

Effects of National Security Concerns on the Patent Process

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Table of Contents

Table of Contents.....	1
Table of Figures.....	1
Table of Tables.....	1
Introduction.....	2
History.....	2
The World Wars.....	2
Post War Legislation.....	4
Section 181.....	4
Section 182.....	4
Section 183.....	4
Section 184.....	4
Section 185.....	4
Section 186.....	5
Section 187.....	5
Section 188.....	5
The 1990s.....	5
Current Crisis.....	6
Recommendations.....	8
Appendix A.....	10

Table of Figures

Figure 1 Secrecy Orders in effect from 2001 to the present day.....	6
Figure 2 Net change in patent Secrecy Orders was negative from 1992 to 2001.....	8

Table of Tables

Table 1 Data extrapolated from FOIA Request No. 05-007.....	10
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Introduction

In the 2004 fiscal year, United States patent office received applications for 376,810 patents¹. In that same fiscal year, 124 new secrecy orders were imposed bringing the total secrecy orders affect to numbering 4,885 and the end of the 2,004 fiscal year². While this minority composes less than a tenth of a percent of the patent applications in that year, it is a special interest we cannot afford to ignore. The protection of the rights of the individual and the rights of the inventor constitutes a serious matter of civil liberties that must not be overlooked simply because of the overshadowing numbers.

There is much that can be said about a patent secrecy orders and their facts on freedom of speech and freedom of information transfer.

History

The World Wars

Concerns about invention secrecy and national security date back to the First World War. In an effort to address the government's concerns, Congress passed the act of October 6, 1917. This act granted the Commissioner of Patents the right to order an invention be kept secret for the duration of the war given that the publication of that information "might be detrimental to the public safety or defense or might assist the enemy or endanger successful prosecution of the war."³ This power was accompanied by two additional stipulations, first with a penalties to be imposed on inventors did not Obey the secrecy orders, primarily being the inability to ever receive new a United States

patent for their invention. Inventors were also provided with an incentive to comply, providing that if they did in fact receive the patent after the secrecy order had been lifted and had complied fully with the secrecy order they would be able to sue for compensation in the United States Court of Claims.⁴ By the end of first world war the following year this act essentially became obsolete, however in 1940 in preparation for the United States impending entry into World War Two, Congress past the Act of July 1, 1940. The sectors of virtual carbon copy of its world war one predecessor the room only exception being read it was set with it to your duration of his than amended upon the united states official entry into the war to be the duration of the hostilities. Both these Acts were intended exclusively for the purpose of protecting the United States strategic national interests during a time of war, and they explicitly expired when that war was over. While their structure essentially provided a framework for our modern invention secrecy policies, it is that one key difference that sets them apart, these acts were applicable exclusively in times of war. This is not to say that there were not certain technical oversights, which allowed these acts to be exploited. All previous invention secrecy acts were repealed in 1951 with the passing of Invention Secrecy Act of 1951. a combination of the fact that this new invention secrecy Act included far broader powers, and the technicality the treaties were not signed ending World War Two officially until 1952, allowed for a considerable minority of wartime inventions (nearly 11%)⁴ to remain under secrecy orders even after conflict had ended in the second world war.

Post War Legislation

The Invention Secrecy Act of 1951 created sections 181 through 188, entitled *Secrecy of Certain Inventions and Filing Application in Foreign Countries*, of the 35 US Code Chapter 17.⁵ Section 181 deals with the conditions set forth by a secrecy order, namely that the order shall last one year, or in the event of war, for the duration of the hostilities plus one year, or in the time of a national emergency (as declared by the president), for the duration of the emergency plus six months, all orders being renewable.

Section 181 also sets out that the applicant may appeal the issuance of a secrecy order to the Secretary of Commerce.

Section 182 asserts that in the event of an unauthorized disclosure of the contents of a secret patent, the inventor forfeits all rights to a patent to which he might have otherwise been entitled.

Section 183 outlines the conditions for an inventor's right to compensation, which is valid for six years from the date of issue on the patent, and includes compensation for government use, and for damages caused by the secrecy order.

Section 184 states that any applicant must not file in a foreign country for six months after filing in the United States, to allow proper review of the invention for its relevance to national security.

Section 185 applies the same penalties for foreign filing as for an unauthorized disclosure (as outlined in section 182)

Section 186 describes the penalties for any violation of the secrecy order, which are up to \$10,000 or two years in prison, or both.

Section 187 exempts officers and agents of the United States from these prohibitions.

Section 188 lists the persons who may wield secrecy orders, which include the Atomic Energy Commission, Secretary of Defense, Secretary of Commerce, and the heads of any government agencies the President designates.

The 1990s

In 1991, the USPTO issued a set of documents detailing how they were employing the current patent secrecy order program, which set forth two major additions to the existing code.^{6,7} It specified three secrecy order types, the first of which was for unclassified inventions that are non-exportable for security reasons. The second type applies to patents that involve classified technical data, which cannot be disclosed. The third type is applied to all patents which need to be withheld with a secrecy order, but do not explicitly fall under either type one or type two. The second addition was the explanation of an Atomic energy review process, where all applications relating to atomic energy are subject to an examination by the Department of Energy.

In 1998, congress updated the code regarding patents, trademarks and copyright in Title 37.⁸ The section dealing with secrecy orders, Title 37 Chapter I Part 5, is essentially a more detailed restatement of the original 1951 code, with no changes in the spirit of the law.

Current Crisis

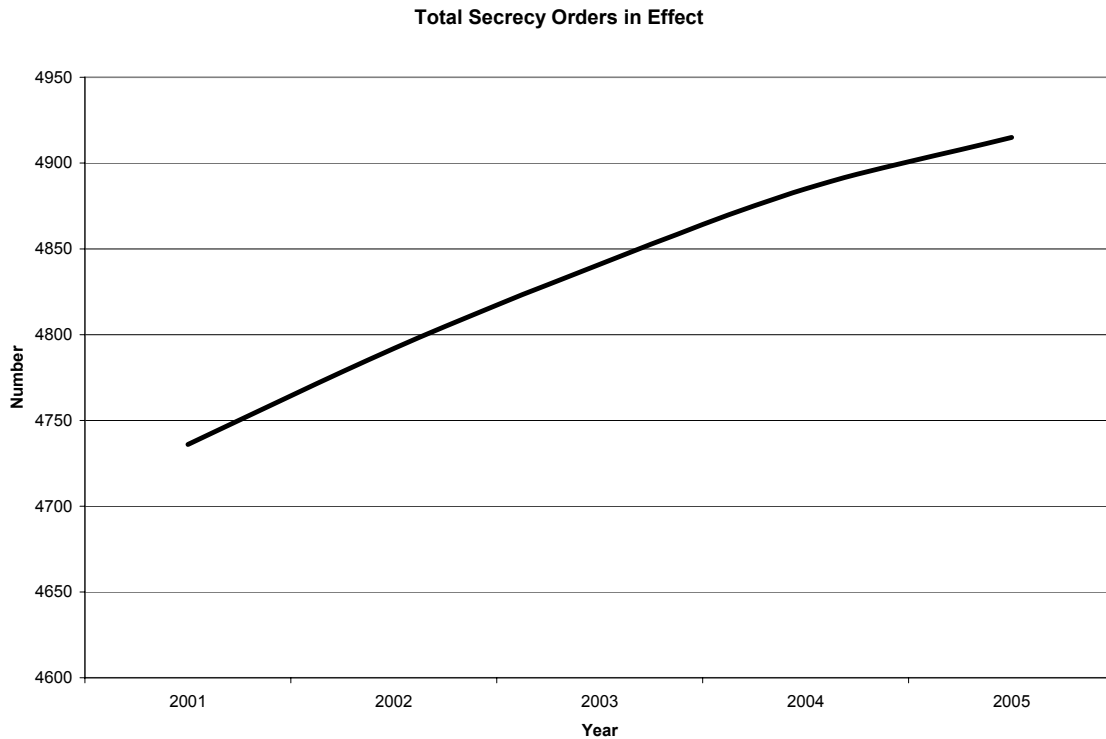


Figure 1 Secrecy Orders in effect from 2001 to the present day

As you can clearly see in Figure 1, since 2001 the number of patents secrecy orders has grown steadily. In the last five years the number of patent secrecy orders rescinded has plummeted to less than half of what it was the before September 11th. Further more, upon the examination of data going back to late 1980's, as show in Figure 2, it becomes apparent that the 2002 fiscal year marked a drastic change in the interpretation of the Invention Secrecy Act. For most of the 1990s, the number of active secrecy orders was on the decline; however, that trend was broken in late 2001.

Nowhere in the USA PATRIOT Act⁹ is the word patent even mentioned, however it is without a doubt that the events of September 11, 2001 and the following legislation

have changed the manner in which the United States government and the U.S. patent office treat patent secrecy orders.

This is a major issue of concern, for on the one hand is essential that we rewrite these rules concerning the issuance of patents of secrecy orders, however it is doubtful that a restructuring of these orders in the current political climate would truly serve to protect the rights of the inventors filing for the protection of their inventions. The last time these policies were seriously updated was in 1951 with the Invention Secrecy Act. This was a time of great fear in the United States of America with the Cold War and Soviet Union presenting a serious threat in nearly all technical fields. Today we are similarly faced with serious threats from the beyond our national borders; however, the nature of these threats is not such that patent secrecy orders can truly serve to protect us from them. We cannot give in to the fear mongering of today's military industrial complex and furthermore, we must not allow them to abuse the patent system for their own agendas at the expense of America's inventors.

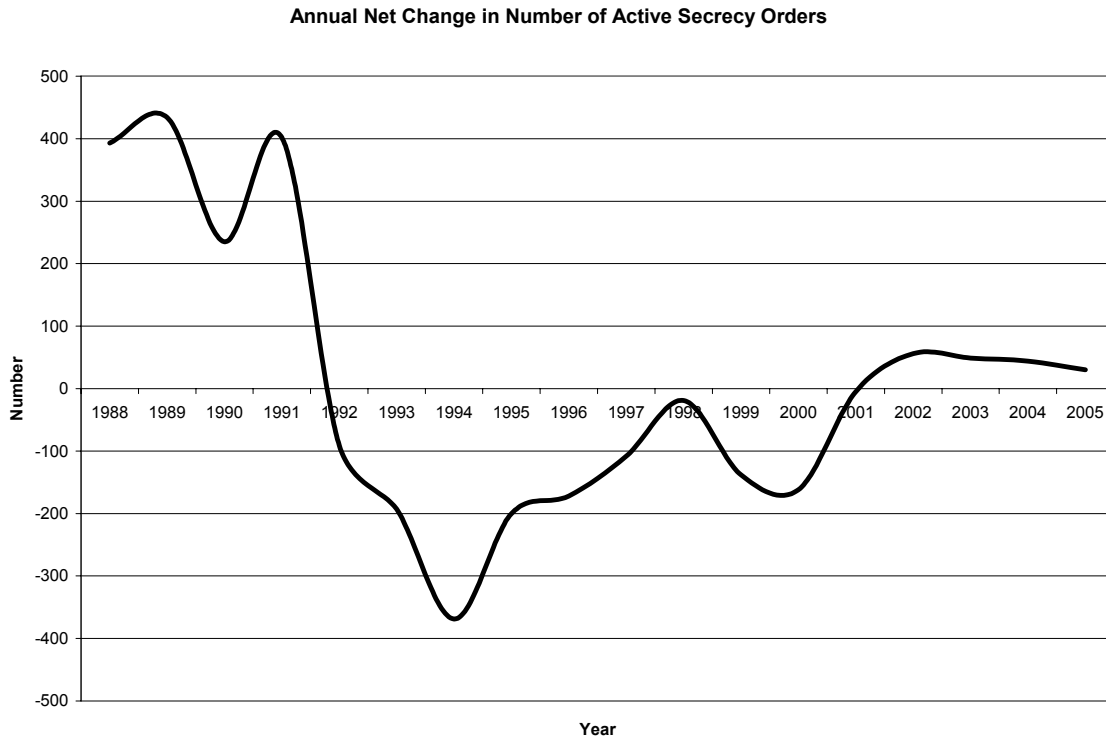


Figure 2 Net change in patent Secrecy Orders was negative from 1992 to 2001

Recommendations

As unlikely as the correction of the secrecy order predicament may be with new legislation in the current milieu, it is something that needs to be tackled before the problem gets worse. It is extremely discouraging that with the thousands of patents currently under secrecy orders, preliminary searches uncovered only two cases in the past 60 years where inventors have sought compensation.^{10,11} Perhaps this is because the Department of Commerce and the other relevant government agencies have been offering generous settlements, but this seems unlikely.

It is my suggestion that a review board be formed, much like the review boards in congress that keep tabs on the operations of government agencies. This board would be

analogous to for example the house subcommittee on Intelligence. Instead of being staffed by US representatives with security clearances, it would instead consist of an assortment of representatives of the involved parties. The board would include three basic components, a third of the council would be composed of delegates from each agency which has been delegated the authority to request secrecy orders. A second third would be independent inventors as appointed by the National Society of Inventors, or a similar trade organization. The final third would be divided in half, with the first half consisting of patent examiners and the second half being professionals who have passed the patent bar and practice in the USPTO. This committee would meet regularly to review new and contested patent applications to ensure a fair and even hand is being applied across the board. This group would also serve as a mediator in any contested secrecy orders and the negotiation of inventor compensation.

Regardless of what action we take to ensure the revision of patent secrecy practices, it is essential that something be done to protect the rights of America's inventors. As we stare into a future of semi-war, the elimination of peacetime secrecy orders is unlikely to disappear. It is essential that if we are to allow these limitations to be placed on inventors that we keep close tabs on exactly what is being kept secret.

Appendix A

Year	New Secrecy Orders	Secrecy Orders Rescinded	Total Secrecy Orders in Effect	Net Increase
1988	630	237	5122	393
1989	847	413	5556	434
1990	731	496	5791	235
1991	774	372	6193	402
1992	452	543	6102	-91
1993	297	490	5909	-193
1994	205	574	5540	-369
1995	124	324	5340	-200
1996	105	277	5168	-172
1997	102	210	5060	-108
1998	151	170	5041	-19
1999	72	210	4903	-138
2000	83	245	4741	-162
2001	83	88	4736	-5
2002	139	83	4792	56
2003	136	87	4841	49
2004	124	80	4885	44
2005	106	76	4915	30

Table 1 Data extrapolated from FOIA Request No. 05-007

¹ Performance and Accountability Report: Fiscal Year 2004.

<http://www.uspto.gov/web/offices/com/annual/2004/2004annualreport.pdf>, United States Patent and Trademark Office, pg 117.

² “Freedom of Information Act Request No. 05-007” <http://www.fas.org/sgp/othergov/invention/stats.pdf>, October 22, 2004, pg. 3.

³ Act of Oct. 6, 1917, Ch. 95, 40 Stat. 394 (1917).

⁴ Lee, Sabing H. “Protecting the Private Inventor Under the Peacetime Provisions of the Invention Secrecy Act” *Berkley Technology Law Journal*. Vol. 12 Issue 2. Fall 1997.

⁵ 35 US CODE CHAPTER 17, <http://www.fas.org/sgp/othergov/invention/35usc17.html>, 1951.

⁶ “The Secrecy Order Program in the United States Patent & Trademark Office”,

<http://www.fas.org/sgp/othergov/invention/program.html>, June 27, 1991.

⁷ “Administration of the Invention Secrecy Act in the Patent and Trademark Office”,

<http://www.fas.org/sgp/othergov/invention/admin.html>, 1991.

⁸ “Secrecy of Certain Inventions”, <http://www.fas.org/sgp/othergov/invention/37cfr5.html>, Code of Federal Regulations, July 1, 1998.

⁹ “Uniting and Strengthening America by Providing Appropriate Tools Required to Intercept and Obstruct Terrorism Act”, <http://www.epic.org/privacy/terrorism/hr3162.html>, HR 3162 RDS, 107th Congress, 1st Session, October 4, 2001.

¹⁰ Richard J. Weiss, Stephen Solender, Arthur Michael Solender, and Elsie Solender v. United States of America, Civil Action No. 00-12549-WGY, 146 F. Supp. 2d 113; 2001.

¹¹ Farrand Optical Co., v. United States of America, 175 F. Supp. 203; 1959.