In Apple Inc. v. Pepper, the Supreme Court held that consumers who allegedly paid too much for apps sold on Apple’s App Store because of an antitrust violation could sue Apple for damages because they were “direct purchasers.” The decision sidesteps most of the bizarre complexities that have resulted from the Supreme Court’s 1977 decision in Illinois Brick Co. v. Illinois, which held that indirect purchasers could not sue for passed-on overcharge injuries under federal antitrust laws.

I. THE INDIRECT PURCHASER RULE UNDER ILLINOIS BRICK

The Illinois Brick decision itself was factually straightforward, although its reasoning was controversial. Makers of construction blocks fixed their prices and sold them to contractors who built buildings for the State of Illinois. No one seriously doubted that when a cartel sells something at a higher price to an intermediary, that intermediary firm will pass on at least part of the price increase to its own customers, and so on down the line. The legal question was how the antitrust laws should recognize that fact in determining the right to collect damages.

Purchaser damages in cartel and monopolization cases are ordinarily measured by the amount of the price increase, or “overcharge.” Roughly
speaking, this is the difference between the actual price that the defendant(s) charged and the price that would have prevailed had there not been any price fixing. As Justice Holmes put it in the first Supreme Court decision to confront the issue, the measure of damages should be “the difference between the price paid and the market or fair price that the city would have had to pay under natural conditions had the combination been out of the way, together with an attorney’s fee.”

*Illinois Brick* held that the first purchaser in line, or the direct purchaser, should obtain the entire overcharge as damages, without any reduction for the amount that it had passed on to purchasers beneath it in the distribution chain. Accordingly, indirect purchasers would not be able to claim any damages, since they had already been recovered in full by the direct purchaser. This rule, the Court noted, was not one of “standing” but rather of entitlement to damages.

In *Illinois Brick*, the Supreme Court recognized some qualifications, indicating that its concern was with the computation of passed-on damages rather than standing to sue. For example, purchasers under a preexisting contract that fixed both the quantity and markup could obtain damages, for in such cases the entire overcharge would be passed on. Other exceptions were not mentioned by the Supreme Court but flowed naturally from the Court’s focus on passed-on damages. For example, the lower courts have held that *Illinois Brick* does not preclude an action for an injunction because no calculation of passed-on damages is necessary.

In its noneconomic approach based on proximate cause, the *Apple*

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7. Id.

8. Id. at 728 n.7. Specifically, the Court stated:

   Because we find Hanover Shoe dispositive here, we do not address the standing issue, except to note, as did the Court of Appeals below, that the question of which persons have been injured by an illegal overcharge for purposes of § 4 [of the Clayton Act] is analytically distinct from the question of which persons have sustained injuries too remote to give them standing to sue for damages under § 4.

   Id. (citation omitted).

9. See id. at 737.

10. See id. at 736; see also Hanover Shoe v. United Shoe Mach. Corp., 393 U.S. 481, 494 (1968) (recognizing the same exception); 2A Areeda et al., Antitrust Law, supra note 2, ¶ 346e (discussing the exception for preexisting fixed-cost, fixed-quantity contracts).

11. See, e.g., In re Warfarin Sodium Antitrust Litig., 214 F.3d 395, 402 (3d Cir. 2000); see also 2A Areeda et al., Antitrust Law, supra note 2, ¶ 346d.
dissenters doubted standing for indirect purchasers seeking only an injunction. 12

The Supreme Court also held in Kansas v. UtiliCorp United, Inc. that the indirect purchaser rule applied even when the direct purchaser passed on 100% of its overcharge. 13 The direct purchaser in that case was a price-regulated utility that operated under a state statute that computed rates as including a one-to-one pass-through of all variable costs, which included fuel costs. 14 Indeed, as the dissenters pointed out, the state regulatory provision required complete pass-through of the overcharge, which appeared as a surcharge on each customer’s utility bill. 15 Nevertheless, the Court concluded the utility itself was the direct purchaser and the customers, who paid the entire overcharge, were merely indirect purchasers. 16 In that case, the direct purchasing utility was not injured by the cartel. By statute, it passed on 100% of its overcharge. 17 Further, it suffered little or no decline in output. 18 The Supreme Court effectively gave the only antitrust cause of action to a firm that had not been injured.

About half of the states have either amended or interpreted their own antitrust statutes so as to permit indirect purchaser damages actions, and the Supreme Court has approved such provisions. 19 Most of the litigation progress we have made in determining how antitrust damages

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13. 497 U.S. 199, 203–05 (1990); see also Simon v. KeySpan Corp., 694 F.3d 196, 198 (2d Cir. 2012), cert. denied, 133 S. Ct. 1998 (2013) (mem.) (holding that a retail electric consumer complaining of price fixing in the wholesale electricity market was an indirect purchaser).


15. UtiliCorp, 497 U.S. at 222–23 (White, J., dissenting).

16. Id. at 207 (majority opinion) (finding that “the consumers in this case have the status of indirect purchasers” and therefore “any antitrust claim against the defendants is not for them, but for the utilities to assert”). The Utilicorp decision rejected a carefully reasoned opinion by Judge Richard Posner in a related case, who observed not only that there was perfect 100% pass-through, but also that there was very little output reduction resulting from the price fix because the retail elasticity of demand for power was very low. See Illinois ex rel. Hartigan v. Panhandle E. Pipe Line Co., 852 F.2d 891, 895–97 (7th Cir. 1988); cf. E. Air Lines, Inc. v. Atl. Richfield Co., 609 F.2d 497, 499 (Temp. Emer. Ct. App. 1979) (holding that “any functional equivalent of a cost-plus contract exception to the Hanover Shoe ban against defensive use of passing on must be one that is already in existence, in that its impact on pricing decisions must be known in advance”).

17. See UtiliCorp, 497 U.S. at 205.

18. Cf. Hartigan, 852 F.2d at 896 (noting, in an analogous rate regulated environment, that “an increase in . . . rates was bound to increase the firm’s revenues”).

are passed through a distribution chain has undoubtedly occurred in the context of this state antitrust litigation.

II. COMPLEXITIES AND AMBIGUITIES IN THE DISTRIBUTION CHAIN

The facts of _Apple v. Pepper_ were more complex than those of _Illinois Brick_, and illustrate some of the difficulties that the courts have faced in applying the indirect purchaser rule. The owners of Apple’s iPhones are required to purchase programs, or “apps,” on Apple’s App Store, which is itself an app that can be found on the iPhone screen.20 Apple’s App Store is thus a bottleneck through which the apps’ producers must pass if they are to reach Apple iPhone users. In this consumer class action, iPhone owners accused Apple of monopolizing the market for Apple iPhone app sales, both through this exclusivity requirement and by charging app producers a very high commission of 30% of the app’s sale price.21 The plaintiffs alleged the margin was extremely high in relation to cost because Apple does very little in its role of distributor of these apps sold by others.22

In this case, unlike _Illinois Brick_, the customers paid their money and purchased directly from Apple. “There is no intermediary in the distribution chain between Apple and the consumer.”23 The Supreme Court majority found this to be “dispositive” of the result—namely, that the plaintiffs paid their money directly to the defendants, and this entitled them to be treated as direct purchasers.24

This would all seem clear enough were it not for the fact that in the forty-year history of _Illinois Brick_ jurisprudence other courts had characterized this same problem differently. A case in point is _Campos v. Ticketmaster_,25 which was very similar to _Apple_, although neither the district court nor either of the Supreme Court opinions in _Apple_ discussed it. The Ninth Circuit decision, however, addressed it at some length.26 In _Ticketmaster_, the defendant, Ticketmaster, was an online event

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23. _Apple_, 139 S. Ct. at 1521.
24. Id.
25. 140 F.3d 1166 (8th Cir. 1998).
26. For the Ninth Circuit’s discussion, see In re Apple iPhone Antitrust Litig., 846 F.3d 313, 325 (9th Cir. 2017). For other decisions raising similar issues to _Apple_, see In re ATM Fee Antitrust Litig., 686 F.3d 741, 750 (9th Cir. 2012), cert. denied sub nom. Brennan v. Concord EFS, Inc., 134 S. Ct. 257 (2013) (mem.) (holding that ATM card users were indirect purchasers, notwithstanding that ATM machine operators, who allegedly fixed transaction fee prices, charged these to banks, who passed them on 100% to the card users); McCarthy v. Recordex Serv., 80 F.3d 842, 848–55 (3d Cir. 1996), cert. denied, 519
ticket retailer accused of monopolizing event ticket sales. The purchasers were event goers who bought their tickets directly from Ticketmaster, paying high processing and handling fees. Ticketmaster itself set the final ticket price. The court held, however, that the concert promoters were direct purchasers of “ticket distribution services” from Ticketmaster, and that the actual ticket buyers were only indirect purchasers of these services. This was true, the court reasoned, because there was “an antecedent transaction between the monopolist and another, independent purchaser” who was in a position to absorb part or all of the overcharge. Under the plaintiff’s theory of the case, the concert promoters presumably behaved as most intermediaries behaved: They passed on Ticketmaster’s high markups by charging higher wholesale prices for the tickets. The final purchasers, who actually used the tickets, were the only ones unable to pass anything on.

Ticketmaster produces the perverse result that the buyer who is able to pass on all or part of the overcharge is treated as the direct purchaser and can sue for damages, while the buyer who is at the end of the line and must absorb the entire overcharge passed on to it has no damages claim, even though it purchased directly from the defendant. As in Apple, the Ticketmaster consumers paid the violator directly, but the Eighth Circuit found them to be “indirect” purchasers. The Apple decision effectively overruled Ticketmaster sub silentio. The Apple majority created an apparently categorical rule that whoever pays the money directly to the defendant should be counted as the direct purchaser.

III. THE PROBLEM OF PASSED-ON DAMAGES

Illinois Brick’s indirect purchaser rule was problematic from the beginning for a number of reasons that the Apple majority did not address and certainly did not fix. First, it was plainly inconsistent with the
antitrust damages statute, which gives an action to “any person who shall be injured in his business or property” by an antitrust violation. That hardly sounds like a limitation to direct purchasers.

A. Computing Pass-on

Second, the Illinois Brick Court exaggerated the difficulty of “tracing” indirect purchaser damages. Computing how damages are passed on at each stage of a distribution chain requires “incidence” analysis, which economists use to compute how a tax or other expenditure is passed along through the economy. In general, the more elastic a firm’s demand, the more of an overcharge it will shift to others. By contrast, the more inelastic its demand the more it will have to absorb. Indeed, the earliest explicit Supreme Court applications of economic analysis to a legal problem occurred in the 1920s and 1930s, and involved computation of how a tax might be passed on from one entity to another. While the Illinois Brick decision acknowledged its relevance, later decisions held that the effect of Illinois Brick was to forbid the use of incidence analysis in the estimation of passed-on antitrust damages.

34. 15 U.S.C. § 15(a) (2012) reads:
[A]ny person who shall be injured in his business or property by reason of anything forbidden in the antitrust laws may sue therefor in any district court of the United States in the district in which the defendant resides or is found or has an agent, without respect to the amount in controversy, and shall recover threefold the damages by him sustained, and the cost of suit, including a reasonable attorney’s fee . . . .


38. See, e.g., In re Brand Name Prescription Drugs Antitrust Litig., 123 F.3d 599, 606 (7th Cir. 1997) (stating that Illinois Brick bars the use of incidence analysis in the computation of passed-on damages); In re Beef Indus. Antitrust Litig., 600 F.2d 1148, 1163 n.19, 1166 (5th Cir. 1979) (noting the Illinois Brick Court’s disapproval of the “speculative nature” of incidence analysis); see also Herbert Hovenkamp, Commentary, The Indirect-Purchaser Rule and Cost-Plus Sales, 103 Harv. L. Rev. 1717, 1721 (1990) (“[T]he Illinois
To illustrate the problem, if a farmer is taxed on wheat, she may absorb part of that tax but pass a portion on to the wholesale bread baker, who may in turn pass some of it on to the grocer, who will then pass part of it on to the consumer. The technical quantification of pass-on is quite demanding, requiring determination of the elasticities of supply and demand facing each individual firm in the distribution chain.\(^3\) A further complication is that the calculations are very sensitive to the distribution of fixed and variable costs. Variable costs generally show up in the market price and are passed on; fixed costs generally are not.\(^4\)

However, in most cases antitrust experts can assess damages without computing pass-on.\(^4\) For example, under the “before-and-after” method, the expert looks at a market just prior to the violation, just subsequent, or both, comparing prices during the violation and nonviolation periods.\(^2\) The “yardstick” method of estimating damages compares prices in the violation market with those in a similar “yardstick” market where the violation is thought not to be occurring.\(^3\) In both cases, one does not need to estimate pass-on at each stage. Rather, the expert compares the price in the cartel market with the price in some reasonably similar comparator market that was not affected by the cartel.\(^4\)

For example, suppose that dairies are fixing prices, raising the wholesale price of milk from $2.00 to $3.00 per gallon. The milk is sold to distributors, who sell it to grocers, who finally sell it to consumers. Computing the amount passed on by each of these would be difficult. But suppose we can identify a “yardstick” market, similar to the cartel market but without price fixing. In that market the dairies’ wholesale price is $2.00, as it should be. Ignoring the distributors and grocers, who are not parties, we also observe that retail prices in this competitive market are $2.90, while retail prices in the cartel market are $3.75. If consumers sue, we do not need to know how much of the overcharge was passed on at each level. These numbers tell us that although not all of the overcharge was passed on, consumers in the cartel market paid 85 cents more

\(^3\) See Landes & Posner, supra note 35, at 620.
\(^4\) See, e.g., Cooter, supra note 35, at 1523–24.
\(^5\) See 2A Areeda et al., Antitrust Law, supra note 2, ¶ 346k.
\(^6\) See Hovenkamp, Federal Antitrust Policy, supra note 5, § 17.5b2.
\(^6\) Id. § 17.5b1. Illustrating the methodology is Greenhaw v. Lubbock Cty. Beverage Ass’n, 721 F.2d 1019, 1026 (5th Cir. 1983). In Greenhaw, the court stated, “By comparing these ‘should have been’ prices to the actual prices charged in 1975, [the expert] was able to estimate the amount of overcharge resulting from defendants’ price-fixing activity.” Id.
\(^6\) See Hovenkamp, Federal Antitrust Policy, supra note 5, § 17.5.
for their milk. This represents their overcharge, regardless of how much was absorbed at each link along the way.45

Courts have approved these incidence-avoiding methodologies in cases involving state antitrust laws that permit indirect purchaser recoveries.46 As one court observed, “the before-and-after ‘yardstick’ methodology has been accepted by courts as a means to measuring damages in both indirect and direct purchaser antitrust actions.”47 One district court noted and approved the plaintiff expert’s use in what it characterized as:

[A] “bottom across” approach which obviates the complexities Defendants cite in their “top down” approach. “Bottom across” means that the overcharge is determined by examining the price differential between the generic and the brand drug at the retail level only. Thus, there will be no need to review “pass-through” variations.48

45. Id. § 17.5b1. For a situation where computation of pass-on was not required, see Drug Mart Pharmacy Corp. v. Am. Home Prods. Corp., No. 93-CV-5148 (ILG), 2002 WL 31528625, at *9 (E.D.N.Y. Aug. 21, 2002). The plaintiff pharmacies were indirect purchasers of pharmaceuticals complaining under state antitrust law that a charge-back system effectively required them to pay more for pharmaceuticals than did favored purchasers, such as HMOs. The plaintiffs’ claimed injury was mainly loss in their ability to compete with the favored purchasers. Id. at *1–3. In this case, overcharge damages could be computed by comparing the net price paid by the pharmacies with that paid by other purchasers at the same distribution level; in any event, diversion of sales rather than the overcharge better captures the plaintiffs’ injuries.


According to the EPPs [“End Payor Plaintiffs,” or the last purchasers in line], they are not calculating “injury or damages by relying on a top-down vertical ‘pass-through’ economic analysis[.]” Rather, “EPPs will use a ‘yardstick’ damages and impact methodology to examine the retail price of the drugs EPPs were forced to purchase” in comparison “to the forecasted price (and volume) of the drug that should have been available but-for Defendants’ misconduct[.]”[.]
B. Who Is Injured, and How?

Third, if we were going to give the overcharge to a single set of buyers it should be the end users, not the direct purchasers. The end user is the only person in the distribution chain who is unable to pass anything on. The impact varies from one situation to another, but in many cases the largest losses are those absorbed by end users, and often they absorb the entire overcharge. Many intermediaries use markup formulas that are standardized across products. Consider the dairy example. Suppose that the milk retailer is Kroger, which routinely computes a 10% markup on its dairy products, depending on the extent of competition each item faces. If it pays $2.50 at wholesale in a competitive market it adds 10%, or 25¢. However, if it pays $3.50 it also adds 10%, which is now 35¢. Far from “absorbing” part of the overcharge, Kroger actually exacts a higher markup when the price of milk is fixed, reflecting its standardized percentage of the higher cartel price. The consumer gets hit even harder. However, the Supreme Court has applied the indirect purchaser rule even to situations, such as price regulated industries, where it is clear that pass-through is 100.

This is not to say that Kroger in the above example is not injured by the price fixing. Its injury results from lost volume rather than the overcharge. Under collusion, sales volume goes down. This suggests an important principle: The real injury to direct purchasers and other intermediaries in the distribution chain is not from the overcharge at all; rather, it is from the loss of sales volume. As a result, the “overcharge” is not even the theoretically correct measure of damages for an intermediary who passes on at least part of an overcharge.

If we really wanted to award damages based on injury to a buyer’s business or property, as the statute requires, we would compute damages as lost profits for all intermediaries, including the direct purchaser. Only the final purchaser, or consumer, should obtain damages for the amount of the overcharge passed on to it. Lost profit damages do not present problems of computing pass-on. Rather, they require information about the impact of the unlawful practice on both the volume of sales and the reseller’s margin. In response to a cartel, volume virtually always goes down. Margins can go down, up, or stay the same depending on the


49. See 2A Areeda et al., Antitrust Law, supra note 2, ¶¶ 346a–c, k.

50. E.g., Kansas v. UtiliCorp United, Inc., 497 U.S. 199 (1990); see supra text accompanying notes 13–18.

51. See Peter Asch & J. J. Seneca, Is Collusion Profitable?, 58 Rev. Econ. & Stat. 1, 4–5 (1976) (finding that the presence of collusive behavior is negatively associated with firm profitability, on which the demand for the firm’s products exerts an important effect).
reseller’s markup practices or the intensity of competition that it faces. The before-and-after and "yardstick" methodologies commonly used in cases involving business damages work here as well.

To be sure, in common with all commercial damages formulas, lost profit formulations impose some complexities, but these are not different in substance from those experienced by the victims of antitrust violations that exclude rivals, where overcharge measures are not relevant. Indeed, a wide variety of commercial legal violations that are subject to private enforcement compute damages as lost profits.

Computing the lost profits that result from a cartel’s higher prices need not be any more complex than computing the lost profits resulting from, say, patent infringement or the breach of a supply contract. For example, the Patent Act permits recovery of lost profits attributable to an infringement, which requires the fact finder to determine the harm caused by each infringing sale of something that could range from a full substitute for the plaintiff’s product to a relatively small component. If the patent is for an improvement, the fact finder must disaggregate that portion of the loss of sales attributable to the improvement from that

54. On lost profit damages for exclusionary practices, see 2A Areeda et al., Antitrust Law, supra note 2, ¶ 397.
57. See, e.g., WesternGeco LLC v. ION Geophysical Corp., 138 S. Ct. 2129, 2135, 2139 (2018) (applying a patent damages provision to foreign sales of an infringer’s product that was substantially identical to patentee’s product).
58. See, for example, Yale Lock Mfg. Co. v. Sargent, concluding that the infringement damages should equal:

[T]he difference between his pecuniary condition after the infringement, and what his condition would have been if the infringement had not occurred, is to be measured, so far as his own sales of locks are concerned, by the difference between the money he would have realized from such sales if the infringement had not interfered with such monopoly, and the money he did realize from such sales. If such difference can be ascertained by proper and satisfactory evidence, it is a proper measure of damages.

117 U.S. 536, 552–53 (1886).
portion attributable to noninfringing conduct. There is no reason for thinking that computation of lost-profit damages from collusion would be more difficult than this.

While pass-on must be allocated individually for each successive link in the distribution chain, loss of output is often simpler because the same loss passes from one entity to the next. For example, if a cartel of wheat growers reduces output by 30%, wholesale bakers will bake 30% less bread and retailers will sell 30% fewer loaves. Of course, complexities in the distribution chain, including the ability of intermediaries to vary the proportions of their inputs, can complicate these numbers.

Guidelines from the European Commission to the national courts of member states permit purchaser damages to be computed by all of the methodologies discussed here. Injuries for what the Guidelines describe as “price effects,” or overcharge, can be estimated using the conventional pass-on methodologies contemplated in the *Illinois Brick* decision, or else by comparing overcharges in the violation market with those in markets that are not affected. The Guidelines also permit damages to be based

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59. As the Court in *Garretson v. Clark*, 111 U.S. 120 (1884), stated:

When a patent is for an improvement, and not for an entirely new machine or contrivance, the patentee must show in what particulars his improvement has added to the usefulness of the machine or contrivance. He must separate its results distinctly from those of the other parts, so that the benefits derived from it may be distinctly seen and appreciated.

Id. at 121.

60. Guidelines for National Courts on How to Estimate the Share of Overcharge Which Was Passed on to the Indirect Purchaser, 2019 O.J. (C 267) 4, 24 [hereinafter Guidelines for National Courts] (“When estimating the passing-on related price effect national courts may rely on different types of economic approaches to quantification . . . .”).

61. Id. at 24–25. The Guidelines describe these as “comparator-based” methods, giving as examples:

1. price or margin data concerning this market before and/or after the infringement, usually referred to as the before-during-after approach;
2. data concerning the same (product) market but in a different geographical area, or another product market that is considered to evolve in a similar manner to the market where the direct or indirect purchaser operates, usually referred to as the cross-sectional approach; or
3. a combination of comparisons over time and comparisons across markets, usually referred to as the difference-in-differences approach.

on what they call the “volume effect,” or lost profits from loss of sales. Just like § 4 of the Clayton Act, the EU Damages Directive authorizes national courts to award provable damages for injuries sustained, but does not specify a particular methodology. However, the EU takes the more realistic approach, and one that is more faithful to the relevant provisions, of permitting damages to be estimated by any controllable method for which there is adequate evidentiary support.

C. Addressing Indirect Purchaser Harm: Expert Testimony

The Illinois Brick decision is apparently based on the premise that damages measurement in antitrust cases is exceptional and requires special and more categorical treatment than is used for other types of commercial injuries. That is hardly obvious. One possible distinction is the existence of treble damages, but Congress can always change that. As noted above, other types of injuries such as those that result from patent infringement pose complexities that are as great or greater.

Rather than being so categorical about the nature of damages, we should assess how damages operate in a particular case, and the variations can be substantial. This means that judges must assess the reliability and applicability of expert testimony. Once a judge has made that assessment and admitted the testimony, the testimony still must be subjected to rigorous cross-examination at trial.

The Supreme Court’s Daubert decision, which came fifteen years after Illinois Brick, should be the controlling mechanism for evaluating expert models rather than anything as blunt, categorical, and frankly wrong as the indirect purchaser rule. Daubert rulings, which are generally not subject to jury control, should provide judges with an adequate mechanism for ensuring that expert damages reports are based on reliable and relevant assumptions, methodologies, and data. In a particular


63. Directive 2014/104/EU of the European Parliament and of the Council of 26 November 2014 on Certain Rules Governing Actions for Damages Under National Law for Infringement of the Competition Law Provisions of the Member States and of the European Union, 2014 O.J. (L 349) 1, 8–9 (stating that each member state has the responsibility to determine its own rules for qualifying the harm, such as the required proof and methods).

64. See supra notes 56–59 and accompanying text.


66. On the use of Daubert in antitrust damages models see 2A Areeda et al., Antitrust Law, supra note 2, ¶¶ 340a, 399.

case, if there is doubt about a particular expert opinion, the court will be required to make a *Daubert* ruling with respect to the expert’s methodology.68

IV. PROXIMATE CAUSE, OR THE PROPER MEASUREMENT OF DAMAGES?

The *Apple* dissenters adopted a distinctively noneconomic approach that dispensed with the pass-on problem entirely. Indeed, they were not even concerned about who was injured. They reasoned that only the direct purchaser had an injury that was “proximately caused” by the defendant’s antitrust violation.69 This view harkens back to a nineteenth-century tort law concept that was used by some courts to limit tort liability, particularly in railroad cases.70 Under this rule, only a single entity could be said to have an injury that was proximately caused by the defendant’s conduct. That approach was rejected by John Stuart Mill by the mid-nineteenth century.71 The dissent’s approach also detaches proximate cause concerns from the factor that has always been central to proximate cause inquiries—foreseeability.72 Indeed, it is so foreseeable that overcharge injuries will be passed on that no one seriously disputes it.73

In the legal system, this narrow approach to proximate cause analysis was properly abandoned in tort cases and should be laid to rest. In economics, it was very largely upended by the marginalist revolution, which


70. See, e.g., Blythe v. Denver & R.G. Ry. Co., 25 P. 702, 702–04 (Colo. 1891) (holding that an “act of God” did not meet the requirement of proximate cause); *Stone v. Bos. & A.R. Co.*, 51 N.E. 1, 2–4 (Mass. 1898) (holding that the plaintiff could not recover when oil leaking from barrels on a railroad platform was ignited by a person unconnected to the railroad for a lack of proximate cause); see also Hovenkamp, *The Opening of American Law*, supra note 36, 106–22.

71. See 1 John Stuart Mill, A System of Logic, Ratiocinative and Inductive: Being a Connected View of the Principles of Evidence, and Methods of Scientific Investigation 241, 398 (1843) (“For every event, there exists some combination of objects or events, some given concurrence of circumstances, positive and negative, the occurrence of which will always be followed by that phenomenon.”). A sharp debate ensued in the United States between Mill and Francis Wharton, an orthodox cleric who wrote on legal subjects and adhered to strictly premarginalist views. See Francis Wharton, *The Liability of Railway Companies for Remote Fires: Proximate and Remote Cause* 731–47 (1876); Francis Wharton, A Suggestion as to Causation 5–14 (1874).

72. See, e.g., Oliver Wendell Holmes, Jr., *The Common Law* 95 (1881) (“There is no such power [to avoid evil] where the evil cannot be foreseen.”); see also Mark F. Grady, Proximate Cause Decoded, 50 UCLA L. Rev. 293, 322–33 (2002); Benjamin C. Zipursky, Foreseeability in Breach, Duty, and Proximate Cause, 44 Wake Forest L. Rev. 1247, 1292–94 (2009).

73. See *Bank of Am. Corp. v. City of Miami*, 137 S. Ct. 1296, 1305–06 (2017) (finding that proximate cause limited liability for a Fair Housing Act violation, even for certain foreseeable harms).
first provided serious tools to investigate how economic disruptions are passed through the economy.\footnote{74} It makes even less sense in antitrust cases.

The \textit{Apple} dissent’s view also confuses questions about proximate cause, or legal cause, with questions about the proper way to measure damages.\footnote{75} \textit{Illinois Brick} was distinctly not a case about causation or proximate cause. Indeed, the majority never used the term at all, and Justice Brennan used it only a single time in his dissent.\footnote{76} The virtually exclusive concern with \textit{Illinois Brick} was with computation of damages in situations where an overcharge might be passed on from one party to another.

Even on its own terms it seems hard to justify a conclusion that only the direct purchaser has an injury “proximately caused” by the violation when in many cases it suffered no overcharge injury at all.

\textbf{CONCLUSION}

Working within the context of the existing \textit{Illinois Brick} rule, the majority reached the right conclusion about its application in \textit{Apple v. Pepper}. While that eliminates some of the irrationalities of the indirect purchaser rule as it has been applied, it is hardly a solution to the problem. The correct solution is more consistent with the statutory language granting an action to (1) “any person who shall be injured in his business or property,” and then measuring the recovery as the (2) “damages by him sustained.”\footnote{77} In the process, this solution addresses a serious and widely recognized problem—namely, that the current policy toward price fixing under-deters.\footnote{78}
End-user purchasers who are not in a position to pass on anything should be awarded overcharge damages for the full overcharge they paid, for that measures the injury that they have sustained. All intermediaries beginning with the direct purchaser should be awarded damages for lost profits, which represents injuries from both absorbed overcharges and the loss of sales that always accompany collusion. None of these recoveries is “duplicative,” and none requires complex apportioning of passed on damages. More importantly, this methodology is driven by the facts of each case and brings antitrust damages measurement more in line with damages formulation across the full range of commercial harms.