NEW ORDER IN PATENT PIRACY

The US government relentlessly hammers foreign piracy of underground groups who replicate patented technology from established companies. When larger corporations replicate technology from individuals or smaller companies, however, there is a different response. In recent years we have seen a weakening of the US intellectual property (IP) system which leans in favor or the large corporations and away from independent inventors. Although these changes may enable the specific technology being challenged to reach the market faster, it diminishes the quality of the patent system and discourages inventors from filing US patents.

The patent system has evolved to encourage innovation and guarantee inventors that their discoveries are secure. The US has proudly show-cased its long history of ingenuity. Thomas Edison had over 1000 patents, the most notable of which include the electric light bulb and the phonograph. The Wright Brothers changed global exploration by introducing the airplane. The development of transistors in the AT&T Bell Labs enabled us to develop a huge array of electronic devices. More recently, the US has filed significant patents in the field of biotechnology, for genetic engineering to produce biologically functional molecular chimeras; for producing the first genetically altered mouse; and for DNA testing by introducing the polymerase chain reaction. With the recent interest in healthcare reforms, it is anticipated that the field of biotechnology will generate many more of inventions in the upcoming years.

Issue

When a patent is filed, all details must be disclosed; but what prevents a competitor from copying the invention? Infringers should compensate for damages from past infringement, a permanent injunction should bar future infringement, and treble damages should be awarded for willful infringement. In recent years, however, these have not always been granted. In eBay Inc. v. MercExchange L.L.C.,¹ although it was shown that eBay willfully infringed on MercExchange's patent, there was no injunction granted as MercExchange could not demonstrate intention to market their patent. In In re. Seagate Technologies, L.L.C.,² the court tightened its requirements on what it means to willfully infringe, making it more difficult to obtain treble damages. Furthermore, there have been cases which describe either the infringer, or the licensee, challenging the patentee. In KSR International Co. v. Teleflex, Inc.,³ Teleflex's patent was invalidated after a change of the obviousness doctrine which left a more flexible approach taken to describe what makes an invention non-obvious. In MedImmune, Inc. v. Genentech, Inc.,⁴ MedImmune licensed out Genentech technology, which became its number one selling drug, and then took Genentech to court and challenged the validity of their patent. These examples demonstrate the flexibility that the patent system has adopted, favouring larger companies who are able to spend more time and money on legal battles.

Reaction

To make the struggle more difficult for independent inventors and entrepreneurs, many have become labelled as "patent trolls"; a term commonly used to describe someone who patents an invention for the sole purpose of holding the rights and then attacking infringers. This method of business has caused widespread alarm as it is feared that this will prevent technology from entering the market.

It is demonstrated in multiple cases, including the \$500 million lawsuit of *TechSearch L.L.C. v. Intel Corp.*,⁵ when "patent troll" was originally coined, that the term is often used as a justification for infringement by larger firms. TechSearch had purchased technology from the bankrupted International Meta Systems, Inc. (IMS). Intel had essentially prevented the development of IMS technology by threatening that any companies (e.g., Compaq) who partnered with competing technology would have their chip allocations cut. Simultaneous to the *TechSearch L.L.C. v. Intel Corp.*, trial, Maelen Limited stepped forward to support IMS trustee, stating that TechSearch paid less than was reasonably equivalently for the asset and offered to cover their costs and make a minimum bid of \$325,000 for the patent if the estate

recovered it. It was later discovered that Maelen Ltd was a Cayman Islands branch of Intel, set up solely to recover the patent from IMS.⁶ Intel tried to defend their actions by claiming that TechSearch were just "patent trolls."

The term was further popularized during the *NTP*, *Inc. v. Research in Motion Ltd.*,⁷ trial. NTP has become known as one of the most notorious "trolls" after challenging RIM and the technology behind their BlackBerry. NTP had approached RIM in January 2000, during the infancy of the BlackBerry, notifying them of their infringement and offering a licensing agreement. Despite ignoring the letter from NTP, RIM sued several infringing competitors during 2001 and 2002. NTP brought RIM to court, where RIM claimed that the technology was available before NTP's patent and proceeded to offer a demonstration of pre-existing technology capable of the same function. It was found that the demonstration was tampered with and because of this willful "fraudulent" activity, the damages were increased from \$33 million plus legal fees and royalties to \$53 million plus legal fees and royalties.⁸ RIM attempted to appeal this which caused the dispute to continue. An injunction of the BlackBerry was considered, but a settlement was eventually reached and NTP was granted \$612.5 million.⁹

The co-founder of NTP, Mr. Campana, did not originally set out to develop a patent-holding company. In the early 1970s he had set up Electronic Services Associates (ESA) which developed the early form of pagers. Campana's strengths, lying in inventing rather than business, meant that ESA struggled and went bankrupt. The company was relaunched in the late 1970s and showed potential in the 1980s with a national pager system. Despite marketing attempts including presenting at computer shows and approaching larger companies for support, Campana was forced to shut down his company in 1991, over half a million dollars in debt. In 1992 Campana partnered with lawyer Mr. Stout and formed NTP as a means to protect his patents.⁸

Looking back on many "patent troll" cases, it appears that inventors do not necessarily set out to capitalize on infringement cases, but they have not had the opportunity or financial support to develop their ideas. Even Peter Detkin, the former Intel vice-president and assistant general counsel, who coined the term "patent troll," states that it is, "too often hurled carelessly."¹⁰ Many patentees are better at inventing than business and marketing and if the US government wishes to develop its resources to the fullest potential, it needs to recognize where strengths lie and develop a more efficient and streamlined method for taking ideas to market.

Key Message

Given the current economic climate and the rising unemployment rates, the US government cannot afford to discourage innovation; one of its most valuable economic resources. With the aging baby-boomer population and increasing healthcare costs, emphasis is being placed on new developments in this area. Current problems with the medical system include the expenses associated with in-hospital care, inefficient and over-generalized treatments, and the limited options for untreatable diseases. President Obama's proposal to invest \$633.8 billion over the next 10 years in healthcare reforms includes introducing an information technology system for improved efficiency of care, encouraging Medicare home health, reducing hospital readmission rates, and investing in cancer research as well as research comparing the effectiveness of medical treatments.¹¹ The restructuring of the budget under President Obama's reforms suggests that there will be a surge of significant inventions generated in this area in upcoming years.

More accurate and efficient methods to monitor and diagnose patients are fundamental to healthcare improvements. Attention has shifted to homecare technology and specifically telemedicine which offers cheaper, more effective and real-time monitoring. For example, cellular phones have been developed which enable diabetes patients to easily and regularly self-monitor their glucose levels providing more efficient readings and consequently a higher quality of care, while also reducing the costs associated with monitoring patients in a hospital. Telehealth is still primarily driven by entrepreneurs rather than larger corporations. These entrepreneurs need to know that they will have the exclusive rights to develop their ideas and disclosing their technology will not mean losing it or potentially having to face long and expensive legal battles.

Pharmacogenomics, molecule specifics and stem cell technology are also medical fields which are predicted to generate a significant number of patents. The US have traditionally been at the forefront of biology-focused advancements, but the ban on human embryonic stem cell research was recognized by foreign countries as their opportunity to get a head-start in the stem cell race. This has helped to set the fast pace of stem cell research internationally and has left US researchers eager to compete now that the ban is lifted. Many top scientists left the US when they found that they did not have the support to conduct their research and the same will happen if they feel that the patent system is not robust enough to support their findings.

The field of biotechnology is growing at a rapid rate and it is anticipated that there will be an influx of inventions in the upcoming years. University researchers, entrepreneurs and independent inventors will be critical to meet these goals; however advancements could be stifled if these people feel insecure about the strength of the patent system.

Business Options

The current patent system allows for fluctuation between cases. There is no guarantee of a permanent injunction for infringers, there is no guarantee of treble damages for willful infringers, and the full compensation cannot always be expected. Whether the patent has been licensed or not, there is also the possibility that a larger firm, with more finances to cover lengthy legal trials, will attempt to invalidate the patent. If inventors feel that they cannot have faith in the patent system, they will begin to seek other ways to protect their ideas.

The most concrete method of security is to keep trade-secrets. When technology is not disclosed, however, it becomes difficult to gain investment funding. Obtaining a patent gives the investors faith in the quality of the product and the added security of having the exclusive rights. If patents are not filed, the level of investment in young ventures will also decrease and innovation will develop solely from larger corporations whose research and development divisions often focus on improving their current technology rather than developing new technology.

The other option that inventors have is to move their technology to another country which has different patent regulations. Although, similar to Canadian-based RIM, foreign companies are still able to be tried in US courts if they are conducting business in the US. This could have further implications on other international companies who may attempt to circumvent business in the US to avoid having to abide by two sets of laws. If this is the case, then undoubtedly people from the US will begin resorting to piracy and illegal knock-offs from other countries.

Recommendations & Conclusions

The fundamental problem is that there is a divide between the people who have the patents and the people who want to compete but do not have the patents. To ensure that long-term leadership in science and technology is not sacrificed, the patent system needs to be strictly defined and robust. If inventors are better suited to inventing rather than marketing, new methods of bringing ideas-to-market should be developed. Licensing companies are often looked down upon as they are considered "trolls", however these companies can help to protect and market technology. Specifically with respect to healthcare technology, there is a global race to compete in this emerging market and for the US to maintain its strong-hold in the upcoming years it will need to guarantee inventors that their patents are secure and encourage them to disclose their findings and continue to drive the competition.

References

- ¹ 57 U.S. 388 (2006).
- ² 497 F.3d 1360, 1371 (Fed. Cir. 2007).
- ³ 127 S. Ct. 1727 (2007).
- ⁴ 549 U.S. 118 (2007).
- ⁵ 286 F.3d 1360 (Fed. Cir. 2002).

⁶ Raymond P. Niro, Who is Really Undermining the Patent System – "Patent Trolls" or Congress?, 6 J.MARSHALL REV. INTELL. PROP. L. 185 (2007).

- ⁷ 418 F.3d 1282, 1326 (Fed. Cir. 2005).
- ⁸ Barrie McKenna, Paul Waldie and Simon Avery. *Patently Absurd: The inside story of RIM's wireless war*. The Globe and Mail (2006, February 21).

⁹ Roma Luciw. *RIM, NTP settle patent war*. The Globe and Mail (2006, March 3).

¹⁰ Peter N. Detkin, *Leveling the Patent Playing Field*, 6 J. MARSHALL REV. INTELL. PROP. L. 636 (2007).

¹¹ **A New Era of Responsibility, Renewing America's Promise** (February 2009), available at http://www.gpoaccess.gov/USbudget/fy10/pdf/fy10-newera.pdf> (pp. 67-70).