. 4.9) is internally inconsistent. This methodology assumes ongoing losses from new Call of Duty users on PlayStation over the five-year period, but that no such new users would ever consider switching to Xbox. This error understates the gains from foreclosure by $ [%].

Third, post-Transaction, Call of Duty will be a first-party title, so Microsoft will not pay a margin to Activision for sales of Call of Duty. The margin paid to a third-party publisher would typically be around $ [%] of the retail price and could be higher in the case of Call of Duty. As a result, Call of Duty spend on Xbox will be $ [%] times more profitable to the merged entity than it presently is to Microsoft.

9. The combined effect of these three errors causes the Addendum to understate the gains to Microsoft from foreclosure by at least 70%. Put differently, the real gains from foreclosure that should be used in the analysis are at least three times higher than those estimated by the Addendum. Correcting these three errors increases the gains to Microsoft from foreclosure from $ [%] to $ [%] per user. The chart below indicates the magnitude of the Addendum’s three errors when it comes to estimating Microsoft’s gains from foreclosure:

Correcting the Addendum’s Errors Would Triple Microsoft’s Gains from Foreclosure

10. Error 2: The Addendum unquestioningly adopts Microsoft’s *ex post* submissions and ignores its contemporaneous business documents. The CMA’s original LTV analysis that found strong incentives to foreclose had relied on an LTV estimate based on Microsoft’s contemporaneous documents created “*in the ordinary course of business*” (PFs, Appendix E, para. 61(a)). The Addendum discards this contemporaneous evidence and instead adopts, without apparent explanation, Microsoft’s adjusted LTV estimates.

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5 The data sources and methodology are explained in Annex 1.
that are lower than those in its contemporaneous documents and were created solely for
the purposes of this proceeding (Addendum, para. 4.6). This is difficult to understand
and is not consistent with the CMA’s practice on the assessment of evidence.6

11. **Error 3: The Addendum wrongly downplays the “significant” strategic benefits to
Microsoft adding Activision content to Game Pass.** Microsoft’s ordinary course LTVs
used in the PFs’ original analysis did not include the strategic benefits of adding
Activision content to Game Pass, because they were based on customers acquired pre-
Transaction in 2021 (PFs, para. 61(a)). It follows that the revised LTV based on
Microsoft’s submissions (which are even lower) must not capture this benefit either.
Indeed, the Addendum expressly accepts that the revised LTVs do not account for
“strategic considerations related to the growth of Game Pass” (Addendum, para. 4.25).
But adding Activision titles to Game Pass reflects a meaningful expansion of content that
can be expected to increase Game Pass adoption, especially if Activision titles are
available on Game Pass on a privileged basis, which is exactly what Microsoft has told
the CMA is going to happen.7

12. Indeed, the PFs found that the expansion of Game Pass “would have significant strategic
value to Microsoft that would represent a gain that goes beyond the sale of consoles and
games to the cohort of consumers that would switch in response to a foreclosure strategy”
(PFs, para. 7.299). The Addendum does not challenge this finding but simply asserts that
these “significant” long-term benefits are not expected to mitigate the losses suggested
by the revised LTV model. This assertion is not consistent with the CMA’s duty to base
its decisions on evidence, rather than speculation.8 Moreover, while the PFs could
conservatively ignore these strategic long-term benefits because it had found an incentive
to foreclose on a static basis, the converse does not hold. The CMA cannot rationally
ignore these significant strategic long-term benefits while holding, based on the static
LTV analysis, that Microsoft would not have an incentive.

13. **Error 4: The Addendum erroneously speculates that not a single user with less than
10 hours of gameplay or $100 of spend on Call of Duty would switch.** The
Addendum’s finding that Microsoft would suffer financially from making Call of Duty
exclusive is based on the unsupported speculation that not a single user that did not have
at least 10 hours of gameplay or $100 of spend on Call of Duty would switch (Addendum,
para. 4.11). As the Addendum explains, assuming no switching for this group represents
the “extreme of a possible range of switching” (Addendum, para. 4.11). The Addendum
nevertheless adopts this extreme assumption without explanation, even though evidence

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6 In *Sabre / Farelogix* (2020), the CMA highlighted the “importance of internal documents” (paras. 9.3
and 9.5). See also Case No. COMP M.7932 *Dow / Dupont* (2017), where the European Commission
observed that “internal documents can prove to be an especially useful source of evidence” and are
“frequently crucial” (para 44).

7 Microsoft’s Response to the CMA’s Phase 1 Decision (October 11, 2022), para 4.2, fourth bullet (“Xbox
may differentiate Game Pass by including Activision Blizzard games in Game Pass, whilst not making
the titles available in the same manner or at the same time on other subscription services”).

8 The CMA’s findings must be “securely rooted in the evidence” and the CMA cannot “leap to any
conclusion” without “robust evidence”. Absent robust evidence, it is insufficient for the CMA simply to
record its “belief” that certain effects will be produced or to engage in “speculation” as to such effects.
See *JD Sports Fashion Plc v. CMA* [2020] CAT 24, paras. 31, 131, 141, 142, 152, 154; and *Tesco Plc v
CC* [2009] CAT 6, para. 150.
on the record shows that a considerable portion of this cohort of users would likely switch:

• First, SIE’s ordinary course survey, which the CMA has on file, found that [\%] of all PlayStation 4 or PlayStation 5 owners would [\%] to switch to an Xbox Series X/S [\%]. This figure applied to all gamers, not just highly engaged Call of Duty gamers; the fact the switching figure was so close to the CMA’s consumer survey for highly-engaged Call of Duty users indicates that the Addendum’s decision to discount switching from the less than 10 hour and $100 cohort entirely is an extreme assumption that biases the analysis in favour of finding no incentive to foreclose.

• Second, Microsoft’s licensing proposal to Sony of [\%] would trigger a payment by SIE to Microsoft equivalent to [\%] on a Call of Duty title. Microsoft’s negotiating posture is consistent with Microsoft viewing even [\%] with Call of Duty as meaningful to platforms and users.

• Third, the cinematic single-player campaign length of Call of Duty is around 6-8 hours. Completing the main story of the last two Call of Duty releases, Call of Duty: Vanguard and Call of Duty: Modern Warfare II, reportedly takes 6 and 8 hours, respectively. See How Long to Beat, Call of Duty: Vanguard (accessed March 30, 2023) and How Long to Beat, Call of Duty: Modern Warfare II (2022) (accessed March 30, 2023).

By assuming that no gamers with less than 10 hours of gameplay would switch, the Addendum ignores gamers who buy Call of Duty just to play the single-player campaign. But those players may still be committed to playing each new release of Call of Duty and therefore be highly relevant as potential switchers.

14. Overall, the Addendum’s position that not a single gamer with less than 10 hours of gameplay or $100 of spend would switch in response to Microsoft’s making Call of Duty exclusive is pure conjecture. This conjecture is not consistent with the CMA’s duty to base its decisions on evidence rather than speculation.12

III. The Addendum’s Re-Assessment Of Microsoft’s Acquisitions And Strategic Objectives Does Not Fit The Evidence

15. The PFs and Addendum explain that Microsoft has acquired a “range of gaming studios over the past few years and, with very few exceptions, has made their future releases of games exclusive or redirected the efforts of studios to produce exclusive Xbox games”

The PFs explained that Microsoft’s past conduct was “informative” when assessing its future intentions for *Call of Duty* and found that Microsoft’s post-acquisition conduct with respect to Bethesda games “reveal its real-world incentives” (PFs, para. 7.288). As the CMA knows, the European Commission found that Microsoft would not have an incentive to foreclose access to Bethesda games, although it has in fact done so. The PFs therefore observed that “static incentives analyses developed in the context of a merger inquiry may fail to capture significant unstated commercial incentives” (PFs, para. 7.288).

16. The Addendum gives two reasons to support its relegation of evidence of Microsoft’s past conduct. Neither justifies the change in position.

17. **Minecraft is not probative of Microsoft’s incentives.** The Addendum cites *Minecraft* as the sole example of a game acquired by Microsoft that continued to be licensed to other platforms. The Addendum does not reach a conclusion on the probative value of *Minecraft* (Addendum, para. 4.18), although it seems to place more emphasis on this single example than the PFs had done (Addendum, para. 4.23). For the avoidance of doubt, the experience of *Minecraft* says nothing about whether Microsoft could pursue exclusivity for *Call of Duty*:

- First, *Minecraft* is very different from *Call of Duty*: it is a single release game that is already in users’ hands (having first been released in 2011); it operates in a virtually infinite game world with blocky graphics (as a result of which it is not a major showcase of a new console’s technical capability); and it has no “goals” of the kind that are important to gamers who play *Call of Duty* (i.e., objectives that determine what a player has to do to win a game and therefore give the player a sense of accomplishment and progression). As the PFs found, *Minecraft*’s “legacy monetisation model of a one-time fee for lifetime access and updates ... differs significantly from Call of Duty, where users buy the new premium iteration of the game every year for a higher fee” (PFs, para. 7.285).

- Second, *Minecraft* does not drive anything like the level of gameplay, engagement, or purchasing decisions as *Call of Duty*. It has [3X] of *Call of Duty* players and MAUs; it has substantially lower user engagement compared to *Call of Duty*; and it has limited impact on console purchasing decisions. *Call of Duty* revenues from 2017–2022 were over [3X] times those of *Minecraft*.

- Third, Microsoft has nonetheless deployed *Minecraft* exclusivity where it suits its strategic interests. In particular, Microsoft has blocked Chrome OS’s access to *Minecraft*’s consumer edition, instead making available only *Minecraft: Education Edition*, a version intended for students and teachers (not consumers). This evidences Microsoft’s intentions to withdraw games from rival platforms when it

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13 This is not disputed by Microsoft (Addendum, para. 4.17).
14 Case M.10001 *Microsoft / Zenimax*, para 124.
15 See SIE’s Observations on Differences Between *Minecraft* and *Call of Duty* (March 14, 2023).
serves its goals of dominance – be it in operating systems, consoles, multi-game subscription services, or cloud gaming.

18. **By contrast, Microsoft’s conduct following the ZeniMax acquisition is highly probative of Microsoft’s post-Transaction incentives with respect of Call of Duty.** The Addendum suggests that Microsoft acquired many of the studios whose games it then made exclusive in order to acquire the talent in those studios “with the specific purpose of making exclusive games for its platform” (Addendum, para. 4.20). The acquisition of Activision has a similar objective – to acquire talent.16

19. The Addendum acknowledges that Microsoft’s acquisition of ZeniMax involved a major studio that, like Activision, publishes “regular releases of popular gaming franchises available on different platforms” (Addendum, para. 4.20). As the CMA is aware, since Microsoft acquired ZeniMax, Microsoft announced that future ZeniMax titles – including *Starfield*, *Elder Scrolls VI*, and *Redfall* – will be Xbox exclusives. In so doing, Microsoft reversed assurances made prior to the ZeniMax acquisition that Microsoft “would not have the incentive to cease or limit making ZeniMax games available for purchase on rival consoles”17 and statements that it “highly encourage[s] cross-platform play [because] if it’s good for the gaming ecosystem, it’s good for us... What we’ll do in the long run is we don’t have intentions of just pulling all of Bethesda content out of Sony.”18

20. And just last week, two days before the Addendum was published, on March 22, the video game trade publication IGN published fresh evidence in the form of an interview with *Redfall*’s creative director, Harvey Smith, that provides additional insight into Microsoft’s strategy.19 Like *Call of Duty*, *Redfall* is a first-person shooter game that features both single player and cooperative multiplayer modes. In his interview with IGN, Mr. Smith explained that *Redfall* was originally planned to be released on all platforms, including PlayStation, but once Microsoft acquired Bethesda, there was a “huge sea change ... [Microsoft] said, ‘No PlayStation 5. Now we’re gonna [sic] do Game Pass, Xbox, and PC.’”20 He also explained that ZeniMax “was working on a PlayStation 5 version of the game” until Microsoft bought ZeniMax. After the

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16 The PFs explain that “Call of Duty has a large number of developers working on it to enable the frequent releases” with “four rotating lead studios” that are dedicated solely to creating new versions of *Call of Duty* (PFs, para. 9.30). See also “The combination of Activision Blizzard’s world-class talent and extraordinary franchises with Microsoft’s technology, distribution, access to talent, ambitious vision and shared commitment to gaming and inclusion will help ensure our continued success in an increasingly competitive industry.” Microsoft News Center, Microsoft to acquire Activision Blizzard to bring the joy and community of gaming to everyone, across every device (January 18, 2022); HR Dive, Microsoft acquired Activision Blizzard. How will it deal with a tarnished HR reputation? (January 31, 2022) (“One of the key reasons that Microsoft is doing this is to acquire talent, and the last thing you want to do is make decisions that would cause talent to leave the organization”).

17 Microsoft/ZeniMax Case COMP/M.10001, Commission Decision, para. 114.

18 Tim Stuart, Microsoft Corporation (MSFT) Management Presents at Jefferies Interactive Entertainment Virtual Conference (Transcript), Seeking Alpha (November 13, 2020).

19 George Yang, Microsoft Scrapped a PS5 Version of Redfall, Says Arkane Director, IGN (March 22, 2023).

20 Ibid.
acquisition, Microsoft “then canned the [PlayStation 5] port.”\textsuperscript{21} Even though the studio had already put in the work to make a PlayStation version of the game, Microsoft decided to terminate this work and make the game exclusive to Xbox.

21. This experience provides further compelling evidence of Microsoft’s ability and incentives to foreclose rivals to acquired games, together with its likely conduct post-Transaction with respect to \textit{Call of Duty}.

IV. \textbf{The Addendum’s Position That Microsoft Has The Ability To Totally, But Not Partially, Foreclose PlayStation Is Not Sustainable}

22. Almost as an afterthought, the Addendum reconsiders the PFs’ original finding that Microsoft would have the ability and incentive to engage in partial foreclosure by degrading PlayStation’s access to \textit{Call of Duty}. It does not, however, follow that, even if the Addendum were correct about Microsoft’s incentives regarding total foreclosure, it would have no incentive to engage in partial foreclosure. Partial foreclosure strategies may in the short-term be more profitable and easier to implement (including because they trigger fewer gamer complaints) than total foreclosure (because Microsoft would still secure revenues from sales of \textit{Call of Duty} on PlayStation for a transitional period while it degraded quality or access), while nevertheless having the same long-term result: foreclosure of PlayStation (PFs, paras. 7.336-7.337).

23. Today, Activision goes to great lengths to promote console competition by releasing an equally high-quality \textit{Call of Duty} game on PlayStation and Xbox while making use of their somewhat different technical capabilities. Post-Transaction, Microsoft would have different incentives because degrading the experience on PlayStation would benefit Xbox, PlayStation’s “closest rival” (PFs Summary, para. 53). Microsoft would have no incentive to make use of the advanced features in PlayStation not found in Xbox. Yet the Addendum claims that Microsoft would not have the ability to engage in partial foreclosure. It does so despite its recognition that \textit{Call of Duty} is critically important for console competition and that fully withholding \textit{Call of Duty} would foreclose PlayStation. The Addendum’s implication is that Microsoft could degrade \textit{Call of Duty} on PlayStation (including simply by not making it as good as it could be), raise its price, release the game at a later date, or make it available only on Game Pass \textit{without harming competition between PlayStation and Xbox}.

24. This finding is unsubstantiated and inconsistent with the evidence. It appears to be based on speculation that the “\textit{deterioration}” in \textit{Call of Duty} would be “\textit{modest}” and, as a result, that the CMA “\textit{would expect only a fraction of gamers would switch to Xbox}” (Addendum, para. 5.6). Yet it is difficult to conceive of an industry where consumers are more attuned to quality and where quality affects purchasing decisions. \textit{Call of Duty} gamers are passionate, knowledgeable, and sophisticated. Gamers engage with each title in the franchise immediately after its release, are keenly aware of a game’s price, quality,

\textsuperscript{21} Zack Zwiezen, \textit{Xbox Cans PS5 Version of Big Game Despite All The Talk About Player Choice}, Kotaku (March 22, 2023).
and features, and regularly compare the quality, performance, and features of their favourite games across PlayStation and Xbox.\(^{22}\)

25. By way of example, within a week of releasing *Modern Warfare II*, Digital Foundry, a leading analyst, compared performance on PlayStation 5 and Xbox Series X and S. Another industry specialist, VG Tech, compared the frame rates of *Modern Warfare II* across PlayStation 5 and Xbox Series X.\(^{23}\) Studies show that these types of comparisons are highly influential. As shown in the figure below, the level of social conversation surrounding consoles and games is extremely high.

**Gamers Regularly Discuss and Compare Their Consoles and Games**

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26. Conversations in forums, chatrooms and public gaming sessions confirm that gamers are very conscious of the slightest changes in a game’s performance.\(^{24}\) As the highly confidential figure below shows, details such as crashes, freezes and glitches, as well as graphics and load times, have a significant impact on consumer satisfaction.

**Gamers Are Perceptive Consumers With High Expectations**

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27. Any degradation in the price, performance, or quality of play on PlayStation or any delays on release would quickly harm SIE’s reputation and cause a loss of engagement and of players. As SIE’s CEO, Jim Ryan, explained to the CMA at the Remedies Hearing, if PlayStation received a degraded version of *Call of Duty*, it would “seriously damage our reputation. Our gamers would desert our platform in droves and network effects would exacerbate the problem. Our business would never recover.”

28. The Addendum appears to ignore this testimony, together with other evidence showing the sensitivity of gamers, and assumes that, even though *Call of Duty* is acknowledged to be important for console competition, it could be degraded without causing gamers to switch. This speculation is unsubstantiated, inconsistent with the facts, and cannot rationally support a decision to find that no SLC will arise in consoles.

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\(^{22}\) See Digital Foundry, *Call of Duty Modern Warfare 2: DF Tech Review - Amsterdam vs Reality Comparison + PS5 vs XSX Tested!* (November 4, 2022) and VG Tech, *Call of Duty Modern Warfare 2 PS4/Pro vs Xbox One X/S Frame Rate Comparison* (November 12, 2022). Both Digital Foundry and VG Tech found that the technical quality of *Modern Warfare II* was similar across platforms. Both Digital Foundry and VG Tech found that the technical quality of *Modern Warfare II* was similar across platforms.


\(^{24}\) By way of example, one player noted (with several others concurring) that at “[f]or 30fps [frames per second] from last gen consoles generally feels fine to me. Play a while at 60 or 120fps and go back to 30fps it feels a bit choppy and weird” and another player explained that “…people have a right to be picky considering a game costs 60 bucks, there should be some certain expectations of quality after paying that amount of money.” Reddit, *Gamers, why is everybody so picky now a days?* and Giantbomb, *Are Gamers To Picky.*
V. Conclusion

29. In conclusion, SIE respectfully submits that the Addendum does not justify the CMA’s U-turn on the consoles theory of harm. The revised LTV model is vitiated by errors that bias the model to finding no incentive to Microsoft to foreclose. The Addendum jettisons, without sound reason, the PFs’ thorough analysis of other evidence establishing Microsoft’s incentives. And the Addendum’s partial foreclosure discussion is based on pure speculation, rather than evidence. To reach a robust decision, the CMA should revisit its analysis of Microsoft’s incentives and partial foreclosure, correcting for the errors identified in this paper.