Vanderbilt Journal of Entertainment & Technology Law

Volume 16 Issue 2 Issue 2 - Winter 2014

Article 1

2014

Statutory Royalty Damages under the Uniform Trade Secrets Act and the Federal Patent Code

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VANDERBILT JOURNAL OF ENTERTAINMENT & TECHNOLOGY LAW

VOLUME 16

WINTER 2014

NUMBER 2

Statutory Royalty Damages under the Uniform Trade Secrets Act and the Federal Patent Code

Richard F. Dole, Jr.*

ABSTRACT

Optional statutory royalty damages are provided for by both the version of the Uniform Trade Secrets Act that has been enacted by most of the forty seven adopting states and the federal patent code remedies for infringement of utility patents. Notwithstanding periodic recommendations that the Uniform Act follow the patent code concept of statutory royalty damages, this article takes the position that differences between the Uniform Act and the Patent Code regarding monetary remedies make it reasonable for the Uniform Act statutory royalty provisions to be construed more objectively than their federal counterpart. This will preclude statutory royalty damages acquiring the unwarranted significance under the Uniform Act that they have acquired under the Patent Code.

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I. INTRODUCTION

Both state trade secret law¹ and federal utility patent law² allow recovery of damages measured by a statutory reasonable royalty.³ Moreover, courts⁴ and commentators⁵ periodically have suggested that state trade secret law should follow the extensive federal patent code case law with respect to statutory royalties.⁶ However, due to the different remedial contexts, the current patent code concept of statutory royalty damages should not apply under the Uniform Trade Secrets Act (Uniform Act).⁷

^{1.} See Kewanee Oil Co. v. Bicron Corp., 416 U.S. 470, 474 (1974) ("We hold that Ohio's law of trade secrets is not preempted by the patent laws of the United States").

^{2. 35} U.S.C. § 284 (2012). The subject matter of utility patents is useful products and processes. See 8 DONALD S. CHISUM, CHISUM ON PATENTS § 23.05 (2013) [hereinafter CHISUM ON PATENTS].

^{3.} A royalty is a usage-based payment by a licensee to a licensor for a right to ongoing use of a patent or a trade secret. See BLACK'S LAW DICTIONARY 1839 (9th ed. 2009). A statutory royalty is a remedy for patent infringement or trade secret misappropriation that is imposed upon a wrongdoer. Compare 35 U.S.C. § 284 (2012) (providing for damages "in no event less than a reasonable royalty"), with RESTATEMENT (THIRD) OF UNFAIR COMPETITION § 45, cmt. g (1995) (discussing a reasonable-royalty measure of common law trade secret relief). This measure of damages involves determination of the price that would have been set by a willing seller and a willing buyer for an infringer's use of a patented invention or a misappropriator's use of a trade secret. See id.

^{4.} See, e.g., Univ. Computing Co. v. Lykes-Youngstown Corp., 504 F.2d 518, 535 (5th Cir. 1974) ("It seems generally accepted that 'the proper measure of damages in the case of a trade secret appropriation is to be determined by reference to the analogous line of cases involving patent infringement").

^{5.} See, e.g., Douglas G. Smith, Application of Patent Law Damages Analysis to Trade Secret Misappropriation Claims: Apportionment, Alternatives, and Other Common Limitations on Damages, 25 SEATTLE U. L. REV. 821, 865 (2002) ("This article has attempted to demonstrate the many ways in which the principles that have been developed in the context of evaluating patent damage claims can be applied with equal effect in the context of trade secret misappropriation claims.").

^{6.} See Univ. Computing, 504 F.2d at 536-43 (reviewing primarily patent cases with respect to reasonable-royalty damages); Smith, supra note 5, at 841 ("Perhaps, the area in which courts have most fully applied patent law damages principles to trade secret damages claims is in the area of royalty damages.").

^{7.} See Mark A. Lemley, The Boundaries of Patent Law: Distinguishing Lost Profits from Reasonable Royalties, 51 Wm. & MARY L. REV. 655, 673 (2009) (recommending that "the

The Patent Code has not allowed a utility patentee to recover an infringer's net profits since 1946,8 and it is unlikely that Congress will amend it to do so.9 Federal case law also imposes overly strict proof requirements for recovery of a patentee's lost net profits. 10 This situation has led the US Court of Appeals for the Federal Circuit, which hears all patent appeals from US District Courts, 11 to approve inflated awards of statutory royalties in order to assure adequate compensation to utility patentees. In *Maxwell v. J. Baker, Inc.*, 12 for example, the Federal Circuit approved instructions directing a jury to determine both statutory royalty damages and any additional damages necessary to compensate the utility patentee, which effectively would increase the statutory royalty damages. 13

In contrast, the Uniform Act,¹⁴ a widely enacted expression of state trade secret principles,¹⁵ permits a complainant to recover "both

reasonable royalty measure of damages can return to its original role—as a means of ensuring that patentees aren't denied fair compensation for the value that they could have demanded in a fair market for a nonexclusive license to their patents" after discussing the Federal Circuit's current blurring of a patentee's lost-profit damages and a patentee's reasonable-royalty damages).

- 8. See, e.g., Georgia-Pacific Corp. v. U.S. Plywood Corp., 243 F. Supp. 500, 514-16, 520-46 (S.D.N.Y. 1965) (holding the Special Master erred in considering that an accounting of an infringer's profits was an available remedy following the 1946 Patent Code amendments).
- 9. See Dan L. Burk & Mark A. Lemley, The Patent Crisis and How the Courts Can Solve It 100–01 (2009) ("Congress has spent the last four years, from 2005 to 2008, in an ultimately futile effort to reform the patent system After four years of apparently fruitless struggle, it appears at this writing that patent reform is dead for the foreseeable future."). In 2011 Congress enacted the America Invents Act, which made a number of substantive and procedural changes in the patent statutes. Leahy-Smith America Invents Act, Pub. L. No. 112-29, 125 Stat. 284 (2011). But the America Invents Act avoided prior legislative controversies by leaving the remedies for patent infringement essentially unaltered. See 1-SA02 CHISUM ON PATENTS, supra note 2, America Invents Act 2011: Analysis & Crossreferences § 2.
- 10. See Lemley, supra note 7, at 661 ("[T]he high standard of proof means that there are many patentees who are not in fact made whole for the acts of infringement under the lost profits rule.").
- 11. The Federal Circuit was created in 1982. See Pub. L. No. 97-164, 96 Stat. 25 (1982) (establishing the United States Court of Appeals for the Federal Circuit).
 - 12. Maxwell v. J. Baker, Inc., 86 F.3d 1098 (Fed. Cir. 1996).
- 13. See id. at 1109-10. Although the Federal Circuit remanded Maxwell, there was no doubt that both the ultimate reasonable royalty and the ultimate additional damage awards would be substantial. Prior to the remand, a jury had awarded over \$1.5 million in reasonable-royalty damages and \$1.5 million in additional damages. See id. at 1108, 1112. Maxwell is one of a number of Federal Circuit decisions approving inflated statutory royalty damages in order to avoid undercompensating a utility patentee. See Lemley, supra note 7, at 668 ("[C]ourts have turned the reasonable royalty from a floor on patent damages designed to avoid undercompensation into a windfall that overcompensates patentees.").
- 14. UNIF. TRADE SECRETS ACT §§ 1-12 (amended 1985), 14 U.L.A. 529-659 (2005), 76-100 (Supp. 2012); see infra notes 19-30 and accompanying text.
- 15. Versions of the Uniform Act have been enacted in 47 states, the District of Columbia, and the American Virgin Islands. See UNIF. TRADE SECRETS ACT, Table of Adoptions (amended 1985), 14 U.L.A. 76–77 (Supp. 2012). In 2012, New Jersey became the 46th state to enact the

the actual loss caused by misappropriation and the unjust enrichment caused by misappropriation that is not taken into account in computing actual loss."¹⁶ The Uniform Act couples this flexible approach to actual damages with a rejection of punitive statutory royalties.¹⁷

Following a general discussion of the Uniform Act and its relationship with federal utility patent law in Part II, this Article surveys the monetary remedies for utility patent infringement and Uniform Act trade secret misappropriation. Part III explores the unsatisfactory current inflation of utility patent statutory royalty awards. Part IV then suggests more appropriate Uniform Act statutory royalty standards.

II. BACKGROUND

A. The Uniform Trade Secrets Act

The 1939 Restatement (First) of Torts¹⁸ was an influential partial formulation of trade secret common law in the United States.¹⁹ Unfortunately, due to trade secret law's specialized nature, it was omitted from the 1979 Restatement (Second) of Torts.²⁰ To fill the gap left by the Restatement (Second) by elaborating on the common law principles reflected in the 1939 Restatement,²¹ the National

Uniform Act, followed by Texas in 2013. See N.J. STAT. ANN. § 56:15-4 (West 2012); S.B. 953, 83d Leg., Reg. Sess. (Tex. 2013). New York and Massachusetts are among the states that have not enacted a version of the Uniform Act. See JAMES POOLEY, TRADE SECRETS § 2.03[7][a] (2013) [hereinafter POOLEY, TRADE SECRETS]. In the 1995 Restatement (Third) of Unfair Competition, the American Law Institute endorsed a definition of "trade secret" that was consistent with the Uniform Act definition and articulated principles of trade secret law that also generally were consistent with the Uniform Act. See RESTATEMENT (THIRD) OF UNFAIR COMPETITION § 39 cmt. b (1995) ("Except as otherwise noted, the principles of trade secret law described in this Restatement are applicable to actions under the Uniform Trade Secrets Act as well as to actions at common law.").

- 16. UNIF. TRADE SECRETS ACT § 3(a) (amended 1985), 14 U.L.A. 633–34 (2005).
- 17. See, e.g., Vermont Microsystems, Inc. v. Autodesk, Inc., 138 F.3d 449, 451–52 (2d Cir. 1998). In construing the California enactment the court commented: "[A] punitive deterrent award does not fall within the description of 'actual loss caused by misappropriation' for which recovery may be had" Id.
 - 18. Restatement (First) of Torts §§ 757–59 (1939).
- 19. See, e.g., Curtiss-Wright Corp. v. Edel-Brown Tool & Die Co., 407 N.E.2d 319, 323–25 & nn.4–6 (1980) (following the Restatement (First) concept of liability). The Restatement (First) focused upon liability with limited discussion of remedies and no treatment of the statute of limitations. See RESTATEMENT (FIRST) OF TORTS §§ 757–59 (1939).
- 20. See RESTATEMENT (SECOND) OF TORTS 9 (1979) (stating that trade secret law had become independent of tort law in introductory note).
- 21. See UNIF. TRADE SECRETS ACT Prefatory Note (amended 1985), 14 U.L.A. 531 (2005) (stating that the Uniform Act provides a unified theory of trade secret protection with a single statute of limitations and appropriate remedies). The 1939 Restatement substantially omitted

Conference of Commissioners on Uniform State Laws (National Conference)²² proposed the Uniform Trade Secrets Act.²³ The National Conference initially approved the Uniform Act in 1979.²⁴ It adopted four official amendments in 1985, two of which involved royalty damages.²⁵

One of the 1985 amendments added the following statutory royalty damages provision to section 3(a) dealing with compensatory damages:

In lieu of damages measured by any other methods, the damages caused by misappropriation may be measured by imposition of liability for a reasonable royalty for a misappropriator's unauthorized disclosure or use of a trade secret. ²⁶

Another 1985 amendment limited the availability of the royalty order injunctions authorized by section 2(b):

In exceptional circumstances, an injunction may condition future use upon payment of a reasonable royalty for no longer than the period of time for which use could have been prohibited. Exceptional circumstances include, but are not limited to, a material and prejudicial change of position prior to acquiring knowledge or reason to know of misappropriation that renders a prohibitive injunction inequitable.²⁷

These amendments addressed different remedies. Section 3(a) deals with the compensatory damages recoverable for a defendant's prior misappropriation; whereas section 2(b) deals with injunctive relief that restrains continued misappropriation by an adjudicated

discussion of remedies and did not address the statute of limitations. See RESTATEMENT (SECOND) OF TORTS 9 (1979); RESTATEMENT (FIRST) OF TORTS §§ 757-59 (1939).

^{22.} The National Conference was organized in 1892 to promote desirable and practicable uniformity in state laws. Commissioners are appointed by each state, the District of Columbia, and Puerto Rico. See Preface, 14 U.L.A. III–IV (2005).

^{23.} See Unif. Trade Secrets Act §§ 1–12 (amended 1985), 14 U.L.A. 529–659 (2005), 76–100 (Supp. 2012).

^{24.} See Unif. Trade Secrets Act §§ 1-12 (amended 1985), 14. U.L.A. 529-659 (2005).

See id. The four amendments were adopted in response to issues raised by the ABA Section of Patent, Trademark and Copyright Law. See Action on Resolutions at the Annual Meeting in New Orleans, Louisiana-August 1981, 1981 A.B.A. SEC. PAT. TRADEMARK & COPYRIGHT L. PROC. 30–31. The ABA Section recommended amending section 2(b) to limit injunctions allowing future use upon payment of a reasonable royalty to exceptional circumstances, amending section 3 to allow reasonable-royalty damages if neither a plaintiff's actual loss nor a defendant's unjust enrichment were provable, amending section 7 to make clear that state remedies for breach of contract would not be preempted by the Uniform Act, and amending section 11 to clarify that the Uniform Act does not apply to a continuing misappropriation that began prior to its effective date. See id. (Resolutions 206-3 to 206-6).

^{26.} See UNIF. TRADE SECRETS ACT § 3(a) (amended 1985), 14 U.L.A. 634 (2005). The initial version of the Uniform Act did not refer to reasonable royalties as a remedy. See id.

^{27.} See id. § 2(b). The 1979 text of section 2(b) stated: "If the court determines that it would be unreasonable to prohibit future use, an injunction may condition future use upon payment of a reasonable royalty for no longer than the period of time the use could have been prohibited." See id.

misappropriator.²⁸ The amendments to both of these sections involve remedies that apply when misappropriation is not willful and malicious.²⁹ Willful and malicious misappropriation is addressed by other sections. Section 3(b) authorizes "exemplary damages" in an amount up to double a compensatory award, and section 4 authorizes recovery of reasonable attorney's fees.³⁰

B. Nonuniform Amendments

James Pooley commented that "[t]he major drawback of the Uniform Trade Secrets Act is that it is not uniform." Although Pooley overstates its significance, superficial nonuniformity surely exists. To begin with, five states that enacted the 1979 version of the Uniform Act have not enacted the 1985 amendment authorizing statutory royalty damages. Individual states have also adopted a number of nonuniform amendments.

California and Indiana adopted nonuniform amendments based upon an ABA Patent Section resolution³³ providing that if neither loss nor unjust enrichment are provable, a patentee can recover statutory royalty damages for no longer than use could have been prohibited.³⁴ The Georgia and Illinois versions allow statutory royalty damages if a person with trade secret rights proves neither damages nor unjust enrichment by a preponderance of the evidence.³⁵

^{28.} See Robert L. Cloud & Assoc. v. Mikesell, 82 Cal. Rptr. 2d 143, 147–48 (Cal. Ct. App. 1999) (stating that one provision authorizes injunctive relief and the other a monetary award); UNIF. TRADE SECRETS ACT §§ 2(b), 3(a) (amended 1985), 14 U.L.A. 619, 634 (2005).

^{29.} See Unif. Trade Secrets Act \S 2(b), 3(a)–(b) (amended 1985), 14 U.L.A. 619, 633–634 (2005).

^{30.} See UNIF. TRADE SECRETS ACT §§ 3(b), 4(iii) (amended 1985), 14 U.L.A. 634, 642 (2005).

^{31.} POOLEY, TRADE SECRETS, *supra* note 15, § 2.03[7][b]. The recent New Jersey and Texas enactments contain the 1985 Official Text of the reasonable-royalty provision. *See* N.J. STAT. ANN. § 56:15-4 (West 2012); S.B. 953, 83d Leg., Reg. Sess. (Tex. 2013).

^{32.} Alaska, Arkansas, Connecticut, Louisiana, and Washington do not expressly authorize reasonable-royalty damages. See Alaska Stat. Ann. § 45.50.915 (West 2007); Ark. Code Ann. § 4-75-606 (West 2004); Conn. Gen. Stat. Ann. § 35-53 (West 2005); La. Rev. Stat. Ann. § 51:1433 (2003); Wash. Rev. Code Ann. § 19.108.030 (West 2013).

^{33.} See Cal. Civ. Code Ann. § 3426.3(b) (West 1997); Ind. Stat. Ann. § 24-2-3-4(b) (LexisNexis 2006).

^{34.} See Cal. Civ. Code $\$ 3426.3(b) (West 1997); Ind. Code Ann. $\$ 24-2-3-4(b) (LexisNexis 2006).

^{35.} See GA. CODE ANN. § 10-1-763(a) (2009); 765 ILL. COMP. STAT. ANN. 1065/4(a) (LexisNexis 2010). The Georgia statute, like the California and Indiana statutes, adds "for no longer than the period of time for which use could have been prohibited." GA. CODE ANN. § 10-1-763(a); CAL. CIV. CODE § 3426.3(b) (West 1997); IND. CODE ANN. § 24-2-3-4(b) (LexisNexis 2006). An Oregon provision states that a damages or an unjust enrichment recovery "shall not be less than a reasonable royalty," and the Virginia statute approximates this by measuring damages "exclusively" by a statutory royalty "[i]f a complainant is unable to prove a greater amount of

The nonuniform amendments primarily involve style rather than substance. The related 1985 amendments allow a complainant to elect statutory royalty damages in lieu of other measures of damage.³⁶ The nonuniform variations allow a similar election if a complainant chooses not to prove loss and unjust-enrichment damages.³⁷ For example, in *Ajaxo*, *Inc. v. E*Trade Financial Corp.*,³⁸ a case involving California's nonuniform amendment, a jury found that the defendant had not been unjustly enriched, and the plaintiff withdrew its claim for actual loss after the defendant moved to exclude the plaintiff's evidence.³⁹ Neither actual loss nor unjust enrichment having been proven under the California nonuniform amendment, the intermediate appellate court remanded the case to the trial court for the determination of a statutory royalty.⁴⁰

Furthermore, the California, Georgia, and Indiana nonuniform amendments limiting statutory royalty liability to the period for which use could have been prohibited⁴¹ express the Uniform Act's policy of limiting trade secret remedies to the commercial advantage gained from misappropriation.⁴²

The five state enactments of the Uniform Act that do not mention royalty damages nevertheless can be construed to permit

- 36. UNIF. TRADE SECRETS ACT § 3(a) (amended 1985), 14 U.L.A. 634 (2005) ("In lieu of damages measured by any other methods, the damages caused by misappropriation may be measured by imposition of liability for a reasonable royalty for a misappopriator's unauthorized disclosure or use of a trade secret.").
- 37. See Ajaxo, Inc. v. E*Trade Fin. Corp., 115 Cal. Rptr. 3d 168, 184–85 (Cal. Ct. App. 2010); supra notes 33–40 and accompanying text. But see Cacique, Inc. v. Robert Reiser & Co., 169 F.3d 619, 623–24 (9th Cir. 1999) (Cal. enactment) (rejecting a plaintiff's unsupported assertion that unjust enrichment of the defendant was not provable). The Virginia nonuniform amendment's reference to "exclusive" measurement of damages by a statutory royalty would be unfortunate only if it were unnecessarily construed to preclude election of statutory royalty damages in some markets but not others as is possible under the Uniform Act. See 9 VA. CODE ANN, \$59.1-338A (LexisNexis 2006); infra notes 48–50 and accompanying text.
 - 38. Ajaxo, Inc. v. E*Trade Fin. Corp., 115 Cal. Rptr. 3d 168 (Cal. Ct. App. 2010).
- 39. See id. at 184-85 (noting that the jury found that the defendant's expenditures with respect to the misappropriated trade secrets exceeded the benefit derived from them, and the plaintiff's proof of losses had been withdrawn after the defendant had moved to exclude it).
 - 40. See id. at 185.
 - 41. See supra notes 34–35 and accompanying text.
- 42. See UNIF. TRADE SECRETS ACT § 3 cmt. (amended 1985), 14 U.L.A. 634 (2005) (stating that a monetary recovery for trade secret misappropriation is appropriate only for the period in which information is entitled to protection as a trade secret); see also, e.g., Carboline Co. v. Jarboe, 454 S.W.2d 540, 553 (Mo. 1970) (limiting damage liability to the period of time it would have taken the defendant to replicate the trade secrets lawfully); supra notes 34, 36 and accompanying text.

damages by other methods of measurement." 14 ORE. REV. STAT. §646.465(2) (2011); 9 VA. CODE ANN. §59.1-338A (LexisNexis 2006). Finally, an Ohio nonuniform amendment adds to the 1985 Official Amendment, "a reasonable royalty that is equitable under the circumstances considering the loss to the complainant, the benefit to the misappropriator, or both." OHIO REV. CODE ANN. § 1333.63(A) (Baldwin, Westlaw through 2013 Files 24 and 26 to 38 of the 130th GA (2013–2014)).

them. Veritas Operating Corp. v. Microsoft Corp., 43 for example, was decided under the Washington-state enactment, which is silent with respect to statutory royalty damages. 44 The defendant moved to exclude the testimony of the plaintiff's expert concerning reasonable-royalty damages, which the defendant asserted the plaintiff could not recover in Washington. 45 Finding that the defendant's unjust enrichment could be measured by a reasonable royalty, the trial judge denied the defendant's motion. 46

Under both the Uniform Act and its nonuniform variations, it would be unreasonable to insist that an election of statutory royalty damages must be exclusive of other nonduplicative damages. To the extent that lost-profit or unjust-enrichment damages are provable, damages frequently will these he more objective reasonable-royalty damages. As under the Patent Code. complainant should be free to request a hybrid damage award combining consistent statutory royalty damages with other damages. 47 In Agilent Technologies, Inc. v. Kirkland, 48 a case decided under the Delaware enactment, for example, the plaintiff recovered lost-profit damages for markets in which the plaintiff and the defendant competed and unjust-enrichment damages for markets in which the plaintiff did not compete with the defendant.⁴⁹ If the defendant had not earned profits in the markets in which the plaintiff did not compete, the plaintiff would have been entitled to elect statutory royalty damages for those markets.⁵⁰

C. The Relationship between State Trade Secret Law and Federal Utility Patent Law

In order to encourage the development and marketing of useful inventions, a federal utility patent confers upon a patentee, *inter alia*, the right to exclude others from the manufacture, use, or sale of a

^{43.} Veritas Operating Corp. v. Microsoft Corp., No. C06-0703-JCC, 2008 U.S. Dist. LEXIS 112135 (W.D. Wash. Feb. 26, 2008).

^{44.} See id. at *7-8; supra note 32 and accompanying text. The other enactments that do not mention statutory royalty damages are in Alaska, Arkansas, Connecticut, and Louisiana. See supra note 32 and accompanying text.

^{45.} See Veritas, 2008 U.S. Dist. LEXIS 112135, at *5.

^{46.} See id. at *9-10.

^{47.} See Agilent Techs., Inc. v. Kirkland, No. 3512-VCS, 2010 WL 610725, at *28-31 (Del. Ch. 2010).

^{48.} See id.

See id.

^{50.} Cf. Univ. Computing Co. v. Lykes-Youngstown Corp., 504 F.2d 518, 529, 536, 539–40 (5th Cir. 1974) (upholding jury charge that misappropriators that had earned no profits nonetheless could be liable for a reasonable royalty).

useful invention for a term beginning on the patent issue date and ending twenty years from the date of the filing of an effective patent application.⁵¹ Good faith conduct, including independent development of a patented invention, usually is no defense to liability for patent infringement.⁵² As of March 16, 2013, federal utility patent rights are reserved for the first person to file an effective patent application for a novel, useful, and nonobvious invention within a category established by Congress.⁵³

A quid pro quo for statutory utility patent rights is the loss of trade secret rights through voluntary disclosure.⁵⁴ The information in a patent application ordinarily becomes public.⁵⁵ The US Patent and Trademark Office publishes most patent applications eighteen months after the earliest filing date.⁵⁶ If a patent issues with respect to an

^{51.} See 35 U.S.C. § 271 (2012) (providing a basic definition of patent infringement); 35 U.S.C. § 154(a)(2) (2012) (outlining patent duration).

^{52.} See E.I. du Pont de Nemours & Co. v. United States, 288 F.2d 904, 911 (Ct. Cl. 1961) (dictum) (stating that use by a second inventor who discovered the invention independently is infringement). Effective March 16, 2013, amendments to the Patent Code have expanded a former limited defense to infringement. See 35 U.S.C. § 273(a) (2012). The expanded defense exists if a person in good faith commercially used in the United States a process or a machine, a manufacture, or a composition of matter used in a commercial process that is the subject of an issued patent at least one year before either the effective filing date for the claimed invention or the date on which the claimed invention was disclosed to the public in a manner that qualified as an exception to prior art. See id. The defense is transferrable to a person other than the patentee only in connection with the "entire enterprise" or "line of business to which the defense relates." See id. § 273(e)(1)(B).

^{53.} See 35 U.S.C. §§ 101-03 (2012) (requiring that a patentable invention be useful, novel, and not obvious to a person with ordinary skill in the relevant art); 35 U.S.C. §§ 161, 171 (2012) (providing categories of patentable inventions, including processes, machines, manufactures, compositions of matter, and improvements thereof in addition to certain biological plants and new and ornamental designs of articles of manufacture). Federal design-patent rights for new, original, and ornamental designs of articles of manufacture are materially different from federal utility patent rights and are not dealt with by this article. See 1 CHISUM ON PATENTS, supra note 2, § 23.01 ("A design patent fundamentally differs from a utility patent."). The person that files the earliest effective patent application has priority. See 35 U.S.C. § 100(i)(B) (2012) (effective Mar. 16, 2013). The former rule gave priority to the first inventor. See 35 U.S.C. § 102(g) (2012) (providing that the first inventor who has not abandoned, suppressed. or concealed an invention has priority). Because the change is not retroactive, the United States will have two Patent Codes for decades. Patents issued under applications filed before the March 16, 2013 effective date of the Patent Code amendment will continue to be governed by the Patent Code in effect prior to March 16, 2013, and cases decided under it. See 1 CHISUM ON PATENTS, supra note 2, America Invents Act 2011: Analysis & Crossreferences § 3.1.

^{54.} See POOLEY, TRADE SECRETS, supra note 15, at § 3.01[1][a] ("In exchange for the inventor's publication of the invention, a 'monopoly' of sorts is granted by the government.").

^{55.} See id. ("[P]ublication usually does not occur until eighteen months after the patent application is filed . . . or issuance of the patent.").

^{56.} See 35 U.S.C. § 122(b)(1) (2012) (stating that, with exceptions, patent applications are to be published eighteen months after the earliest filing date); 37 C.F.R. § 1.11(a) (2012) (providing that all papers relating to published patent applications are open to public inspection and copying). But see 35 U.S.C. § 122(b)(2)(B)(i) (2012) (explaining that an application will not be published if an applicant requests nonpublication and certifies that that an application will not

application excepted from publication, information relating to the patent application becomes available to the public upon issuance.⁵⁷

The publication of a patent application destroys the secrecy of the published information, precluding future trade secret protection.⁵⁸ That the patent may be later invalidated by a court is irrelevant.⁵⁹ Nevertheless, during the interval between filing a patent application and the application becoming public, state trade secret rights can continue to exist with respect to the information in the application.⁶⁰ Moreover, new information acquired after the filing of a patent application can remain secret.⁶¹

State trade secret law is an alternative method of protecting patentable useful inventions and other valuable commercial information.⁶² But utility patent protection must be sought prior to marketing a product that reveals a trade secret.⁶³ Sale of the product discloses the trade secret and destroys the secrecy required for continued trade secret protection.⁶⁴ Inventors should also seek utility

be filed in another country or under a multinational international agreement that requires publication of applications eighteen months after filing).

^{57.} See 37 C.F.R. § 1.11(a) (2012).

^{58.} See, e.g., On-Line Techs., Inc. v. Bodenseewerk Perkin-Elmer GmbH, 386 F.3d 1133, 1141 (Fed. Cir. 2004) (holding that information disclosed by an issued patent is not subject to trade secret rights); Vital State Can., Ltd. v. Dreampak, LLC, 303 F. Supp. 2d 516, 524–25 (D.N.J. 2003) (holding that the complainant failed to rebut the inference that its published patent applications put its trade secrets into the public domain).

^{59.} See Conmar Prods. Corp. v. Universal Slide Fastener Co., 172 F.2d 150, 154-56 (2d Cir. 1949) (holding that trade secrets disclosed by an invalid patent are in the public domain).

^{60.} See Plastic & Metal Fabricators, Inc. v. Roy, 303 A.2d 725, 733-34 (Conn. 1972) (holding that trade secret relief remains available during the pendency of a patent application). But see supra notes 56-58 and accompanying text (discussing the Patent Code amendment requiring disclosure of most patent applications eighteen months after the earliest filing date and finding that the public disclosure of an application that has been on file for eighteen months precludes further trade secret rights with respect to the information disclosed).

^{61.} See Transco Prods. Inc. v. Performance Contracting, Inc., 38 F.3d 551, 553, 558-59 (Fed. Cir. 1994) (holding that a continuation application not involving new matter need not update an initial disclosure). For example, trade secret rights can exist in a unique combination of the information disclosed in one or more published patent applications. See Tewari De-Ox Sys., Inc. v. Mountain States/Rosen, L.L.C., 637 F.3d 604, 612-14 (5th Cir. 2011) (stating that the fact that every element of an alleged trade secret either was disclosed by patent applications or was known to the industry did not preclude the existence of a trade secret involving a new combination of the known elements).

^{62.} See Kewanee Oil Co. v. Bicron Corp., 416 U.S. 470, 484–93 (1974) (noting that trade secret law applies to inventions that are clearly unpatentable, of doubtful patentability, and clearly patentable).

^{63.} See 1A ROGER M. MILGRIM & ERIC E. BENSEN, MILGRIM ON TRADE SECRETS § 8.02 (2012) (observing that the embodiment of a secret in a product that will be sold in most cases makes a patent the only meaningful protection).

^{64.} Cf. Kewanee Oil Co., 416 U.S. at 475 ("The subject of a trade secret must be secret, and must not be of public knowledge or of a general knowledge in the trade or business." (citing B.F. Goodrich Co. v. Wohlgemuth, 192 N.E.2d 99, 104 (Ohio 1963); Nat'l Tube Co. v. E. Tube Co., 3 Ohio C.C. 459, 462 (1902), aff'd 69 Ohio St. 560 (1903))).

patent protection if competitors are likely to discover a trade secret independently in the foreseeable future.⁶⁵ Otherwise, a choice between utility patent and trade secret protection for a patentable product or process should be made with deliberate speed. Prior to the patent code amendments that became effective on March 16, 2013, secret commercial use of an invention more than a year before a patent application was considered a "public use" that barred the application.⁶⁶ Notwithstanding the amendments, this well-established judicial construction of "public use" may continue.⁶⁷

If information remains valuable and secret, trade secret protection theoretically can be perpetual.⁶⁸ But, trade secrets are only protected from misappropriation by improper means.⁶⁹ Thus, acquiring knowledge of a trade secret by proper means, including independent discovery and reverse engineering⁷⁰ of a publicly available product, is not actionable.⁷¹ The improper-means limitation upon actionable trade secret misappropriation, when combined with the immunity of utility patent rights from the defenses of lack of secrecy and independent discovery by proper means,⁷² make it unlikely that the existence of trade secret law discourages patent applications. A Supreme Court majority in *Kewanee Oil Co. v. Bicron*

^{65.} See id. at 490 ("The ripeness-of-time concept of invention . . . predicts that if a particular individual had not made a particular discovery others would have, and in probably a relatively short period of time."). Moreover, in a particular industry, multiple competitors actively may be researching the subject matter of a trade secret. See id. at 490–91.

^{66.} See 35 U.S.C. § 102(a)(1) (2012) (effective Mar. 16, 2013) (noting that public use, being on sale, or otherwise being available to the public more than a year prior to the filing of a patent application precludes patentability); Kinzenbaw v. Deere & Co., 741 F.2d 383, 389–91 (Fed. Cir. 1984) (observing that a secret commercial use is a public use for purposes of the bar to patentability). A patent that erroneously was issued notwithstanding public use more than a year prior to the filing of the patent application will be invalidated by the courts. See, e.g., C&F Packing Co. v. IBP, Inc., 224 F.3d 1296, 1300–01 (Fed. Cir. 2000) (holding that the patent was properly invalidated by the trial court because the invention had been on sale more than one year before the application date).

^{67.} See 1 CHISUM ON PATENTS, supra note 2, America Invents Act 2011: Analysis & Crossreferences § 3.3.1.3.

^{68.} See Kewanee Oil, 416 U.S. at 473-74, 493 (reinstating district court injunction restraining disclosure or use of trade secrets until secrecy ends).

^{69.} See id. at 475-76 ("The law also protects the holder of a trade secret against disclosure or use when the knowledge is gained, not by the owner's volition, but by some improper means." (quoting RESTATEMENT (FIRST) OF TORTS § 757(a) (1939))).

^{70.} The Supreme Court has defined "reverse engineering" as "starting with the known product and working backward to divine the process which aided in its development or manufacture." See id. at 476 (citing Nat'l Tube Co. v. E. Tube Co., 3 Ohio C.C. 459, 462 (1902), aff'd, 69 Ohio St. 560 (1903)).

^{71.} See id. at 489-90 (stating that trade secret law provides far weaker protection than patent law, permitting discovery of trade secrets by fair and honest means).

^{72.} Effective March 16, 2013, a previously limited defense for certain prior users of a patented invention has been expanded. See supra note 52 and accompanying text.

Corp. 73 consequently concluded that federal utility patent law does not preempt the traditional state trade secret law upon which the Uniform Act is based. 74

III. MONETARY REMEDIES

A. Monetary Remedies for Utility Patent Infringement

Section 284 of the Patent Code contains the basic monetary remedies for utility patent infringement:

Upon finding for the claimant the court shall award the claimant damages adequate to compensate for the infringement, but in no event less than a reasonable royalty for the use made of the invention by the infringer, together with interest and costs as fixed by the court.

When the damages are not found by a jury, the court shall assess them. In either event the court may increase the damages up to three times the amount found or assessed.⁷⁵

A judge also has discretion to award reasonable attorney's fees to a prevailing party "in exceptional cases." A patentee that proves willful infringement can receive both enhanced damages and reasonable attorney's fees."

This basic damage provision entitles a patentee with a valid and infringed utility patent to recover either a reasonable royalty for infringement⁷⁸ or, if greater, the patentee's provable losses from

^{73.} Kewanee Oil, 416 U.S. at 474.

^{74.} See id. at 474, 489–90 (stating that inventors with clearly patentable inventions are unlikely to forego strong patent rights for far weaker trade secret protection). But unwarranted extensions of state trade secret law are preempted. Cf. Bonito Boats, Inc. v. Thunder Craft Boats, Inc., 489 U.S. 141, 159–68 (1989) (preempting a state prohibition upon reverse engineering a public domain vessel hull design). Following the Bonito Boats decision, Congress passed a statute authorizing copyright protection for original vessel hull designs. See 17 U.S.C. §§ 1301–1332 (2012).

^{75.} See 35 U.S.C. § 284 (2012). A trial court has discretion to enhance the damages found by either the court or a jury up to three times the amount found to exist. See id. Willful infringement is the most common reason for enhancing damages. See Shatterproof Glass Corp. v. Libby-Owens Ford Co., 758 F.2d 613, 628–29 (Fed. Cir. 1985) ("While a finding of willful infringement is sufficient to support an award of increased damages . . . on the record before us it was neither clear error nor an abuse of the trial court's discretion to deny Shatterproof's motion." (internal citation omitted)).

^{76. 35} U.S.C. § 285 (2012).

^{77.} With respect to enhanced damages, willful infringement must be established by clear and convincing evidence that an infringer acted despite an objectively high likelihood that its actions constituted infringement of a valid patent. See In re Seagate Technology, LLC, 497 F.3d 1360, 1371 (Fed. Cir. 2007). A similar showing is required to impose liability for a patentee's attorney's fees upon an infringer. See 7 CHISUM ON PATENTS, supra note 2, § 20.03[4][c][ii].

^{78.} See Lemley, supra note 7, at 655 ("As the statutory language suggests, reasonable royalties exist as a floor or backstop for those who cannot prove that they have lost profits as a result of infringement.").

infringement—typically the patentee's lost net profits.⁷⁹ Although a utility patentee cannot recover an infringer's net profits per se,⁸⁰ an infringer's net profits are relevant to a patentee's lost net profits if the patentee proves that he or she would have made all or a percentage of the infringer's sales.⁸¹ An infringer's net profits also are relevant to the amount of a statutory royalty.⁸²

If a patentee seeks to recover lost net profits under section 284, courts require rigorous proof of actual lost profits.⁸³ On the other

- 81. See Georgia-Pacific Corp. v. U.S. Plywood Corp., 243 F. Supp. 500, 529 (S.D.N.Y. 1965) ("[I]f the patent owner can establish that he was in competition with the infringer in the sale of the patented article and that, absent the infringement, he would have made the infringer's sales of the patented item, but he finds it extremely difficult or impossible to prove what his, the patent owner's, profits would have been had he made these waylaid sales, then, the infringer's profits on these sales may logically (i.e., probatively) be used as a rough equation for the patent owner's lost profits." (citing Mfg. Co. v. Cowing, 105 U.S. 253 (1881))).
- 82. See id. at 529 ("The size of an infringer's profits is often an influential factor in the determination of the amount of a reasonable royalty." (citing Faulkner v. Gibbs, 199 F.2d 635 (9th Cir. 1952); Hartford Nat'l Bank & Trust Co. v. E. F. Drew & Co., 188 F. Supp. 353 (D. Del. 1960), aff'd, 290 F.2d 589 (3d Cir. 1961))). In a hypothetical negotiation, the theory is that a willing licensor and a willing licensee would establish a royalty rate that divided the economic benefit of the patented invention between them. See 7 CHISUM ON PATENTS, supra note 2, § 20.07[2][d].
 - 83. In the leading case, *Panduit*, the Sixth Circuit commented:

To obtain as damages the profits on sales he would have made absent the infringement, i.e., the sales made by the infringer, a patent owner must prove: (1) demand for the patented product, (2) absence of acceptable noninfringing substitutes, (3) his manufacturing and marketing capability to exploit the demand, and (4) the amount of the profit he would have made.

575 F.2d at 1156 (citing 3 R. WHITE, PATENT LITIGATION: PROCEDURE AND TACTICS § 9.03[2]; Bros. Inc. v. W. E. Grace Mfg. Co., 320 F.2d 594, 598 (5th Cir. 1963); Elec. Pipe Line, Inc. v. Fluid Sys., Inc. 250 F.2d 697 (2d Cir. 1957)). The Federal Circuit has endorsed this analysis. See

^{79.} See Panduit Corp. v. Stahlin Bros. Fibre Works, 575 F.2d 1152, 1156–57 (6th Cir. 1978) (discussing how a patentee must prove lost profits and explaining why there was a failure of proof in the case). The Federal Circuit has approved the *Panduit* analysis. See Siemens Medical Solutions USA, Inc. v. Saint-Gobain Ceramics & Plastics, Inc., 637 F.3d 1269, 1287 (Fed. Cir. 2011); see also Lemley, supra note 7, at 657–61, 671–72 (stating that the Federal Circuit should be more liberal in allowing lost-profit recoveries by patentees that compete directly with infringers).

^{80.} See Aro Mfg. Co. v. Convertible Top Replacement Co., 377 U.S. 476, 504–07 (1964) (plurality opinion) (explaining that a 1946 amendment to the Patent Code changed the law so as to preclude a patentee's recovery of an infringer's profits per se). Although this aspect of the Aro opinion was the view of only a plurality of the Court, see id., 377 U.S. at 502 n.18 (expressing the views of four justices), it caused a shift in the tenor of lower court decisions. See 7 CHISUM ON PATENTS, supra note 2, § 20.02[4][c]. Under prior law, there frequently had been protracted litigation with respect to the amount of an infringer's profits. See General Motors Corp. v. Devex Corp., 461 U.S. 648, 654 (1983) ("In 1946 Congress excluded consideration of the infringer's gain . . . the determination of which had often required protracted litigation." (internal citations omitted) (citing H.R. REP No. 1587, at 1–2 (1946); S. REP. No. 1503, at 2 (1946) (statement of Sen. Pepper))). On the other hand, design patentees are entitled to recover an infringer's net profits. See 35 U.S.C. § 289 (2012) (stating that an infringer "shall be liable . . . to the extent of his total profit, but not less than \$250").

hand, utility patentees are allowed great latitude in proving statutory royalty damages for past infringement. Statutory royalty damages are based conceptually on a hypothetical negotiation between a willing patentee and a willing infringer at the time that the infringement began. The hypothetical negotiation is a device for analyzing reasonable compensation. It is not dependent upon the parties' actual willingness to negotiate. The prevailing concept of a hypothetical negotiation derives from a 1970 federal district court opinion in Georgia-Pacific Corp. v. U.S. Plywood Corp. The Georgia-Pacific analysis assumes that, during a hypothetical negotiation, the parties know that a patent is valid and has been infringed. The hypothetical license under negotiation is assumed to be nonexclusive and "naked," meaning unaccompanied by a patentee's related rights to know-how, trademarks, and copyrights.

Siemens Medical Solutions USA, Inc. v. Saint-Gobain Ceramics & Plastics, Inc., 637 F.3d 1269, 1287 (Fed. Cir. 2011).

- 84. Another type of patent code reasonable-royalty damages is "ongoing" reasonable-royalty damages for future infringement. See 35 U.S.C. §§ 283–284 (2012). If a district court denies a patentee a permanent injunction against infringement and the parties are unable to agree upon a reasonable royalty, the district court can exercise its equitable power to order an infringer to pay a reasonable royalty for future infringement. See, e.g., Affinity Labs of Tex., LLC v. BMW N. Am., LLC, 783 F. Supp. 2d 891, 895–901 (E.D. Tex. 2011), appeal dismissed, 462 F. App'x 958 (Fed. Cir. 2012) (unpublished decision). See generally Mark A. Lemley, The Ongoing Confusion over Ongoing Royalties, 76 Mo. L. REV. 695 (2011) (discussing the complications of ongoing royalties). This patent code remedy is analogous to a royalty order injunction authorized by Uniform Act section 2(b) rather than reasonable-royalty damages authorized by Uniform Act section 3(a). See supra notes 26–28 and accompanying text.
- 85. See, e.g., Rite-Hite Corp. v. Kelly Co., 56 F.3d 1538, 1554 (Fed. Cir. 1995) (en banc) ("The hypothetical negotiation requires the court to envision the terms of a licensing agreement reached as the result of a supposed meeting between the patentee and the infringer at the time infringement began." (citing Hanson v. Alpine Valley Ski Area, Inc. 718 F.2d 1075, 1078 (Fed. Cir. 1983))).
- 86. See id. at 1554 n.13 (referring to the hypothetical negotiation as involving a "willing licensor/willing licensee" is "inaccurate" and even "absurd" when the patentee does not wish to grant a license (citing Hanson v. Alpine Valley Ski Area, Inc. 718 F.2d 1075, 1078 (Fed. Cir. 1983); TWM Mfg. Co. v. Dura Corp. 789 F.2d 895, 900 (Fed. Cir. 1986))).
- 87. Georgia-Pacific Corp. v. U.S. Plywood Corp., 318 F. Supp. 1116 (S.D.N.Y. 1970), modified, Georgia-Pacific Corp. v. U.S. Plywood-Champion Papers Inc., 446 F.2d 295 (2d Cir. 1971); see Daralyn J. Durie & Mark A. Lemley, A Structured Approach to Calculating Reasonable Royalties, 14 LEWIS & CLARK L. REV. 627, 629 (2010) ("The universally accepted test for reasonable royalty damages comes, perhaps improbably, from a 1970 district court case"). Although the Second Circuit modified the district court's conclusions, it is the district court opinion that has been influential. See id. at 631 (stating that the district court's opinion has become "gospel").
- 88. Mark A. Lemley & Carl Shapiro, *Patent Holdup and Royalty Stacking*, 85 TEX. L. REV. 1991, 2018 (2007) (stating that both patent validity and infringement are assumed).
- 89. Robert Goldscheider, The Employment of Licensing Expertise in the Arena of Intellectual Property Litigation, 36 IDEA 159, 174–75 (1996) (commenting upon the assumption that a hypothetical license is nonexclusive and naked). But, under Georgia-Pacific Factor three, a

The *Georgia-Pacific* opinion nominally listed fifteen nonexclusive factors pertaining to a reasonable royalty.⁹⁰ Factor fourteen, however, merely invites expert testimony to provide a basis

court can consider evidence of the type of license the parties would have negotiated. See Durie & Lemley, supra note 87, at 638.

90. The district court stated:

The following are some of the factors mutatis mutandis seemingly more pertinent to the issue herein:

- 1. The royalties received by the patentee for the licensing of the patent in suit, proving or tending to prove an established royalty.
- 2. The rates paid by the licensee for the use of other patents comparable to the patent in suit.
- 3. The nature and scope of the license, as exclusive or non-exclusive; or as restricted or non-restricted in terms of territory or with respect to whom the manufactured product may be sold.
- 4. The licensor's established policy and marketing program to maintain his patent monopoly by not licensing others to use the invention or by granting licenses under special conditions designed to preserve that monopoly.
- 5. The commercial relationship between the licensor and licensee, such as, whether they are competitors in the same territory in the same line of business; or whether they are inventor and promoter.
- 6. The effect of selling the patented specialty in promoting sales of other products of the licensee; that existing value of the invention to the licensor as a generator of sales of his non-patented items; and the extent of such derivative or convoyed sales.
- 7. The duration of the patent and the term of the license.
- 8. The established profitability of the product made under the patent; its commercial success; and its current popularity.
- 9. The utility and advantages of the patent property over the old modes or devices, if any, that had been used for working out similar results.
- 10. The nature of the patented invention; the character of the commercial embodiment of it as owned and produced by the licensor; and the benefits to those who have used the invention.
- 11. The extent to which the infringer has made use of the invention; and any evidence probative of the value of that use.
- 12. The portion of the profit or of the selling price that may be customary in the particular business or in comparable businesses to allow for the use of the invention or analogous inventions.
- 13. The portion of the realizable profit that should be credited to the invention as distinguished from non-patented elements, the manufacturing process, business risks, or significant features or improvements added by the infringer.
- 14. The opinion testimony of qualified experts.
- 15. The amount that a licensor (such as the patentee) and a licensee (such as the infringer) would have agreed upon (at the time the infringement began) if both had been reasonably and voluntarily trying to reach an agreement; that is, the amount which a prudent licensee[—]who desired, as business proposition, to obtain a license to manufacture and sell a particular article embodying the patented invention[—]would have been willing to pay as a royalty and yet be able to make a reasonable profit and which amount would have been acceptable by a prudent patentee who was willing to grant a license.

Georgia-Pacific Corp. v. U.S. Plywood Corp., 318 F. Supp. 1116, 1120 (S.D.N.Y. 1970), modified, Georgia-Pacific Corp. v. U.S. Plywood-Champion Papers Inc., 446 F.2d 295 (2d Cir. 1971). As a practical matter, the factors used as evidence ordinarily consist of either two or, at most, eleven of the other thirteen factors. See id.

for assessing the other factors, and Factor fifteen simply describes the hypothetical negotiation device for determining a reasonable royalty.⁹¹

Factors one and two are considered initially. Factor one pertains to the royalties received by the patentee for licensing the utility patent in suit, and Factor two deals with the royalty rate paid by the "licensee" (the infringer) for the use of patents comparable to the utility patent in suit.⁹² But if neither Factor one nor Factor two is satisfied, they are no longer relevant.⁹³ By the same token, if either Factor one or Factor two is satisfied, the remaining factors are not relevant.⁹⁴

Professor Mark Lemley and Daralyn Durie have suggested distillation of the fifteen nonexclusive *Georgia-Pacific* factors into the following four nonexclusive factors:

[T]he relevant questions in calculating a reasonable royalty fall into four basic categories: (1) whether the patentee in fact produces a product in the market; (2) the contribution made by the patented technology compared to the next best alternative; (3) the number and importance of other inputs necessary to make that technology work; and (4) evidence of how the market has actually valued the patent, to the extent it differs from the outcome of (1), (2), and (3).⁹⁵

The Federal Trade Commission (FTC) also has recommended radical alteration of the *Georgia-Pacific* factors. ⁹⁶ In order to increase the accuracy of statutory royalty awards in patent cases, the FTC recommended in March of 2011 that the basic test should be the hypothetical negotiation described in *Georgia-Pacific* Factor fifteen—without regard to considerations like punishing or deterring infringement or a patentee's unproven lost net profits. ⁹⁷ According to the FTC, the other *Georgia-Pacific* factors simply comprise a nonexclusive list of evidentiary categories that may or may not be

^{91.} See id.

^{92.} See id.

^{93.} See Goldscheider, supra note 89, at 175 (stating that several cases hold that the existence of an established royalty obviates a need to consider the other eleven factors).

^{94.} See id.

^{95.} Durie & Lemley, supra note 87, at 636. Lemley and Durie analyze the relationship of their four factors to the fifteen Georgia-Pacific factors. See id. at 636-44 (correlating each of the four factors with its counterparts in the Georgia-Pacific fifteen-factor test). The first Lemley-Durie factor distinguishes between patentees that produce goods for the market either directly or through an exclusive licensee and nonpracticing entities that license others to produce goods for the market. See id. at 636-37.

^{96.} See Fed. Trade Comm'n, The Evolving IP Marketplace: Aligning Patent Notice and Remedies with Competition (2011) [hereinafter FTC, The Evolving IP Marketplace], available at 2011 WL 838912.

^{97.} See Georgia-Pacific Corp. v. U.S. Plywood Corp., 318 F. Supp. 1116, 1120 (S.D.N.Y. 1970), modified, Georgia-Pacific Corp. v. U.S. Plywood-Champion Papers Inc., 446 F.2d 295 (2d Cir. 1971); FTC, THE EVOLVING IP MARKETPLACE, supra note 96, at *81, *84.

relevant to a particular statutory royalty calculation.⁹⁸ The FTC emphasized that evidence should not be admitted solely because it relates to one of the *Georgia-Pacific* factors.⁹⁹ Moreover, there should be three general characteristics of admissible expert testimony: (1) a reliable methodology; (2) an application of the methodology to the facts of the case; and (3) the availability of sufficient data to justify conclusions.¹⁰⁰

It is also important to note that the *Georgia-Pacific* multi-factor test was formulated and applied by a trial judge sitting without a jury. Today, however, juries decide most patent litigation. There are strong indications that the *Georgia-Pacific* nonexclusive multi-factor test gives little practical guidance to juries and makes it difficult for judges to determine whether a jury verdict is supported by substantial evidence. Nevertheless, the original *Georgia-Pacific* list of nonexclusive factors remains the basis for patent code statutory royalty awards. 104

B. Uniform Act Monetary Remedies

In addition to authorizing recovery of a reasonable royalty, Uniform Act section 3(a), as amended, provides:

Except to the extent that material and prejudicial change of position prior to acquiring knowledge or reason to know of misappropriation renders a monetary recovery inequitable, a complainant is entitled to recover damages for misappropriation. Damages can include both the actual loss caused by misappropriation and the unjust enrichment caused by misappropriation that is not taken into account in computing actual loss. ¹⁰⁵

The 1979 version of section 3(a) was essentially the same except in two respects. The exception for good faith acquirers who

^{98.} See FTC, THE EVOLVING IP MARKETPLACE, supra note 96, at *84–85.

^{99.} See id. at *92.

^{100.} See id.

^{101.} See Georgia-Pacific Corp., 318 F. Supp. at 1117–19 (trial judge's determination of a reasonable royalty), modified, Georgia-Pacific Corp. v. U.S. Plywood-Champion Papers Inc., 446 F.2d 295 (2d Cir. 1971).

^{102.} See Christopher B. Seaman, Reconsidering the Georgia-Pacific Standard for Reasonable Royalty Patent Damages, 2010 BYU L. REV. 1661, 1688 (2010) (noting that most contemporary patent litigation is before a jury).

^{103.} See Durie & Lemley, supra note 87 at 631-36 (stating that juries regularly disregard instructions with respect to the Georgia-Pacific factors and that judges are reduced either to deferring blindly to jury determinations or to substituting their view of the evidence for a jury's and that reviewing published decisions citing or relying upon Georgia-Pacific indicated that blind deference has been the norm).

^{104.} See id. at 628 (describing the Georgia-Pacific test as "the gold standard for calculating reasonable royalty damages").

^{105.} See UNIF. TRADE SECRETS ACT § 3(a) (amended 1985), 14 U.L.A. 633-34 (2005).

materially and prejudicially changed their position before being notified of misappropriation and the statutory royalty provision were omitted. The drafters added the first exception to conform to an exclusion. Uniform Act section 1(2)(ii)(C) excludes from "misappropriation" disclosure or use of a trade secret by a person who materially changed position before knowing or having reason to know that the information was a trade secret, knowledge of which had been acquired by accident or mistake. 107

The Uniform Act does not provide for minimum damages.¹⁰⁸ A plaintiff that does not seek injunctive relief must prove substantial actual-loss damages, substantial unjust-enrichment damages, or substantial statutory royalty damages in order to recover a judgment.¹⁰⁹

Basic-loss damages are a plaintiff's lost net profits,¹¹⁰ including net profits lost due to price erosion caused by misappropriation.¹¹¹ Basic unjust-enrichment damages are either a defendant's net profits from misappropriation¹¹² or a defendant's expenses saved by

With respect to calculation of a defendant's net profits from misappropriation, the plaintiff has the burden of establishing the defendant's sales, and the defendant has the burden of justifying deductions, including sales not attributable to misappropriation and expenses. See Cartel Asset Mgmt. v. Ocwen Fin. Corp., 249 F. App'x 63, 78–79 (10th Cir. 2007) (unpublished decision) (stating that a defendant has the burden of justifying deductions from sales).

A plaintiff has the option of recovering a defendant's unjust enrichment even though the plaintiff would have licensed its trade secret rather than marketing a competing product. See Russo v. Ballard Med. Prods., 550 F.3d 1004, 1020–21 (10th Cir. 2008) (Utah enactment) ("In Ballard's view, unjust enrichment damages are appropriate only when the defendant has used a misappropriated trade secret to compete with the plaintiff, because there the defendant's profits

^{106.} Compare id., with id. (1979) ("In addition to or in lieu of injunctive relief, a complainant may recover damages for the actual loss caused by misappropriation. A complainant also may recover for the unjust enrichment caused by misappropriation that is not taken into in computing damages for actual loss.").

^{107.} See id. § 1(2)(ii)(C), 14 U.L.A. 537.

^{108.} See id. § 3(a), 14. U.L.A. 633-34 (neither the 1979 nor the 1985 Official Text refers to minimum damages); Alphamed Pharm. Corp. v. Arriva Pharm., Inc., 432 F. Supp. 2d 1319, 1334-40 (S.D. Fla. 2006) (vacating jury verdict of nominal damages under the Florida enactment).

^{109.} See Alphamed Pharm. Corp., 432 F. Supp. 2d at 1340.

^{110.} See, e.g., Mangren Research & Dev. Corp. v. Nat'l Chem. Co., 87 F.3d 937, 945–46 (7th Cir. 1996) (affirming jury award under the Illinois enactment of a plaintiff's lost profits on sales made possible by misappropriation).

^{111.} See, e.g., id. (affirming jury award under the Illinois enactment of lost profits caused by plaintiff's price reductions due to competition made possible by misappropriation).

^{112.} See Brown v. Ruallam Enters., Inc., 44 S.W.3d 740, 745 (Ark. Ct. App. 2001) ("We hold that the proper method of calculation is on the basis of net profit . . . gained by the wrongdoer . . . "), overruled by Pro-Comp. Mgmt., Inc. v. R.K. Enters., LLC, 237 S.W.3d 20 (Ark. 2006). To the extent that Brown holds that a defendant's net profit is the exclusive measure of a defendant's unjust enrichment, it has been overruled. See Pro-Comp Mgmt., Inc., 237 S.W.3d at 24–25 ("The conclusion in Brown that unjust enrichment must be defined solely through analysis of profits is incorrect.").

misappropriation.¹¹³ Courts can avoid overcompensating plaintiffs by awarding either a plaintiff's actual loss or a defendant's unjust enrichment, whichever is greater.¹¹⁴ However, awarding a plaintiff's lost net profits for a defendant's sales in markets in which a plaintiff competed and unjust-enrichment damages for a defendant's sales in markets in which a plaintiff did not compete would not involve overcompensation.¹¹⁵

Unlike the Federal Circuit's construction of the Patent Code, the Uniform Act does not deal with the evidence required to recover a plaintiff's lost net profits. A state's general rules for tort compensatory damages apply. 117

serve as a proxy for the plaintiff's lost profit. . . . [T]he problem with Ballard's argument is that the Utah legislature has rejected it." (internal citations omitted)). Allowing recovery of a misappropriator's unjust enrichment reduces a competitor's incentive to spend on misappropriation, which, in turn reduces a person with trade secret rights' need to make expenditures protecting secrecy. See Michael Risch, Why Do We Have Trade Secrets?, 11 MARQ. INTELL. PROP. L. REV. 1, 58–59 (2007) (arguing that requiring disgorgement of unjust benefits reduces a competitor's incentive to allocate more resources to misappropriation). But Professor Lemley has observed that the focus must be upon enrichment that impairs a person with trade secret rights' ability to cover necessary costs and to make a reasonable profit. Cf. Mark A. Lemley, Property, Intellectual Property, and Free Riding, 83 Tex. L. Rev. 1031, 1046–50 (2005) (emphasizing that all benefits derived from another's intellectual property rights are not unjust).

- 113. See RESTATEMENT (THIRD) OF UNFAIR COMPETITION § 45, cmt. f (1995) ("The standard of comparison measure determines the defendant's gain by comparing the defendant's actual costs with the costs that the defendant would have incurred to achieve the same result without the use of the appropriated trade secret."). One measure of the development costs saved by the defendant is the plaintiff's development costs. See Syntron Bioresearch, Inc. v. Fan, 2002 WL 660446 at *12–14 (unpublished decision) (awarding an unjust enrichment recovery based upon 75 percent of the plaintiff's costs of developing all its products), modified on denial of reh'g, rev. denied (Cal. Ct. App. 2002). But the plaintiff should be awarded only the development costs of misappropriated trade secrets of commercial value to the defendant. See id. at *12–13. An injunction against future use adequately protects a plaintiff with respect to misappropriated trade secrets that have not been of commercial value to a defendant. See id. at *14 ("[A]s to those misappropriated trade secrets that were neither used nor commercially implemented, the injunctive relief granted by the [trial] court . . . provided Syntron with complete relief.").
- 114. See RESTATEMENT (THIRD) OF UNFAIR COMPETITION § 45, cmt. c (1995) ("An award of the greater of the two remedies thus ordinarily . . . best prevents double recovery.").
- 115. See Agilent Techs., Inc. v. Kirkland, No. 3512-VCS, 2010 WL 610725, at *28-31 (Del. Ch. Feb. 18, 2010) (unpublished opinion) (awarding plaintiff lost-profit damages for markets in which the plaintiff and the defendant corporation competed and unjust-enrichment damages for markets in which the plaintiff did not compete).
- 116. Compare UNIF. TRADE SECRETS ACT §§ 1–12 (amended 1985), 14 U.L.A. 529–659 (2005), 76–100 (Supp. 2012), with Siemens Medical Solutions USA, Inc. v. Saint-Gobain Ceramics & Plastics, Inc., 637 F.3d 1269, 1287–89 (Fed. Cir. 2011).
- 117. See RESTATEMENT (THIRD) UNFAIR COMPETITION § 45, cmt. a, (1995) ("The general rules relating to the recovery of compensatory damages in tort actions apply in actions for the misappropriation of trade secrets.").

IV. THE PATENT CODE AND UNIFORM ACT STATUTORY ROYALTY PROVISIONS

A. Inflation of Patent Code Statutory Royalty Recoveries

The *Georgia-Pacific* list of reasonable-royalty factors includes Factor fifteen, which reads:

The amount that a licensor (such as the patentee) and a licensee (such as the infringer) would have agreed upon (at the time infringement began) if both had been reasonably and voluntarily trying to reach an agreement; that is, the amount which a prudent licensee—who desired, as a business proposition, to obtain a license to manufacture and sell a particular article embodying the patented invention—would have been willing to pay as a royalty and yet be able to make a reasonable profit and which amount would have been acceptable by a prudent patentee who was willing to grant a license. 118

But, the Federal Circuit takes a different view. In *Rite-Height Corp.* v. Kelly Co., 119 the Federal Circuit commented: "The hypothetical negotiation is often referred to as a 'willing licensor/willing licensee' negotiation. However, this is an inaccurate, and even absurd, characterization.... [It is] a 'device in the aid of justice." 120

Furthermore, in *Monsanto Co. v. Ralph*, ¹²¹ a jury awarded an amount in excess of an infringer's anticipated profit as a statutory royalty. Upon appeal, the infringer requested a new trial with respect to damages, contending that the *Georgia-Pacific* factors required that an infringer be allowed to make a reasonable profit. ¹²² The Federal Circuit responded:

Ralph argues that no sane farmer would ever negotiate a royalty in excess of his anticipated profits. However, although an infringer's anticipated profit from use of the patented invention is "[a]mong the factors to be considered in determining" a reasonable royalty, the law does not require that an infringer be permitted to make a profit. ¹²³

Yet Georgia-Pacific Factor fifteen indicates that a hypothetical reasonable royalty should leave an infringer with a profit.¹²⁴ In its reasonable-royalty analysis, the Federal Circuit pays lip service to, but does not follow, Georgia-Pacific Factor fifteen. Maxwell v. J.

^{118.} Georgia-Pacific Corp. v. U.S. Plywood Corp., 318 F. Supp. 1116, 1120 (S.D.N.Y. 1970), modified, Georgia-Pacific Corp. v. U.S. Plywood-Champion Papers Inc., 446 F.2d 295 (2d Cir. 1971).

^{119.} Rite-Hite Corp. v. Kelley Co., 56 F.3d 1538 (Fed. Cir. 1995) (en banc).

^{120.} *Id.* at 1554 n.13 (quoting Hanson v. Alpine Valley Ski Area, Inc., 718 F.2d 1075, 1081 (Fed. Cir. 1983); TWM Mfg. Co. v. Dura Corp., 789 F.2d 895, 900 (Fed. Cir. 1986)).

^{121.} Monsanto Co. v. Ralph, 382 F.3d 1374 (Fed. Cir. 2004).

^{122.} See id. at 1383.

^{123.} *Id.* at 1384 (alteration in original) (internal citation omitted) (quoting Georgia-Pacific Corp. v. U.S. Plywood Corp., 318 F. Supp. 1116, 1120 (S.D.N.Y. 1970), *modified*, Georgia-Pacific Corp. v. U.S. Plywood-Champion Papers Inc., 446 F.2d 295 (2d Cir. 1971)).

^{124.} See Georgia-Pacific, 318 F. Supp. at 1120.

Baker, Inc. 125 clarifies the Federal Circuit's approach. In Maxwell, the district court asked the jury to answer special interrogatories. 126 Question eight asked what a reasonable royalty rate was: question ten asked whether the patentee had been damaged in excess of the amount of a reasonable royalty; and question eleven asked what amount would compensate the patentee for any additional damage suffered.¹²⁷ The Federal Circuit held that the special interrogatories were not an abuse of discretion. 128 According to the Federal Circuit. the district court merely asked the jury to determine separately the amount of an ordinary negotiated royalty and the additional amount necessary to compensate the patentee for other damage caused by infringement. 129 To deter infringement, a statutory royalty award ordinarily combines these two components in a reasonable royalty "for an infringer."130 Unless a reasonable royalty for an infringer was higher than a negotiated royalty, the perception would be "that blatant, blind appropriation of inventions . . . is the profitable, can't-lose course."131 The court also found it to be relevant that "an infringer had to be ordered by a court to pay damages, rather than agreeing to a reasonable royalty."132 Inflating the statutory royalty for infringers could induce a patentee to refuse a request for a license and later to sue the requestor for infringement in order to recover higher statutory royalties than those to which the requestor would have agreed.133

Since 1946, the federal Patent Code has denied a utility patentee the option of recovering an infringer's net profits.¹³⁴

^{125.} Maxwell v. J. Baker, Inc., 86 F.3d 1098 (Fed. Cir. 1996), cert denied, 520 U.S. 1115 (1997).

^{126.} See id. at 1109.

^{127.} See id.

^{128.} See id.

^{129.} See id. at 1109-10

^{130.} Id. at 1110 (quoting Stickle v. Heublein, Inc., 716 F.2d 1550, 1562 (1983)).

^{131.} Id. at 1109 (quoting Fromson v. W. Litho Plate & Supply Co., 853 F.2d 1568, 1575 (Fed. Cir. 1988)).

^{132.} Id. at 1110.

^{133.} Cf. Lemley, supra note 7, at 667-68 ("[T]he situation has gotten so bad that some patentees who can prove lost profits elect instead to seek a 'reasonable' royalty that is far in excess both of what the parties would have negotiated and of the actual losses that the patentee suffered.").

^{134.} The purpose of the 1946 amendment was to preclude the long and costly hearings before masters and the insoluble problems of apportionment that had characterized infringement actions in which an infringer's net profits had been sought to be recovered. See Georgia-Pacific Corp. v. U.S. Plywood Corp., 243 F. Supp. 500, 528–29 (S.D.N.Y. 1965) ("[T]he patent owner's sole measure of recovery, other than a reasonable or established royalty, was to be his lost profits"). An "established royalty" is derived from the royalties in a patentee's licenses of the patent in suit. See Laserdynamics, Inc. v. Quanta Computer, Inc., 694 F.3d 51, 79 (Fed. Cir. 2012).

Although a patentee can theoretically recover its own lost net profits, 135 the leading federal case imposes a high burden of proof. 136 In order to compensate patentees adequately and to deter infringers, the result has been judicial inflation of reasonable-royalty damages. 137 This has led some patentees who could prove lost net profits to seek larger statutory royalty damages instead. 138

B. No Reason to Inflate Damages under the Uniform Act

Unlike the Patent Code, the Uniform Act allows a person with trade secret rights to recover both actual losses and a misappropriator's unjust enrichment that the fact finder does not take into account in computing actual losses. As case law has recognized, the Uniform Act's full range of monetary remedies removes any need to inflate Uniform Act statutory royalty damages.

^{135.} See 35 U.S.C. §§ 284-85 (2012). In the case of willful infringement and exceptional circumstances, an enhanced section 284 recovery and discretionary attorney's fees also can be recovered. See id.

^{136.} See Siemens Medical Solutions USA, Inc. v. Saint-Gobain Ceramics & Plastics, Inc., 637 F.3d 1269, 1287 (Fed. Cir. 2011); Panduit Corp. v. Stahlin Bros. Fibre Works, 575 F.2d 1152, 1156–57 (6th Cir. 1978); supra note 83 and accompanying text; see also Lemley, supra note 7, at 658 (noting that courts quite often reject claims for lost profits).

^{137.} See Lemley, supra note 7, at 674 ("[T]he fear of undercompensating deserving patent owners that should have been able to prove lost profits, has led to systematic distortions in the reasonable royalty structure").

^{138.} See id. at 667 (observing that some patentees that could prove lost profits seek larger reasonable-royalty damages).

^{139.} Compare 35 U.S.C. § 284 (2012) (no reference to an infringer's unjust enrichment), with UNIF. TRADE SECRETS ACT § 3(a) (amended 1985), 14 U.L.A. 633-34 (2005) ("Damages can include both the actual loss caused by misappropriation and the unjust enrichment caused by misappropriation that is not taken into account in computing actual loss.").

^{140.} See, e.g., Vermont Microsystems, Inc. v. Autodesk, Inc., 138 F.3d 449, 451–52 (2d Cir. 1998). Construing the California enactment, the court commented that "a punitive deterrent award does not fall within the description of 'actual loss caused by misappropriation' for which recovery may be had." *Id.*

The Uniform Act's approach has been regarded as more justifiable than the Patent Code's. See Roger D. Blair & Thomas F. Cotter, An Economic Analysis of Damages Rules in Intellectual Property Law, 39 WM. & MARY L. REV. 1585, 1693–94 (1998) ("[T]he general baseline recovery in intellectual property cases should be the greater of the plaintiff's actual damages or the defendant's profits attributable to infringement. . . . Of the four major bodies of intellectual property law, trade secret law appears to adhere most closely. Patent law diverges from the model by not permitting the plaintiff to recover restitutionary damages, and there appears to be no compelling economic justification for this departure."). But Professor Lemley has observed that the focus must be upon enrichment that impairs a person with trade secret rights' ability to cover necessary costs and to make a reasonable profit. See Mark A. Lemley, Property, Intellectual Property, and Free Riding, 83 Tex. L. Rev. 1031, 1046–50 (2005) (emphasizing that all benefits derived from another's intellectual property rights are not unjust).

In Agilent Technologies, Inc. v. Kirkland, 141 for example, a Delaware trial judge awarded a person with trade secret rights \$1,538,368 in lost net profits, a figure that reflected 20 percent of the defendant-corporation's sales of competitive products for four years. 142 The trial judge also awarded \$2,991,649 as unjust-enrichment damages based upon three years of the other 80 percent of the defendant-corporation's sales. 143 The judge calculated unjust enrichment by subtracting the defendant-corporation's cost of goods sold from its total revenue from the sale of the product developed with the misappropriated information. Although the defendant claimed that it was entitled to more deductions, it did not prove them. 144 As the Agilent Technologies case illustrates, under the Uniform Act there is less need for any statutory royalty recovery and no need to inflate statutory royalty damages when they are awarded.

C. Applying the Uniform Act Statutory Royalty Provision

As amended in 1985, section 3(a) of the Uniform Act provides in part:

Damages can include both the actual loss caused by misappropriation and the unjust enrichment caused by misappropriation that is not taken into account in computing actual loss. In lieu of damages measured by any other methods, the damages caused by misappropriation may be measured by imposition of liability for a reasonable royalty for a misappropriator's unauthorized disclosure or use of a trade secret. ¹⁴⁵

When the drafters were considering the 1985 official amendment dealing with statutory royalty damages, *University Computing Co. v. Lykes-Youngstown Corp.* 146 was a leading common law decision with respect to reasonable-royalty damages in trade

^{141.} Agilent Techs., Inc. v. Kirkland, No. 3512-VCS, 2010 WL 610725, at *35 (Del. Ch. Feb. 18, 2010) (unpublished decision).

Twenty percent was the trade secret rights holder's market share with respect to the competing products. See id. at *27-29. Agilent's use of market share analysis to establish a plaintiff's lost net profits has been followed under the Florida enactment. See Premier Lab Supply, Inc. v. Chemplex Indus., Inc., 94 So. 3d 640, 645-46 (Fla. Dist. Ct. App. 2012). The Federal Circuit considers that market share analysis can satisfy the Panduit test for a patentee's lost net profits only if a patentee and an infringer sell substantially similar products in the same market. See BIC Leisure Prods., Inc. v. Windsurfing Int'l, Inc., 1 F.3d 1214, 1218-19 (Fed. Cir. 1993); supra note 83 and accompanying text (describing the Panduit test).

^{143.} See Agilent, 2010 WL 610725, at *30–31. The basic period for calculating a monetary recovery was the three-year "head start" that the defendant corporation had gained through misappropriation. See id. at *26–27. The extra year of lost net profit damages was to compensate the plaintiff for denial of its request for injunctive relief against competition. See id. at *27, *31–32.

^{144.} See id. at *30.

^{145.} See UNIF. TRADE SECRETS ACT §3(a) (amended 1985), 14 U.L.A. at 633–34 (2005). The 1979 version of the Uniform Act did not refer to reasonable royalties as a remedy. See id.

^{146.} Univ. Computing Co. v. Lykes-Youngstown Corp., 504 F.2d 518 (5th Cir. 1974).

secret cases. The case applied Georgia's adoption of Restatement (First) trade secret principles.¹⁴⁷

University Computing and Lykes had entered into a written joint-venture contract to provide computer services to businesses in the southeastern United States. 148 One of the computer systems to be marketed by the joint venture was AIMES III, an automated retail inventory control system owned by University Computing. 149 However, Lykes bribed an employee of a University Computing licensee to disclose the system, after which Lykes unjustifiably terminated the joint venture. 150 University Computing sued Lykes based on several claims; one of which was trade secret misappropriation of AIMES III. 151 A jury awarded University Computing \$220,000 for Lykes's trade secret misappropriation. 152

On appeal, the record did not show any specific loss to University Computing nor any profit by Lykes from the misappropriated trade secrets. The parties agreed that a reasonable-royalty award was appropriate but disagreed as to the amount of a reasonable royalty. The Fifth Circuit held that a reasonable royalty must be based upon "the actual value of what has been appropriated" and requires "a flexible and imaginative approach to the problem of damages." Furthermore:

In calculating what a fair licensing price would have been had the parties agreed, the trier of fact should consider such factors as the resulting and foreseeable changes in the parties' competitive posture; that prices past purchasers and licensees may have paid; the total value of the secret to the plaintiff, including the plaintiff's development costs and the importance of the secret to the plaintiff's business; the nature and extent of the use the defendant intended for the secret; and finally whatever other unique factors in the particular case which might have affected the parties' agreement, such as the ready availability of alternative processes. ¹⁵⁶

The Fifth Circuit emphasized that this reasonable-royalty test was appropriate for cases like *University Computing*, in which: the

^{147.} See id. at 534 ("What Georgia law exists in this area seems to follow the Restatement, Torts §757.").

^{148.} See id. at 526-27.

^{149.} See id. at 528-29.

^{150.} See id. at 532-34.

^{151.} See id. at 532-34.

^{152.} See id. at 526-29, 532-33, 543-46.

^{153.} See id.

^{154.} See id. at 536.

^{155.} See id. at 537-38 (quoting Vitro Corp. of Am. v. Hall Chem. Co., 292 F.2d 678, 683 (6th Cir. 1961)).

^{156.} Id. at 539 (citing Hughes Tool Co. v. G. W. Murphy Indus., Inc. 491 F.2d 923, 931 (5th Cir. 1973)). The Restatement of Unfair Competition's discussion of the factors pertinent to the amount of a reasonable royalty both cites and paraphrases University Computing. Compare id., with RESTATEMENT (THIRD) OF UNFAIR COMPETITION § 45 cmt. g (1995).

parties were in direct competition; the defendant's course of conduct extended over a period of time, including multiple uses of the plaintiff's trade secret; and, the development of the trade secret had been difficult.¹⁵⁷ The Fifth Circuit affirmed the jury award of \$220,000 to University Computing based upon expert testimony evaluating University Computing's prior offer to sell its trade secrets to a third party for that amount.¹⁵⁸

University Computing was decided after Georgia-Pacific, which articulated the commonly applied fifteen nonexclusive reasonable-royalty factors under the Patent Code. 159 Although the court in University Computing considered patent cases appropriate analogies, 160 the University Computing opinion neither discussed nor cited Georgia-Pacific. 161 Moreover, University Computing provides a simpler statement of the nonexclusive factors relevant to the hypothetical negotiation of a reasonable royalty. 162 Perhaps for that reason, University Computing has been followed in a majority of the reasonable-royalty cases under the Uniform Act. 163

^{157.} See Univ. Computing, 504 F.2d at 538. On the other hand, if a defendant had made a limited use of a plaintiff's trade secret that had ended, was not in direct competition with the plaintiff, and the trade secret was relatively easy to discover, it could be sufficient to hold the defendant liable for the costs it had saved through misappropriation. See id.

^{158.} See Univ. Computing, 504 F.2d at 543-46.

^{159.} See supra note 90 and accompanying text. The Georgia-Pacific trial court decision was handed down in 1970. See Georgia-Pacific Corp. v. U.S. Plywood Corp., 318 F. Supp. 1116, 1120 (S.D.N.Y. 1970), modified, Georgia-Pacific Corp. v. U.S. Plywood-Champion Papers Inc., 446 F.2d 295 (2d Cir. 1971).

^{160.} See Univ. Computing., 504 F.2d at 536 ("In the case before us, then, the 'appropriate measure of damages, by analogy to patent infringement, is not what plaintiff lost, but rather the benefits, profits, or advantages gained by the defendant in the use of the trade secret." (quoting Int'l Indus., Inc. v. Warren Petroleum Corp., 248 F.2d 696, 699 (3d Cir. 1957))).

^{161.} See Univ. Computing, 504 F.2d at 534-46.

^{162.} Compare supra note 156 and accompanying text (highlighting the reasonable-royalty factors of *University Computing*), with supra note 90 and accompanying text (outlining the fifteen Georgia-Pacific factors).

^{163.} Many cases rely upon University Computing for their statutory royalty analysis. See, e.g., Am. Sales Corp. v. Adventure Travel, Inc., 862 F. Supp. 1476, 1479–80 (E.D. Va. 1994) (Va. enactment); Ajaxo Inc. v. E*Trade Fin. Corp., 115 Cal. Rptr. 3d 168, 179–180 (Cal. Ct. App. 2010); Olson v. Nieman's, Ltd., 579 N.W.2d 299, 310–11 (Iowa 1998). Other cases rely upon University Computing analysis either in dictum or for other purposes. See, e.g., Check 'N Go of Va., Inc. v. Laserre, No. Civ.A.6:04 CV 00050, 2005 WL 1926609, at *4-6 (W.D. Va. 2005) (dictum) (unpublished decision) (Va. enactment); Litton Sys., Inc. v. Ssangyong Cement Indus. Co., No. C-89-3832 VRW, 1993 WL 317266, at *2 (N.D. Cal. 1993) (dictum) (unpublished decision) (Cal. enactment); Perdue Farms Corp. v. Hook, 777 So. 2d 1047, 1051–52 (Fla. Dist. Ct. App. 2001) (citing University Computing with respect to actual damages). The principal case utilizing the Georgia-Pacific factors to determine a Uniform Act statutory royalty is O2 Micro Int'l Ltd. v. Monolithic Power Sys., Inc., 399 F. Supp. 2d 1064, 1078 (N.D. Cal. 2005), amended on other grounds, 420 F. Supp. 2d 1070 (N.D. Cal. 2006), aff'd per curiam, 221 F. App'x 996 (Fed. Cir. 2007) (unpublished decision).

But, the *University Computing* framework is incomplete. Most importantly, the *University Computing* factors omit the aspect of Georgia-Pacific Factor fifteen that acknowledges that a hypothetical licensee (an infringer) should be allowed to make a reasonable profit. 164 Additionally, Vermont Microsystems, Inc. v. Autodesk, Inc., 165 which was decided under the California enactment, suggests two other elements that should be part of a jury charge or a trial judge's findings under the Uniform Act. The first is whether a misappropriated trade secret accounted for only a portion of the profits earned by a a reasonable royalty should be reduced defendant. If so. accordingly. 166 Second, the magistrate judge in Vermont Microsystems had doubled the statutory royalty awarded to the plaintiff in order to "deter" infringement. 167 The Second Circuit had reversed, stressing that compensatory damages under the Uniform Act must redress "actual loss" and that the willful and malicious misappropriation that the Act requires for exemplary damages was not present in the record.168

Alternatively, Professor Mark Lemley and Daralyn Durie's distillation of the fifteen nonexclusive Georgia-Pacific factors into four nonexclusive factors can be adapted to the Uniform Act. 169 Under an adapted Lemley-Durie approach, the basic factors would be: (1) whether a person with trade secret rights produces or will produce a product in the market either directly or through licensing; (2) the contribution made by the trade secret compared to the next best alternative; (3) the number and importance of other inputs necessary to make the trade secret work; and (4) if the market has valued the

^{164.} See Georgia-Pacific Corp. v. U.S. Plywood Corp., 318 F. Supp. 1116, 1120 (S.D.N.Y. 1970), modified, Georgia-Pacific Corp. v. U.S. Plywood-Champion Papers Inc., 446 F.2d 295 (2d Cir. 1971); supra note 118 and accompanying text.

^{165.} Vermont Microsystems, Inc. v. Autodesk, Inc., 138 F.3d 449, 449-50 (2d Cir. 1998).

^{166.} See id. at 450 (dictum) ("If the trade secret accounts for only a portion of the profits earned on the defendant's sales, such as when the trade secret relates to a single component of a product marketable without the secret, an award to the plaintiff of defendant's entire profit may be unjust." (quoting RESTATEMENT (THIRD) OF LAW OF UNFAIR COMPETITION § 45 cmt. f (1995))).

^{167.} See id. at 451.

^{168.} See id. at 451–52 (alternative holding). The Panel also observed that it would border on the ridiculous to consider that a misappropriator would agree to pay more than the misappropriated property's actual value in a hypothetical negotiation for a reasonable royalty. See id. at 452. In a prior appeal of the Vermont Microsystems case, the Second Circuit also had clarified the parameters of a hypothetical negotiation in which a trier of fact computes a reasonable royalty. See Vermont Microsystems, Inc. v. Autodesk, Inc., 88 F.3d 142, 151–52 (2d Cir. 1996). The court reversed a decision by a magistrate judge that had based the amount of a reasonable royalty upon the amount that the person with trade secret rights would have charged at the time that misappropriation occurred rather than upon what the parties would have agreed in a hypothetical negotiation. See id. The court's primary reference for this standard was the Georgia-Pacific Second Circuit opinion. See id.

^{169.} See supra note 95 and accompanying text (discussing the Lemley-Durie factors).

trade secret, the extent to which that value differs from the outcome under nonexclusive Factors (1), (2), and (3).¹⁷⁰

The Lemley-Durie approach can be most readily applied if both a person with trade secret rights and a misappropriator have used a trade secret commercially. Yet the Uniform Act recognizes the existence of trade secret rights that have not been used by the person entitled to them.¹⁷¹ It also authorizes a person with trade secret rights to elect statutory royalty damages for either a misappropriator's "unauthorized disclosure or use of a trade secret."¹⁷² If neither a person with trade secret rights nor a misappropriator has used a trade secret, there may be no market value to consider under Lemley-Durie Factor four.

Courts should apply Lemley-Durie Factor four, which includes actual royalties charged for the trade secret at issue and comparable trade secrets, to check the results of the prior three inquiries.¹⁷³ But, negotiated royalties may have been discounted due to uncertainty as to whether a trade secret was valid or had been misappropriated; whereas, in a hypothetical negotiation, a trade secret is assumed to be valid and to have been misappropriated,¹⁷⁴ which justifies a higher royalty.¹⁷⁵

An adapted Lemley-Durie formulation of the nonexclusive Georgia-Pacific factors should be melded with the Vermont Microsystems requirement that Uniform Act reasonable royalties not be "punitive." The Lemley-Durie formulation incorporates the other Vermont Microsystems gloss requiring consideration of other contributions to a defendant's profits. Finally, the FTC's evidentiary recommendations could be integrated with either the

^{170.} Cf. Durie & Lemley, supra note 87, at 636.

^{171.} See UNIF. TRADE SECRETS ACT §1, cmt. (amended 1985), 14 U.L.A. 538 (2005) ("[T]he proposed Act extends protection to a plaintiff who has not yet had an opportunity or acquired the means to put a trade secret to use.").

^{172.} See id. § 3(a), 14 U.L.A. 634.

^{173.} Durie & Lemley, supra note 87, at 642-43 (stating that actual royalties, which are discounted due to uncertainty as to patent validity and infringement, "are best viewed . . . as a check on the results of the prior three steps").

^{174.} See id. at 641-43.

^{175.} See id. at 642 ("[Actual royalties] must be enhanced to counteract the discount that negotiating parties place on the likelihood that the patent is valid and infringed.").

^{176.} See supra note 140 and accompanying text.

^{177.} See Durie & Lemley, supra note 87, at 639-40. Lemley-Durie factor three takes into consideration profits that should be attributed to nonpatented elements, the manufacturing process, business risks, or significant features or improvements added by an infringer. See id.

^{178.} See supra notes 96-100 and accompanying text.

modified $University\ Computing\ factors^{179}$ or the adapted and modified Lemley-Durie factors. 180

V. CONCLUSION

There are alternatives to the Federal Circuit's *Georgia-Pacific* analysis that will produce more coherent statutory royalty determinations under the Uniform Act. Rejection of the Federal Circuit's current approach to statutory royalties should also ensure that a person with trade secret rights will not exercise the option to recover statutory royalty damages because of their artificial inflation.

Unlike the statutory royalties approved for utility patentees by the Federal Circuit, the statutory royalty damages recoverable under the Uniform Act should be compensatory, nonpunitive, and allow a defendant а reasonable profit. The University Computing nonexclusive factors of reasonableness should be combined with Georgia-Pacific Factor fifteen, which allows an infringer a reasonable profit. The Vermont Microsystem emphasis upon both the amount of a misappropriator's profit attributable to misappropriation and the rejection of punitive statutory royalties should also be added to the analysis. Alternatively, adaptation of the Lemley-Durie distillation of the Georgia-Pacific nonexclusive factors could be combined with Vermont Microsystem's rejection of punitive statutory royalties.

^{179.} See supra notes 155-68 and accompanying text.

^{180.} See supra notes 169-77 and accompanying text.