

**UNITED STATES COURT OF APPEALS FOR THE FEDERAL CIRCUIT**

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Appeal No. 2007-1130  
(Serial No. 08/833,892)

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**FILED**  
U.S. COURT OF APPEALS FOR  
THE FEDERAL CIRCUIT

**APR - 7 2008**

**JAN HOFFMAYL**  
CLERK

**IN RE BERNARD L. BILSKI and RAND A. WARSAW**

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Appeal from the United States Patent and Trademark Office,  
Board of Patent Appeals and Interferences

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**BRIEF FOR *AMICI CURIAE***  
**PACIFIC LIFE INSURANCE COMPANY, THE HARTFORD FINANCIAL**  
**SERVICES GROUP, INC., AND JOHN HANCOCK LIFE INSURANCE**  
**COMPANY (U.S.A.) IN SUPPORT OF APPELLEE**

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*Dated April 7, 2008*

*Attorneys for Amici Curiae*

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**UNITED STATES COURT OF APPEALS FOR THE FEDERAL CIRCUIT**

In re Bilski v. \_\_\_\_\_

No. 2007-1130

**CERTIFICATE OF INTEREST**

Counsel for the (petitioner) (appellant) (respondent) (appellee) (amicus) (name of party)

Amici \_\_\_\_\_ certifies the following (use "None" if applicable; use extra sheets if necessary):

1. The full name of every party or amicus represented by me is:

Pacific Life Insurance Company  
The Hartford Financial Services Group, Inc.  
John Hancock Life Insurance Company (U.S.A.)

2. The name of the real party in interest (if the party named in the caption is not the real party in interest) represented by me is:

See above.

3. All parent corporations and any publicly held companies that own 10 percent or more of the stock of the party or amicus curiae represented by me are:

Pacific Life Insurance Company is a wholly owned subsidiary of Pacific LifeCorp, of which a controlling interest is owned by Pacific Mutual Holding Company.  
John Hancock Life Insurance Company (U.S.A.) is a wholly owned, indirect subsidiary of publicly traded Manulife Financial Corporation.

4.  There is no such corporation as listed in paragraph 3.

5. The names of all law firms and the partners or associates that appeared for the party or amicus now represented by me in the trial court or agency or are expected to appear in this court are:

James R. Myers - Ropes & Gray LLP  
Brandon H. Stroy - Ropes & Gray LLP

April 7, 2008  
Date

James R. Myers  
Signature of counsel  
JAMES R. MYERS  
Printed name of counsel

Reset Fields

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## **STATEMENT OF IDENTITIES OF THE AMICI CURIAE**

The Federal Circuit's February 15, 2008 Order invited briefing from interested Amici. This Amici Brief is filed pursuant to that order. The companies whose interests are represented by this Amici Brief, Pacific Life Insurance Company, The Hartford Financial Services Group, Inc., and John Hancock Life Insurance Co. (U.S.A.), are directly affected by business method patents during the regular course of business. This Amici brief is offered in support of limiting the availability of business method patents for financial services offerings.

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**ISSUES PRESENTED**

The Court's February 15, 2008 Order permits briefing from Amici addressing the following five questions:

Whether claim 1 of the 08/833,892 patent application claims patent eligible subject matter under 35 U.S.C. § 101?

What standard should govern in determining whether a process is patent-eligible subject matter under section 101?

Whether the claimed subject matter is not patent-eligible because it constitutes an abstract idea or mental process; when does a claim that contains both mental and physical steps create patent-eligible subject matter?

Whether a method or process must result in a physical transformation of an article or be tied to a machine to be patent-eligible subject matter under section 101?

Whether it is appropriate to reconsider *State Street Bank & Trust Co. v. Signature Financial Group, Inc.*, 149 F.3d 1368 (Fed. Cir. 1998), and *AT&T Corp. v. Excel Communications, Inc.*, 172 F.3d 1352 (Fed. Cir. 1999), in this case and, if so, whether those cases should be overruled in any respect?

Many financial services companies are facing patent infringement allegations associated with “business method” patents that seek very substantial damages. The asserted patent claims regularly combine financial strategies with well known, routine computerization. The subject matter of such patent claims is outside any historical and traditional definition of technology—and should not be patent-eligible under Section 101. While other briefs may be aimed at more general issues and principles (or directed towards the highly problematic Bilski patent application), this amicus brief is focused on the patents that are causing the most unfortunate consequences: patents seeking to cover operations of financial services companies by claiming abstract financial and legal concepts combined with incidental, generic computer-based limitations.

This amicus brief presents the following arguments. The holding of the Board of Patent Appeals and Interferences (“BPAI”) that Bilski’s claim 1 fails to recite patent-eligible subject matter is correct. The basic business processes of financial services companies (financial calculations and valuations, legal and

financial guarantees, trading or financial strategies, administration of financial services contracts, advertising and marketing approaches, legal dispute resolution strategies, accounting procedures, customer relations, organizational methodologies, and methods of conducting sales and auctions) are “abstract ideas” not eligible by themselves for patent protection. *See infra*, at 5-8. In agreement with the BPAI *Bilski* opinion, abstract ideas in financial services implemented on a general purpose computer claiming general purpose computer operations (such as inputting, storing, processing, calculating, determining, comparing, adjusting, networking, displaying, outputting, etc.) do not create patent-eligible subject matter. *See infra*, at 9-11. Further, a test for determining patent-eligible subject matter under Section 101 (without reliance on 35 U.S.C. §§ 102 and 103) is offered for circumstances where a claim contains both abstract ideas in financial services and general purpose computer limitations. *See infra*, at 11-16. Clarification and reconsideration of *State Street* is advisable. *See infra*, at 16-19. Finally, this brief provides a rebuttal to “scare tactic” arguments offered in *Bilski*’s Supplemental Brief. *See infra*, at 20-22.

## ARGUMENT

### I. INTRODUCTION

In the wake of *Diamond v. Diehr*, 450 U.S. 175 (1981), the appropriate standard by which to judge the patentability of method and process claims under 35 U.S.C. § 101 has been an area of developing precedent. The *State Street Bank & Trust Co. v. Signature Financial Grp., Inc.*, 149 F.3d 1368 (Fed. Cir. 1998), case that purportedly established a “useful, concrete, and tangible result” test for patentability summarily dealt with computer implementation questions as novelty and obviousness inquiries better suited for analysis under Sections 102 and 103. However, this standard is not the correct one.

The Federal Circuit should develop a framework, flowing out of the Supreme Court’s opinions for using Section 101 to determine whether a claim is a patentable “process” or merely an “abstract idea”—especially in cases where claims combine abstract ideas with incidental general purpose computer limitations. Additionally, the *State Street* opinion should be reexamined and clarified in a way that is consistent with any newly adopted framework.

### II. THE FEDERAL CIRCUIT’S INQUIRIES

#### 1. **Bilski’s Claim 1 Does Not Contain Patent-Eligible Subject Matter Under 35 U.S.C. § 101, And Was Properly Rejected By The PTO And The Board**

The March 8, 2006 opinion of the BPAI regarding Claim 1 of Bilski’s Patent Application No. 08/833,892 correctly rejects the claim for failure to include

patent-eligible subject matter under 35 U.S.C. § 101. The positions put forth in the March 6, 2008 Supplemental Brief of Appellee Director of the United States Patent and Trademark Office for Hearing *En Banc* on this issue are substantially correct.

**2. Under *Diamond v. Diehr* An “Abstract Idea” Is Not A Patent-Eligible “Process” Under Section 101**

The Supreme Court, in *Diamond v. Diehr*, 450 U.S. 175 (1981), held that a patent claim for a process must not seek to patent an abstract idea, law of nature, or natural phenomenon. *Diehr*, 450 U.S. at 185, 192. Although described in formal terms as a machine application of an abstract idea, a claimed invention falls outside the category of technological innovations susceptible of patent protection<sup>1</sup> when the advance over the prior art on which applicant relies involves only an advance in a field of endeavor outside technology such as legal and financial guarantees, financial calculations, administration of financial services contracts, and marketing. *Cf. In re Comiskey*, 499 F.3d 1365, 1380 (Fed. Cir. 2007) (“The routine addition of modern electronics to an otherwise unpatentable invention typically creates a prima facie case of obviousness [under Section 103].”). This brief addresses this issue, specifically arguing that (1) abstract ideas include the basic operations of financial services companies, and (2) claims that combine abstract ideas with routine general purpose computer claim limitations do

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<sup>1</sup> See PTO’s Supplemental Brief, at 10-13 (addressing the types of technological innovations historically eligible for patent protection – which types did not include innovations in financial services and law).

not escape from *Diehr's* prohibition under Section 101 against patenting abstract ideas.

A further response to the Court's Question No. 2 is provided below in conjunction with the responses to Questions 3 and 5.

**3. Claims Directed To Abstract Ideas Performed On General Purpose Computers Do Not Become Patent-Eligible Subject Matter Simply Because They Are Nominally Tied To A Machine Implementation**

**A. Abstract ideas include such broad concepts as business processes, valuations, calculations, and guarantees of financial services companies, and are not patent-eligible under Section 101**

Under the standard articulated in *Diehr*, abstract ideas, as “fundamental truth[s],” are excluded from patent protection. *Diehr*, 450 U.S. at 185. Patentability questions relating to abstract ideas often arise in the context of mathematical algorithms. *Diehr*, 450 U.S. 175; *Parker v. Flook*, 437 U.S. 584 (1978); *Gottschalk v. Benson*, 409 U.S. 63 (1972). But the definition of “abstract ideas” is not limited to mathematical algorithms; the term also encompasses financial and legal guarantees, financial valuations and calculations, trading or financial strategies, administration of financial services contracts, marketing campaigns and strategies, offers for sale, and business models, among other intangibles.

Several specific examples illustrate the potential scope of the abstract idea exclusion. In *In re Schrader*, 22 F.3d 290 (Fed. Cir. 1994), the patentability of a “novel way of conducting auctions” was reviewed. The Court in *Schrader* found that the claims related a mathematical algorithm to “obvious and familiar modes of human behavior,” and had no tangible aspect or transformational effect. *Id.* at n. 8. The Court further dismissed as indistinguishable from mere “data gathering” the alleged physical transformation, and held the claims unpatentable. *Id.* at 294.

The predecessor to the Federal Circuit has also found unpatentable a method for use by salespeople in managing relationships with their respective customers. *In re Maucorps*, 609 F.2d 481 (C.C.P.A. 1979). In that case, the Court affirmed the decision of the BPAI rejecting the claims where there was “no substantial practical application [of the algorithm] except in connection with a digital computer.” *Id.* at 484. Additionally, in *In re Meyer*, the Court held unpatentable claims directed toward an algorithm to aid in the diagnosis of medical patients, finding the claims consisted merely of a “mathematical algorithm representing a mental process that has not been applied to physical elements or process steps.” 688 F.2d 789, 796 (C.C.P.A. 1982). Another would-be patentee attempted to obtain a patent on a method of preventing theft and embezzlement by restaurant waiters. Stating that “[n]o mere abstraction, no idea, however brilliant,

can be the subject of a patent irrespective of the means designed to give it effect,” the Second Circuit declared the method unpatentable for failing to illustrate a useful result of the claimed abstract idea. *Hotel Security Checking Co. v. Lorraine Co.*, 160 F. 467, 569 (2d Cir. 1908).

Recently, in *Comiskey*, the Federal Circuit examined a patent directed to a “method for mandatory arbitration resolution.” *See Comiskey*, 499 F.3d at 1379. In holding that two of the claims at issue presented unpatentable subject matter under Section 103,<sup>2</sup> the Court found that the claims described, “in essence, ‘conducting arbitration resolution for [a] contested issue’ and ‘determining an award or a decision for the contested issue’ through a pre-determined ‘mandatory’ arbitration system, and thus claim *the use of mental processes* to solve a legal dispute.” *Id.* (emphasis added).

The “abstract idea” exclusion under applicable precedent is thus generally broad enough to include at least the following “business methods”: legal dispute resolution strategies, simple accounting procedures, customer relations, organizational methodologies, and methods of conducting sales and auctions, to name only a few. Such “abstract ideas” also include a wide range of other

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<sup>2</sup> This Court in *Comiskey*, 499 F.3d at 1368, 1379-80, apparently held that tying an abstract idea to a general purpose computer met the requirements of Section 101. To the extent this is a correct reading of *Comiskey*, amici submit that *Comiskey* should be clarified as such claims should not be patent-eligible under Section 101 (nor patentable under Section 103 as such claims are obvious).

financial calculations and valuations, legal and financial guarantees, administration of financial services contracts, trading and financial strategies, and advertising and marketing approaches.

**B. Abstract ideas, not independently patentable, do not become patentable when merely and nominally combined with general purpose computer limitations**

Where a claim is directed to an unpatentable abstract idea, the mere addition of a nominal or incidental physical limitation does not elevate the claim to patent-eligibility. *Ex Parte Bilski*, at 21-22; *Ex Parte Lundgren*, 76 U.S.P.Q.2d 1385, 1405. This principle applies to patent claims directed to performance of abstract ideas by general purpose computers. *Lundgren*, 76 U.S.P.Q.2d at 1427-28.

Where a claim consists not of a process, but only of an “abstract idea” coupled with a nominal or incidental physical limitation, the claim is not patent-eligible under Section 101. *Bilski*, at 21-22 (citing *Lundgren*, 47 U.S.P.Q.2d at 1407-08). This conclusion is commanded by analysis of the characteristics of an “abstract idea”, one which the BPAI takes up in its *Bilski* opinion. *Cf. Flook*, 437 U.S. at 591 (the process itself rather than the algorithm must be new and useful) ; *Aristocrat Technologies v. International Game Technology*, \_\_\_ F.3d. \_\_\_, No. 2007-1419, 2008 U.S. App. LEXIS 6472, at \*9-17 (Fed. Cir. Mar. 28, 2008) (appropriate computer processing does not sufficiently claim specific structure). One

characteristic of a claim to an “abstract idea” is that the claim is “so broad that it covers (preempts) any and every possible way that the steps can be performed, because there is no ‘practical application.’” *Id.* Succinctly, “[i]ncidental physical limitations, such as data gathering, field of use limitations, and post-solution activity are not enough to convert an ‘abstract idea’ into a statutory ‘process.’” *Bilski*, at 21-22 (citing *Lundgren*, 47 U.S.P.Q.2d at 1405, 1427-27). *See Flook*, 437 U.S. at 590 (“The notion that post-solution activity, no matter how conventional or obvious in itself, can transform an unpatentable principle into a patentable process exalts form over substance. A competent draftsman could attach some form of post-solution activity to almost any mathematical formula....”).

The most immediately important example of the coupling of an “abstract idea” with an incidental or nominal physical limitation is the performance of an otherwise “abstract idea” on an ordinary, general purpose computer, with corresponding claims purporting to disclose a “computer-implemented” method for performing the “abstract idea”. The BPAI illustrated the absurdity of this situation using the following hypothetical: “a series of steps without any recitation of how the steps are performed might be rejected as nonstatutory subject matter as an “abstract idea,” whereas the same series of steps, if performed by a machine [or computer], might be statutory as a practical application of the abstract idea.”

*Bilski*, at 29. Instead, because these types of claims operate essentially to cover performance of an “abstract idea”, they should not be eligible for patent protection under Section 101. The BPAI agrees: “[a]bstract ideas performed on general purpose machines or embodied in a generic manufacture constitute a “special case” where subject matter that appears to be nominally within § 101 is nonstatutory.” *Bilski*, at 15, n. 6, 21-22, 26, 31, 33; *Lundgren* at 1407-08. The same is essentially the holding of *Benson*, in which a general purpose computer which merely performed an “abstract idea” was unpatentable as a non-statutory attempt to patent the “abstract idea” itself under the guise of couching it in terms of a computer-assisted process. 409 U.S. at 71-72. See *Flook*, 437 U.S. at 595 (“[I]f a claim is directed essentially to a method of calculating, using a mathematical formula, even if the solution is for a specific purpose, the claimed method is nonstatutory.”) (quoting *In re Richman*, 563 F.2d 1026, 1030 (C.C.P.A. 1977)).

While such a case can be formally described as a computer- or machine-implemented application of an “abstract idea”, such an invention only falls within the sphere of patentability when the advance over the prior art on which the applicant relies involves a *technological* advancement. By contrast, when the advance over the prior art is nothing more than an advance in a *non-technological* field, there is no basis for affording such a claim the protection of a patent. Cf. *Comiskey*, 499 F.3d at 1380 (“The routine addition of modern

electronics to an otherwise unpatentable invention typically creates a prima facie case of obviousness [under Section 103].”). Examples of advancements in *non-technological* fields were described above, and include financial calculations and valuations, legal and financial guarantees, administration of financial services contracts, marketing and advertising techniques, customer service and retention strategies, dispute resolution strategies, simple accounting methods, financial and trading strategies, and methods of conducting sales and auctions, to name only a few.

**C. Patentability determinations under Section 101 regarding claims that contain both abstract ideas and computer limitations can be made, absent the necessity of novelty or obviousness considerations under Sections 102 and 103**

The statement in the Patent Office’s Supplemental Brief at 16, n.5, that there is no immediate need to address Question 3 with respect to the Bilski case as the claims in the Bilski application are not limited to computer- or machine-implemented applications of his abstract idea is correct. The inquiry is nonetheless appropriate in view of the Federal Circuit’s request as to where the *boundary* lies for patentability of process claims under Section 101, the proper standard to be used for claims consisting substantially of “abstract ideas”, the tying of otherwise abstract claims to a computer or a machine, and whether a reconsideration or clarification of *State Street* is warranted. Further, additional guidance from the Federal Circuit on the precise framework to be used for

analyzing and deciding Section 101 questions would be quite beneficial to patent holders and litigants, as well as federal district court judges.

The Supreme Court, in *Diehr*, stated that for the purposes of evaluating available patent protection under Section 101, “the claims must be considered as a whole. It is inappropriate to dissect the claims into old and new elements and then to ignore the presence of the old elements in the analysis. This is particularly true in a process claim because a new combination of steps in a process may be patentable even though all the constituents of the combination were well known and in common use before the combination was made.” *Diehr*, 450 U.S. at 188. Under such a view, while a claim cannot be summarily declared unpatentable based on its discrete parts, it is equally impossible to view a claim directed at a computer- or machine-implementation of an “abstract idea” as being *de facto* patentable simply because it contains a known machine limitation. Instead, in order to be patentable, the Supreme Court in *Diehr* has suggested that the claim, as a whole, must be directed toward patent-eligible subject matter. That the method in *Diehr* involved the use of a computer to assist in the calculations was, in the eyes of the court, irrelevant to its ultimate patentability. Far from justifying its determination on the basis of the addition of the computer calculations, the Court offered only the inverse argument that “a claim drawn to subject matter otherwise statutory does not become nonstatutory simply because it

uses a mathematical formula, computer program, or *digital computer*.” *Id.* at 187 (emphasis added).

The Supreme Court’s *Diehr* analysis asks, as does that of the BPAI in the *Bilski* opinion, whether the claimed physical and technological steps are but incidental additions to the practical use of the “abstract idea” when viewing the claim in its entirety. Answering this question under Section 101 does not require making a novelty or obviousness determination, governed by Sections 102 and 103. Compare *Diehr*, 450 U.S. at 189-90 with *State Street*, 149 F.3d at 1377; and with *Comiskey*, 499 F.3d at 1380. Patent-eligibility analysis under Section 101 can be guided by the following two questions:

Does the claim in question merely recite an “abstract idea” performed on a general purpose computer using general purpose operations (*e.g.*, inputting, storing, processing, calculating, determining, comparing, adjusting, networking, displaying, outputting, etc.)?

Does the claim in question lack sufficiently particular steps as to how the abstract idea is performed and instead describe the outcome of performing the function?

An affirmative answer to the first question (*i.e.*, that the claim *does* merely present an “abstract idea” performed on a general purpose computer using general purpose operations such as inputting, storing, processing, calculating, determining, comparing, adjusting, networking, displaying, outputting, etc.)

provides a strong indication that the claim is not patent-eligible.<sup>3</sup> *See Bilski*, at 21-22; *Lundgren*, 76 U.S.P.Q.2d at 1407-08. The Federal Circuit has stated that processes are not patentable under Section 103 “when they merely [claim] a mental process standing alone and untied to another category of statutory subject matter.” *Comiskey*, 499 F.3d at 1378;<sup>4</sup> *see also Benson*, 409 U.S. at 71-72; *Alappat*, 33 F.3d at 1541, 1543; *Maucorps*, 609 F.2d at 482, 486. The *Comiskey* Court also offered that “the patent statute does not allow patents on particular systems that depend for their operation on human intelligence alone.” *Id.* Without a specific technological advancement, an “abstract idea” is precisely such a system, dependent only on the use of mental processes even if a computer or machine is used to make the mental process more efficient or expedient. The opinion of the BPAI in both *Bilski* and *Lundgren* is an unwavering affirmation that, “[a]bstract ideas performed on general purpose machines or embodied in a generic manufacture constitute a special case where subject matter that appears to be nominally within § 101 is nonstatutory.” *Bilski*, at 21. Importantly, the BPAI distinguishes between “abstract ideas” that

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<sup>3</sup> If the claim includes sufficient particular limitations describing how to perform a specific claimed algorithm, then the claim may be for a special purpose computer. *See Aristocrat Technologies*, \*4; *Alappat*, 33 F.3d 1526, 1545 (Fed. Cir. 1994). If patentability is based on technological innovation rather than an abstract idea in financial services or routine general purpose computer limitations, then the subject matter should also be patent eligible. *See Flook*, 437 U.S. at 594; *cf. Comiskey*, 499 F.3d at 1380.

<sup>4</sup> *See supra* note 2, at 8.

when carried out represent new uses for existing machines, and those that simply employ machines in known ways to reach a useful end:

Methods tied to a machine generally qualify as a “process” under § 101 because machines inherently act on and transform physical subject matter, and new uses for known machines are a “process” under 35 U.S.C. § 100(b). The principal exception is the “special case” of general purpose machine-implemented processes that merely perform an “abstract idea” (the best known example of which is a mathematical algorithm).

*Bilski*, at 18 (citations omitted).

Second, where a claim, taken as a whole, covers all of the practical ways of using an “abstract idea”, and the claim lacks the concrete steps or structures that would limit the claim, the claim is not likely to be patent-eligible under Section 101. The particular problem arises in the case of method or process claims where the “abstract idea” is divorced from the specific instructions on how to carry the “abstract idea” out. This type of claim is the hallmark of a “disembodied ‘abstract idea’ because it recites no particular implementation of the idea” that would make the claim sufficiently tangible to become a statutory “process”. *Lundgren*, 76 U.S.P.Q.2d at 1405. *Cf. Aristocrat Technologies, Inc.*, at \*14-15 (simply claiming the outcome of an equation is insufficient under Section 112, Paragraph 6). Similarly, in *Benson*, the Federal Circuit found a claim unpatentable where it was “not limited to any particular art or technology, to any particular apparatus or machinery, or to any particular use,” and would thus

“wholly pre-empt the mathematical formula and in practical effect would be a patent on the algorithm itself.” *Benson*, 409 U.S. at 64, 71-72. A process or method, existing in ether, without instruction about how the process or method is to be carried out, can be nothing other than an “abstract idea”. As such, where the second question is answered in the affirmative, there is also a strong indication that the claim is not directed to patent-eligible subject matter under Section 101.

**4. Combining General Purpose Computer Limitations With Abstract Ideas Is Insufficient To Create Patent-Eligible Subject Matter Under Section 1010**

These issues are discussed above in Section 3.

**5. The *State Street* Opinion Should Be Clarified To Reflect The Scope Of Its Holdings And To Reflect The Standard Articulated Above**

*State Street* addresses the question of patent eligibility for claims directed to methods and incidentally tied to general purpose computers for their implementation in a manner that is inconsistent with Supreme Court precedent. A clarification or reevaluation of *State Street* is appropriate.

The discussion in *State Street* is susceptible to misapplication. For example, as described in the PTO’s Supplemental Brief, the holding of *State Street* reads:

Today, we hold that the transformation of data ... by a machine through a series of mathematical calculations ... constitutes a practical application of a mathematical

algorithm, formula, or calculation, because it produces “a useful, concrete and tangible result.”

*State Street*, 149 F.3d at 1373 (citation omitted). A careless reading of this holding suggests that patentability arises out of the production of a “useful, concrete, or tangible result.” Instead, the critical aspect of the holding should be viewed as the presence of a machine limitation, with a structure limited and defined by Section 112, Paragraph 6. *See id.* at 1371. Further, the holding is presented within the context of a defense of mathematical algorithm claims as not being broadly unpatentable. Read in this context, the holding merely offers a situation (transformation of data by a machine) where, in the opinion of the Federal Circuit, a mathematical algorithm might be patentable. In other words, the central teaching of *State Street* can properly be distilled to a single, general proposition:

Subject matter is not automatically excluded from eligibility for patent protection under Section 101 simply by attaching to it the label of a “mathematical algorithm” or “business method.”

Viewed in this way, *State Street* would offer a clear, bright line rule, dispelling any prior myth regarding the broad unpatentability of mathematical algorithms or business method claims. This interpretation would also find support in the Supreme Court. Indeed, *State Street* has been denounced as being contrary to the Court’s precedent by four Supreme Court justices:

[*State Street*] does say that a process is patentable if it produces a “useful, concrete, and tangible result. But this

Court has never made such a statement and, if taken literally, the statement would cover instances where this Court has held the contrary.

*Lab. Corp. of Am. Holdings v. Metabolite Labs., Inc.*, 548 U.S. 124, 126 S. Ct. 2921, 2928 (2006) (Breyer, J., dissenting and joined by Kennedy, J., Souter, J., Stevens, J.). Clarification or reconsideration of the proper scope of *State Street* would resolve any perceived conflicts with Supreme Court jurisprudence.

While an explicit correction is not necessary for the mere purpose of providing guidance on the proper interpretation of Section 101, a side effect of adopting the two step analysis proposed in this amicus brief is that the particular means-plus-function claim limitations at issue in *State Street* arguably do not pass muster, as the functional limitations offered in the claim are extraordinarily general. *State Street*, 149 F3d at 1372. Because the claimed computer implementation in *State Street* is directed only to a general purpose computer with general computer operations, *i.e.*, a personal computer including a CPU, a data disk for storing data, and an arithmetic logic circuit configured to prepare the data disk, to retrieve information, and to calculate, *id.*, and not to a particular technological advancement, the claim should not be eligible for patent protection. As discussed at length above, linking an otherwise “abstract idea”, a financial calculation, to a general purpose computer to facilitate its implementation does not make the “abstract idea” patent-eligible under Section 101. Further, the claims essentially

preempt all practical ways to use the “hub and spoke” concept without limitations specifying how to perform the “abstract idea.” *Cf. Aristocrat Technologies*, at \*14-15. As a result, under the proposed two part framework for analyzing Section 101, the claim at issue in *State Street* should be found to contain subject matter which is ineligible for patent protection—despite the fact that the means-plus-function claim limitations are limited to the particular structures described in the specification pursuant to Section 112, paragraph 6.

While overruling the conclusion of *State Street* is not strictly necessary in deciding the patentability of the Bilski claims, a clarification or reexamination of that opinion in order to clarify the standard of analysis under Section 101 would be extraordinarily useful, and would, mercifully, allow for the reasonable prediction of outcomes in future cases. At a minimum, the Federal Circuit is urged to adopt the two-part inquiry proposed above, and to review the *State Street* case with that standard in mind.

### **III. REBUTTAL TO BILSKI SUPPLEMENTAL BRIEF**

The correct course of action in this case should not be governed by fear of upsetting the status quo, or by blind adherence to obsolete jurisprudence. Rather, the Court should make its decision based on what produces the proper result on a forward looking basis. In Bilski’s March 6, 2008 Supplemental Brief, the argument is presented that modifying the holdings of *State Street* and *AT&T*

would “throw into question the validity of many unexpired patents on which patentees have relied in establishing business plans.” *Bilski Supplemental Brief*, at 16. But the Supreme Court has found that such arguments, forecasting a “gruesome parade of horrors”, are not to be given any substantial judicial weight. *Diamond v. Chakrabarty*, 447 U.S. 303, 316 (1980). Among the reasons for discounting such arguments, the Supreme Court admitted its own inability to entertain such ideas, instead admonishing that they would be properly put before the Legislature. *Id.* at 317 (“the balancing of competing values and interests . . . is the business of elected representatives”). The fact that the current system has allowed patents to issue on obvious and trivial physical embodiments of otherwise unpatentable “abstract ideas” is not a solid basis for continuing their existence.

While the Supreme Court was correct that weighing the public interest is the duty of the Legislature, and not the Judiciary, *Bilski*’s narrow assertion addresses only the interest of the patentee, ignoring those of the rest of the population, and especially those of the people and companies who are forced to defend infringement suits regarding patents that should not have been issued at the outset. The existence of these types of patents is, on balance, much more damaging to alleged “infringers” than it is beneficial to the “patentees.” Many financial service companies, including their customers and their investors, are presently faced with multiple lawsuits involving patents that claim abstract ideas

linked to general purpose computer limitations. The patent damages asserted with such invalid patents are often in excess of \$100 million per “infringing” company. These are precisely the types of cases that would cease to exist if the above proposal were to be adopted. Further, damages notwithstanding, patent litigation itself is extraordinarily expensive and disruptive, forcing many defendants to settle their cases without having their defenses fully adjudicated. Thus, the present interpretation forces a tidal wave of litigation that cannot be slowed because it is prohibitively expensive for a defendant to invalidate these kinds of patents through trial and appeal.

Under the unclarified framework of *State Street*, too many patent holders are allowed to wrongfully claim exclusive ownership of subject matter that should rightfully be in the public domain, and for which patent protection should not be available. While *Bilski* is correct that a whole claim cannot be found *ipso facto* non-statutory simply because part of that claim is non-statutory, (*Bilski* Supplemental Brief, at 12), the requirement that claims be construed as a whole must similarly require that a whole claim does not become statutory merely because an applicant adds incidental, generic computer-based limitations to an otherwise non-statutory claim.

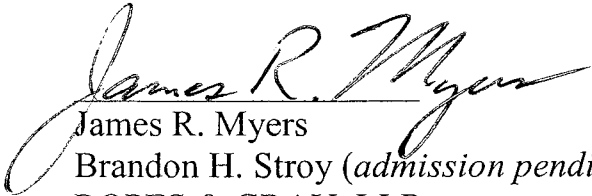
In order to settle this questions, and avoid the pain of needless, interminable litigation, the Federal Circuit should clarify the law so that many of

these patents are not issued, and so that if issued, they can be quickly and summarily invalidated in litigation avoiding unnecessary costs to the defendants.

### CONCLUSION

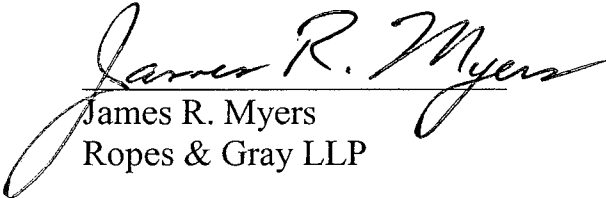
For the reasons articulated in the above sections, we urge the Court to find the Bilski patent application claims not patent-eligible under Section 101, to adopt the proposed standard for analysis under Section 101 of method or process claims combining abstract financial services with general purpose computer limitations, and to revisit *State Street*, consistent with the newly-adopted standard.

Respectfully submitted,

  
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**RULE 32(a)(7)(C) CERTIFICATE OF COMPLIANCE**

I certify pursuant to FRAP 32(a)(7) that the foregoing brief complies with the type-volume limitation. The total number of words in the foregoing brief, excluding the table of contents and table of authorities, is 4902, as calculated by the Microsoft Word program.

  
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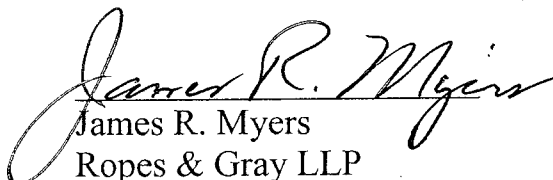
## CERTIFICATE OF SERVICE

I certify that on April 7, 2008, the foregoing BRIEF FOR AMICI CURIAE PACIFIC LIFE INSURANCE COMPANY, THE HARTFORD FINANCIAL SERVICES GROUP, INC., AND JOHN HANCOCK LIFE INSURANCE COMPANY (U.S.A.) IN SUPPORT OF APPELLEE was served on counsel for all parties via first class, postage prepaid, United States mail at the addresses specified below:

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