

No. 04-1350

IN THE
Supreme Court of the United States

KSR INTERNATIONAL CO.,

Petitioner,

v.

TELEFLEX INC. and
TECHNOLOGY HOLDING CO.,

Respondents.

**ON WRIT OF CERTIORARI TO THE
UNITED STATES COURT OF APPEALS
FOR THE FEDERAL CIRCUIT**

**BRIEF FOR AMICUS CURIAE NEW YORK INTELLECTUAL
PROPERTY LAW ASSOCIATION IN
SUPPORT OF RESPONDENTS**

MARYLEE JENKINS
President

*New York Intellectual
Property Law Association*

ARENT FOX PLLC
1675 Broadway Avenue
New York, NY 10019
(212) 484-3900

ROCHELLE K. SEIDE
Counsel of Record

JOHN K. HSU
ARENT FOX PLLC
1675 Broadway Avenue
New York, NY 10019
(212) 484-3900

Counsel for Amicus Curiae

204023



COUNSEL PRESS
(800) 274-3321 • (800) 359-6859

TABLE OF CONTENTS

	<i>Page</i>
Statement of Interest of Amicus Curiae	1
Question Presented	2
Position of Amicus Regarding Question Presented . . .	2
Summary of the Argument	2
Argument	4
I. Congress Enacted 35 U.S.C. § 103 To Provide An Objective And Reliable Standard For Determining Obviousness	4
A. Before Enactment of Section 103, the Difficulty of Determining Obviousness Resulted in an Uneven Application of the Law	4
B. Congress Enacted Section 103 to Codify the Principle of <i>Hotchkiss</i> and to Provide an Objective Standard to Test Obviousness	9
II. In <i>Graham</i> , This Court Set Forth A Stable Framework For Determining Obviousness Under Section 103, But Did Not Fully Address How To Avoid The Use Of Hindsight Analysis	12
A. In <i>Graham</i> , the Court Used Its Implicit Authority to Further Implement Standards for Section 103	12

Contents

	<i>Page</i>
B. This Court Recognized in <i>Graham</i> and its Antecedents that the Potential for Hindsight Presented a Major Problem for the Non-Obviousness Analysis	14
III. The Federal Circuit’s Teaching-Suggestion-Motivation Test Effectively Resolves Hindsight Problems	16
A. The Test Furthers the Goals of Section 103 and Works Well Within the Framework of <i>Graham</i>	16
B. Absent the Teaching-Suggestion-Motivation Test, Many Valuable Inventions Would Be Susceptible to Invalidation by Judicial Hindsight, or May Be Found Unpatentable in the First Place	18
C. The Teaching-Suggestion-Motivation Test Allows for Flexibility	19
D. The Teaching-Suggestion-Motivation Test Protects Inventors From Arbitrary and Erroneous Decisions by Examiners and the Courts	22
Conclusion	24

TABLE OF CITED AUTHORITIES

Page

CASES

<i>ACS Hosp. Sys., Inc. v. Montefiore Hosp.</i> , 732 F.2d 1572 (Fed. Cir. 1984)	16
<i>Alza Corp. v. Mylan Labs., Inc.</i> , No. 06-1019 (Fed. Cir. Sept. 6, 2006)	17, 20, 21
<i>C. & A. Potts & Co. v. Creager</i> , 155 U.S. 597 (1895)	7
<i>Cross Med. Prod., Inc. v. Medtronic Sofamor Danek, Inc.</i> , 424 F.3d 1293 (Fed. Cir. 2005)	20
<i>Cuno Eng'g Corp. v. Automatic Devices Corp.</i> , 314 U.S. 84 (1941)	7
<i>Diamond Rubber Co. v. Consol. Rubber Tire Co.</i> , 220 U.S. 428 (1911)	14, 15
<i>Dystar Textilfargen GMBH & Co. Deutschland KG v. C.H. Patrick Co.</i> , No. 06-1088 (Fed. Cir. Oct. 3, 2006)	20, 21, 23
<i>Graham v. John Deere Co.</i> , 383 U.S. 1 (1966)	<i>passim</i>
<i>Great Atl. & Pac. Tea Co. v. Supermarket Equip. Corp.</i> , 340 U.S. 147 (1950)	7, 8, 10
<i>Hotchkiss v. Greenwood</i> , 52 U.S. (11 How.) 248 (1850)	<i>passim</i>

Cited Authorities

	<i>Page</i>
<i>In re Ahlert</i> , 424 F.2d 1088 (C.C.P.A. 1970)	21
<i>In re Bergel</i> , 292 F.2d 955 (C.C.P.A. 1961)	16
<i>In re Fridolph</i> , 30 C.C.P.A. 939 (1943)	16
<i>In re Imperato</i> , 486 F.2d 585 (C.C.P.A. 1973)	16
<i>In re Kahn</i> , 441 F.3d 977 (Fed. Cir. 2006)	20
<i>In re Napier</i> , 55 F.3d 610 (Fed. Cir. 1995)	20
<i>Interconnect Planning Corp. v. Feil</i> , 774 F.2d 1132 (Fed. Cir. 1985)	16
<i>Jungersen v. Ostby & Barton Co.</i> , 335 U.S. 560 (1949)	7
<i>Loom Co. v. Higgins</i> , 105 U.S. 580 (1881)	14
<i>Marconi Wireless Tel. Co. of Am. v. United States</i> , 320 U.S. 1 (1943)	15, 18
<i>McClain v. Ortmyer</i> , 141 U.S. 419 (1891)	5
<i>McGinley v. Franklin Sports, Inc.</i> , 262 F.3d 1339 (Fed. Cir. 2001)	17
<i>Monroe Auto Equip. Co. v. Heckethorn Mfg. & Supply Co.</i> , 332 F.2d 406 (1964)	14
<i>Nat'l Steel Car, Ltd. v. Canadian Pac. Ry., Ltd.</i> , 357 F.3d 1319 (Fed. Cir. 2004)	20

Cited Authorities

	<i>Page</i>
<i>Reckendorfer v. Faber</i> , 92 U.S. 347 (1875)	7
<i>Smith v. Whitman Saddle Co.</i> , 148 U.S. 674 (1893) . .	7
<i>Washburn & Moen Manuf'g Co. v. Beat'em All Barbed-Wire Co.</i> (The Barbed Wire Case), 143 U.S. 275 (1892)	18, 19
<i>W.L. Gore & Assocs., Inc. v. Garlock, Inc.</i> , 721 F.2d 1540 (Fed. Cir. 1983)	16

STATUTES

35 U.S.C. § 103	<i>passim</i>
---------------------------	---------------

LEGISLATIVE MATERIALS

H. Rep. No. 1923 (May 12, 1952), <i>as reprinted in</i> 1952 U.S.C.C.A.N. 2394	11
National Patent Planning Comm., Report, H.R. Doc. No. 239 (June 18, 1943)	9
S. Rep. No. 1979 (June 27, 1952), <i>as reprinted in</i> 1952 U.S.C.C.A.N. 2394	11
Subcomm. on Domestic and Int'l Scientific Planning and Analysis of the House Comm. on Science and Tech., 94th Cong., Background Materials on Government Patent Policies: Reports of Committees, Commissions, and Major Studies xi (Comm. Print 1976)	8

*Cited Authorities**Page***LEGAL SCHOLARSHIP**

- Myron Cohen, *Nonobviousness and the Circuit Courts of Appeals-Twenty-Five Years in Review*, in NONOBVIOUSNESS—THE ULTIMATE CONDITION OF PATENTABILITY (John F. Witherspoon ed., BNA Books 1980) 12
- Christopher Anthony Cotropia, *Nonobviousness and the Federal Circuit: An Empirical Analysis of Recent Case Law* 82 NOTRE DAME L. REV. (forthcoming Feb. 2007) (manuscript available at http://papers.ssrn.com/so13/papers.cfm?abstract_id=933192) 21
- P.J. Federico, *Commentary on the New Patent Act*, reprinted in 75 J. Pat. & Trademark Off. Soc’y 1614 (1993) 11, 12
- Edward Gregg, *Tracing the Concept of “Patentable Invention,”* 13 VILL. L. REV. 98 (1967) 7
- Irving Kayton, *Nonobviousness of the Novel Invention* – 35 U.S.C. § 103, in PATENT PREPARATION AND PROSECUTION PRACTICE (Irving Kayton ed., Patent Resources Institute 1977), reprinted in NONOBVIOUSNESS—THE ULTIMATE CONDITION OF PATENTABILITY (John F. Witherspoon ed., BNA Books 1980) 5

Cited Authorities

	<i>Page</i>
Giles S. Rich, <i>Congressional Intent—Or, Who Wrote the Patent Act of 1952?</i> in PATENT PROCUREMENT AND EXPLOITATION (BNA Inc. 1963), <i>reprinted in</i> NONOBVIOUSNESS—THE ULTIMATE CONDITION OF PATENTABILITY (John F. Witherspoon ed., BNA Books 1980)	7, 9, 10
Giles S. Rich, <i>Laying the Ghost of the “Invention” Requirement</i> , 1 Am. Pat. L. Ass’n Q.J. 26 (1972), <i>reprinted in</i> 14 Fed. Cir. B.J. 163 (2004)	4, 5, 6, 11, 12
Giles S. Rich, <i>Why and How Section 103 Came to Be</i> , in NONOBVIOUSNESS—THE ULTIMATE CONDITION OF PATENTABILITY (John F. Witherspoon ed., BNA Books 1980)	8
George M. Sirilla & Giles S. Rich, <i>35 U.S.C. . . . §103: From Hotchkiss to Hand to Rich, the Obvious Patent Law Hall-of-Famers</i> , 32 J. Marshall L. Rev. 437 (1999)	6, 7
MISCELLANEOUS	
Brief for the United States as Amicus Curiae Supporting Petitioner at 16, <i>KSR Int’l Co. v. Teleflex, Inc.</i> , No. 04-1350 (U.S. Aug. 2006)	18, 19, 22, 23
Federal Trade Commission, <i>To Promote Innovation: The Proper Balance of Competition and Patent Law and Policy</i> , Ch. 4 (October 2003)	16, 22

Cited Authorities

	<i>Page</i>
Judge Giles S. Rich, Remarks at the 75th Annual Dinner of the NYIPLA (May 1997), <i>in</i> 37 NYIPLA BULL. 5, May/June 1997	11
Press Release, U.S. Patent and Trademark Office, Patent & Trademark Office Mourns Death of Judge Giles S. Rich (June 10, 1999), <i>available at</i> http://www.uspto.gov/web/offices/com/speeches/99-14.htm	5
Symposium on Patents, Summary of Proceedings, Section of Patents, Trademark and Copyright Law (Chicago: American Bar Center, 1962)	9
U.S. Patent & Trademark Office, <i>Manual of Patent Examining Procedure</i> , § 2144.03 (8th ed. rev. 3d 2006)	21
U.S. Patent and Trademark Office, U.S. Patent Statistics Chart Calendar Years 1963-2005 (2006), <i>available at</i> http://www.uspto.gov/go/taf/us_stat.htm	22
John Langdon, HORSES, OXEN AND TECHNOLOGICAL INNOVATION: THE USE OF DRAUGHT ANIMALS IN ENGLISH FARMING FROM 1066 TO 1500 (Cambridge University Press 1986)	19
James V. DeLong, <i>Mind Over Matter</i> , REASON (June 1998), <i>available at</i> http://reason.com/9806/fe.delong.shtml	19

STATEMENT OF INTEREST OF AMICUS CURIAE

This brief amicus curiae is submitted in support of Respondents by the New York Intellectual Property Law Association (the “NYIPLA” or the “Association”), a professional association of more than 1,300 attorneys whose interests and practices lie in the area of patent, copyright, trademark, trade secret, and other intellectual property law.¹

NYIPLA members include in-house attorneys working for businesses that own, enforce and challenge patents as well as attorneys in private practice who represent both patent owners and accused infringers. NYIPLA members frequently engage in patent licensing matters, representing both patent licensors and licensees.

NYIPLA members represent both plaintiffs and defendants in infringement litigation and also regularly participate in proceedings before the United States Patent and Trademark Office (“PTO”), including representation of applicants for patents and parties to interferences. A substantial percentage of NYIPLA members participate actively in patent litigation.

NYIPLA has a particularly strong interest in the meaning and application of 35 U.S.C. § 103 because a past president of the Association, Judge Giles S. Rich, had a significant involvement in the drafting of the statute. In particular, Judge Rich co-authored Section 103 and spoke on behalf of the Association before Congress and the legal community to educate and champion the purpose and application of the Section.

1. Pursuant to Sup. Ct. R. 37.6, the NYIPLA and its counsel represent that they have authored this brief in whole, and that no person or entity other than the Association and its counsel have made a monetary contribution to the preparation or submission of this brief. The parties have consented to the filing of this brief in papers docketed with this Court on July 19 and July 31, 2006.

QUESTION PRESENTED

Whether the Federal Circuit erred in holding that a claimed invention cannot be held “obvious,” and thus unpatentable under 35 U.S.C. § 103(a), in the absence of some proven “teaching, suggestion or motivation” that would have led a person of ordinary skill in the art to combine the relevant prior art teachings in the manner claimed”?

POSITION OF AMICUS REGARDING QUESTION PRESENTED

The Association respectfully submits that the Federal Circuit’s teaching-suggestion-motivation test has provided an objective, predictable, and reliable means of applying Section 103 and preventing hindsight analysis from plaguing the obviousness determination. The test is consistent with this Court’s precedent and has served the patent system well. Consequently, the Federal Circuit did not err in its decision below.

SUMMARY OF THE ARGUMENT

Over a century and a half ago, this Court recognized in *Hotchkiss v. Greenwood* the necessity of a non-obviousness requirement in our patent system. Both judges and patent examiners, however, had difficulty applying the requirement, which resulted in an uneven application of the law. Even worse, judges and examiners often arbitrarily determined patentability based on subjective standards.

In response, Congress enacted 35 U.S.C. § 103 to codify the non-obviousness requirement and provide an objective standard for determining obviousness. Subsequently, this Court provided, in *Graham v. John Deere Co.*, a robust framework for deciding the obviousness issue. This Court,

however, did not fully address how to prevent judges and patent examiners from allowing hindsight to cloud their evaluation of obviousness. To fill that void, the Federal Circuit, building upon the precedents of the Court of Customs and Patent Appeals (“CCPA”), developed the teaching-suggestion-motivation test. With this test, the Federal Circuit ensures that there is some basis, either explicit or implicit, in the prior art for an evaluator’s finding that the invention is obvious and prevents the unjustified use of hindsight to invalidate patent claims.

The teaching-suggestion-motivation test serves this purpose well. The test is flexible and allows judges and patent examiners to reject obvious inventions while protecting inventors from the invalidation of their patent claims based on nothing more than the inventor’s own disclosure of his invention. Absent the protection of the teaching-suggestion-motivation test, many truly inspired inventions are liable to be found obvious based solely on the disclosures contained in their own applications. Because the case at bar is entirely consistent with this Court’s jurisprudence and the statutory framework, the decision in favor of Respondents should be upheld.

ARGUMENT**I. CONGRESS ENACTED 35 U.S.C. § 103 TO PROVIDE AN OBJECTIVE AND RELIABLE STANDARD FOR DETERMINING OBVIOUSNESS****A. Before Enactment of Section 103, the Difficulty of Determining Obviousness Resulted in an Uneven Application of the Law**

In *Hotchkiss v. Greenwood*, this Court firmly grafted onto the patent law a requirement that an invention, in addition to being novel and useful, had to be non-obvious to warrant patent protection. 52 U.S. (11 How.) 248 (1850). Although clearly establishing a non-obviousness requirement, the Court did not set forth a clear standard to determine whether an invention met the requirement. As a result, subsequent courts struggled to implement this requirement, relying on varying tests, or at worse, no test at all. See Giles S. Rich, *Laying the Ghost of the “Invention” Requirement*, 1 Am. Pat. L. Ass’n Q.J. 26 (1972), reprinted in 14 Fed. Cir. B.J. 163, 166 (2004) [hereinafter *Laying the Ghost*]. Indeed, this Court later noted the difficulty judges faced by stating that:

[t]o say that the act of invention is the production of something new and useful does not solve the difficulty of giving an accurate definition, since the question of what is new, as distinguished from that which is a colorable variation of what is old, is usually the very question in issue. To say that it involves an operation of the intellect, is a product of intuition, or of something akin to genius, as distinguished from mere mechanical skill, draws one somewhat nearer to an appreciation of the true distinction, but it does not adequately express the idea. The truth is, the word [invention] cannot be

defined in such manner as to afford any substantial aid in determining whether a particular device involves an exercise of the inventive faculty or not.

McClain v. Ortmayer, 141 U.S. 419, 426-27 (1891).

To implement the *Hotchkiss* requirement, courts proceeded to develop an amorphous “standard of invention” or “requirement for invention” to evaluate obviousness which, unfortunately, served only as a label that gave no insight to the analysis. *See Laying the Ghost*, at 166. This standard led to a circular reasoning in which an invention became patentable if the court found that it resulted from an “inventive act.” In fact, many in the patent bar noted that the use of the term “invention” in the obviousness analysis imparted a “mystical, indefinable, and unknowable quality or quantity” to the analysis. Irving Kayton, *Nonobviousness of the Novel Invention*—35 U.S.C. § 103, in *PATENT PREPARATION AND PROSECUTION PRACTICE* (Irving Kayton ed., Patent Resources Institute 1977), *reprinted in NONOBVIOUSNESS—THE ULTIMATE CONDITION OF PATENTABILITY*, at 2:101, 2:102 (John F. Witherspoon ed., BNA Books 1980).

Judge Giles S. Rich,² a co-author of Section 103, understood well the problems that arose from the vague nature of the standard and the state of the law. Judge Rich found that the standard of invention left no yardstick as to how to determine if something was patentable and noted that

2. Judge Rich, a former president of the Association, left an impressive legacy in patent law and was recognized by the PTO as “the single most important figure in twentieth century intellectual property law.” Press Release, U.S. Patent and Trademark Office, Patent & Trademark Office Mourns Death of Judge Giles S. Rich (June 10, 1999), *available at* <http://www.uspto.gov/web/offices/com/speeches/99-14.htm>. See Section IB of this brief for a description of Judge Rich and the Association’s contribution to the drafting of Section 103.

the ambiguous test predictably led to a “confusing state of the law of patent validity that followed in the wake of *Hotchkiss*.” George M. Sirilla & Giles S. Rich, 35 *U.S.C. . . . §103: From Hotchkiss to Hand to Rich, the Obvious Patent Law Hall-of-Famers*, 32 *J. Marshall L. Rev.* 437, 461 (1999) [hereinafter *Hall-of-Famers*]; see also *Laying the Ghost* at 166-67.

With nothing more than the vague notion of “invention” to guide them, the courts, and the PTO relying on court decisions, often determined patentability in an arbitrary fashion based on the personal views of judges and examiners as to what should be patentable. *Laying the Ghost* at 167. Judge Rich noted that:

[w]hat it all came down to, in final analysis, in the Patent Office or in court, was that if the Office or a judge was persuaded that an invention was *patentable* (after hearing all the praise by the owners and all the denigration by the opposition) then it *was* an “invention.” How that decision was reached was rarely revealed. Everyone realized it was subjective.

Id. In turn, courts applied the law unevenly due to the lack of a predictable and objective standard.

This Court also contributed to the difficulty in formulating a reliable test to determine whether an invention was non-obvious, and thus patentable. See *Hall-of-Famers*, at 468 (noting that the Court’s decisions from 1850 to 1891 “were at best inconsistent, and at worst confusing, with respect to any methodology for determining whether or not a patented device amounted to a truly patentable ‘invention’” and from 1892 to 1930, the Court used various tests for determining the existence of “invention” with mixed results).

On the one hand, the Court sometimes relied on a severe requirement of “inventive genius” or “flash of genius.” *See, e.g., Cuno Eng’g Corp. v. Automatic Devices Corp.*, 314 U.S. 84, 91 (1941); *Reckendorfer v. Faber*, 92 U.S. 347, 357 (1875). On the other hand, the Court began applying the now well-known secondary considerations of non-obviousness without any analysis of “inventive genius.” *See, e.g., C. & A. Potts & Co. v. Creager*, 155 U.S. 597, 608-10 (1895); *Smith v. Whitman Saddle Co.*, 148 U.S. 674, 681-82 (1893).

Moreover, from 1930 to 1952 the Court appeared to have a harshly critical view of patents and, in particular, patents directed to mechanical devices comprised of combinations of known elements. *See Hall-of-Famers*, at 473 (“[T]he Supreme Court embarked on a period of what can only be termed disfavor of, if not outright hostility toward, patents.”); Edward Gregg, *Tracing the Concept of “Patentable Invention,”* 13 Vill. L. Rev. 98 (1967). Members of the patent bar, accordingly, feared that the patent system could be gutted absent intervention. Giles S. Rich, *Congressional Intent—Or, Who Wrote the Patent Act of 1952?* in *PATENT PROCUREMENT AND EXPLOITATION* (BNA Inc. 1963), *reprinted in* *NONOBVIOUSNESS—THE ULTIMATE CONDITION OF PATENTABILITY*, at 1:3 (John F. Witherspoon ed., BNA Books 1980) [hereinafter *Congressional Intent*]. (“The practical value of patents was being downgraded” and “courts were, on the average, applying a too stringent test for ‘invention.’”). Likewise, this Court’s hostility towards patents caused Justice Jackson to lament that “the only patent that is valid is one which this Court has not been able to get its hands on.” *Jungersen v. Ostby & Barton Co.*, 335 U.S. 560, 572 (1949) (Jackson, J., dissenting).

In *Great Atlantic & Pacific Tea Co. v. Supermarket Equipment Corp.*, 340 U.S. 147 (1950), Justice Jackson, writing for the Court, one year after the above lament,

invalidated a patent on a cashier's counter that had been "widely adopted and successfully used." *Id.* at 149. In reaching its decision, the Court asserted that the lower courts had misapplied the "standard of invention" for inventions that comprised combinations of old elements. *Id.* at 154. Moreover, the Court indicated that the proper standard took into account a synergistic effect of the elements. *Id.* at 152. ("The conjunction or concert of known elements must contribute something; only when the whole in some way exceeds the sum of its parts is the accumulation of old devices patentable.").

Prompted by the seriousness of the problem facing the patent system due to the vague "standard of invention," the National Patent Planning Commission ("NPPC")³ voiced its concerns in reports that were widely circulated amongst the patent bar at that time. *See* Giles S. Rich, *Why and How Section 103 Came to Be*, in *NONOBVIOUSNESS—THE ULTIMATE CONDITION OF PATENTABILITY*, at 1:201 (John F. Witherspoon ed., BNA Books 1980). Particularly, the NPPC found:

One of the greatest technical weaknesses of the patent system is the lack of a definitive yardstick as to what is invention. To provide such a yardstick and to assure that the various courts of law and the Patent Office shall use the same standards, several changes are suggested. It is proposed that Congress shall declare a national standard whereby patentability of an invention

3. President Roosevelt appointed the Commission by Executive Order in 1941 to plan and utilize in times of peace the nation's expanded industrial capacity developed during war. Subcomm. on Domestic and Int'l Scientific Planning and Analysis of the House Comm. on Science and Tech., 94th Cong., Background Materials on Government Patent Policies: Reports of Committees, Commissions, and Major Studies xi (Comm. Print 1976).

shall be determined by the objective test as to its advancement of the arts and sciences.

National Patent Planning Comm., Report, H.R. Doc. No. 239 at 6, 10 (June 18, 1943).

B. Congress Enacted Section 103 to Codify the Principle of *Hotchkiss* and to Provide an Objective Standard to Test Obviousness

In view of the difficulty that courts and the PTO faced when determining obviousness, Congress, with the guidance of patent practitioners from private practice, industry, and the PTO, enacted the Patent Act of 1952.⁴ In enacting Section 103, Congress set forth a succinct directive which could serve as a strong foundation to build an objective standard for assessing obviousness.

Understanding the need for a comprehensive revision of the patent laws to address issues such as non-obviousness, the House Subcommittee on Patents, Trademarks, and Copyrights assigned the task of drafting a patent bill to P.J. Federico, the then Examiner-in-Chief at the PTO. *Congressional Intent*, at 1:4. Mr. Federico collaborated with a select group of patent practitioners, including Judge Rich,

4. Representative Shepard J. Crumpacker, a member of the House Subcommittee on Patents during the enactment of the Patent Act, emphasized that “when the courts, in seeking to interpret the language of the Act, go through the ritual of seeking to ascertain the ‘intent of Congress’ in adopting same, they would do well to look to the writings of these men—Federico [the Examiner-in-Chief of the PTO], Rich, Harris [counsel for the Subcommittee], and the others—as they, far more than any member of the House or Senate, knew and understood what was intended by the language used.” See Symposium on Patents, Summary of Proceedings, Section of Patents, Trademark and Copyright Law (Chicago: American Bar Center, 1962).

Paul Rose, who was the American Patent Law Association's chairman of the Practice Committee, and Henry Ashton, who was the chairman of the National Council of Patent Law Associations. *Id.* at 1:5-1:6.

Notably, Judge Rich, the Association's President during the years 1950 and 1951, was instrumental in the creation and drafting of Section 103. *Congressional Intent* at 1:5-1:10. Judge Rich, along with Mr. Rose, served as the two-man Drafting Committee for the Patent Act of 1952 formed by the National Council of Patent Law Associations. *Id.* at 1:6. The Drafting Committee was tasked with revising the preliminary draft of the proposed patent legislation consistent with the consensus views of patent practitioners. *Id.* Accordingly, the Drafting Committee reviewed hundreds of comments from interested associations and individuals and after distilling the information and exercising their own judgment, proposed revisions to the preliminary draft. *Id.* Judge Rich and Mr. Rose subsequently worked closely with Mr. Federico and Mr. Ashton to submit a revised draft of the proposed legislation. *Id.* In turn, the four worked closely with Subcommittee on Patents of the Committee on the Judiciary of the House of Representatives to enact the statute. *Id.* at 1:7-1:10.

Not coincidentally, those four key drafters of the 1952 Patent Act met the day after the Supreme Court issued its decision in the *Great Atlantic & Pacific Tea Co.* case. *Congressional Intent* at 1:7, 1:8. As acknowledged by Judge Rich, the case clinched their decision to include Section 103 in the bill because the Court invalidated the patent-in-suit based on the very problem plaguing the patent system, i.e., the vague "standard of invention." *Id.* at 1:8; *Great Atl. & Pac. Tea Co.*, 340 U.S. at 154 ("[A] standard of invention appears to have been used that is less exacting than that required where a combination is made up of old components.

It is on this ground that the judgment below is reversed.”). The drafters of the Patent Act included Section 103 “to enact a statutory substitute that would make more sense, would apply to all kinds of inventions, would restrict the courts in their arbitrary, *a priori* judgments on patentability, and that, above all, would serve as a uniform *standard of patentability*.” *Laying the Ghost* at 169-70.⁵

Accordingly, Congress included Section 103 in the Patent Act for uniformity and definiteness of the application of the non-obvious analysis. S. Rep. No. 1979 (June 27, 1952), *as reprinted in* 1952 U.S.C.C.A.N. 2394, 2400; H. Rep. No. 1923 (May 12, 1952), *as reprinted in* 1952 U.S.C.C.A.N. 2394, 2400 (“[t]his section [103] is added to the statute for uniformity and definiteness”), with the intention that Section 103 “should have a stabilizing effect and minimize great departures which have appeared in some cases.” *Id.* See also P.J. Federico, *Commentary on the New Patent Act*, *reprinted in* 75 J. Pat. & Trademark Off. Soc’y 161, 184 (1993).

Unfortunately, the courts were slow to incorporate the new standard for obviousness and instead, continued in an arbitrary and uneven application of the law. See *Laying the*

5. Judge Rich recollected on the important role the Association played in the enactment of Section 103 by stating that Section 103

replaced the vague and undefinable judge-made law requiring the presence of “invention.” . . . Again it was this association [NYIPLA] through what was then called the Committee on Patent Law and Practice of the then NYPLA, on which I was servicing, that conceived the idea of replacing the requirement of “invention” with a defined nonobviousness provision and putting it in the statute, where there was then nothing whatever on that judge-made requirement.

Judge Giles S. Rich, Remarks at the 75th Annual Dinner of the NYIPLA (May 1997), *in* 37 NYIPLA BULL. 5, May/June 1997.

Ghost, at 164; see also Myron Cohen, *Nonobviousness and the Circuit Courts of Appeals-Twenty-Five Years in Review*, in *NONOBVIOUSNESS—THE ULTIMATE CONDITION OF PATENTABILITY*, at 3:1 (John F. Witherspoon ed., BNA Books 1980). Likewise, the PTO still relied on the vague “standard of invention.” See *Laying the Ghost*, at 172-73 (noting that when Judge Rich came to the CCPA in 1956, he found that four years after the enactment of Section 103, the CCPA continued to ignore the statute, with the court deciding cases with rejected claims based on a lack of invention, and the solicitor of the PTO still arguing on that basis). Section 103 might have been doomed to the same uncertainties that prevailed before its enactment due to judicial and administrative inertia. This Court, however, set forth a stable legal framework for deciding obviousness challenges, consistent with Section 103, with its decision in *Graham v. John Deere Co.*, 383 U.S. 1 (1966).

II. IN *GRAHAM*, THIS COURT SET FORTH A STABLE FRAMEWORK FOR DETERMINING OBVIOUSNESS UNDER SECTION 103, BUT DID NOT FULLY ADDRESS HOW TO AVOID THE USE OF HINDSIGHT ANALYSIS

A. In *Graham*, the Court Used Its Implicit Authority to Further Implement Standards for Section 103

Congress recognized that the proper application of Section 103 would require further development either by Congress or the courts. See P.J. Federico, *Commentary on the New Patent Act*, reprinted in 75 J. Pat. & Trademark Off. Soc’y 161, 184 (1993):

The problem of what is obvious and hence not patentable is still of necessity one of judgment. The statute does not purport to categorize the

particular criteria according to which the judgment is to be exercised, in fact, the Revision Note under section 103 indicates that the section would also serve as a basis for the addition at a later time of some criteria which may be worked out.

In turn, this Court took a major step forward in *Graham* by setting forth a stable framework to determine obviousness under Section 103. The courts and the PTO are to analyze nonobviousness of an invention using what have become known as the “*Graham* Factors”: (1) evaluation of the scope and content of the prior art; (2) differences between the prior art and the claims at issue; (3) the level of ordinary skill in the pertinent art; and (4) secondary considerations, such as commercial success, long felt but unsolved needs, and the failure of others. *Graham*, 383 U.S. at 17-18.

When arriving at this framework, the Court recognized that Congress intended Section 103 to codify the law of obviousness first articulated in *Hotchkiss*. *Graham*, 383 U.S. at 16 (“We conclude that the section was intended merely as a codification of judicial precedents embracing the *Hotchkiss* condition. . . .”). The Court, however, could not have been endorsing the vague and uncertain jurisprudence that had existed before enactment of Section 103, as described above. Instead, the Court recognized Congress’s clear intent to codify the necessity of a non-obviousness standard based on objective criteria. Indeed, the Court set forth an excellent, although incomplete, means of effectuating the aims of Section 103.

B. This Court Recognized in *Graham* and its Antecedents that the Potential for Hindsight Presented a Major Problem for the Non-Obviousness Analysis

In *Graham*, the Court recognized the difficulty of resisting the use of hindsight in evaluating patentability of an invention and patent validity. *Graham*, 383 U.S. at 36 (quoting *Monroe Auto Equip. Co. v. Heckethorn Mfg. & Supply Co.*, 332 F.2d 406, 412 (1964) (Secondary considerations “may also serve to ‘guard against slipping into use of hindsight,’ and to resist the temptation to read into the prior art the teachings of the invention in issue.”)). Indeed, this is not the first time the Court recognized the problem and, in fact, it has long realized the temptation and peril of using hindsight. For example, as early as 1881, the Court noted the impermissible use of hindsight by rejecting the temptation to resort to it when it upheld the patent-in-suit in *Loom Co. v. Higgins*, 105 U.S. 580 (1881), noting:

At this point we are constrained to say that we cannot yield our assent to the argument, that the combination of the different parts or elements for attaining the object in view was so obvious as to merit no title to invention. Now that it has succeeded, it may seem very plain to any one that he could have done it as well.

Id. at 591.

In 1911, the Court again criticized the use of hindsight when it also upheld the patent-in-suit in *Diamond Rubber Co. v. Consolidated Rubber Tire Co.*, 220 U.S. 428 (1911), finding:

Knowledge after the event is always easy, and problems once solved present no difficulties,

indeed, may be represented as never having had any, and expert witnesses may be brought forward to show that the new thing which seemed to have eluded the search of the world was always ready at hand and easy to be seen by a merely skillful attention.

Id. at 435.

Notably, in *Marconi Wireless Telegraph Co. of America v. United States*, 320 U.S. 1 (1943), Justice Frankfurter specifically warned against the unjustified use of hindsight to invalidate a patent, stating:

Reconstruction by hindsight, making obvious something that was not at all obvious to superior minds until someone pointed it out,—this is too often a tempting exercise for astute minds. The result is to remove the opportunity of obtaining what Congress has seen fit to make available. . . . To find in 1943 that what Marconi did really did not promote the progress of science because it had been anticipated is more than a mirage of hindsight.

Id. at 62-63 (Frankfurter, J., dissenting).

Thus in *Graham*, the Court continued to voice its concern with the impermissible use of hindsight but did not fully develop safeguards against such improper use. The Court provided a robust framework for assessing obviousness and an admonition that hindsight should be kept from affecting the obviousness analysis. The teaching-suggestion-motivation test developed and used by the Federal Circuit (and its predecessor court, the CCPA) has furthered this Court's directive against resorting to impermissible hindsight analysis in determining whether an invention is non-obvious and thus worthy of patent protection.

III. THE FEDERAL CIRCUIT'S TEACHING-SUGGESTION-MOTIVATION TEST EFFECTIVELY RESOLVES HINDSIGHT PROBLEMS

A. The Test Furthers the Goals of Section 103 and Works Well Within the Framework of *Graham*

While the Court in *Graham* provided the guiding principles for the application of Section 103, the Federal Circuit developed the teaching-suggestion-motivation test to fill the gap not fully addressed in *Graham*.⁶ The Federal Circuit developed the test to ensure that the patent system would have a reliable, objective test to protect inventors from a bias or temptation to use hindsight. In turn, the Federal Circuit has instilled an objectivity and predictability to the obviousness analysis.⁷ At its core, the teaching-suggestion-motivation test is premised on the notion that the obviousness analysis should be properly grounded on some concrete reason other than hindsight. *See Interconnect Planning Corp. v. Feil*, 774 F.2d 1132, 1143 (Fed. Cir. 1985) (citing *ACS Hosp. Sys., Inc. v. Montefiore Hosp.*, 732 F.2d 1572, 1577 n.14 (Fed. Cir. 1984)) (“When prior art references require

6. There is no single case in which the Federal Circuit announced the teaching-suggestion-motivation test. Rather the test has developed from a long line of cases, some of which even pre-date the enactment of Section 103, which recognize the importance of protecting the patent evaluation process from the scourge of hindsight analysis. *See, e.g., W.L. Gore & Assocs., Inc. v. Garlock, Inc.*, 721 F.2d 1540, 1553 (Fed. Cir. 1983); *In re Imperato*, 486 F.2d 585, 587 (C.C.P.A. 1973); *In re Bergel*, 292 F.2d 955, 956-57 (C.C.P.A. 1961); *In re Fridolph*, 30 C.C.P.A. 939, 942 (1943).

7. Even the Federal Trade Commission (“FTC”), in its widely cited report on the U.S. patent system, found that “the Federal Circuit’s application of the suggestion test arguably has the virtue of certainty and predictability.” Federal Trade Commission, *To Promote Innovation: The Proper Balance of Competition and Patent Law and Policy*, Ch. 4 at 13 (October 2003) [hereinafter *FTC Report*].

selective combination by the court to render obvious a subsequent invention, there must be some reason for the combination other than the hindsight gleaned from the invention itself.”). This forces the analysis to be based on evidence—not speculation. *See Alza Corp. v. Mylan Labs., Inc.*, No. 06-1019, slip op. at 5-6 (Fed. Cir. Sept. 6, 2006) (“Our anti-hindsight jurisprudence is a test that rests on the unremarkable premise that legal determinations of obviousness, as with such determinations generally, should be based on evidence rather than on mere speculation or conjecture.”).

The need for protection from the use of hindsight is even more pronounced in cases involving mechanical inventions, such as the one at bar.⁸ There is a very real risk that familiarity with mechanical principles and apparatus, which would not occur with regard to inventions directed to the chemical or electrical fields, will breed a false sense of intuition or understanding and lead to a more prevalent use of hindsight with regard to mechanical inventions. *See McGinley v. Franklin Sports, Inc.*, 262 F.3d 1339, 1351 (Fed. Cir. 2001) (“When the art in question is relatively simple, as is the case here, the opportunity to judge by hindsight is particularly tempting.”). By requiring concrete evidence to support the patent examiner’s or court’s determination, the teaching-suggestion-motivation test eliminates the arbitrary use of vague tests which, in reality, are no more than the application of hindsight. Hence, the test strongly protects against the very situations that plagued the patent system when the

8. The Association does not advocate that any type of disparate test be applied to different types of inventions, but simply highlight the additional hazards posed to inventors of mechanical devices. Rather, the Association notes that the teaching-suggestion-motivation test is well suited to protect inventors in all disciplines from the hazards of hindsight bias. A single uniform test for all inventions accordingly does not allow for the tendency to invalidate or refuse to issue patents based on a bias toward a certain technology.

dubious “standard of invention” test held sway prior to the enactment of Section 103.

Petitioner and its supporting amici provide no credible way for courts to protect against hindsight entering into the analysis, absent the teaching-suggestion-motivation test. Indeed, the Solicitor General merely reassures that “[c]ourts are fully capable of distinguishing between obvious and nonobvious inventions without undue influence from the claimed invention itself.” Brief for the United States as Amicus Curiae Supporting Petitioner at 16, *KSR Int’l Co. v. Teleflex, Inc.*, No. 04-1350 (U.S. Aug. 2006) [hereinafter “Brief for the United States”]. This Panglossian view regarding hindsight essentially ignores the history, described above, of the challenges presented when courts are without a clear objective test. As Justice Frankfurter, applying a healthy dose of realism, once observed, the training of judges “ill-fits them to discharge the technological duties cast upon [them] by patent legislation.” *Marconi Wireless Tel. Co.*, 320 U.S. at 60-61 (Frankfurter, J., dissenting).

B. Absent the Teaching-Suggestion-Motivation Test, Many Valuable Inventions Would Be Susceptible to Invalidation by Judicial Hindsight, or May Be Found Unpatentable in the First Place

Many useful inventions may appear to be obvious with the improper application of hindsight. As the Court has noted, once an invention “has succeeded, it may seem very plain to any one that he could have done it as well. This is often the case with inventions of the greatest merit.” *Washburn & Moen Manuf’g Co. v. Beat’em All Barbed-Wire Co.* (The Barbed Wire Case), 143 U.S. 275, 283 (1892). The Barbed Wire Case provides a good example of such a situation. The Court was faced with a simple invention and acknowledged that the

invention was not radically different from the previous art. *Id.* at 282. However, that minor change “made the barbed-wire fence a practical and commercial success.” *Id.* Another example is the invention directed to a horse collar. James V. DeLong, *Mind Over Matter*, REASON (June 1998), available at <http://reason.com/9806/fe.delong.shtml>; see also John Langdon, HORSES, OXEN AND TECHNOLOGICAL INNOVATION: THE USE OF DRAUGHT ANIMALS IN ENGLISH FARMING FROM 1066 TO 1500 5-9 (Cambridge University Press 1986). By making a relatively minor change to the harnesses of the day, so that they stopped choking the animals, farming productivity (plowing, harvesting, etc.) was increased fourfold. *Id.* Again, an evaluator looking at the problem from the perspective of the final result might readily conclude that the change was obvious to one skilled in the art; yet the change took many years to occur, which suggests that the change was not at all obvious.

Without the Federal Circuit’s teaching-suggestion-motivation test, many inventions that are of considerable value to society may never receive the patent protection their inventors have earned and deserve. History is replete with examples of relatively minor inventions that have gone on to advance, and even to revolutionize, their fields. Absent the protection afforded by the teaching-suggestion-motivation test, an evaluator assessing these inventions could simply have dismissed them as obvious to a person of ordinary skill in the art without citation to even a scintilla of evidence.

C. The Teaching-Suggestion-Motivation Test Allows for Flexibility

Petitioner and its supporting amici contend that the teaching-suggestion-motivation test is rigid and inflexible and thus prevents the exercise of common sense and knowledge in the technology. See, e.g., Brief for the United

States, at 17. To the contrary, the test is only “rigid” to the extent it properly prohibits invalidating patents based on nothing more than an unfounded bias masquerading as “common sense” or intuition. Rather than being rigid or inflexible, the test, when properly applied, allows all relevant information to be evaluated by the courts and the PTO. Indeed, as the Federal Circuit recently described, the teaching-suggestion-motivation test is “quite flexible and not only permits, but *requires*, consideration of common knowledge and common sense.” *Dystar Textilfarben GMBH & Co. Deutschland KG v. C.H. Patrick Co.*, No. 06-1088, slip op. at 20 (Fed. Cir. Oct. 3, 2006). Equally important, an explicit statement of teaching, suggestion, or motivation to combine prior art references is not required to establish the obviousness of an invention. *Id.*

The Federal Circuit has repeatedly recognized that a motivation, suggestion, or teaching in the prior art can be found either explicitly or implicitly. *See Alza*, slip op. at 3; *In re Kahn*, 441 F.3d 977, 987 (Fed. Cir. 2006) (quoting *Nat’l Steel Car, Ltd. v. Canadian Pac. Ry., Ltd.*, 357 F.3d 1319, 1337 (Fed. Cir. 2004)); *Cross Med. Prods., Inc. v. Medtronic Sofamor Danek, Inc.*, 424 F.3d 1293, 1322 (Fed. Cir. 2005) (“[T]he motivation to combine need not be found in prior art references, but equally can be found in the knowledge generally available to one of ordinary skill in the art.”). Indeed, the Federal Circuit has explained that a motivation to combine references can be found in various sources other than the specific prior art references cited. *Dystar*, slip op. at 7-8 (“The motivation need not be found in the references sought to be combined, but may be found in any number of sources, including common knowledge, the prior art as a whole, or the nature of the problem itself.”). *See also In re Napier*, 55 F.3d 610, 613 (Fed. Cir. 1995). Moreover, this notion is not new. The Federal Circuit’s predecessor court stated “where it is found necessary, [examiners] may take

notice of facts beyond the record which, while not generally notorious, are capable of such instant and unquestionable demonstration as to defy dispute.” *In re Ahlert*, 424 F.2d 1088, 1091 (C.C.P.A. 1970).

The PTO also understands the flexibility of the test, as its Manual of Patent Examining Procedure outlines the permissible guidelines for the application of such knowledge. U.S. Patent & Trademark Office, *Manual of Patent Examining Procedure*, § 2144.03 (8th ed. rev. 3d 2006) (“In limited circumstances, it is appropriate for an examiner to take official notice of facts not in the record or to rely on ‘common knowledge’ in making a rejection, however such rejections should be judiciously applied.”). The PTO may not solely rely on such knowledge, but it may apply the knowledge to support evidence contained in the prior art. *Id.*

Furthermore, the Federal Circuit’s recent jurisprudence clearly puts to rest the erroneous charge that under the teaching-suggestion-motivation test, judges or patent examiners will be unable to invalidate obvious inventions. In both *Alza* and *Dystar*, the Federal Circuit found the contested claims to be obvious under the teaching-suggestion-motivation test. *See also* Christopher Anthony Cotropia, *Nonobviousness and the Federal Circuit: An Empirical Analysis of Recent Case Law*, 82 NOTRE DAME L. REV. (forthcoming Feb. 2007), (manuscript at 24-25, available at http://papers.ssrn.com/so13/papers.cfm?abstract_id=933192) (finding no support for suggestion that nonobviousness requirement has lowered significantly but, rather, that “if any bias exists, it is a bias towards finding patents obvious, not nonobvious as most critics suggest”).

D. The Teaching-Suggestion-Motivation Test Protects Inventors From Arbitrary and Erroneous Decisions by Examiners and the Courts

As many amici in support of Petitioner have noted, the PTO is straining to accommodate the growth in the number of patent application filings.⁹ Contrary to the suggestions of Petitioner and its amici, abandonment of the teaching-suggestion-motivation test will do little to remedy this administrative problem. Most of the growth of the PTO's workload has nothing to do with the purported difficulty of invalidating patents on the basis of obviousness.¹⁰ On a percentage basis, the PTO actually rejects many more patents now than it did 40 years ago. Between 1963 and 1965, the PTO received 284,103 applications and granted 166,007 patents, about a 58% grant rate. Between 2003 and 2005, the PTO received 1,165,690 applications and granted 526,034 patents, actually producing a lower grant rate of 45%. *See* U.S. Patent and Trademark Office, U.S. Patent Statistics Chart Calendar Years 1963-2005 (2006), *available at* http://www.uspto.gov/go/taf/us_stat.htm.

Moreover, the Solicitor General advocates:

The PTO should instead be allowed to bring to bear its full expertise—including its *reckoning* of the basic knowledge and common sense possessed by persons in particular fields of endeavor—when making the predictive judgment whether an invention would have been obvious to a person of ordinary skill in the art. The patent applicant should bear the burden of proving PTO's Board and examiners wrong.

9. *See e.g.*, Brief for the United States, at 23 n.1.

10. *See generally* FTC Report, Ch. 1 at 31 (noting sheer number of patents sought and received as challenge posed by growth of knowledge-based economy).

Brief for the United States, at 26 (emphasis added). How exactly an inventor is supposed to disprove a “reckoning” of the PTO or a court is left unexplained. While the Federal Circuit’s recent jurisprudence notes that “common knowledge” may support a finding of obviousness, the evaluator must clearly explain any such evidence relied upon. *See Dystar* slip op. at 17. Such reasoned findings by an evaluator are far from the type of essentially unsubstantiated analysis the Solicitor General suggests. Stripped of the certainty and predictability of the Federal Circuit’s teaching-suggestion-motivation test, inventors will be subject to the capriciousness of examiners and judges who, if the test is removed, will be susceptible to the irresistible temptation of hindsight analysis.

CONCLUSION

For over forty years, Section 103, coupled with this Court's decision in *Graham*, has provided inventors and patent practitioners with a stable framework for evaluating obviousness. While the Court left largely unresolved the important issue of how to prevent hindsight bias from entering the obviousness analysis, the Federal Circuit has filled this void with the stable framework of the teaching-suggestion-motivation test. This test is flexible and has provided inventors and the patent community with a robust, reliable, and predictable mechanism to protect against the pernicious effects of hindsight.

Respectfully submitted,

ROCHELLE K. SEIDE
Counsel of Record
JOHN K. HSU
ARENT FOX PLLC
1675 Broadway Avenue
New York, NY 10019
(212) 484-3900

MARYLEE JENKINS
President
*New York Intellectual
Property Law Association*
ARENT FOX PLLC
1675 Broadway Avenue
New York, NY 10019
(212) 484-3900

Counsel for Amicus Curiae