THE AFTERMATH OF *eBay*: PREDICTING WHEN DISTRICT COURTS WILL GRANT PERMANENT INJUNCTIONS IN PATENT CASES

By Jeremy Mulder

When the Supreme Court agreed to hear *eBay Inc. v. MercExchange, LLC*, superscript 1, patent practitioners braced themselves for a sea change: would district courts continue to issue injunctions as a matter of course once a court adjudged a patent valid and a defendant’s actions infringing? For over twenty years, this had been the Federal Circuit’s general rule, superscript 2 and the patent community benefited from the predictability of this rule governing the grant of permanent injunctions. On May 15, 2006, the Court, overruling the Federal Circuit, held a district court must apply a four-factor test in determining whether to grant an injunction in patent cases, superscript 3.

As the patent community adjusts to this shift in the law, the question becomes: how will district courts apply this test in practice—under what set of circumstances will district courts grant injunctions in patent cases? Furthermore, if a district court denies an injunction, what remedy can a patentee expect?

Part I of this Note sets out the Court’s opinion in *eBay*, superscript 4 and pays special attention to the concurring opinions, which offer insights into the direction of patent injunction case law. superscript 5 Part II examines the concerns arising in the aftermath of *eBay* and introduces some post-*eBay* patent injunction decisions. These cases provide the first glimpse at how district courts decide, under the equitable four-factor test, whether to grant patent injunctions. Part III of this Note sketches a preliminary model for predicting when district courts will grant patent injunctions. Based on the available post-*eBay* case law, this model suggests that courts will grant an injunction when a defendant-infringer directly competes with a plaintiff-patentee, and will deny an injunction when a defendant-infringer merely indirectly competes with a plaintiff-patentee.

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4. *Id.* at 1837.
5. *Id.* at 1841-43 (Roberts, C.J., concurring; Kennedy, J., concurring).
I. THE *EBAY* V. *MERCEXCHANGE* DECISION

For over twenty years, under Federal Circuit case law, a court issued a patent injunction as a matter of course once it adjudged the patent valid and the defendant's actions infringing.\(^6\) On May 15, 2006, in *eBay*,\(^7\) the Court reversed the Federal Circuit's longstanding rule by holding that under well-established principles of equity, a plaintiff seeking a permanent injunction must satisfy a four-factor test before a court may grant such relief. A plaintiff must demonstrate: (1) that it has suffered an irreparable injury; (2) that remedies available at law, such as monetary damages, are inadequate to compensate for that injury; (3) that, considering the balance of hardships between the plaintiff and defendant, a remedy in equity is warranted; and (4) that the public interest would not be disserved by a permanent injunction.\(^8\)

In so holding, the Court stated that both lower courts were in error.\(^9\) Specifically, the district court articulated the four-factor test but then erroneously suggested a broad swath of situations in which an injunction should not issue—namely, cases involving business method claims and cases involving patentees who do not make or use their inventions but merely seek to license them.\(^10\) On appeal, the Federal Circuit, ignoring the four-factor test, applied its general rule: absent exceptional circumstances, a permanent injunction follows from a finding of validity plus infringement.\(^11\) With clarity, the Supreme Court stated that the four-factor test applied to permanent injunctions in all cases, including patent cases.\(^12\) All the justices agreed with this ruling.\(^13\)

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7. Plaintiff MercExchange owned "a business-method patent for an electronic market designed to facilitate the sale of goods between private individuals by establishing a central authority to promote trust among market participants." 13 JAMES WM. MOORE ET AL., MOORE'S FEDERAL PRACTICE § 65.03 (3d ed. 2006); U.S. Patent No. 5,845,265 (filed Nov. 7, 1995).
9. *Id.* at 1840-41.
10. *Id.* at 1840.
11. *Id.* at 1841.
12. *Id.*
13. *Id.* at 1841 (Roberts, C.J., concurring); *Id.* at 1842 (Kennedy, J., concurring).
A. The Concurring Opinions of Justice Roberts and Justice Kennedy

The Court was divided, however, about the practical implications of the majority's ruling. Justice Thomas, writing for the majority, stated,

we take no position on whether permanent injunctive relief should or should not issue in this particular case, or indeed in any number of other disputes arising under the Patent Act. We hold only that the decision whether to grant or deny injunctive relief rests within the equitable discretion of the district courts, and that such discretion must be exercised consistent with traditional principles of equity [i.e. the four-factor test] . . . .

Notwithstanding Justice Thomas's claim, both Chief Justice Roberts's and Justice Kennedy's concurring opinions, which speak for a total of seven of the justices, did take positions on whether permanent injunctions should issue in any number of other patent disputes. Furthermore, the Roberts and Kennedy concurring opinions espouse contrasting views of the proper outcome of future patent injunction cases.

1. Chief Justice Roberts' Concurring Opinion: History is Instructive

Chief Justice Roberts' concurring opinion suggested tradition is outcome-determinative. He stated, quoting Justice Holmes, that "a page of history is worth a volume of logic." The Chief Justice noted that historically injunctions have almost always issued upon a finding of patent infringement. According to Chief Justice Roberts, this is because the right to exclude, once infringed, necessarily implicates at least the first two factors—irreparable harm and no adequate remedy at law—of the four-factor test. Chief Justice Roberts' statements insinuate that even under the four-factor test district courts should continue to grant injunctions in the vast majority of patent cases.

14. Id. at 1841.
15. Id. at 1841 (Roberts, C.J., concurring, joined by Scalia, J. and Ginsburg, J.); Id. at 1842 (Kennedy, J., concurring, joined by Stevens, J., Souter, J., and Breyer, J.). Justice O'Connor had resigned, and Justice Alito was not yet confirmed, when the Court decided eBay.
16. Id. at 1842 (Roberts, C.J., concurring) (quoting New York Trust Co. v. Eisner, 256 U.S. 345 (1921)).
17. Id. at 1841 (Roberts, C.J., concurring).
18. Id. at 1842 (Roberts, C.J., concurring).
2. Justice Kennedy's Concurring Opinion: Contextually Situated

In contrast to the Chief Justice's view, Justice Kennedy's concurring opinion stated that the appropriate remedy will not always follow history, but instead will depend on the context: historic or modern. Justice Kennedy stated the equitable four-factor test is well suited to deal both with cases that are similar to those that have come before, and cases which present new issues not historically seen. Justice Kennedy implied that cases that resemble historic fact patterns will likely result in an injunction, whereas cases involving certain modern issues may result in district courts denying injunctions. Explaining the difference between modern and historical context, Justice Kennedy stated, "[i]n cases now arising[,] trial courts should bear in mind that in many instances the nature of the patent being enforced and the economic function of the patent holder present considerations quite unlike earlier cases." Specifically, Justice Kennedy mentioned two modern issues: (1) an emerging industry that uses patents primarily for obtaining license fees, rather than for producing and selling; and (2) business method patents.

Justice Kennedy cautioned that in modern cases involving patentees primarily concerned with licensing, such as when the patent covers only a small part of the infringing product and the patentee uses the threat of an injunction for negotiation leverage, that "legal damages may well be sufficient to compensate for the infringement and an injunction may not serve the public interest." With respect to business method patents, Justice Kennedy stated that district courts should consider that the "potential vagueness and suspect validity of some of these [business method] patents may affect the calculus under the four-factor test."

To be sure, Justice Kennedy does not advocate for a blanket rule where courts should deny an injunction because a case falls into one of these modern categories. Rather, in his view, courts should equitably examine these modern categories to determine whether to grant an injunction.

19. Id. (Kennedy, J., concurring).
20. Id.
21. Id. at 1842-43 (Kennedy, J., concurring).
22. Id. at 1842 (Kennedy, J., concurring).
23. Id.
24. Id.
25. Id.
26. See id.
3. The Concurring Opinions Recapped: Agreement and Disagreement

Chief Justice Roberts and Justice Kennedy agree that courts should issue injunctions in cases with traditional fact patterns—for example, an infringer who makes, uses, or sells in direct competition with a patentee. They apparently disagree, however, about whether courts should consider emerging issues that were not historically present to determine whether granting an injunction is appropriate in evolving modern contexts.

With the majority refusing to advocate for a position, and the concurring opinions suggesting different approaches, the divided Court leaves district courts with the task of deciding how to apply the four-factor test and whether and under what circumstances to grant injunctions in future patent cases.

II. CONSEQUENCES OF THE EBAY DECISION

When the Court in eBay overturned the Federal Circuit’s twenty-year old general rule that validity plus infringement gives rise to an injunction, the Court caused a shift in the law which left several concerns and uncertainties for inventors, businesses, investors, and practitioners. These uncertainties include whether district courts will grant injunctions in patent cases involving: (1) business method patents; (2) a patented invention that is a small component of the infringing product; and (3) a patentee that licenses but does not make or use his or her invention. When a court denies an injunction, further uncertainties include: (4) whether a patentee must commence multiple actions to obtain its legal remedy for a defendant’s ongoing infringement, or whether courts will calculate a license fee going forward; and (5) how courts will fashion a deterrent remedy.

These uncertainties should concern inventors, businesses, investors, and practitioners. Inventors, businesses, and investors want to know whether they can enjoin infringing competitors and thereby help recoup their investments and secure positive returns. Practitioners want to know

27. Id. at 1841-42 (Roberts, C.J., concurring); id. at 1842 (Kennedy, J., concurring).
28. Compare id. at 1841-42 (Roberts, C.J., concurring), with id. at 1842 (Kennedy, J., concurring). One reason Chief Justice Roberts’s and Justice Kennedy’s opinions differ on whether a district court should grant a permanent injunction is because they view the right to exclude differently. Whereas Chief Justice Roberts believes the right to exclude, once infringed, necessarily implicates at least the first two factors—irreparable harm and no adequate remedy at law—of the four-factor test, Justice Kennedy separates the right to exclude from the remedy for a violation of that right. Id.
how to craft arguments and devote resources to secure permanent injunctions for their clients.

The Court’s decision in *eBay* offered little guidance on how to apply the four-factor test and left the district courts to determine under what circumstances to grant patent injunctions. Importantly, because the district courts’ opinions will be reviewed under the abuse of discretion standard,\(^{29}\) their equitable decisions will likely be final in most instances; district courts will shape the future of patent injunction case law.

Part II of this Note surveys the post-*eBay* district court decisions involving permanent injunctions and presents the data used in Part III to sketch a preliminary predictive model of the post-*eBay* landscape.

### A. The Post-*eBay* Cases

This Section presents five post-*eBay* cases and categorizes them into two groups: injunction granted and injunction denied.\(^{30}\) The grouping illu-

\(^{29}\) *Id.* at 1839 ("The decision to grant or deny permanent injunctive relief is an act of equitable discretion by the district court, reviewable on appeal for abuse of discretion.").


Three additional cases, *Floe* Int’l, Inc. v. Newmans’ Mfg., Inc., No. 04-5120 (DWF/RL), 2006 U.S. Dist. LEXIS 59872 (D. Minn. Aug. 23, 2006) (granting an injunction), *Am. Seating* Co. v. USSC Group, Inc., No. 01-00578, 2006 U.S. Dist. LEXIS 59212 (E.D. Mich. Aug. 22, 2006) (granting an injunction), and *Telequip* Corp. v. Change Exch., No. 5:01-CV-1748 (FJS/GJD), 2006 U.S. Dist. LEXIS 61469 (N.D.N.Y. Aug. 15, 2006) (granting an injunction), fail to adequately discuss the four-factor test and therefore this Note will not analyze them. In *American Seating*, without any mention of the four-factors, the court stated (1) in the circumstance of this case, direct competition in a two-party market, an injunction is in order, and (2) nothing in *eBay* was contrary to this decision. 2006 U.S. Dist. LEXIS 59212, at *1*-2. In *Floe*, the defendant-infringer stipulated to a permanent injunction enjoining it from directly competing against plaintiff Floe in the manufacturing and selling of snowmobile trailers. 2006 U.S. Dist. LEXIS 59872, at *1*-2, *25*-27. In *Telequip*, the court granted an injunction because the defendant-infringer defaulted and therefore the court accepted the plaintiff’s well-pleaded factual allegations as true. 2006 U.S. Dist. LEXIS 61469, at *2*. *Telequip* teaches that a plaintiff-patentee seeking an injunction should include in the complaint factual allegations, which at a minimum state the following: plaintiff’s reputation has been irreparably harmed by the de-
strates the shift from the old Federal Circuit rule, under which courts granted injunctions as a matter of course after a finding of validity and infringement, to the new four-factor eBay rule. Under the new rule, courts have already denied injunctions in three cases notwithstanding a jury’s finding of validity and infringement.31

I. Injunction Granted

This Section examines two post-eBay decisions granting permanent injunctions.32 Both decisions are unpublished.33

a) Litecubes, LLC v. Northern Light Products, Inc.34

Plaintiff Litecube and defendant Northern Light Products were direct competitors in the market for illuminating novelty-devices that resemble ice cubes.35 The jury returned a verdict stating that Northern Light Products had willfully infringed Litecubes’ patent.36 After reciting the four-factor test, the district court granted Litecubes’ request for a permanent injunction against Northern Lights Products.37

The court stated that Litecubes demonstrated that each factor favored the entry of a permanent injunction.38 It suffered irreparable injury because, “[p]otential customers in the United States were buying infringing devices sold and imported by Defendant, instead of purchasing the products sold by Plaintiffs.”39 Money damages were inadequate because, “[i]f the Court fail[ed] to grant equitable relief, Defendants [would] be able to continue to sell and import its products in violation of Plaintiffs’ intellectual property rights unless Plaintiffs file[d] another lawsuit to enforce their rights.”40 The court noted that Northern Light Products’ sales history, combined with its admission that it still had a warehouse full of infringing

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34. Litecubes, 2006 U.S. Dist. LEXIS 60575.
35. Id. at *3; U.S. Patent No. 6,416,198 (filed July 28, 2000).
37. Id. at *31-33.
38. Id.
39. Id. at *31.
40. Id. at *31-32.
inventory, meant that infringing products would likely find their way to the United States.\textsuperscript{41}

The balance of hardships favored an injunction because Lightcubes had developed and obtained IP protection for its product whereas Northern Light Products had no such protection and sought to poach Lightcubes’ customers while violating its rights.\textsuperscript{42} The court stated an injunction was necessary to stop the defendant from continuing to import and sell its infringing products. Finally, the court issued a blanket statement: “the public interest would not be disserved by a permanent injunction.”\textsuperscript{43}

b) \textit{Wald v. Mudhopper Oilfield Services}\textsuperscript{44}

In another direct competitor situation, this time involving the sale of an oil well treatment product, the district court granted plaintiff Wald a permanent injunction against defendant Mudhopper Oilfield Services, Inc. (“Mudhopper”), a willful infringer.\textsuperscript{45}

The court articulated the four factors and found each factor favored Wald’s request for a permanent injunction.\textsuperscript{46} Addressing the first factor, the court acknowledged that “irreparable harm evades easy definition” but that it “is often suffered when the injury can[not] be adequately atoned for in money . . . or when the district court cannot remedy [the injury] following a final determination on the merits.”\textsuperscript{47} The court, addressing the first two factors together, held Wald suffered irreparable harm, and money damages were inadequate compensation because Wald “lost market share and the opportunity to maintain [its] own polymer stick to [sic] as the industry standard and that their reputation for innovation was damaged as a result.”\textsuperscript{48} Thus, the court stated damages, awarded either by the jury or trebled, did not compensate Wald for these harms.\textsuperscript{49}

Under Federal Circuit law, several factors support a court’s decision that the balance of hardships favors an injunction: a defendant’s failure to provide a reason it stopped infringing, a defendant’s failure to profess its intent not to infringe in the future, and a defendant’s ability to resume pro-

\textsuperscript{41} Id. at *32.
\textsuperscript{42} Id.
\textsuperscript{43} Id. at *32-33.
\textsuperscript{44} \textit{Wald}, 2006 U S Dist LEXIS 51669.
\textsuperscript{45} Id. at *17-18.
\textsuperscript{46} Id. at *14-17.
\textsuperscript{47} Id. at *15-16 (citing Prairie Band of Potawatomi Indians v. Pierce, 253 F.3d 1234, 1250 (10th Cir. 2001) (citations and quotations omitted).
\textsuperscript{48} \textit{Wald}, 2006 U S Dist LEXIS 51669, at *15-16 (internal quotes omitted) (citing plaintiff’s reply at 8-9).
\textsuperscript{49} Id.
duction. The court in this case found the balance of hardships favored a permanent injunction, as Mudhopper merely stated an injunction was unnecessary, but failed to specifically identify any hardship it would suffer from an injunction. Here, notwithstanding Mudhopper’s immediate cessation of selling its infringing product and its professed intention not to sell again, the court found that its willful infringement and its failure to indicate that it did not still possess an infringing inventory weighed in favor of granting an injunction.

The court found the public interest favored Wald, stating simply that Wald bore the risks of future infringement, while Mudhopper suffered no harm implicating the public interest.

Under Chief Justice Roberts’s view, it should come as no surprise that the courts applying the four-factor test in Litecubes and Wald granted permanent injunctions. Historically, courts have almost always granted injunctions upon a finding of patent infringement. This Note’s focus shifts now to the cases where courts, applying the four-factor test, have denied injunctions despite a finding of validity and infringement.

2. Injunction Denied

Under the four-factor test, courts denied permanent injunctions in three post-eBay patent cases. As the only published opinion of the post-eBay cases and a case where the court denied an injunction, z4 Techs., Inc. v. Microsoft Corp. is the most important decision from a precedential standpoint.

a) z4 Technologies, Inc. v. Microsoft Corp.

The district court denied z4’s request for a permanent injunction despite a jury finding defendant Microsoft willfully infringed plaintiff z4’s patent. z4 and Microsoft are not direct competitors. z4’s patent covers

52. Id. at *17.
53. Id.
55. Voda, 2006 U.S. Dist. LEXIS 63623 (denying an injunction); Paice, 2006 U.S. Dist. LEXIS 61600 (denying an injunction); z4 Techs., Inc., 434 F. Supp. 2d 437 (denying an injunction).
56. See z4 Techs., Inc., 434 F. Supp. 2d 437; see supra note 30.
57. z4 Techs., Inc., 434 F. Supp. 2d 437.
58. Id. at 438.
methods for "product activation," which limits the unauthorized use of computer software.\textsuperscript{59} z4 produces, markets, sells, and licenses its product activation software. Microsoft does not produce product activation software, but instead uses product activation in its Windows operating system and Office software.\textsuperscript{60}

Addressing z4's request for a permanent injunction, the district court laid out the applicable four-factor test from eBay, ultimately denying z4's request for a permanent injunction. Under the irreparable harm factor, the court held that a finding of validity plus infringement does not raise a presumption of irreparable harm.\textsuperscript{61} In the court's view, "in eBay, the Supreme Court indicated that an injunction may only issue 'in accordance with the principles of equity[.]' once a plaintiff satisfied the four-factor test."\textsuperscript{62} This language, combined with the Court's warning that the traditional principles of equity counsel against applying categorical rules\textsuperscript{63} led the district court to find that there was no presumption of irreparable harm.\textsuperscript{64}

Next, the court held z4 failed to show it would suffer irreparable injury absent a permanent injunction.\textsuperscript{65} In the court's view, irreparable injury included lost profits, loss of brand name recognition, and loss of market share.\textsuperscript{66} The court stated z4 would not suffer irreparable injury for two reasons: (1) Microsoft did not produce product activation software for individual sale, distribution, or license to third parties and therefore was not a direct competitor, and (2) "Microsoft only use[d] the infringing technology as a small component of its own software, and it [was] not likely that any consumer of Microsoft's Windows or Office software purchase[d] these products for their product activation functionality."\textsuperscript{67}

The court found z4 failed to show monetary damages were inadequate compensation for Microsoft's infringement.\textsuperscript{68} The court noted that infringement of a patentee's right to exclude did not automatically mean money damages were inadequate.\textsuperscript{69} Instead, in dicta, the court gave examples where money damages would be inadequate: direct competition which saturated the market and damaged goodwill or brand name recogni-

\textsuperscript{59} Id. at 438-39.  
\textsuperscript{60} Id. at 440.  
\textsuperscript{61} Id.  
\textsuperscript{62} Id. (citing eBay, 126 S. Ct. at 1840).  
\textsuperscript{63} eBay, 126 S. Ct. at 1840-41.  
\textsuperscript{64} z4 Techs., Inc., 434 F. Supp. 2d at 440.  
\textsuperscript{65} Id. at 441.  
\textsuperscript{66} Id. at 440.  
\textsuperscript{67} Id.  
\textsuperscript{68} Id. at 442.  
\textsuperscript{69} Id. at 441.
Here, citing Justice Kennedy’s eBay concurrence, the court found money damages adequately compensated z4 because its product activation was only a small component, a non-core functional component, of Microsoft’s software products. That is, the court found that a reasonable royalty compensated z4. To preserve z4’s right to future monetary damages for Microsoft’s post-verdict infringement, the court severed z4’s continuing cause of action for money damages, and ordered Microsoft to file quarterly reports indicating the number of infringing units sold.

The court found the balance of hardships favored denying a permanent injunction. Specifically, if the court granted an injunction, Microsoft would need to expend considerable time and money to reengineer and re-release its Windows and Office software. Also, an injunction would shut down the product activation in Windows and Office and allow the market to be flooded with pirated software resulting in incalculable damage to Microsoft. On the other hand, if the court denied an injunction, z4 only faced limited harm, which money damages could remedy.

Finally, the court found granting a permanent injunction would disserve the public interest. An injunction which interrupted Microsoft’s immensely popular Windows and Office software products would likely harm downstream third parties such as smaller computer manufacturers, retailers, and users. The court could not think of a reason why denying an injunction would harm the public interest. A potential harm outweighs no harm.

b) Paice LLC v. Toyota Motor Corp.

The court in Paice held that defendant Toyota’s hybrid transmission infringed plaintiff Paice’s patent for an improved hybrid electric vehicle, yet the court declined to enter a permanent injunction against Toyota be-

70. Id. (“This is because it is impossible to determine the portions of the market the patent owner would have secured but for the infringer or how much damage was done to the patent owner’s brand recognition or good will due to the infringement.”).
71. Id.
72. Id. at 442.
73. Id. at 444.
74. Id. at 443.
75. Id. at 442.
76. Id. at 443.
77. Id.
78. Id. at 444.
79. Id. at 443-44.
80. Id. at 444.
cause Paice failed to establish that any of the four factors cut in favor of an injunction.\textsuperscript{83}

The court found Paice failed to show it had suffered an irreparable injury.\textsuperscript{84} Paice argued Toyota’s infringement prevented it from licensing its patented technology.\textsuperscript{85} However, the court found that Paice failed to provide evidence that it was otherwise unable to license its patented technology.\textsuperscript{86} Furthermore, Paice and Toyota were not direct competitors: Paice sought to license its patented hybrid technology, whereas Toyota manufactured and sold vehicles. The facts of the case did not implicate the benchmarks of irreparable harm—loss of market share and loss of brand name recognition—because the parties were not direct competitors.\textsuperscript{87}

The court found Paice failed to establish that money damages were inadequate.\textsuperscript{88} The court stated that Paice failed to demonstrate “why other potential licensees would be less likely to take a license if this case end[ed] with monetary damages instead of equitable relief.”\textsuperscript{89} Furthermore, Paice’s willingness to extend offers to license its product, including to Toyota throughout litigation, illustrated the adequacy of money damages.\textsuperscript{90} Finally, two of the jury’s findings buttressed the court’s conclusion that money damages would adequately compensate Paice: (1) Paice’s product was only a small component of, and only contributed a small value to, Toyota’s vehicles; and (2) a reasonable royalty—$25 per sale of infringing vehicles, paid quarterly, and accompanied by an accounting of infringing sales—could be easily calculated based on future sales of Toyota’s infringing devices.\textsuperscript{91}

According to the court, neither the balance of hardships, nor the public interest, favored an injunction.\textsuperscript{92} Paice argued that without an injunction it would be unable to license and would therefore go out of business; the court dismissed the argument for lack of evidence of proximate causation.\textsuperscript{93} Conversely, the court stated that enjoining Toyota might stifle re-

\begin{itemize}
\item \textsuperscript{83} Paice, 2006 U.S. Dist. LEXIS 61600, at *18.
\item \textsuperscript{84} Id. at *12.
\item \textsuperscript{85} Id.
\item \textsuperscript{86} Id.
\item \textsuperscript{87} Id. at *14.
\item \textsuperscript{88} Id.
\item \textsuperscript{89} Id.
\item \textsuperscript{90} Id. at *16.
\item \textsuperscript{91} Id. at *15-16, *19-20; see also id. at *7-8 (setting forth basis for jury’s computation of $25 reasonably royalty payment rate).
\item \textsuperscript{92} Id. at *16-17.
\item \textsuperscript{93} Id.
\end{itemize}
search and development in the hybrid market, harm innocent downstream third parties like dealers and suppliers, and damage Toyota's reputation.94

c) Voda v. Cordis Corp.95

In Voda, the court denied plaintiff Voda's request for a permanent injunction, even though defendant Cordis Corp. ("Cordis"), through its sales activities, willfully infringed Voda's angioplasty guide catheter patents.96 Voda exclusively licensed its patents to Scimed, a non-party to the suit.97

In its analysis, the court addressed only the first two factors of the four-factor test, finding that Voda failed to demonstrate either irreparable injury or the inadequacy of money damages.98 With respect to harm to itself, Voda argued only that a presumption of irreparable harm follows a finding of infringement and validity; the court dismissed this argument as running afoul of eBay which, "clearly held the right to exclude does not, standing alone, justify a general rule in favor of injunctive relief."99 Voda also argued that Cordis' infringing activities harmed its exclusive licensee, Scimed.100 The court held such arguments were irrelevant because Scimed elected not to sue to enforce its patent rights, and plaintiff Voda suffered no personal injury from Cordis' infringement of Scimed's rights.101

The court held that Voda failed to show monetary damages were inadequate to compensate it for Cordis' infringing sales.102 The court found unpersuasive Voda's argument that money damages were inadequate to compensate for Cordis' continuing infringement, which harmed Voda's relationship with its exclusive licensee.103 The court commented that this argument was, "simply the other side of the right-to-exclude coin and [was] not sufficient to justify granting injunctive relief."104

Having examined the post-eBay uncertainties, concerns, and case law, this Note now advances a model that attempts to predict when district courts will grant permanent injunctions in patent cases.

94. Id. at *16.
96. Id. at *1-2; U.S. Patent No. 5,445,625 (filed June 14, 1994).
97. Id. at *20.
98. See id. at *18 (failing to address the balance of hardships and public interest factors).
99. Id. (citing eBay, 126 S. Ct. at 1840).
100. Id. at *18-19.
101. Id. at *19.
102. Id. at *20.
103. Id.
104. Id.
III. A PREDICTIVE MODEL

Based on the available post-\textit{eBay} case law, the type of competition between the plaintiff-patentee and the defendant-infringer determines whether district courts grant permanent injunctions in patent cases. District courts will grant permanent injunctions when the patentee and the infringer compete directly. No injunction follows from indirect competition.

A. The Model's Origins: How District Courts View the Four Factors

This Section delineates the origins of the predictive model by discussing how courts view the four factors when ruling on motions for permanent injunctions. Based on the available data, courts view the first two factors as most crucial, and the outcome of those two factors depends upon the type of competition; direct competition favors an injunction, whereas indirect competition favors royalty payments. The latter two factors appear less crucial, either because they are less likely to be implicated or because when they are implicated, courts appear to stampede them with the first two factors.\footnote{105}{See Barton Beebe, An Empirical Study of the U.S. Copyright Fair Use Cases, 1978-2005 (A Report of Initial Findings for Boalt Hall's Intellectual Property Scholarship Seminar, Oct. 19, 2006), http://www.law.berkeley.edu/institutes/bclt/students/Beebe.pdf (discussing the term "stampeding," in context of Copyright's fair use factor test, and how if courts find that one factor favors an outcome, then the court will find that all the factors favor that outcome).}

1. Factors One and Two: Irreparable Injury and No Adequate Remedy at Law

The first two factors are the most crucial. In every post-\textit{eBay} case, the court has ruled on the first two factors in lockstep and this ruling determined whether the court granted or denied the injunction. Inevitably, factors one and two both cut the same way.

Courts collapse the first two factors, apparently viewing irreparable harm, if an injunction is not granted, and inadequate remedy at law, in the form of damages, as opposite sides of the same coin. If the patentee suffers an irreparable injury then money damages will not make the patentee whole and the equitable relief of an injunction is necessary; if money damages will not right the defendant's wrong, then the plaintiff has been irremediably injured. One commentator describes the first two factors as follows: "[a]n \textit{irreparable injury} is defined as a harm the court would be unable to remedy even if the [plaintiff-patentee] prevailed in the final adjudication[;]" the plaintiff may show the inadequacy of a remedy at law if
such remedy is unavailable or insufficiently compensatory.\textsuperscript{106} For example, "[a]n adequate remedy at law may be deemed unavailable if a legal remedy may be obtained only by commencement of multiple actions, such as when the defendant repeatedly commits allegedly harmful acts."\textsuperscript{107} Also, injuries to a patentee's "reputation, credibility, or ability to continue its business viably . . . are difficult to calculate, and, thus, money damages would be an inadequate remedy to compensate those injuries."\textsuperscript{108}

This Note advances the hypothesis that courts collapse the first two factors into a single factor: type of competition. Courts view direct competition as the proxy for both irreparable harm and no adequate remedy at law. Establishing direct competition equates to victory for plaintiffs seeking an injunction. Indirect competition, on the other hand, is the proxy for reparable harm and adequate remedy at law. No injunction follows from indirect competition.

Here, courts are making a normative judgment and balancing the rights of patentees with the ultimate aim of the patent statute. Congress enacted the patent statute to "promote the Progress of Science and the useful Arts."\textsuperscript{109} As the means to accomplish this end, the patent statute granted patentees limited rights.\textsuperscript{110} The Supreme Court has described this situation as a delicate balance.\textsuperscript{111} If the scope of the rights were too narrow, inventors would have no incentive to create or disclose their inventions. Consequently society would suffer from a stagnation of the pool of available scientific knowledge. If the patent statute granted patentees exclusionary rights that were too broad, then the patentees would assert their broad rights for personal gain in an expansive manner. Therefore, patents would impede other inventors from contributing to the further creation and would compromise dissemination of scientific knowledge.

The normative implications of how courts view the four factors are clear: post-\textit{eBay} courts view the patentee as entitled to an injunction to protect its patented invention from \textit{direct} competition. Allowing a direct competitor to violate a patentee's right to exclude harms the bedrock view that patents provide incentives to invent and thereby promote the progress of science. If a patentee cannot control the market its patent competes in,

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\bibitem{106} Moore et al., \textit{supra} note 7, § 10A.20.
\bibitem{107} \textit{Id.} (citations omitted).
\bibitem{108} \textit{Id.}
\bibitem{109} U.S. Const. art. I, § 8, cl. 8.
\bibitem{110} \textit{Id.}; 35 U.S.C. § 100 et seq.
\bibitem{111} See Bonito Boats, Inc. v. Thunder Craft Boats, Inc., 489 U.S. 141, 168 (1989) ("It is for Congress to determine if the present system of design and utility patents is ineffectual in promoting the useful arts in the context of industrial design.").
\end{thebibliography}
then why should it create, disclose information, or pay the large sum of money needed to secure a patent in the first place?

The other side of this normative view leaves indirect competition beyond the reach of equitable remedy. If courts deny injunctions of indirect competitors, then a patentee cannot exclude other competitive entrants from innovating in the indirect market space, even if they infringe. Subsequent inventors can continue to invent and disseminate their inventions in the indirect markets, subject to paying the patentee money damages; limiting the patentee’s right to exclude in this manner consequently allows build-on innovation to continue, which aids patent laws overall goal of promoting the progress of science.

2. Factors Three and Four: Balance of Hardships and Public Interest

Factors three and four appear less crucial to a court’s decision of whether to grant an injunction. This is true for two reasons. First, the facts of the case do not always implicate either a balancing of hardships between the patentee and the infringer, or the public interest and the patentee. When discussing a preliminary injunction, one commentator has noted courts apply a sliding scale to balancing hardships: “the more likely that the plaintiff will succeed on the merits, the less the balance of harms need favor the plaintiff.”112 If this is the rule in the preliminary injunction context, then arguably, in the permanent injunction context, since the plaintiff has already succeeded on the merits, then the balance of hardships may be irrelevant. In effect, if a plaintiff shows irreparable injury and no adequate remedy at law, then the plaintiff has implicitly established its hardship relative to the defendant-infringer.

Second, even where the facts of the case do implicate one or both of the last two factors, courts appear to stampede113 factors three and four based upon the first two factors. That is, if the court finds irreparable injury and no adequate remedy at law, then it will find that the last two factors favor the court’s granting an injunction, too. If the court finds reparable injury and an adequate remedy at law, then the court will find that the last two factors also favor denial of an injunction.

However, under the right set of facts, the last factor might favor a denial of an injunction even if factors one and two favor granting an injunction. Although post-eBay such a situation has yet to present itself, the

112. Moore et al., supra note 7, § 10A.20 (citing Eli Lilly & Co. v. Natural Answers, Inc., 2000 U.S. App. LEXIS 29547, at *6-7 (7th Cir. 2000)).
113. See Beebe supra note 105.
fourth factor might equitably trump a court's decision to otherwise grant an injunction if, for example, granting an injunction would harm public safety.

In summary, district courts applying the four-factor test will grant permanent injunctions in patent cases when the plaintiff-patentee and the defendant-infringer directly compete. District courts will deny injunctions when the patentee and infringer indirectly compete. The public interest is a wild-card, which, under certain yet to occur conditions, may trump direct competition.

B. The Effect of District Courts Viewing the Four Factors According to the Model

By viewing the four factors according to this model, courts are able to address certain patents, patent practices, and negative externalities of the patent laws, which arguably retard rather than promote the progress of science. This list includes business method patents, patent trolls, and the patent thicket. Additionally, when courts view the four factors in this manner and deny injunctions in certain cases, practical issues surface which courts will need to address. These issues include whether a patentee must commence multiple actions to obtain legal remedy or whether courts will calculate a license fee going forward, and whether courts can fashion remedies that will deter future infringement.

1. Increasing the Efficiency of the Innovation System

District court decisions that deny permanent injunctions in patent cases involving indirect competition increase the efficiency of the patent system. If a court defines indirect competition to include the situation where a plaintiff's patent covers only a small component part of a defendant's allegedly infringing product, then that theoretically provides the court with a tool to deny injunctions for business method patents. Although a court has yet to address this argument, a defendant could argue that the plaintiff's business method patent is merely a component part of the whole business. Unless the business method patent is the only, or the central, aspect of the defendant-infringer's business, then a business method patent would always be a component part of defendant's larger business. As such, courts could categorize the infringement of business method patents as indirect competition and deny requests for injunctions.

Categorizing a patentee that does not make or use its patent but merely seeks to license the patented technology as only having indirect competi-

114. See infra note 116 and accompanying text.
115. See infra note 117 and accompanying text.
tors allows courts to deny injunctions and therefore alleviate concerns regarding patent trolls and the patent thicket. Patent trolls are entities that own patents but do not make, use, or sell their inventions; rather, patent trolls seek only to license their patented technology.\textsuperscript{116} If courts find that a patentee who only seeks to license its patented technology competes indirectly with a defendant-infringer, then courts will deny injunctions in cases involving patent trolls. Disarming patent trolls of their business strategy of negotiating artificially high license fees under threat of an injunction alleviates the unproductive drag trolls place on the patent system’s goal to promote the progress of science.

The patent thicket is “a dense web of overlapping intellectual property rights that a company must hack its way through in order to actually commercialize new technology.”\textsuperscript{117} The patent thicket, a negative externality of the current patent laws, impedes innovation which builds upon former innovation. If courts find that a defendant-infringer’s larger product competes indirectly with a patentee’s component part, then courts will deny injunctions. Such decisions can work to thin out the patent thicket. Subsequent inventors can continue to invent and disseminate their inventions in the indirect markets, subject to paying the patentee money damages. Such a scheme aids patent law’s overall goal of promoting the progress of science.

2. Remedial Issues at Law

Once a court denies an injunction, which is more likely under the \textit{eBay} decision, two remedial issues surface: (1) must a patentee commence multiple actions to obtain legal remedy or will courts calculate a license fee going forward, and (2) how will courts fashion a deterrent remedy?

Even if the court denies an injunction, the patentee still has a remedy. Under these circumstances, the remedy at law for a defendant’s infringement of a patentee’s rights is money damages. Both \textit{z4} and \textit{Paice} denied injunctions and awarded the plaintiff money damages.\textsuperscript{118} The two decisions took slightly different approaches in determining how to award damages for the defendant’s future infringement. In \textit{z4}, the court severed

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plaintiff's cause of action for future infringement and required the defendant to provide a quarterly accounting of its infringing sales activities.\footnote{z4 Techs., Inc., 434 F. Supp. 2d at 444.} Under this method, the plaintiff will need to return to court and request the court grant it damages for the defendant's infringing activities between the last trial and the current action. This arguably requires the patentee to commence multiple suits to obtain a remedy at law, which some courts have held tantamount to no adequate remedy at law.\footnote{See Lee v. Bickell, 292 U.S. 415, 421, (1934); accord MOORE ET AL., supra note 7, § 10A.20 (citations omitted).} However, the court's requirement that the defendant-infringer file quarterly reports, when combined with issue and claim preclusion, makes it easy for the plaintiff-patentee to come back into court and obtain its remedy at law. When weighing the various interests—the constitutional goal of promoting the progress of science versus a plaintiff-patentee having to return to court to obtain an adequate remedy at law—requiring a plaintiff to commence multiple actions seems a slight burden.\footnote{Furthermore, severing future damages is an efficient way for courts to effectuate a just, speedy, and inexpensive trial pursuant to FED. R. CIV. P. 1.}

The court in \textit{Paice} also denied an injunction, but ordered the defendant to keep a quarterly accounting of its infringing sales and pay the patentee a reasonable royalty for future infringement based on this accounting.\footnote{Paice, 2006 U.S. Dist. LEXIS 61600, at *19-20.} One advantage of this method over that used in \textit{z4 Techs.} is that the plaintiff-patentee does not need to come back into court to obtain its legal remedy.\footnote{At worst, if the defendant failed to pay, the patentee would return to the court to institute contempt proceedings, or the court on its own initiative could do so. The harsh sanctions for contempt would likely deter a defendant from failing to pay the initial court ordered forward-looking reasonable royalty.}

Denying the injunction also raises the question: will money damages deter future infringement of a patentee's rights? If courts deny injunctions in indirect competition cases, perhaps defendant-infringers will refuse to license \textit{ex ante}. Instead, defendants will take their chances at trial that either the court will invalidate the patent, find the defendant does not infringe the patent, or deny an injunction and award a reasonable royalty, \textit{ex post}, at a relatively lower rate than the patentee's \textit{ex ante} offer to license.

Faced with this possibility, a court which denies an injunction should find that a defendant's continued infringement is willful. As the remedy for willful infringement is treble damages, such a penalty, over time, will push the infringer to "move away from the infringing technology, accom-
plishing what an injunction would do without the disruption of a sudden stop. Meanwhile, the patent owner’s legal rights are respected and the court reinforces to other would-be infringers the deterrent message Congress intended.\textsuperscript{124}

Having examined the benefits and consequences of courts viewing the four factors through the lens of the model, this Note now applies the model to the eBay case, which is still pending on remand.

C. Application of the Model to eBay on Remand

The model predicts that the district court should deny MercExchange’s request for a permanent injunction on remand.

MercExchange and eBay compete indirectly. MercExchange seeks to license its “business-method patent for an electronic market designed to facilitate the sale of goods between private individuals by establishing a central authority to promote trust among participants.”\textsuperscript{125} eBay runs an internet marketplace, allowing private parties to sell items via auction or fixed price. The parties compete indirectly in different markets; thus, the district court should deny an injunction.

The court could craft its opinion within the framework of the four-factors as follows:

MercExchange has failed to prove it suffered irreparable injury. MercExchange has not proven eBay’s failure to license harmed its ability to license its patented technology.\textsuperscript{126} Furthermore, MercExchange’s patent is a small component part of eBay’s larger internet business, and MercExchange’s patent is not primarily responsible for drawing customers to use eBay’s internet market.\textsuperscript{127}

MercExchange has failed to prove it has no adequate remedy at law. As the parties compete indirectly, eBay’s infringement does not cause harm to MercExchange’s reputation or goodwill.\textsuperscript{128}

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\item \textsuperscript{124} Mitchell G. Stockwell, Implementing eBay: New Problems in Guiding Judicial Discretion and Enforcing Patent Rights, 88 J. PAT. & TRADEMARK OFF. SOC’Y 747, 755, n.39 (2006); see also Panduit Corp. v. Staehlin Bros. Fibre Works, Inc., 575 F.2d 1152, 1158 (6th Cir. 1978) ("[T]he infringer would have nothing to lose, and everything to gain if he could count on paying only the normal, routine royalty non-infringers might have paid.").
\item \textsuperscript{125} eBay Inc. v. MercExchange, LLC, 126 S. Ct. 1837, 1839 (2006); U.S. Patent No. 5,845,265 (filed Nov. 7, 1995).
\item \textsuperscript{126} See Paice LLC v. Toyota Motor Corp., 2006 U.S. Dist. LEXIS 61600, at *12 (E.D. Tex. 2006).
\item \textsuperscript{127} See z4 Techs., Inc. v. Microsoft Corp., 434 F. Supp. 2d 437, 440 (E.D. Tex. 2006).
\item \textsuperscript{128} See id. at 441.
\end{itemize}
direct market is licensing its patented technology, money damages, in the form of a reasonable royalty, adequately compensate it for eBay’s infringement.

MercExchange has failed to prove that the balance of hardships warrants a remedy in equity. If the court issued an injunction, eBay would have to spend considerable time and money to reengineer its internet marketplace. Additionally, an injunction that shuts down the trusted component aspect of eBay’s marketplace would expose its customers to a high risk of fraudulent transactions, which would harm eBay’s goodwill and business reputation as a leader in the field of internet marketplaces. On the other hand, if the court denied an injunction, MercExchange only faces limited harm to its market for licensing its patented technology; money damages will compensate MercExchange for such harm.

MercExchange has failed to prove that the public interest would be served by a permanent injunction. An injunction which interrupts eBay’s immensely popular internet marketplace would likely harm innocent downstream third parties, such as retailers and buyers.

As a practical matter, the court, in denying an injunction, should nevertheless find that eBay’s continued infringement is willful. Such a remedy will entitle MercExchange to treble damages for eBay’s continued infringement and deter eBay and others from future infringement. Treble damages will also push eBay to design around the patent, thereby promoting innovation.

Because MercExchange and eBay compete indirectly, the model suggests that the court, applying the four-factor test on remand, should deny MercExchange’s request for a permanent injunction.

IV. CONCLUSION

The patent community finds itself in the midst of a sea change: the Court struck down the Federal Circuit’s general rule that validity plus infringement yields an injunction, which had been the norm for more than twenty years. Now the question becomes: under what circumstances will district courts, acting within the mandated four-factor framework, grant permanent patent injunctions? Based on the available post-eBay case law, the type of competition determines whether a court will grant a permanent

129. See id. at 442.
130. See id. at 443.
131. See id.
132. See id. at 443-44; Paice, 2006 U.S. Dist. LEXIS 61600, at *16.
133. See supra note 124 and accompanying text.
injunction in patent cases. Courts grant injunctions when the patentee and the defendant-infringer directly compete. No injunction follows from indirect competition. As courts decide future cases, hopefully, the patent community can use, refine, and build upon this preliminary predictive model. Ideally, in the not too distant future, inventors, businesses, investors, and practitioners can once again predict when district courts will grant permanent injunctions in patent cases.