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Judge Koh's Monopolization Mania: Her Novel Antitrust Assault Against Qualcomm Is an Abuse of Antitrust Theory

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Richard A. Epstein*

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I. INTRODUCTION: A BLOCKBUSTER DECISION

On May 21, 2019, Judge Lucy Koh handed down her decision in *Federal Trade Commission v. Qualcomm*,¹ one of the most important—and devastatingly misguided—decisions in the annals of antitrust law. At stake in this litigation was the entire business model of Qualcomm, which has long been acknowledged as one of the leaders in 5G technology, where it contains an extensive portfolio of patents and pending patent applications, estimated to number about 140,000.² The gist of the Federal Trade Commission’s (FTC) complaint was that Qualcomm, virtually from its inception, engaged in a set of unilateral monopolistic practices that allowed it to extract unreasonably high rates for the combination of its patented technologies and the chipsets that it supplies to original equipment manufacturers (OEMs), other than Qualcomm competitors. I shall examine the key allegations in the case, but it is critical at the outset to note the extensive nature of the injunctive relief that Judge Koh awarded on a *worldwide* basis.³ She was relentless in her condemnation: “In combination, Qualcomm’s licensing practices have strangled competition in the CDMA [code-division multiple access] and premium LTE [long-term evolution] modern chip markets for years, and harmed rivals, OEMs, and end consumers in the process.”⁴ She concluded that, in light of the ongoing nature of the Qualcomm violations, it was necessary to enter a sweeping injunction against the continuation of Qualcomm practices.⁵ The

1. Fed. Trade Comm’n v. Qualcomm Inc., No. 17-CV-00220-LHK, 2019 WL 2206013 (N.D. Cal. May 21, 2019).

2. *Id.* at *3.

3. *Id.* at *15.

4. *Id.* at *130.

5. *Id.* at *135 (noting that the FTC “seeks and requests” the following injunctive relief from the Court: “(1) Prohibit Qualcomm from conditioning the supply of modem chips on a customer’s patent-license status; (2) Require Qualcomm to negotiate or renegotiate, as applicable, license terms with customers in good faith under conditions free from the threat of lack of access to or discriminatory provision of modem chip supply or associated technical, software, or other support; (3) Require Qualcomm to submit, as necessary, to arbitral or judicial dispute resolution to determine reasonable royalties and other license terms should a customer choose to pursue such resolution; (4) Require Qualcomm to make exhaustive SEP licenses available to modem-chip suppliers on fair, reasonable, and non-discriminatory terms and to submit, as necessary, to arbitral or judicial dispute resolution to determine such terms; (5) Prohibit Qualcomm from discriminating or retaliating in any way against any modem-chip customer or modem-chip supplier because of a dispute with Qualcomm over license terms or because of a customer’s license status; (6) Prohibit Qualcomm from making payments or providing other value contingent on a customer’s agreement to license terms; (7) Prohibit Qualcomm from entering express or de facto exclusive-dealing agreements for the supply of modem chips; (8) Prohibit Qualcomm from interfering with the ability of any customer to communicate with a government agency about a potential law enforcement or regulatory matter; (9) Require Qualcomm to adhere to compliance and monitoring procedures and appropriate ‘fencing in’ provi-

key elements of that relief were that Qualcomm had to (1) abandon its “no license, no chips policy” and offer all of its chips to both its competitors and OEMs on “exhaustive” licenses (those in which Qualcomm waives any effort to seek legal relief against any customer of its licensee) on fair, reasonable, and nondiscriminatory terms; (2) review the terms of each of its license agreements with all of its customers to see that they are issued on fair and reasonable terms; and (3) abstain from entering into “express or de facto exclusive-dealing agreements” with its customers.⁶

Judge Koh’s decision has received a rocky reception since its publication. On August 23, 2019, a unanimous panel of the Ninth Circuit granted a stay of the order pending its resolution on appeal.⁷ That decision applied traditional principles in order to reach three central conclusions. First, the Ninth Circuit held that Qualcomm had raised “serious questions” on the merits of the decision below. Second, Qualcomm had demonstrated the likelihood of “irreparable harm” absent a stay, and third that the balance of equities pointed toward a stay. The brief per curiam decision took issue with the two central conclusions of the district court decision that Qualcomm (1) has an antitrust duty to license its SEPs to rival chip suppliers, and (2) engaged in anticompetitive conduct by using its royalty rates to effectively impose a surcharge on competitive chips.⁸ On the first of these questions, the Ninth Circuit found that the duty to deal was far more limited than Judge Koh had concluded, so that in all but exceptional circumstances any firm is free to choose the parties to whom it wishes to sell and the prices on which those sales will take place. It also noted that the standard antitrust case law does not support the proposition that any party can engage in “monopoly leveraging” by the way in which it prices goods and services in two markets—in this instance, the market for chips and the independent market for Qualcomm technology that is sold separately from the chips. It also noted the unusual situation where the Department of Justice had filed its own brief to express its “stark disagreement” with the approach that the FTC had taken in this case.⁹ I know of nothing in this case which would lead the Ninth Circuit to reverse field when the briefing is completed, and I now firmly expect that the decision of Judge Koh will be overturned on

sions, including but not limited to a potential firewall between patent licensing and chip personnel; and (10) Impose any other relief that the Court finds necessary and appropriate to redress and prevent recurrence of Qualcomm’s conduct.”).

6. *Id.*

7. *Fed. Trade Comm’n v. Qualcomm Inc.*, No. 19-16122, 2019 U.S. App. LEXIS 25326 (9th Cir. Aug. 23, 2019).

8. *Id.*

9. *Id.* at *6.

this appeal. The remainder of this article, written before the interim stay was granted offers my arguments in favor of that conclusion.

Indeed, the decree gave rise to a remarkable intergovernmental dispute as the Department of Justice (DOJ), which has concurrent jurisdiction over antitrust matters, took the unprecedented step of filing its own papers before Judge Koh and asked that she go easy on the remedy stage of the case in the event that she found antitrust violations.¹⁰ The DOJ's filing provoked a fierce response from the FTC and its defenders, who branded the request as "untimely" and claimed that it "misconstrues applicable law and the record"¹¹ in what has to rank as one of the most profound public disagreements on antitrust policy between the FTC and DOJ.

Clearly the stakes in this decision are extraordinarily high both for its impact on Qualcomm and the 5G market, as well as for the future shape of antitrust law in the United States and across the globe. In light of the case's significance, it is important to review this decision in some detail, taking care to examine it using the proper conceptual framework for antitrust analysis. Antitrust law is a complex body of law that looks at a bewildering set of business practices, some benign and some not, in order to ferret out and stop various strategies of monopolization. The motivation for this approach is easy to spot.

The shift from a pure competitive regime to a monopoly regime always entails some element of social loss. The higher prices that are charged by the monopolist are not simply a distributional gambit, whereby the producer gains exactly the same amount of wealth that consumers lose. Why anyone should care about a zero-sum transaction is hard to see. Indeed, these distributional consequences are hard to disentangle because antitrust litigation typically involves litigation between different entities, both public and private, which makes it especially difficult to know how any given decision influences the wealth of individuals who often have stakes in the multi-layered entities on both sides of the dispute. To incur high administrative costs to rearrange the outcome of some zero-sum game is always a form of social waste. Therefore, the reason why the antitrust law focuses on monopoly power is that the exercise leads in most cases to a negative-sum game. The monopolist gains less than the consumers of that product

10. For a discussion of the intergovernmental dispute, see Claude Barfield, *The Justice Department's Unprecedented Intervention in the Federal Trade Commission Case Against Qualcomm: Implications for 5G*, AM. ENT. INST. (May 10, 2019), <https://www.aei.org/publication/the-justice-departments-unprecedented-intervention-in-the-federal-trade-commission-case-against-qualcomm-implications-for-5g/> [https://perma.unl.edu/WG7J-PKJB].

11. *FTC Calls DOJ Statement in Qualcomm Antitrust Case "Untimely," Says it "Misconstrues Applicable Law and the Record": Inter-Institutional Quarrel*, FOSS PATENTS (May 10, 2019), <http://www.fo SSPATENTS.COM/2019/05/ftc-calls-doj-statement-in-qualcomm.html> [https://perma.unl.edu/KAS4-NQ6F].

or service lose. The higher price exceeds the reservation price of at least some consumers, so as some consumers drop out of the market, fewer gainful transactions are completed.

There is one important correlative of the above analysis: the disastrous social consequences of mistakenly finding an antitrust violation from the practice of procompetitive strategies by firms that have a competitive advantage based on superior technology, better marketing, more astute management, or any combination of the above. This pattern is evident in the FTC case against Qualcomm, which relies on a novel monopolization theory that has little precedent in earlier case law on the subject. When this Article was first prepared, Qualcomm was fighting a two-front war. The first front was the FTC prosecution of the matter before Judge Koh. At the same time, a complicated second front started with a systematic attack by Apple, now settled, which had initiated its own antitrust litigation against Qualcomm as part of an ongoing dispute over the patent royalties that Apple owed Qualcomm.¹² Qualcomm also sued Apple for its misuse of Qualcomm trade secrets, which were alleged to have been shared improperly with Intel in order to allow Intel to build its own 5G chips to power the next generation of Apple smart devices.¹³ That was a spirited battle of titans until the case was settled suddenly and dramatically in April 2019, when Apple and Qualcomm dropped all claims against each other.¹⁴

The terms of the settlement called for all litigation to cease between the two companies. In addition, Apple renewed its license for a six-year licensing agreement by which Apple will power its new line of iPhones with Qualcomm chips, reversing its 2016 decision to obtain chips exclusively from Intel.¹⁵ It also appears that Apple will pay Qualcomm somewhere between 4.5 and 4.7 billion dollars for past roy-

12. Jacob Kastrenakes, *Apple and Qualcomm Drop All Lawsuits in Surprise Settlement*, THE VERGE (Apr. 16, 2019), <https://www.theverge.com/2019/4/16/18410985/apple-qualcomm-settle-royalty-dispute-patent-licensing-terms-high-fees> [https://perma.unl.edu/FK4J-NM8X].

13. *See* Complaint, *Qualcomm Inc. v. Apple Inc.*, No. 37-2017-00041389-CU-BC-NC (Cal. Super. Ct. Sept. 24, 2018). The relevant information is available at *Qualcomm Inc. v. Apple Inc.*, TRADE SECRETS INST. (June 30, 2019, 4:53 PM), <http://tsi.brooklaw.edu/cases/qualcomm-inc-v-apple-inc> [https://perma.unl.edu/GT5F-TCGA].

14. For the public announcement of their settlement, see *Qualcomm and Apple Agree to Drop All Litigation*, BUS. WIRE (Apr. 16, 2019), <https://www.businesswire.com/news/home/20190416005931/en/> [https://perma.unl.edu/8KBT-5CRF].

15. *See* Jean Baptiste Su, *Analysis: Apple to Drop Qualcomm Modems From Next iPhones for Intel, Samsung Wireless Chips*, FORBES (July 26, 2018, 12:39 AM), <https://www.forbes.com/sites/jeanbaptiste/2018/07/26/analysis-apple-to-drop-qualcomm-modems-from-next-iphones-for-intel-samsung-chips/#3d9e06fc4960> [https://perma.unl.edu/5W7L-NP3S].

alties.¹⁶ Within hours after this settlement was announced, Intel exited the 5G market amid rumors that it would be unable to meet its development goals in that space.¹⁷ The simplest explanation for all of these events is that Qualcomm's dominance in the advanced chip market was attributable to the excellence of its product, and not to the marketing practices that the FTC claims violate the antitrust laws. The Apple–Qualcomm settlement offers further confirmation that the FTC's suit was misconceived from the outset. Judge Koh did not allude to the Qualcomm–Apple settlement in her opinion,¹⁸ but substantial evidence appears to support the view that Apple returned to Qualcomm because of the superiority of Qualcomm chips.¹⁹

Accordingly, it is still important to offer a detailed analysis of the basic FTC case. To see how the matter plays out, this Article is organized in the following fashion. Part II describes the three different varieties of antitrust cases. The first are cases which deal with *per se* offenses, in which only narrow and specific justifications for certain practices are allowed in cartel-like situations where parties jointly limit output or divide territories. The second class of cases are “rule of reason” cases, where it is necessary to look closely at particular arrangements to see whether their restrictive consequences outweigh their efficiency gains. The third class involves cases of *per se legality*, where there is no antitrust duty at all, most notably in cases where the claim is that the antitrust law imposes a duty on one firm to deal with another. Once this typology is examined, in Part III I apply the scheme to the allegations in the FTC complaint against Qualcomm, which the government treats as a *per se* monopolization offense, but which is better regarded as either a rule of reason case or a case involving no antitrust duty at all. The consequences of the FTC's misclassification of its case against Qualcomm is serious in that it tends

16. For a brief account of the supposed settlement terms, see *Qualcomm Got \$4.7 Billion from Apple Settlement According to Earnings Release*, MACRUMORS (May 1, 2019, 1:29 PM), <https://www.macrumors.com/2019/05/01/qualcomm-apple-settlement-4-billion/> [<https://perma.unl.edu/7Y49-8CL9>].

17. Chaim Gartenberg, *Intel Says Apple and Qualcomm's Surprise Settlement Pushed it to Exit Mobile 5G*, THE VERGE (Apr. 25, 2019, 6:39 PM), <https://www.theverge.com/2019/4/25/18516830/intel-apple-qualcomm-surprise-settlement-pushed-exit-mobile-5g-modems> [<https://perma.unl.edu/SM5W-QT3R>].

18. See Fed. Trade Comm'n v. Qualcomm Inc., No. 17-CV-00220-LHK, 2019 WL 2206013, at *50–64 (N.D. Cal. May 21, 2019) (analyzing from 2007 to 2017, but not beyond that date).

19. See Kif Leswing, *Apple Reportedly Looked at Buying Intel's 5G Business, Showing Openness to Big Deals*, CNBC (Apr. 26, 2019, 3:27 PM), <https://www.cnbc.com/2019/04/26/apple-looked-at-intels-5g-business-wsj.html> [<https://perma.unl.edu/6VX-T4H7>] (“Intel currently provides LTE modem chips for Apple's current generation of iPhones. But Qualcomm's modem chips are widely considered to be superior, and Apple said it will buy Qualcomm chips again after a bitter legal battle between the two companies was settled last week.”).

to suppress the competition and innovation that the antitrust laws are supposed to advance.

II. THE TYPOLOGY OF ANTITRUST OFFENSES

A. *Per Se* Offenses

The conditions under which *per se* offenses are likely to happen are generally well understood. The major threat in these cases is some kind of a horizontal arrangement whereby rival suppliers band together to reduce output or divide territories in order to gain those precious monopoly rents. The social losses in these cases are easy to detect, so that the prohibition is easy to state, even if the horizontal arrangements are in some cases difficult to detect. Accordingly, the main challenge in these cartelization cases lies in figuring out the best set of remedies, both public and private, to stymie those threats.

The somewhat harder cases involve situations where two or more firms decide to merge or otherwise combine their operation, which could have the same consequences of reducing output and raising prices. But in these cases the added complication is that some mergers have only modest influence on prices or output while introducing certain joint efficiencies so that the fewer number of firms can actually produce offsetting gains for consumers.²⁰ In these cases, the positive and negatives are both present, but they are often hard to balance out. Hence the law adopts an intermediate strategy; the so-called rule is a rule of reason which tries, with difficulty, to make some assessment of the relevant magnitude of the gains or losses, and in most cases does little to resist mergers that leave four, perhaps even three, major firms in the marketplace.

B. Rule of Reason Cases

A second portion of the antitrust docket deals with some kind of vertical arrangement whose terms are fully stated on the record—concealment is not an issue. The legal game is now a form of double-dummy bridge, and the legal challenge here is to find out whether the anti-monopolization rationale applies to these cases. The initial problem in these vertical situations is that there is no strong theory of how the actions of any single party can proactively manipulate its prices or terms in ways that impose monopoly losses on anyone else. It is therefore necessary to look hard at these cases before finding any antitrust violation.

The first part of the problem is that all the actions of single parties that result in the acquisition of some degree of monopoly do not make

20. Oliver Williamson, *Economies as an Antitrust Defense: The Welfare Trade Offs*, 58 AM. ECON. REV. 18 (1968).

out the case for government intervention. The standard formulation, which raises as many problems as it answers, is the key holding in *United States v. Grinnell Corp.*,²¹ which states that the government can only make out a monopolization case by showing: “(1) the possession of monopoly power in the relevant market and (2) the willful acquisition or maintenance of that power as distinguished from growth or development as a consequence of a superior product, business acumen, or historic accident.” There are difficulties defining the relative market, and the best guideline is still that which comes out of the DOJ and the FTC in their 2010 Horizontal Merger Guidelines, neither cited nor discussed by Judge Koh. The DOJ and FTC made the following observation: “Market definition focuses solely on demand substitution factors, i.e., on customers’ ability and willingness to substitute away from one product to another in response to a price increase or a corresponding non-price change such as a reduction in product quality or service.”²² To measure that degree of substitutability, the DOJ and FTC rightly stress that the product market cannot be defined either too broadly or too narrowly. Thus, in examining a merger between two motorcycle companies, they caution against defining the market so broadly that it includes cars, given the obvious dilution that it would pose to the respective market shares of the two merger applicants. By the same token, they recognize that the market cannot be defined too narrowly, such that there is one market for large motorcycles and another one for small motorcycles. At this point, no merger could be attacked if two competitive firms are placed into distinct, adjacent markets, even though there is substantial demand and substitutability.

This analysis applies to liability on monopolization claims under Section 2 of the Sherman Antitrust Act (the Sherman Act), and the parallel provisions dealing with monopolization under Section 5 of the Federal Trade Commission Act (the FTC Act), with its general injunction against “unfair methods of competition,” both of which were invoked by Judge Koh in her opinion.²³ Indeed on August 13, 2015, the FTC issued a one page statement of principle that stressed that the unfair methods of competition under Section 5 should be tested against a general standard of consumer welfare that requires, in essence, that the FTC only bring enforcement actions in cases where it could identify conduct likely to cause “harm to competition or the competitive process, taking into account any associated cognizable effi-

21. *United States v. Grinnell Corp.*, 384 U.S. 563, 570–71 (1966).

22. U.S. DEPT. OF JUSTICE & FED. TRADE COMM’N, HORIZONTAL MERGER GUIDELINES (2010).

23. *Qualcomm*, 2019 WL 2206013, at *13.

ciencies and business justifications.”²⁴ The lone dissenter of that statement was then-Commissioner Maureen Ohlhausen, who was concerned that the proposed policy did not go far enough to rein in potential abuse by the FTC.²⁵

There are, if anything, even greater difficulties in making out the sharp dichotomy between the legal and illegal methods of monopoly acquisition or maintenance. The case that is most protected is one in which a firm succeeds through internal growth without gaining assets through any kind of merger. But the converse is hardly true because there are many sensible acquisitions that improve efficiency without allowing any firm to impose restrictive practices on the market. And where the course of business can last for many years, it is expected that in many cases product excellence may be augmented in some uncertain proportion by some restrictive practice.

It is widely understood, for example, that a patent’s key function is to give the patent holder the *exclusive* right to sell the good in question during the patent period. Notably, the patent law contains the notion of a “pioneer patent,” nowhere discussed by Judge Koh, which gives a broad scope of application to patents that introduce transformative technologies.²⁶ No matter how broadly a patent is construed, the grant of a patent does not necessarily allow the patent holder to market its goods in that period. Outside the patent, other impediments against sale, such as the failure to obtain approval from the Food and Drug Administration (FDA), could block the patented activity and lead to necessary extensions in the protected period, such as those under the Hatch-Waxman Act.²⁷ Within the antitrust framework, *Jefferson Parish Hospital Dist. No. 2 v. Hyde*²⁸ and its progeny have held exclusive dealing and tie-in cases—both of which presuppose a defen-

24. *FTC Issues Statement of Principles Regarding Enforcement of FTC Act as a Competition Statute*, FED. TRADE COMM’N (Aug. 13, 2015), <https://www.ftc.gov/news-events/press-releases/2015/08/ftc-issues-statement-principles-regarding-enforcement-ftc-act> [https://perma.unl.edu/ZX9A-S5JF] [hereinafter *FTC Issues Statement*].

25. Fed. Trade Comm’n, Dissenting Statement of Commissioner Maureen K. Ohlhausen, FTC Act Section 5 Policy Statement (Aug. 13, 2015).

26. For the simplest statement on this point, see *Pioneer Patent Law and Legal Definition*, USLEGAL, <https://definitions.uslegal.com/p/pioneer-patent/> [https://perma.unl.edu/V6HT-ZDWY] (“Pioneer patent refers to a patent that covers a function or a major technological advance never before performed . . . Under the U.S. law, the claims relating to a pioneer patent are entitled to broader interpretation and therefore, should be given a broader range of equivalents.”). The last phrase refers to the doctrine of equivalents, which allows a patentee to sue for infringement, a device not explicitly covered by the patent. For discussion, see *Warner-Jenkinson Co. v. Hilton Davis Chem. Co.*, 520 U.S. 17 (1997).

27. Drug Price Competition and Patent Term Restoration Act of 1984, Pub. L. No. 98-417, 98 Stat. 1585.

28. *Jefferson Par. Hosp. Dist. No. 2 v. Hyde*, 466 U.S. 2 (1984). The case is not cited or discussed by Judge Koh.

dant with a dominant market position—are subject to a rule of reason and not to *per se* invalidation. The logic of these cases is unexceptional. There are many cases in which tie-arrangements made perfectly good economic sense, so that the *per se* rule of illegality results in too many false positives under the antitrust law. In this regard it is critical to give the correct definition of the relevant market, noting the basic point that patentees are allowed and encouraged to use their monopoly power.

C. Per Se Legality or “No-Duty” Rules

Modern antitrust law has established a strong safe harbor of *per se legality* against the claim of illegal techniques toward monopolization. This line of cases, led by *Verizon Commc’ns Inc. v. Law Offices of Curtis V. Trinko, LLP*, holds that no supplier of any product is under an antitrust duty to license its products to anyone else, let alone a patent infringer, outside of exceptional circumstances.²⁹

III. FTC V. QUALCOMM

A. The Complaint and the Ohlhausen Dissent

The most striking feature about the current litigation is that neither the FTC nor Judge Koh relies on any known theory of vertical or horizontal arrangements. Instead, they ignore the established case law by assembling odd bits and pieces from some major cases, which, if read in full support the opposite conclusion, or they ignore adverse cases like *Trinko* altogether. The result is a flawed monopolization claim that vastly overstates the power that Qualcomm possesses in the relevant market, and brings back the specter that haunted the antitrust laws of the 1960s: over-enforcement. At stake in this case is international dominance in the 5G market, which is now getting close to realization. Therefore, the issues take place on a far wider canvas than those involved in the earlier litigation. It is, as Adam Mossoff noted, a fitting irony that the FTC called as its lead witness a Huawei economist, who works for one of Qualcomm’s major international competitors, while it is under investigation for stealing American trade secrets.³⁰

29. *Verizon Commc’ns Inc. v. Law Offices of Curtis V. Trinko, LLP*, 540 U.S. 398 (2004).

30. Adam Mossoff, *The FTC Joins Huawei on a Misguided Troll Hunt*, WALL ST. J.: OPINION (Jan. 28, 2019, 4:24 PM), <https://www.wsj.com/articles/the-ftc-joins-huawei-on-a-misguided-troll-hunt-11548624270> [https://perma.unl.edu/8TSG-WQ27]. For the opposite view, see Theodore Olson, *FTC Has Qualcomm’s Number*, WALL ST. J.: OPINION (Jan. 29, 2019, 7:46 PM), <https://www.wsj.com/articles/ftc-has-qualcomms-number-11548722793> [https://perma.unl.edu/6SXR-L7M8]. Olson, who represented Apple, endorsed the FTC’s monopolization claims based on its “no license, no chips policy.” That general claim is examined later.

The gist of the FTC's claim is that Qualcomm engaged in unfair methods of competition by using its alleged dominance in the chipsets market to extract elevated royalties from all licensees of its patented technology under standard FRAND (fair, reasonable, and nondiscriminatory) licenses. Lest there be any confusion, the key passage from the FTC complaint reads as follows:

Qualcomm's "no license-no chips" policy dramatically increases customers' costs of challenging Qualcomm's preferred license terms before a court or other neutral arbiter—including on the basis that those terms are non-FRAND—or to negotiate royalties in the shadow of such a challenge. This leaves Qualcomm's customers in a markedly different position than they would be in a typical patent licensing negotiation. As a result, Qualcomm's customers have accepted elevated royalties and other license terms that do not reflect an assessment of terms that a court or other neutral arbiter would determine to be fair and reasonable.³¹

In essence, the FTC claims that Qualcomm, by unilateral action alone, is able to impose an unprecedented and hidden "tax" on all of Qualcomm's rivals who need a Qualcomm license to market their own chips, including the CDMA and the premium LTE technology, where Qualcomm allegedly holds a dominant position in the marketplace. The gist of the FTC theory is that Qualcomm can charge all of its customers an elevated royalty for its chipset licenses. The key strategy that the FTC claims facilitates this outcome has always been in plain view. Qualcomm has long announced a policy of "no license-no chips" for its products. Qualcomm has insisted that any firm that wishes to acquire its chips must obtain a license from Qualcomm for intellectual property rights (IPRs) related to its patented technologies enabling 3G and 4G communication systems. The same system will, of course, also apply to the 5G chips and technology.

The FTC has challenged this stated policy on the ground that it enables Qualcomm, by unilateral action alone, to acquire undeserved monopoly profits for chipsets by forcing its chipset buyers to pay excessive royalties to license its FRAND-encumbered patents.³² According to the FTC, that extra license fee operates as an implicit "tax" from all of Qualcomm's customers who needed Qualcomm's cutting-edge CDMA chips for their phones—chips where Qualcomm allegedly held a dominant position in the marketplace. The whole point is something of a mystery, for the FTC never explains why Qualcomm could not just raise the price of its chips to extract the supposed monopoly profit, of which it gives no direct evidence. Nor does it explain how the monopoly mechanism works. The license did not obligate them to use

31. Federal Trade Commission's Complaint for Equitable Relief, Fed. Trade Comm'n v. Qualcomm Inc., No. 5:17-CV-00220, 2017 WL 242848 (N.D. Cal. Jan. 17, 2017).

32. FRAND refers to "fair, reasonable, and nondiscriminatory rates," which is a public utility-like standard that parties agree to whenever they license their "standard essential patents," which are incorporated into a basic standard.

Qualcomm chips or chipsets (together “chips”), for if they needed chips at all, they were free to acquire other chips from other vendors of their own choosing. The fact that some parties would want the technology without purchasing the chips explains why there has to be separate pricing for the two elements. Yet that efficiency is neither mentioned nor refuted in either the FTC’s complaint or Judge Koh’s decision.

The FTC complaint was met by this stinging dissent of Commissioner Maureen K. Ohlhausen:

The core theory of the complaint is that Qualcomm uses its alleged chipset monopoly to force its customers—smartphone manufacturers (OEMs)—to pay unreasonably high royalties to license FRAND-encumbered patents that are essential to practicing CDMA and LTE cellular-communications standards. Because OEMs have to pay those royalties regardless of which chipset manufacturers they purchase from, the alleged effect is to squeeze the margins of Qualcomm’s competitors in chipsets. Qualcomm allegedly implements that strategy through its “no license–no chips” policy and refusal to license its chipset-maker rivals. The fundamental element of this theory is a royalty overcharge. If Qualcomm charges reasonable royalties for its patents, then there is no anticompetitive “tax”—the complaint’s nomenclature for a price squeeze—but only the procompetitive monetization of legitimate patent rights. Importantly, there is no suggestion that Qualcomm charges higher royalties to OEMs that buy non-Qualcomm chipsets. Hence, the complaint’s taxation theory requires that Qualcomm charge OEMs unreasonably high royalties.

Rather than allege that Qualcomm charges above-FRAND royalties, the complaint dances around that essential element. It alleges that Qualcomm’s practices disrupt license challenges and bargaining in the shadow of law, and that the ensuing royalties are “elevated.” But the complaint fails to allege that Qualcomm charges more than a reasonable royalty.³³

Commissioner Ohlhausen’s last paragraph is critical, for there are only two states of the world. In the first, the royalties are within FRAND, at which point there is no possible exaction. In the alternative, there is a violation of the FRAND terms, but in this instance under *Trinko*, the sole remedy is for breach of contract. No firm is required under the antitrust law to enter into these FRAND arrangements under the principles of *Trinko*, and joining a FRAND agreement does not trigger any new antitrust violations. As Assistant Attorney General for Antitrust Makan Delrahim has stated, “An antitrust cause of action premised on a failure to abide by FRAND commitments would be inconsistent with Section 2 of the Sherman Act.”³⁴

33. U.S. Fed. Trade Comm’n, No. 141-0199, Dissenting Statement of Commissioner Maureen K. Ohlhausen, In the Matter of Qualcomm, Inc. (Jan. 17, 2017), https://www.ftc.gov/system/files/documents/cases/170117qualcomm_mko_dissenting_statement_17-1-17a.pdf [<https://perma.unl.edu/T6MZ-DWK9>].

34. Makan Delrahim, Assistant Att’y Gen., Antitrust Div., U.S. Dept. of Justice, Remarks as Prepared for IAM’s Patent Licensing Conference: Antitrust Law and Patent Licensing in the New Wild West (Sept. 18, 2018). Absent an antitrust duty to deal, a company has no obligation to deal under terms and conditions favorable to its competitors.

B. The Monopolization Issue

Faced with this dilemma, the FTC makes, and Judge Koh, endorses, the woolly claim that conduct may be “an unfair method of competition if it is ‘collusive, coercive, predatory or exclusionary in character’” or possesses other indicia of oppressiveness,³⁵ and further that “standards for determining whether it is ‘unfair’ within the meaning of § 5 [of the FTC Act] must be formulated to discriminate between normally acceptable business behavior and conduct that is unreasonable or unacceptable.”³⁶ That standard was quoted from *E.I. Du Pont De Nemours & Co v. FTC*.³⁷ But Judge Koh does not quote the follow-on sentence from *Du Pont*, which casts the passage in the exact opposite light: “Otherwise the door would be open to arbitrary or capricious administration of § 5; the FTC could, whenever it believed that an industry was not achieving its maximum competitive potential, ban certain practices in the hope that its action would ‘increase competition.’”³⁸ The entire decision in *Du Pont* was a warning against the aggressive application of Section Five of the FTC Act, which points to the exact opposite result that she reached here. The basic fact pattern in *Du Pont* arose when the FTC charged that Du Pont and other major antiknock compound manufacturers “engaged in unfair methods of competition in violation of § 5(a)(1) when . . . each firm independently and unilaterally adopted at different times [certain] business practices that were neither restrictive, predatory, nor adopted for the purpose of restraining competition.”³⁹

The case is therefore instantly distinguishable from the FTC against Qualcomm on several grounds. First, it alleged some form of cooperative behavior among rival sellers, while the case against Qualcomm is for unilateral actions. Second, to the extent that *Du Pont* involved patents, it reached the opposite conclusion from Judge Koh when it stated:

[I]f anticompetitive impact were the sole test, the admittedly lawful unilateral closing of a plant or refusal to expand capacity could be found to be “unfair.” The holder of a valid product patent could be prevented from exercising its lawful monopoly to charge whatever the traffic would bear, even though “a monopolist, as long as he has no purpose to restrain competition or to enhance or expand his monopoly, and does not act coercively, retains [the right to trade with whom he wishes].”⁴⁰

35. See Fed. Trade Comm’n v. Qualcomm Inc., No. 17-CV-00220-LHK, 2019 WL 2206013, at *13 (N.D. Cal. May 21, 2019).

36. *Id.* at *11.

37. *E.I. Du Pont de Nemours & Co. v. Fed. Trade Comm’n*, 729 F.2d 128, 138 (2d Cir. 1984).

38. *Id.* at 138–39.

39. *Id.* at 130.

40. *Id.* at 138 (citation omitted).

Finally, Judge Koh never noted that the Second Circuit had *rejected* an FTC order on the further grounds that the FTC “owes a duty to define the conditions under which conduct claimed to facilitate price uniformity [the issue in that case] would be unfair so that businesses will have an inkling as to what they can lawfully do rather than be left in a state of complete unpredictability.”⁴¹

It is therefore an unpardonable act of cherry-picking quotations by both the FTC and Judge Koh to take a precedent that is foursquare against them and treat it as a foundation for their analysis. Their argument is even worse because it is painfully clear that *none* of the first four terms apply to this case, unless one wants to take the bizarre position that every effort by every firm to increase its royalty rates is a form of coercion, at which point no supplier can escape the threat of antitrust liability, just as the court in *Du Pont* feared. Nor by this extended logic is there any way in which a licensee, such as Apple, could escape the charge that its determined efforts to obtain lower rates is a form of coercion against potential sellers that render it subject to antitrust liability. It simply makes no sense to define coercion so broadly such that all market participants are at perpetual risk of the charge. Any workable definition has to be narrow enough to allow for the ordinary give-and-take that is part and parcel of any business negotiation. Nonetheless, neither the FTC nor Judge Koh offer any limiting conditions on the theory of liability.

The FTC and Judge Koh seek to create a wedge between these two statutes by insisting that in dealing with Section 5 it is sufficient for the government to show that the allegedly anticompetitive actions “reasonably appear capable of making a significant contribution to maintaining monopoly power.”⁴² But that standard is hopelessly lax, for under that test, conduct that most likely will *not* constitute an antitrust violation nonetheless remains vulnerable to antitrust action, thereby posing a serious risk of FTC over-enforcement. Elsewhere the FTC contends, and Judge Koh accepts, that injunctive relief is appropriate where there is some “cognizable danger of a recurrent violation,”⁴³ which again sets the bar far too low. In so doing, both the FTC and Judge Koh disregard the FTC’s one page August 2015 statement (referred to above) that stressed that the unfair methods of competition under Section 5 should be tested against a standard of consumer welfare used generally under the Sherman Act to identify conduct likely to cause “harm to competition or the competitive process, taking

41. *Id.* at 139.

42. Fed. Trade Comm’n v. Qualcomm Inc., No. 17-CV-00220-LHK, 2019 WL 2206013 at *25 (N.D. Cal. May 21, 2019).

43. *Id.* at *130.

into account any associated cognizable efficiencies and business justifications.”⁴⁴

Stated otherwise, the gist of the FTC theory, accepted by Judge Koh, is that Qualcomm can charge an elevated royalty for the licenses of its patent portfolio, above what the FTC posits—but does not demonstrate—to be the competitive licensing royalty rates. In the FTC’s own words, “Qualcomm’s chip leverage in license negotiations raises royalties.”⁴⁵ Its asserted evidence for this proposition is that “the dependence on Qualcomm for modem chip supply heavily influenced license negotiations and led to elevated effective royalties.”⁴⁶ But those self-serving testimonials count for naught in the face of unambiguous evidence to the contrary. Remember the exit of Intel from the 5G market is only explainable by the simple fact that it cannot compete on price, timeliness, or quality.

In her decision, Judge Koh takes the aggressive position that a barrier to entry arises whenever the incumbent makes “onerous front-end investments that might deter competition from all but the hardest and most financially secure investors.”⁴⁷ She then uses that point to explain the predicament of Intel without mentioning its withdrawal from the 5G market for phone modems. Judge Koh quotes Intel’s then-Chief Strategy Officer who stated that Qualcomm had a two decades head start on Intel, which forced Intel to invest “lots of money, billions of dollars, and an army of engineers” to generate a premium LTE modem chip business from scratch.⁴⁸ Yet the point is wholly incorrect; within the antitrust law, it is best to think of a barrier to entry as some formal legal obstacle—a regulation, tax, or permit—that is imposed on a subsequent entrant that the initial entrant did not face. Treating the high cost of catching up by developing a rival technology “from scratch” as a barrier to entry means that the initial entrant is now forced by law to provide subsidies to its late-coming rivals. This essentially introduces a regime of cross-subsidies that distorts the investment decisions of both early and subsequent players. In light of the general rules on patent power articulated in cases such as *Du Pont*, that entire position must be rejected.

44. *FTC Issues Statement*, *supra* note 24.

45. Federal Trade Commission’s Pretrial Brief at 10, *Fed. Trade Comm’n v. Qualcomm Inc.*, No. 17-CV-00220-LHK, 2019 WL 2206013 (N.D. Cal. May 21, 2019).

46. *Id.*

47. *Qualcomm*, 2019 WL 2206013, at *14 (quoting *United States v. Microsoft Corp.*, 253 F.3d 34, 51 (D.C. Cir. 2001)).

48. *Id.* at *24.

C. Market Definition

The analysis of patent power in the previous section is critical to understanding the definition of the relevant market for antitrust enforcement. Everyone agrees that the market for Qualcomm's technology and chips is worldwide, so the critical question is the definition of the product market. In order to address this issue, Judge Koh relies on a well-known test in antitrust law: "Under the hypothetical monopolist test, the court asks 'whether a monopolist in the proposed market could profitably impose a small but significant and non-transitory price increase' or 'SSNIP.'"⁴⁹ As noted earlier, the application of this standard is far from easy given the difficulties of deciding whether the test is too wide or too narrow. In this instance, Judge Koh thinks that these difficulties do not matter because the dominance of the CDMA chip is such that no technology is a close substitute.⁵⁰ Unfortunately, her analysis does not take into account the special position of patented technology for which market exploitation—in order to encourage innovation—is prized and not disparaged. The simple response is that meeting the SSNIP standard is the sign of a strong patent, not the sign of an antitrust violation.

That point was implicit in *Du Pont*, and it is also worthwhile to note how this insight was applied in *Illinois Tool Works Inc. v. Independent Ink, Inc.*⁵¹ There, the alleged tying good was subject to patent protection which applies, as noted earlier, with special force to pioneer patents. The holding of the case stated that the rule of reason standard should be applied in cases in which patented goods are alleged to be the tying good, and that any supposed presumption that a patent confers market power "must be supported by proof of power in the relevant market rather than by a mere presumption thereof."⁵² The explanation for this approach is not hard to seek. The patent gives one the exclusive right to sell a good in a given marketplace, but that power alone does not exclude the possibility that other products covered by patents of their own are competing for the same market niche for end users. The strength of any given patent is determined by the number of close substitutes. The patents that have the most unique niches can generate the greatest economic rents, which is all for the good. At the front end, it spurs the technology for pioneer patents whose customers happily pay a high price for a new technology that leaves them better off than before. Simultaneously, at the back end, those high rents signal to other potential entrants that moving into

49. *Id.* at *15 (quoting *Theme Promotions, Inc. v. News Am. Mktg. FSI*, 546 F.3d 991, 1002 (9th Cir. 2008)).

50. *Id.* at *15–16.

51. *Ill. Tool Works, Inc. v. Indep. Ink, Inc.*, 547 U.S. 28 (2006). The case is not cited or discussed by Judge Koh.

52. *Id.* at 43.

this market promises, at least in the short-run, super competitive profits.

D. *Trinko* and the Antitrust Duty to Deal

In the next section of her opinion, Judge Koh states that “Qualcomm Has an Antitrust Duty to License its SEPs to Rivals.”⁵³ Her bland recitation of the holding from *Trinko* misses all of the relevant features, as she is content to write:

The United States Supreme Court has explained that, in general, “there is no duty to aid competitors.” *Trinko*, 540 U.S. at 411. Nonetheless, “[u]nder certain circumstances, a refusal to cooperate with rivals can constitute anticompetitive conduct and violate § 2.” *Id.* For the reasons explained below, the Court concludes that Qualcomm has an antitrust duty to license its SEPs to rival modem chip suppliers.⁵⁴

This characterization sanitizes *Trinko* so that it now stands for the exact opposite proposition that Justice Scalia advocated. His fuller passage reads: “[w]e have been very cautious in recognizing such exceptions, because of the uncertain virtue of forced sharing and the difficulty of identifying and remedying anticompetitive conduct by a single firm.”⁵⁵ Judge Koh casts caution to the winds, and thus reads the exception to *Trinko* as if it swallowed the rule. Thus, the most noted exception to the *Trinko* rule is the much criticized decision⁵⁶ of *Aspen Skiing Co. v. Aspen Highlands Skiing Corp.*⁵⁷ That case held that the decision of the three defendants to expel the plaintiff could constitute an antitrust violation for three ski resorts, which previously offered package deals with a fourth, to break off that arrangement. The decision is instantly distinguishable on the grounds that Justice Scalia cited for the no-duty rule. *Aspen Skiing* did not involve the creation of any forced associations with competitors with whom the defendants had not previously done business.⁵⁸ Judge Koh’s effort to shoehorn Qualcomm into the *Aspen Skiing* strategy provoked an angry and effective response by a new Commissioner of the FTC, Christine Wilson:

Here, the judge concluded that Qualcomm had a duty to license its intellectual property to chip-making rivals, even though Qualcomm did not have a pre-existing, voluntary and profitable course of dealing with them. So she expanded the scope of *Aspen Skiing*. Peering into the distant past, she found that in 1999 Qualcomm said it was licensing some patents to some chip mak-

53. *Qualcomm*, 2019 WL 2206013, at *81.

54. *Id.*

55. *Verizon Commc’ns Inc. v. Law Offices of Curtis V. Trinko, LLP*, 540 U.S. 398, 408 (2004).

56. See Dennis W. Carlton, *A General Analysis of Exclusionary Conduct and Refusal to Deal—Why Aspen and Kodak are Misguided*, 68 ANTITRUST L.J. 659 (2001).

57. *Aspen Skiing Co. v. Aspen Highlands Skiing Corp.*, 472 U.S. 585 (1985).

58. *Id.* at 603 (noting that the monopolist made an “important change” to a cooperative business practice that “had persisted for several years.”).

ers. Although it has long since stopped, and presumably those patents have long since expired, she reasoned that “Qualcomm itself has licensed its [patents] to rival” chip makers, and therefore had a duty under *Aspen Skiing* to “continue” doing so. Never mind that the judge’s reference point involved licensing different patents, to different competitors, in a different century. By this logic, *Aspen Skiing* now means that if a company ever sells any product to any competitor, it then could have a perpetual antitrust obligation to sell every product to every competitor.⁵⁹

As Commissioner Wilson points out, Judge Koh’s fanciful reading of *Aspen* is light years beyond the “outer boundary” of antitrust law. Instead, it only sought to reinstate an arrangement that had once been in place. Additionally, it did not impose any of the enormous ratemaking burdens that proved so troublesome in *Trinko*. Finally, it is worth noting that under a rule of reason this case gives rise to a serious efficiency justification for the conduct of the three ski resorts if they could show that the quality of the lifts at the plaintiff resort was inferior to the quality of their lifts. At that point the pooling arrangement (which helps bring people to the slopes) is offset by an efficiency disadvantage. Each of the parties to the agreement share equally in revenue, the greater portion of which is generated by the three defendants.

Justice Koh never discusses these issues in her brief and unsatisfactory treatment of the case.⁶⁰ Nor does she address the particulars of the *Trinko* decision, which is a powerful precedent for Qualcomm in this case. The 1996 Telecommunications Act⁶¹ radically changed the situation on the ground. Congress imposed new duties on the incumbent “Local Exchange Carriers” (LECs)—those companies that had exclusive monopolies in territories by virtue of the settlement of the 1982 antitrust lawsuit that secured the break-up of AT&T. These LECs had statutory duties to enter into interconnection agreements with the so-called “Competitive Exchange Carriers” (CLECs). Under these agreements, the LECs would grant the CLECs access to their networks on a nondiscriminatory basis by supplying the CLECs with what were termed unbundled network elements (UNEs).

The new entrants could acquire UNEs selectively in order to build out their new network which allowed the CLEC to compete in the LECs’ territory. This was a clear case of a statutory duty to subsidize a competitor.⁶² The only way to implement this scheme was to allow the

59. Christine Wilson, *A Court’s Dangerous Antitrust Overreach*, WALL ST. J. (May 28, 2019, 7:10 PM), <https://www.wsj.com/articles/a-courts-dangerous-antitrust-overreach-11559085055> [<https://perma.unl.edu/6JKV-9VPT>].

60. *Qualcomm*, 2019 WL 2206013, at *81–85.

61. The Telecommunications Act of 1996, Pub. L. No. 104-104, 110 Stat. 56 (codified as amended in scattered sections of 47 U.S.C.). For a discussion of the scope of the sharing obligation, see *AT&T Corp. v. Iowa Utils. Bd.*, 525 U.S. 366 (1999).

62. 47 U.S.C. § 251(c)(3) (2012) (establishing “[t]he duty to provide, to any requesting telecommunications carrier for the provision of a telecommunications service,

Federal Communications Commission (FCC) and the various state rate commissions to prescribe the terms under which the LECs had to pair with the multiple CLECs that wanted to enter into their territory. In effect, these were forced commercial interactions imposed by statute. The purpose of this scheme was certainly fully congruent with the antitrust laws in so far as it uprooted the LECs' local monopolies by imposing sharing obligations on the LECs.⁶³ But, there were difficulties in the enforcement of this obligation, and Verizon was held in violation of its statutory obligations.

The question then arose whether the violation of the Telecommunications Act counted as a violation of the antitrust laws as well. The statutory framework contained two key provisions. The Telecommunications Act was not allowed to preempt the operation of the antitrust laws: "[n]othing in this Act or the amendments made by this Act shall be construed to modify, impair, or supersede the applicability of any of the antitrust laws."⁶⁴ By the same token, the status quo was preserved because the Telecommunications Act also did nothing to expand the scope of the antitrust laws. It did not create new claims going beyond existing antitrust standards. The creation of any additional antitrust standards would be equally inconsistent with the saving clause's mandate that nothing in the Telecommunications Act would "modify, impair, or supersede the applicability" of existing law.

The antitrust laws thus carried over. Trinko's claim sought to piggyback on the FCC's resolution of the statutory grievance by initiating an antitrust action that concerned the same territory based on the same theory.⁶⁵ Judge Koh thus wholly misread *Trinko* by imposing on Qualcomm an unprecedented duty to deal with its competitors.⁶⁶ In the bluntest form, the antitrust law is concerned with ensuring the maintenance of competition between rivals. Therefore, it cannot require what no competitive market would allow, namely, for one business to be forced to supply its competitors. Since these sales are compelled by the state, the price has to be set by the state, because by

nondiscriminatory access to network elements on an unbundled basis at any technically feasible point on rates, terms, and conditions that are just, reasonable, and nondiscriminatory in accordance with the terms and conditions of the agreement and the requirements of this section and section 252. An incumbent local exchange carrier shall provide such unbundled network elements in a manner that allows requesting carriers to combine such elements in order to provide such telecommunications service.").

63. For a discussion of the scheme, see *Verizon Commc'ns Inc. v. Fed. Commc'ns Comm'n*, 535 U.S. 467, 488 (2002).

64. Telecommunications Act of 1996, Pub. L. No. 104-104, 110 Stat. 143 (codified in 47 U.S.C. § 152).

65. *Verizon Commc'ns Inc. v. Law Offices of Curtis V. Trinko, LLP*, 540 U.S. 398, 405-06 (2004).

66. See *Fed. Trade Comm'n v. Qualcomm Inc.*, No. 17-CV-00220-LHK, 2019 WL 2206013, at *81-85 (N.D. Cal. May 21, 2019).

definition there is no price at which the holder of a given technology finds itself better off by sharing that technology with a rival. Of course, there are many cases in which such licenses, often part of complex cross-licensing transactions, do take place in the voluntary market. But it is precisely because markets often do work in these situations that there is no need for the state to coerce any transaction. The refusal to deal is rightly regarded as wrong when committed by common carriers and public utilities. But even then, such duties have always extended only to consumers, not to competitors.⁶⁷ Indeed, the standard rule has always been that one common carrier is not obligated to take at regulated rates the packages of another common carrier. Cross subsidies do not exist in competitive circumstances and should not be imposed either by the antitrust laws or by any system governing regulated industries.

E. Qualcomm's Pricing Policy—The Use of Constant Rates

In the next stage of her argument, Judge Koh manages to draw precisely the wrong inference from the simple fact that since the founding of Qualcomm in 1985, the rate for anyone to obtain a technology license has been constant, no matter what company supplied the chips. The key testimony on which Judge Koh relies reads as follows:

Richard Donaldson, the FTC's licensing expert, explained that Qualcomm's royalty rates should decline over time because handsets are now essentially computers:

[I]n the case of Qualcomm when rates were first established back when CDMA was used in telephones were our cell phones were [sic]—it was just a cell phone. No other capabilities. And those products have changed dramatically over the life since then and we now have smartphones with many, many features that do not infringe the cellular patents, the SEPs. So I would expect that to drive a lower royalty rate.⁶⁸

There is absolutely no reason to think that this point is relevant to the question of whether Qualcomm exerted some form of monopoly power. The relevant question is not whether Qualcomm had used the same form of pricing over its entire existence, but instead, whether it had to respond to competition from new entrants. In this instance, competition from new entrants came from the Taiwanese company MediaTek, whose successful efforts to erode Qualcomm's dominance led to an overall rate reduction from Qualcomm in order to keep market share.⁶⁹ Nor does Judge Koh's basic theory make any sense. The

67. For a discussion of the history of common carrier regulation, see RICHARD A. EPSTEIN, *PRINCIPLES FOR A FREE SOCIETY: RECONCILING INDIVIDUAL LIBERTY WITH THE COMMON GOOD* 279 (1998).

68. *Qualcomm*, 2019 WL 2206013, at *103.

69. Ralph Jennings, *MediaTek is Fighting Back Against Qualcomm to Speed Up Cheap Smartphones in China*, FORBES (July 30, 2018, 3:30 AM), <https://www.forbes.com/sites/ralphjennings/2018/07/30/mediatek-is-fighting-back-against-qualcomm-to-speed-up-cheap-smartphones-in-china/#531c03a4b478> [https://per

conversion of a smart phone into a computer is neither here nor there. If the industry structure has evolved from the cell phone to the smart phone, so too did the various generations of Qualcomm's patents. It is simply naked speculation to assume that the new patent suite is more valuable today than the older patent suite was in the cell phone era. More or less concretely, the Donaldson testimony presupposes that Qualcomm started with a monopoly power when Qualcomm first introduced its technologies, and when it made no chips at all, until the present. In subsequent years, Qualcomm, unlike its competitors, took on a dual role. It has continued to be a pioneer in systems technology, to which it then added the role of chips producer. Some of those chips obtained dominant market positions, others did not.

Nor is it permissible to overlook the plausible efficiency justifications for Qualcomm's pricing policy. Its strict nondiscrimination policy offered critical price protection for Qualcomm customers against potential holdups.⁷⁰ At no time during its entire existence has Qualcomm ever threatened to cut off its licensed technology to companies that refused to buy its chips. It has of course—as Judge Koh notes—refused to supply chips to companies that have refused to license its technology. Thus, Judge Koh goes on at some length to describe instance after instance in which there was a refusal to deliver chips to customers who would not take out a chip license.⁷¹ Nonetheless, she wrongly attributes antitrust implications to an indispensable element of ordinary patent law, which, as noted in *Du Pont*, allows any patentee unilaterally to set the terms and conditions on which it does business.⁷² At all times, the pricing of these two distinct lines of business was independent of the other, which makes it incorrect for the FTC to assert that Qualcomm was able to secure supra-competitive profits by making firms “face the prospect of a modem-chip supply disruption.”⁷³ Indeed, Qualcomm is in a business that requires that it maintain goodwill with its existing customer base in order for it to acquire new customers. The use of a uniform pricing structure for licensing in all markets is, in fact, a strong guarantee against the risk that any particular firm or product line will be targeted with threats, which in any individual case would frighten Qualcomm's customer base. The FTC's claim that the threat of chip disruption drives Qualcomm's ability to reap special short-term profits would, if such a

ma.unl.edu/7PXP-E77S] (noting the fierce back and forth competition between the two companies).

70. Richard A. Epstein, F. Scott Kieff & Daniel F. Spulber, *The FTC, IP, and SSOs: Government Hold-Up Replacing Private Coordination*, 8 J. COMPETITION L. & ECON. 1 (2012).

71. *Qualcomm*, 2019 WL 2206013, at *8.

72. See *E.I. Du Pont de Nemours & Co. v. Fed. Trade Comm'n*, 729 F.2d 128, 138 (2d Cir. 1984).

73. Federal Trade Commission's Pretrial Brief, *supra* note 45, at 12.

policy was either announced or implemented, prove a public relations disaster for the business.

It is also critical to note that from the founding of Qualcomm in 1985, the rate for obtaining a technology license has been constant no matter what company supplied the chips. That rate applied when Qualcomm first introduced its technologies—when it made no chips at all—through the present. Qualcomm’s strict nondiscrimination policy offers critical price protection for Qualcomm’s customers against any possible holdout risk.⁷⁴ Consistent with this analysis, at no time during its entire operations did Qualcomm ever threaten to cut off its licensed technology for companies that refused to buy its chips. At every interval, the pricing of these two distinct lines of business was independent of the other, which makes it incorrect for the FTC to assert—or for Judge Koh to conclude—that Qualcomm was able to secure supra-competitive profits by making firms “face the prospect of a modem-chip supply disruption.” The rates for licensing its technologies remained the same in all cases for all products, even as Qualcomm’s share of the market started to drop in 2013.⁷⁵ The supposed lever never moved.

The FTC then goes on to claim that Qualcomm, in aid of its ability to collect that surcharge, used other devices to cement its monopolistic position, including by making “payments of funds designed to induce OEMs [original equipment manufacturers] to accept Qualcomm’s preferred royalty terms.”⁷⁶ Judge Koh joins in the condemnation of these rebate provisions on the ground that they were in effect an effort to secure a “de facto exclusion” policy of the sort she banned. Yet, neither the FTC nor Judge Koh explained why Qualcomm would *pay* others to use its chips if Qualcomm had the kind of monopoly power that it allegedly possessed. Qualcomm should have been able to exact the higher level of profits without having to pay some of that cash back to secure the loyalty of its customers. In making its claim, the FTC ignores the best efficiency explanation for those incentive payments when it claims that these payments *to* its licensees somehow increased the price that Qualcomm extracted out of them. By making a front-end payment to its customers, Qualcomm disarmed itself from any threat of service disruption. Instead, it bound itself to serve its licensees in the long run, as that was the only way in which it could recoup the implicit bond that it created through the transfer payments.

At the same time, the FTC and Judge Koh ignore the opposite side of the holdout risk in these FRAND negotiations. As Kayvan Noroozi

74. Epstein et al., *supra* note 70.

75. See Federal Trade Commission’s Opposition to Qualcomm’s Motion to Dismiss at 77, Fed. Trade Comm’n v. Qualcomm Inc., No. 17-CV-00220-LHK, 2019 WL 2206013, at *12–13 (N.D. Cal. May 21, 2019).

76. Federal Trade Commission’s Pretrial Brief, *supra* note 45, at 1.

and I have demonstrated, there is no *a priori* reason why a potential buyer of chip sets or technology would not seek a reduced price below that obtainable in a competitive market.⁷⁷ Our proposal was skeptical of any claim of holdout by a licensee-implementer unless it first made its own concrete proposal as to how the patented technology should be priced and why.

The key point here is that the holdout risk runs in both directions.⁷⁸ It is also the case that any reduction in rates that works to the benefit of downstream implementers also works to the disadvantage of upstream producers. At one point, the FTC claims that eliminating Qualcomm's so-called "tax"—a term that Judge Koh studiously avoids—removes an excess burden that is otherwise imposed on downstream parties, many of whom are innovators in their own fields. In so doing, the FTC claims that Qualcomm's behavior thus "diminishes their ability and incentive to enter, expand, invest, and innovate." But that claim is ungrounded so long as Qualcomm operates within the traditional boundaries of the FRAND license, and it is remedied by a breach of contract action if Qualcomm acts outside of those permissible boundaries.

Either way, a complete analysis evaluates the impact of any pricing practice or policy on *both* upstream and downstream innovators, knowing that any forced transfer from upstream to downstream has both positive and negative effects, neither of which the FTC can quantify. It therefore cannot explain why the effort to remove one distortion in the downstream market does not create a greater distortion in the upstream market. But the powerful inference is that there is no distortion in any downstream market so long as patented technologies are licensed at FRAND rates in a competitive chipset market. No one would say that an innovative research firm like Apple should be able to lease space at below market rates or hire workers at below market rates in order to spur its innovation. Such a firm has no claim to be subsidized by its suppliers or by its employees. Nor should that innovative firm be able to demand inappropriately low prices for the intellectual property or chipsets that it receives from upstream suppliers.

The FTC presented no evidence whatsoever of systematic price distortions at any level of the market, which is a prerequisite to establish

77. Richard A. Epstein & Kayvan B. Noroozi, *Why Incentives for "Patent Holdout" Threaten to Dismantle FRAND, and Why It Matters*, 32 BERKELEY TECH. L.J. 1381 (2017).

78. In general, for patent negotiations there are two distinct risks. First is the "patent holdup" risk, which suggests that entities like Qualcomm would try to extract excessive royalties from the companies that implement their technology. Second is the "patent holdout" risk, which suggests that the companies that Qualcomm licenses its technologies to would refuse to negotiate in good faith and thus ratchet up the costs of enforcing the innovator's valid patent. *See id.* at 1384.

an antitrust injury,⁷⁹ that is, an “injury of the type the antitrust laws were intended to prevent and that flows from that which makes defendants’ acts unlawful.”⁸⁰ Judge Koh’s opinion does nothing to fill this gap.

F. The FTC Valuation Dilemma

Thus far I have addressed the legal deficiencies in the FTC complaint, but even if its theory of liability made sense, it offers no discussion of the appropriate remedy. And Judge Koh’s brief discussion of this issue is wholly disproportionate to the enormous burdens that she has imposed on Qualcomm. Once the FTC and Judge Koh reject the current rates, they must establish a rate structure that makes sense in light of the flawed monopolization theory they both champion. Clearly the injunction must speak to the construction of nonmarket-based rates. But that entire enterprise is doomed to fail. The point here is put well by Alex Galetovic and Stephen Haber:

Bottom up holds that courts should value SEPs [standard essential patents] as the incremental value of the patented technology compared to its next-best alternative (which was discarded) at the time that the SEP became part of an industry standard. The technique cannot be operationalized: it requires that practitioners be able to identify, and know the market price of, an alternative technology that was nearly identical to the technology adopted but that never came into existence because it was discarded. As an empirical matter, it is not possible to know the price of something that did not exist.

To be concrete, the finding that the patent holders earned 3.3 percent of the value of the average smartphone in 2016 has two (perhaps complementary) interpretations: 1) the purchaser with the lowest willingness to pay for the average smartphone valued those technologies in the equivalent of 3.3 percent of the price she paid for her smartphone; 2) there were alternative inputs available to producers. And given that a patented technology is not a physical input, an obvious alternative for producers was to infringe the patents. The 3.3 percent therefore represents a lower bound estimate of the value of the patented technologies to the marginal consumer.⁸¹

79. *Brunswick Corp. v. Pueblo Bowl-O-Mat, Inc.*, 429 U.S. 477, 488 (1977).

80. *Id.* at 489 (“We therefore hold that [for] the plaintiffs to recover treble damages on account of § 7 violations, they must prove more than injury causally linked to an illegal presence in the market. Plaintiffs must prove *antitrust* injury, which is to say injury of the type the antitrust laws were intended to prevent and that flows from that which makes defendants’ acts unlawful. The injury should reflect the anticompetitive effect either of the violation or of anticompetitive acts made possible by the violation.”). This statement was made in connection with charges that Brunswick engaged in anticompetitive practices when it acquired defaulting bowling centers, which it could have let close, thereby improving Pueblo’s profits. *Id.* It is odd to consider “keeping a business afloat” as an argument in favor of finding an antitrust injury.

81. Alexander Galetovic & Stephen H. Haber, *SEP Royalties: What Theory of Value and Distribution Should Courts Apply?* (Hoover Inst. Working Grp. on Intellectual Prop., Innovation, and Prosperity at Stanford Univ., Working Paper No. 19001, 2019), <https://hooverip2.org/wp-content/uploads/ip2-19001-paper.pdf> [<https://perma.unl.edu/67US-QNGE>].

Galetovic and Haber rightly object to the incremental value standard on the grounds that it cannot be operationalized given its insurmountable valuation problems. But the difficulty in that standard in fact goes deeper, including cases in which there is some *perfect* valuation method. Consider the following situation: here are two rival firms, which for simplicity's sake, each expend \$20 to produce a new technology and the two technologies are direct substitutes for each other. One generates the value of \$100 and the other \$90. In a competitive market, the more successful technology will win out across the board. But under the incremental value standard, the firm creating the more valuable technology can only charge \$10, which is the difference between its technology and the second-best technology. Two conclusions are clear. First, the successful firm cannot recover its initial \$20 investment. The continued presence of the losing firm means that the winning firm cannot recover its full investment. Second, neither of the two firms receive any credit for the initial \$90 worth of improvements, which means that the innovators' compensation is well below social value of the technologies.

Other variations of this situation should receive parallel treatment to allow recovery of the full cost of investment. Suppose that the first firm moves the technology up from a base of \$0 to \$90. Since there is no direct competitor, it gets full compensation for its investment, as it should under any theory. If the second firm now comes in with a new and independent technology worth \$100, only by charging \$100 will the firm be able to recover its full investment. Forcing it to settle for the \$10 incremental value guarantees that it will never enter the market. The correct result always allows for full recovery of investment, regardless of what rivals do and when they enter the market. A contrary result would produce this imperfection: one of the firms will not enter the market, even though both can carry their weight if allowed to charge market prices. To allow for only the incremental improvement to be compensated is a bit like marginal cost pricing for traditional utilities, where nothing is left to cover the fixed cost of the initial investment—clearly an unsustainable strategy.⁸² On the other hand, if a firm comes up with an improvement patent that adds \$10 in value to an existing technology, \$10 is the correct price, which should allow it to recover its full investment. The holder of the initial patents continues—whether held by the initial innovator or some other firm—to charge what they did before, because the improvement adds to the value of the original patent, but does not replace it.

82. See Ronald H. Coase, *The Marginal Cost Controversy*, 13 *ECONOMICA* 169 (1946).

G. Qualcomm Efficiency Justifications

The valuation difficulties in the FTC's position are compounded by its inattention to the serious impediment that its position has on Qualcomm's ability to enforce its patents. At best, Judge Koh gave passing acknowledgment to the point that some rule of reason analysis was required.⁸³ One of the constant refrains of the FTC is that the relevant pricing should be done in "the shadow of the law"—that is, against the background of the FRAND royalty standard. The argument here is that by imposing the "no license, no chips" policy, other parties cannot claim the benefit of FRAND because they need to license the chips before they can use them.⁸⁴ But it is quite clear that under the FTC's position, no party is ever under a duty to enter into a FRAND negotiation for licensing any product. When established, these FRAND obligations leave all handset manufacturers free, but not required, to include Qualcomm chips in their equipment. Other manufacturers of course produce other chipsets that utilize the technology built to these FRAND standards, and there is robust competition among rival chipset manufacturers to persuade the handset manufacturers that their equipment is (taking quality and price into account) superior to their rivals. In this setting, the FRAND commitment operates as the quid pro quo for inclusion of the patented technology in the FRAND standard. But it does not preclude competition between rival suppliers in meeting that standard with different chipsets, a point that the FTC never explicitly acknowledges.

At this point, the efficiency rationale for the "no license, no chips" policy becomes much clearer. Qualcomm wants to be paid in advance for the chips that it sells. If it sells the chipsets to some party that has no license, it has no ready way to obtain the cash for its products in advance of sale. Any person who is given the right to acquire the chipsets without a license can then force Qualcomm to secure payment through a damages action that is costly to maintain, and when successful, only results in the award of some supposed FRAND royalty payments, an amount which is far less than the current chipset rates. In addition, the company faces an additional risk from the patent exhaustion doctrine that could bar any lawsuit against the subsequent taker of the patented technology.⁸⁵ That rule blocks Qualcomm from asserting any rights whatsoever against third parties that might abuse or infringe its patents if it is duty-bound to sell to unlicensed parties, who are the only parties against whom Qualcomm has any

83. Fed. Trade Comm'n v. Qualcomm Inc., No. 17-CV-00220-LHK, 2019 WL 2206013, at *12–13 (N.D. Cal. May 21, 2019).

84. See Federal Trade Commission's Opposition to Qualcomm's Motion to Dismiss, *supra* note 75, at 1.

85. Quanta Comput., Inc. v. LG Elecs., Inc., 553 U.S. 617 (2008).

patent remedies. The FTC's position ignores the customary and efficient licenses practices.

In all likelihood, any regime of forced transfers is likely to lead to a degenerative cycle because, in the absence of strong patent protection, no party has any incentive to keep its current contracts. So, the law encourages a race to the bottom, since Qualcomm, or any other party that makes and sells chipsets, is subject to the same process of forced surrender of its intellectual property. A manufacturer's only remaining option would be to seek compensation through an arduous *ex post* damages action, which could take years, assuming that a revenue-starved firm is still in business. Why require any patentee to become an unsecured creditor in an involuntary transaction? Indeed, under the long-standing common law of conditions, a seller need not deliver any property to a buyer if he does not receive cash or adequate security in advance.⁸⁶ The point here is that there is an obvious efficiency justification for this practice, and no one would question its application if the defendant did not have a monopoly position. But since this arrangement—however it is classified—is judged based on a rule of reason standard, the obvious payment risks cannot be ignored in the relentless pursuit of a novel, if unspecified, monopolization theory.

Unfortunately, Judge Koh's single-minded monopolization theory never addresses the efficiency side of the equation. Under the well-established rule of *Matsushita Electric Industrial Co. v. Zenith Radio Corp.*,⁸⁷ the proper way to establish an antitrust violation is to introduce evidence that “tends to exclude the possibility” that the alleged conspirators acted independently.⁸⁸ In *Matsushita*, a predatory pricing case, the courts note that there are many explanations for why companies lower prices that do not require the existence of a conspiracy. The simplest explanation is that competition keeps prices low. It would be exceedingly odd for multiple firms to agree to sell goods for an amount below their production costs. None of them have a strong chance to recoup the gains later on, given the risk of entry by other firms once prices were raised.⁸⁹ Paradoxically, predation by a single monopolistic firm is, at the margin, more dangerous than industry-wide collusion in a less concentrated market.

86. *Kingston v. Preston*, 2 Douglas 689, 99 Eng. Rep. 437 (K.B. 1773) (“[I]t would be the greatest injustice if the plaintiff should prevail: the essence of the agreement was, that the defendant should not trust to the personal security of the plaintiff, but, before he delivered up his stock and business, should have good security for the payment of the money. The giving such security, therefore, must necessarily be a condition precedent.”).

87. *Matsushita Elec. Indus. Co. v. Zenith Radio Corp.*, 475 U.S. 574 (1986).

88. *Id.* at 588.

89. *Id.* at 589 (citing Frank H. Easterbrook, *Predatory Strategies and Counterstrategies*, 48 U. CHI. L. REV. 263 (1981)).

Yet even this modification does not alter the basic antitrust equation involving Qualcomm. The FTC's case does not involve predation, or as Judge Koh acknowledges, any form of cooperative behavior.⁹⁰ The case only involves a single company whose pricing practices for chipsets and technology are said to allow it to wring out a monopoly profit. But the mechanics of the FTC's claim are utterly opaque. Qualcomm has to sell its technology independently of its chipsets. To raise the price of these untied activities is in effect to impose a "tax" on buyers who do not buy the Qualcomm chipsets, reducing the demand for its technologies. By imposing this "tax," Qualcomm kills its own technology business—for no good reason. It could always capture any monopoly rent, based on patent strength, just by raising its chip prices. Accordingly, the basic elements of its case are not present: there is no dominant firm and there is no exclusive dealing claim since other firms offer their own chipset and license combinations. Under *Matsushita*, the FTC produced no evidence to explain how any monopolization theory is credible, nor did Judge Koh fill the gap. Indeed, all the available evidence tends to exclude any inference of illegal conduct.

That justification gap is especially telling because Qualcomm has offered its own explanation for why it has uniformly adopted its practices. This justification includes a comprehensive license that allows a licensee to purchase not only an original 3G system, but also obtain chips, including future upgrades—say from 3G to 4G—without acquiring a separate license. In effect, any first generation licensee can acquire long-term security that ensures it will continue to receive upgraded products without having to worry about being held up in renegotiation. One of the constant themes of the FTC's claim is that Qualcomm uses its holdup powers to extend its alleged monopolistic position. This particular practice is strong proof in the opposite direction, and is not addressed by the FTC or Judge Koh.

In addition, the FTC and Judge Koh overstate the point that Qualcomm engaged in other unique licensing practices.⁹¹ Even if that point were true, it would hardly establish any antitrust violation; innovation in contractual terms is as important as price and technical competition. But, ironically, Judge Koh concludes that Qualcomm engages in illicit licensing practices because it does not license at the chip level, but only at the device level. And at the device level, Qualcomm only licenses to original equipment manufacturers and never to competitors.

There are two decisive responses to that claim. The first is a strong efficiency explanation. These licensed devices often implicate a large

90. Fed. Trade Comm'n v. Qualcomm Inc., No. 17-CV-00220-LHK, 2019 WL 2206013, at *12 (N.D. Cal. May 21, 2019).

91. *Id.* at *26.

suite of Qualcomm patents, and the uniform pricing at the device level eliminates major transaction cost issues that would arise if each element in constantly shifting chipsets had to be separately priced for each transaction. By the same token, there has never been any indication that licensing a chip by the larger product of which it is a part lets Qualcomm base the prices it charges on, for example, the cost of a commercial airline. The connection between the large finished product and the intellectual property of the product's component parts is too weak for such an arrangement to make sense for either side of a transaction, which is why the market has never gravitated toward this hypothetical arrangement.

Finally, it is worth noting that the device level pricing is not unique to Qualcomm, but is also a practice adopted by its competitors. Presumably, this industry-wide adoption is because of the same transactional advantage. Judge Koh has a separate section in her opinion devoted to supporting the proposition that “[o]ther SEP [l]icensors [h]ave [i]mitated Qualcomm’s [p]ractice [b]ecause it is [l]ucrative.”⁹² “Following Qualcomm’s lead, other SEP licensors, such as Nokia and Ericsson, have concluded that licensing only OEMs is more lucrative and have thus structured their practices accordingly.”⁹³ So much for the view that this pricing policy is a technique to extract profits by a dominant firm, when an entire industry is benefiting from this approach.

It has always been a serious obstacle to any Section 2 monopolization claim to show that practices used by smaller competitors to improve their efficiency advantage are somehow off limits to larger, more successful competitors—as if they could compete on equal terms if they are denied the use of a common and efficient business practice. There is no good explanation as to why successful firms have to abandon the pricing practices that paved the way to their success. Indeed, such a restriction is an implicit subsidy to smaller players.

It turns out that the FTC eliminated any need to show the inherent tendency of Qualcomm’s practice to create monopoly rents. After all, if Qualcomm raised its rates as its market share increased, that would surely count, *a fortiori*, as a use of monopoly power. And of course, if it had lowered its rates, the FTC could still have insisted that such reductions were too small in dollar amount to make any serious difference. So, they would argue, Qualcomm continued—magically—to earn monopoly profits by lowering prices just enough to maintain its dominant position.

However, the counter explanation is really quite clear. The high rates that Qualcomm is able to charge are a function of its superior

92. *Id.* at *78.

93. *Id.*

technology. The return of Apple as a customer to Qualcomm is evidence of that position. Recall that Apple had at various times before 2016 explored entering into purchase arrangements with other suppliers, but always found that Qualcomm's competitors' products did not meet its own production standards. If there had been a supposed lock-in effect by virtue of these contractual arrangements with Qualcomm, Apple would never have bothered to look elsewhere for potential chips. Nor would it have wanted, in its contracts with Qualcomm, the power to exit the arrangements. The existence of an exit right is evidence of the existence of a competitive market.

That point is further underscored by the odd feature of the FTC's lawsuit seeking injunctive relief against Qualcomm. The lawsuit is based on information about market structure that omits any reference whatsoever to the major events that occurred after January 2017, including the ill-fated decision by Apple to radically shift its purchasing practices. Apple acquired 100 percent of its chips from Intel, even though it had previously acquired 100 percent of its chips from Qualcomm. The inconsistency here is particularly ironic given that the FTC on the one hand claims that Qualcomm's conduct is an "ongoing" violation, but on the other hand resists introducing any evidence to show the supposed anticompetitive effects.

At the time of trial, the evidence showed a *declining* market share of Qualcomm's chips from over 90% from 2008 to 2014, and dropped down to over 80% percent in 2014, on both a unit and revenue basis. Those numbers subsequently slipped to over 60% on a unit basis and 74% on a revenue basis for 2016 in a market replete with new entrants and new technology. Those new entrants are still there, yet when Apple settled its suit with Qualcomm, it entered into a long-term license arrangement for its chips. At the end of the day, the intellectual blindness of both the FTC and Judge Koh proves the old adage that "it takes a great mind to understand the obvious." Both parties could have spared everyone undue angst by looking at the overall situation and realizing that their sophisticated list of antitrust violations is based on the simple reality that Qualcomm's chips are better than Intel's.

IV. CONCLUSION

I have offered this detailed examination of both the FTC's claim and Judge Koh's opinion because I think that the role of patent and antitrust law is to encourage—not stifle—competition and innovation. In general, the greatest effort should be made to reward innovators, not implementers. Yet the FTC's claim and Judge Koh's opinion appear to violate the relevant norms by adopting exotic theories of antitrust. This case appears to be a throwback to an earlier era in which

antitrust theories were used to thwart the operation of successful businesses for the benefit of their competitors.

As noted above, there are three types of antitrust cases: *per se* illegality, “rule of reason,” and *per se* legality. In light of recent developments, it is now clear as a matter of both theory and practice that the FTC’s complaint against Qualcomm falls into the no-duty classification, so this complaint should never have been heard. Even if that judgment was somehow in error, the FTC’s case would fall into the “rule of reason” category, at which point Qualcomm’s efficiency justifications for following standard, industry-wide practices seem decisive.

Yet ironically, this case ignores the tremendous dynamism that arises when economic rewards are allocated to those who make and facilitate change. The only successful long-term regulatory strategy must start with the proposition that patent licensees have obligations with respect to licensors, obligations that cannot be avoided by wrongly insisting that a wide range of contractual provisions and contract rates generate onerous antitrust obligations. Unfortunately, this assumption is ignored in the opinion written by Judge Koh and in the FTC’s insistence that Qualcomm is guilty of a *per se* violation of the antitrust laws. Recently, the cause of aggressive antitrust enforcement suffered defeats in both *Ohio v. American Express, Co.*⁹⁴ and *United States v. AT&T, Inc.*⁹⁵ The FTC should be chastised once again, and Judge Koh’s disastrous opinion should be consigned to the dustbin of antitrust history. The decision of the Ninth Circuit to stay immediate enforcement of her order is the first step in that direction.

94. *Ohio v. Am. Express Co.*, 138 S. Ct. 2274 (2018); *but see* Evan Chesler & David Korn, *Lessons from Amex for Platform Antitrust Litigation*, 98 *NEB. L. REV.* 345 (defending the district court’s outcome in *Ohio v. American Express*).

95. *United States v. AT&T, Inc.*, 916 F.3d 1029 (D.C. Cir. 2019).