

# TOWARD A SYSTEM OF INVENTION REGISTRATION: THE LEAHY-SMITH AMERICA INVENTS ACT

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## INTRODUCTION

The recently enacted Leahy-Smith America Invents Act (“AIA”) represents the most significant legislative event affecting patent law and practice in more than half a century. In addressing the AIA, scholars and policymakers have focused with an almost laser-like exclusivity on the AIA’s imposition of a first-to-file-or-first-to-publicly-disclose system, which replaces an over 200-year-old first-to-invent tradition. This myopia, we suggest, overlooks a part of the AIA that could hold a substantially greater potential to jeopardize American innovation, job creation, and economic competitiveness: the imposition of a mechanism for supplemental examination.

### I. A PATENT AMNESTY PROGRAM

Section 12 of the AIA details a new procedure that allows patent owners to “request supplemental examination of a patent in the [United States Patent and Trademark] Office to consider, reconsider, or correct information believed to be relevant to the patent.”<sup>1</sup> After receiving the request, the patent office (through the Director) must assess whether the information presented in the request “raises a substantial new question of patentability.”<sup>2</sup> If it does not, the Director issues a certificate to that effect. If it does, a reexamination is ordered that proceeds along the same lines as an initial examination.<sup>3</sup>

The effect of either form of resolution of a request for supplemental examination is to effectively eliminate nearly all related claims of inequitable conduct; inequitable conduct being the judicially crafted doctrine that serves the policy purpose of protecting the integrity of the patent system. This is so

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1. Leahy-Smith America Invents Act, Pub. L. No. 112-29, 125 Stat. 284, 325 (2011) (to be codified at 35 U.S.C. § 257).

2. *Id.* (to be codified at 35 U.S.C. § 257(a)).

3. *Id.* (to be codified at 35 U.S.C. § 257(b)).

even when there is no reexamination of the patent. In the words of the AIA: “A patent shall not be held unenforceable on the basis of conduct relating to information that had not been considered, was inadequately considered, or was incorrect in a prior examination of the patent if the information was considered, reconsidered, or corrected during a supplemental examination of the patent.”<sup>4</sup>

New § 257 is thus a patent amnesty program. It encourages patent applicants to use any number of strategies that would never have been countenanced under pre-AIA law to obtain patents, and it offers to cure all but the most extreme through filing a supplemental examination request. For example, potential descriptions of a claimed invention in a prior art printed publication, or possible instances of prior patenting of the claimed invention by another,<sup>5</sup> that are known to a patent applicant, and that might have a high probability of barring a patent or limiting claim scope, may not be disclosed during the initial examination. Similarly, sales and public uses<sup>6</sup> that are known to a patent applicant and that may have a high probability of barring the patentability of a claimed invention may be withheld at least until supplemental examination if the applicant likes (and perhaps longer depending on an applicant’s risk tolerance). Even the use of false data to obtain the patent in the initial examination can be exonerated by filing a supplemental examination request, which by the statutorily required process can be expected to produce a director’s certificate within three months.<sup>7</sup>

The AIA offers two exceptions to this broad patent amnesty program. But the exceptions are largely within the control of the patentee, and thus are not likely to offer an effective counterincentive to the incentives provided by the supplemental examination process. First, the prohibition against finding patents unenforceable when the patentee seeks the shelter of supplemental examination does not apply when the allegation of inequitable conduct is pled with particularity in a civil action, if that pleading occurs before a patentee has filed a supplemental examination request concerning the information that forms the basis of the patent challenger’s allegation.<sup>8</sup> As uncovering most forms of inequitable conduct requires a searching analysis of the candor of the applicant’s behavior during a secret *ex parte* process, it seems improbable that patent challengers will learn of relevant conduct before discovery. A similar analysis applies to the related exception that arises when the allegation is pled in the context of so-called “paragraph iv” notices, special procedural devices that are relevant to only a small fraction of patents. In the overwhelming number of cases that likely means that patentees are in control and can choose to immunize themselves before a patent challenger ever has an opportunity to learn about the conduct.

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4. *Id.* (to be codified at 35 U.S.C. § 257(c)(1)).

5. *See* 35 U.S.C. § 102(a) (2006).

6. *See id.* § 102(b).

7. AIA § 12 (to be codified at 35 U.S.C. § 257(a)).

8. *Id.* (to be codified at 35 U.S.C. § 257(c)(2)(A)).

A second exception involves actions commenced by the patent holder under § 281 of the Patent Act or actions brought under section 337(a) of the Tariff Act, which prohibits unfair methods of competition and other unfair acts in the importation of goods into the United States. This exception differs from the first exception in that, for the patent holder to immunize its conduct, it needs the director's certificate and any reexamination ordered therein to be completed before bringing an action.<sup>9</sup> Here, too, because the decision to commence an action ordinarily lies in the hands of the patent holder, the patent holder will usually have control over its exposure to claims that could render its patent unenforceable.

As a catchall for the most extreme cases of misconduct, Congress also added a mechanism to allow for criminal prosecution. Section 257(e) states that if the Director of the patent office becomes aware during the supplemental examination or reexamination "that a material fraud on the Office may have been committed in connection with the patent that is the subject of the supplemental examination . . . the Director shall also refer the matter to the Attorney General for such further action as the Attorney General may deem appropriate."<sup>10</sup>

While certainly intimidating, this provision is likely to be of no serious consequence, absent a significant policy change by the Director. The Director has long had the power to encourage the prosecution of those who engage in material misconduct,<sup>11</sup> but it is rarely used. There are probably very good reasons why, as the extreme conduct that seems to be contemplated by the provision is likely to be uncommon. In addition, assuming that the main avenue of criminal proceedings would be through 18 U.S.C. § 1001, which establishes liability for false statements in matters involving the government of the United States, probably few who commit material fraud need to worry. The statute of limitations is five years from the false statement, so—barring a creative interpretation of the running of the statutory period—statements made to effect material fraud may simply be too old by the time the patent gets scrutinized (if it ever does) in a supplemental examination or reexamination proceeding.

Under the AIA, therefore, a patent owner may now obtain a patent through the ex parte examination process despite conduct that would be abhorrent under traditional understandings of a patent applicant's obligation to be equitable in dealing with the public. The owner may then immunize the conduct using supplemental examination should litigation appear on the horizon (or terminally disclaim or covenant not to sue at a time convenient to the patentee). In practical terms, the supplemental examination mechanism thus provides amnesty to issued patents that were obtained inequitably. It additionally provides amnesty to any other patent that, if it had been ex-

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9. *Id.* (to be codified at 35 U.S.C. § 257(c)(2)(B)).

10. *Id.* (to be codified at 35 U.S.C. § 257(e)).

11. *See* United States v. Markham, 537 F.2d 187 (5th Cir. 1976) (affirming a conviction under 18 U.S.C. § 1001 based on the act of attempting to conceal from the patent office the true inventor of the process for which a patent was sought).

amined in view of information relevant to the patentability of the claimed invention reasonably available during the initial examination, might not have issued at all, or if it had issued, might have issued with claims of significantly narrower scope. Moreover, the patent amnesty program is administered using a patent office administrative function—supplemental examination. It is therefore subject to well recognized externalities that cause the patent office to have a more favorable view of patentability than courts, competitors, and the public.<sup>12</sup>

## II. WHAT'S WRONG WITH PATENT AMNESTY?

In a nutshell, the problem with patent amnesty is that it jeopardizes American innovation, job creation, and economic competitiveness. As this Part explains, it does so by potentially increasing the cost of competition, making research and development more expensive, and making market entry more difficult and risky. At the same time, and somewhat perversely, it creates an environment in which organizing capital around a patent or modestly sized patent portfolio might make less sense than it did before the AIA.

### *A. Patent Law and Information*

It is dogma that the public obtains its optimum benefit from the patent system when the patent law is properly applied. Put slightly differently, the benefits and competitive costs of the patent system are believed to be most efficiently balanced when patents issue for inventions that satisfy the law's requirements for patenting and when patents do not issue for "inventions" that do not satisfy the requirements.

Implicit in this dogma is a theoretical purity that is not matched by reality. It is therefore equally dogmatic that the idea of a patent system in which patentability decisions are always correctly made—by either the patent office or by the courts—is a complete and utter fantasy. A primary explanation for this is the cost of information. It would be expensive beyond imagination to operate a patent system that correctly determines the patentability of all claims with which it is presented, and in any event, the benefits of such a patent system would be overwhelmed by the costs of its administration.

Taken together, these dogmas help reveal that an important purpose of patent law is to improve the efficiency of information gathering, recordation, and application—tasks necessary for an accurate assessment of patentability. The patent law seeks to increase efficiency in various ways, one of which is by allocating the cost of providing information. Typically the law seeks to place this cost on the party for whom the relevant information is least expensive. Further, the law requires that the party burdened with the cost provide only such information as it can obtain and disclose at a reasonable cost. Thus, for example, the law requires patent applicants to disclose a spe-

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12. R. Polk Wagner, *Understanding Patent-Quality Mechanisms*, 157 U. PA. L. REV. 2135, 2153 (2009).

cification of their invention that describes the invention in such a way that a person of skill in the art—not any person off the street—is enabled to make and use it. The applicant is also required to include claims defining the exclusive rights sought. The applicant is not, however, required to take on the cost of making the words of the claim “clear and unequivocal;” instead the law requires only that the applicant choose words that are not “insolubly ambiguous.”<sup>13</sup>

Besides the kinds of information described above, the law also demands that patent applicants bear the reasonable costs of providing information that relates to issues of novelty and obviousness. The underlying philosophy is the same: patent applicants are more knowledgeable about their inventions, and how those inventions situate in the body of existing knowledge, than a patent examiner or subsequent reader could ever hope to be. Moreover, there is some information pertinent to the patentability of the claims an applicant seeks that may be uniquely within the control of the patent applicant. The cost of contributing such information to the patent creation process might be very low or even trivial for a patent applicant, but it may in practical terms be infinitely expensive for the patent office to provide during the *ex parte* process of patent prosecution.

Thus where the cost of having the patent applicant provide information is relatively low, and particularly where the cost to the patent office of providing information is prohibitively high, the law allocates the cost of the information to the party seeking the exclusive rights. Two examples of this can be found in patent office regulations.

In the first example, rule 1.105 authorizes the patent office to request information “*reasonably necessary to properly examine or treat the matter [of a pending or abandoned application].*”<sup>14</sup> Moreover, under this rule it is a complete reply to the patent office’s request for information for an applicant to state that the information requested is “unknown to or is not readily available to the party or parties from which it was requested.”

The second example is rule 1.56, which allocates a portion of the cost of providing information material to patentability (e.g., prior art patents and printed publications, and information about sales and public uses before the critical date) to the patent applicant. This allocation of cost to patent applicants is mitigated by at least three features of the law. First, the law has attempted to improve the certainty of the application of the statutory bars,<sup>15</sup> and has sought predictability in the determination of what is or is not a printed publication.<sup>16</sup> Thus, patent applicants can more cheaply determine what needs to be disclosed. Second, the applicant is relieved of the cost of providing this sort of information if the office has already associated the relevant information with the patent application. Third, the applicant is additionally relieved of the

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13. *Exxon Research & Eng'g Co. v. United States*, 265 F.3d 1371, 1375 (Fed. Cir. 2001).

14. 37 C.F.R. § 1.105 (2011) (emphasis added).

15. *Pfaff v. Wells*, 525 U.S. 55, 66 (1998).

16. *Accord In Re Klopfenstein*, 380 F.3d 1345, 1349 (Fed. Cir. 2004).

cost of providing this sort of information if the information is unknown to the applicant. Thus, for example, assuming it is unaware of the information, an applicant does not have to take on the cost of providing information about obscure theses in foreign university libraries, or third party sales, or public uses of the invention claimed in a patent application. Indeed, it is another patent law dogma that patent applicants have no duty to spend any resources searching for information material to patentability.<sup>17</sup>

### B. A Balancing Act

The prior Section explains that an important purpose of the patent laws is to improve the efficiency of information in the patent system. This Section elaborates on why.

One way of understanding the information functions of the patent laws is to recognize that they balance the cost of administering “correct” *ex ante* decisions about patentability, against the benefits the public is thought to receive from giving patents and the costs to competition that flow from granting patents. As noted above, patent law seeks to achieve this balance by being savvy about where it gets information. Normally, this means seeking information from the cheapest cost provider, and ordinarily that is the patent applicant. Historically it has also generally meant requiring the patent applicant to contribute information before granting a patent. There is a very important reason for this.

Conventional estimates hold that while perhaps less than 1 percent of all patents are ever litigated, as many as 5 to 29 percent of patents may be licensed. An additional fraction of patents work an economic impact, although they are never litigated or licensed, by deterring market entry and competition.<sup>18</sup> When summed with litigated and licensed patents, this amounts to perhaps half of all issued patents. Accordingly, the overwhelming majority of patents that are monetized, are capable of being monetized, or have a “monetizing” effect (because they deter competition and improve the pricing position of a patentee) are *not* litigated patents.

The empirical “reality” anticipated by these estimates suggests that the patent office plays a crucial role in ensuring that the balance of the benefits and costs imposed by the patent system tip in the proper direction. This is because the patent office is the agency that determines whether patents should issue and makes this determination by attempting to properly apply the law of patentability. Because the economic impact of most patents will be due to the patent office’s decision to issue the patent, and not a court’s decision to uphold the patent’s claims, how “right enough” the patent office is in its decisionmaking is important.

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17. See *Am. Hoist & Derrick Co. v. Sowa & Sons, Inc.*, 725 F.2d 1350, 1362 (Fed. Cir. 1984).

18. See Ted Sichelman, *Commercializing Patents*, 62 *STAN L. REV.* 341, 362–63 & n.121 (2010).

This observation puts into sharp relief the role that patent laws play in improving the efficiency of information in the patent system. They have been built to impose reasonable costs on patent applicants early in the patent granting process because the legal determination most important to the economic significance of most patents is the one the patent office makes.

### *C. The Problem of Patent Amnesty*

Once we realize that for most patents that will impact the marketplace the only formal legal determination ever made about whether they satisfy the requirements for patentability is made by the patent office, we can begin to appreciate the jeopardy of the AIA's patent amnesty program. The risk is that the incentives of the program will reduce the quality of information available to the patent office when it makes its decision to issue a patent. The patent office will be "right enough" marginally less often than before, and more low-quality patents, defined as those that do not meet the requirements for patentability, should be expected to issue.

When securing a patent, applicants have options. A first is to take on the cost of disclosing information relevant to patentability during the initial examination. The marginal consequences of the first option can be expected to include a longer, more costly prosecution and narrower claims allowed. A second option is not to take on the cost of disclosing information relevant to patentability in the initial examination. The marginal consequences of the second option can be expected to include a less expensive, shorter prosecution and broader claims allowed. One of the chief reasons for the difference in consequences between the two options is that applicants who choose the second option shift the cost of information about patentability and patent scope from themselves to higher cost providers like the patent office, courts, and competitors.

The clearest tool of pre-AIA patent law to discourage option two behavior was the inequitable conduct doctrine, which imposed a low probability but high cost sanction on applicants that were caught electing option two. The AIA has largely obviated the influence of inequitable conduct. Specifically, under the AIA, patent applicants may choose not to disclose information relevant to patentability of which they are aware during the initial examination, obtain a patent that perhaps should not have issued, and then, by disclosing the information at a later time if strategy dictates, play a "get out of jail free card" as Representative Waxman put it in his statement to Congress on June 24, 2011. To be sure, there remains the possibility of a criminal sanction, but as we observed above there is reason to be skeptical of the effectiveness of this provision.

The AIA thus reduces the risk in electing option two, and thereby makes this strategy more valuable to the patent applicant. If after monetizing its broader claims for a time using the mechanisms by which most patents are monetized (licensing, deterrence of competition, and vague threats to enforce), the patentee comes upon the competitor who prefers to take the matter to court, the patentee can preemptively invoke supplemental exami-

nation. This technique offers a triple benefit. First, it allows a *patentee* to cleanse a *patent applicant's* conduct undertaken during the initial examination, and in so doing remove a theory for challenging the patent—this step strengthens the patent by improving the probability that it will not be determined unenforceable. Second, it allows a patentee to put more challenging art into the file before litigation and thus benefit from patent office externalities that favor the allowance of claims; and, by getting the art in the file, it allows the patentee to benefit from judicial norms that express a reluctance to invalidate claims based on art that the patent office considered in connection with the patent. Finally, no competitor will know which path a patent applicant chose, so the ability of a competitor to respond strategically is compromised. In addition, if competitors cannot distinguish option one from option two patents, then option one patentees are unlikely to get the benefit of the cost incurred by choosing option one.

It therefore seems to us that the AIA presents a very real risk of increasing the number of low-quality patents. The relationship between low-quality patents and competition are well established, and we see no reason to repeat in depth what is well known. The literature has made clear that low-quality patents can make competition more expensive because competitors may have to pay supramarginal cost prices due to patents that never should have issued. Similarly the literature has made clear that low-quality patents can increase the cost of research and development because future innovators may be forced to pay rents on patents that never should have issued. Finally, the literature is clear that low-quality patents can make market entry more difficult and expensive because new entrants may (1) have to pay rents for patents that never should have issued, or (2) be forced to defend nuisance suits—to the tune of four to five million dollars for middle of the road cases—based on patents that never should have issued.

And while the literature is less clear on this, it seem logical that low-quality patents could reduce capital investment based on a patent or a small number of patents. This is so because in a system with supplemental examination all patents should be perceived as marginally less likely to be successfully enforced—because they are marginally more likely to be perceived as invalid—unless and until they have gone through supplemental examination. Thus, the value of a patent, or a small portfolio, such as a small business or a start-up might own, is worth marginally less in a world of supplemental examination than it is in a world without. Investors should accordingly be willing to pay less for it.

The same is, however, less likely to be true for firms that hold large portfolios of patents. While their portfolios may be marginally less valuable when comprised mostly of patents obtained after supplemental examination goes into effect, as long as the portfolios remain large, there should be an adequate probability of enforcement of relevant patents. Thus, large firms should be able to get cheaper patents and should be able to enforce more of them. The law might thus have the effect of preferring large firms over small businesses and start-ups trying to enter a market.

## CONCLUSION

The purpose of this Essay is to reveal and discuss the AIA's imposition of a mechanism for supplemental examination. It must be recognized that the analysis provided here relates to the marginal effects of a supplemental examination system. It is not a complete analysis of the benefits and costs of the AIA. Thus, policymakers might conclude that other provisions of the AIA (perhaps, for example, prior user rights) provide benefits that meet or exceed the risk of the costs illuminated in this analysis. Similarly, if they were to consider it, policymakers might be able to conclude that the economic costs implicated by an increase in low-quality patents are outweighed by a decrease in the costs of administering patent examination. Because the innovation risks of the supplemental examination mechanism implicate some very basic patent economics, however, it is somewhat surprising that these concerns have not received more attention from policymakers and patent scholars. We hope that the analysis provided in this Essay can contribute to a more comprehensive analysis of the AIA, which will no doubt be forthcoming as policymakers and scholars begin to better understand its implications.