UNITED STATES PATENT AND TRADEMARK OFFICE

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
13/912,453	06/07/2013	Howard W. Lutnick	05-1100-C1	7127

63710	7590	09/19/2017

INNOVATION DIVISION
CANTOR FITZGERALD, L.P.
110 EAST 59TH STREET (6TH FLOOR)
NEW YORK, NY 10022

EXAMINER
SUBRAMANIAN, NARAYANSWAMY

ART UNIT	PAPER NUMBER
3695	

NOTIFICATION DATE	DELIVERY MODE
09/19/2017	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

patentdocketing@cantor.com
lkorovich@cantor.com
phowe@cantor.com

PTOL-90A (Rev. 04/07)

UNITED STATES PATENT AND TRADEMARK OFFICE

_____

BEFORE THE PATENT TRIAL AND APPEAL BOARD

_____

Ex parte HOWARD W. LUTNICK and MICHAEL SWEETING

_____

Appeal 2016–004930
Application 13/912,453
Technology Center 3600

_____

Before ANTON W. FETTING, BIBHU R. MOHANTY, and
ALYSSA A. FINAMORE, *Administrative Patent Judges.*

FETTING, *Administrative Patent Judge.*

DECISION ON APPEAL

STATEMENT OF THE CASE[1]

Howard W. Lutnick and Michael Sweeting (Appellants) seek review
under 35 U.S.C. § 134 of a final rejection of claims 58–69, 71, 72, and 74–
79, the only claims pending in the application on appeal. We have
jurisdiction over the appeal pursuant to 35 U.S.C. § 6(b).

_____

[1] Our decision will make reference to the Appellants' Appeal Brief ("App.
Br.," filed October 22, 2015) and Reply Brief ("Reply Br.," filed April 4,
2016), and the Examiner's Answer ("Ans.," mailed February 2, 2016), and
Final Action ("Final Act.," mailed January 22, 2015).

The Appellants invented an electronic system for trading order priority in accordance with specific protocols. Specification para. 1.

An understanding of the invention can be derived from a reading of exemplary claim 77, which is reproduced below (bracketed matter and some paragraphing added).

77. A method comprising:

[1] receiving, by at least one processor, a plurality of trading orders

from a plurality of trading participants

via a corresponding plurality of trading terminals in electronic communication with a server of an electronic trading system

that matches trades between the plurality of trading participants

in accordance with a predetermined algorithm for matching trading orders;

[2] arranging, by the at least one processor, at least a first and a second one of the plurality of trading orders in a stack

according to priority rules

such that the first trading order has a more senior position in the stack than the second trading order;

[3] causing, by the at least one processor, a vending of trading priority

between a priority vendor associated with the first order and priority acquirer associated with the second order,

wherein the priority vendor comprises a trader having a first trading order in the stack,

and

wherein the vending and acquiring of said trading priority includes awarding an incentive to the priority

vendor based on the priority vendor vending the trading priority to the priority acquirer,

wherein the incentive awarded to the vendor is provided as a reduction in one of brokerage, trading fees, and clearing fees;

and

[4] modifying, by the at least one processor, the position in the stack of the second trading order

based on the act of causing the vending of the trading priority.

The Examiner relies upon the following prior art:

Lutnick et al.   US 8,463,690 B2   June 11, 2013

Claims 58–69, 71, 72, and 74–79 stand rejected under 35 U.S.C. § 101 as directed to non–statutory subject matter.

Claims 58–69, 71, 72, and 74–79 stand rejected under the judicially created doctrine of obviousness type double patenting as claiming the patentably indistinguishable subject matter as another U.S. Patent.

ISSUES

The issues of eligible subject matter turn primarily on whether the claims recite more than abstract conceptual advice as to what a computer is to provide without implementation details as to how to do so.

The issues of non-statutory double patenting turn primarily on whether there is a patentable distinction between the instant claims and those of another patent.

FACTS PERTINENT TO THE ISSUES

The following enumerated Findings of Fact (FF) are believed to be supported by a preponderance of the evidence.

Facts Related to Claim Construction

01. The disclosure contains no lexicographic definition of "stack."

Facts Related to Appellants' Disclosure

02. *One important component of electronic trading systems* is order priority. Order priority is the mechanism by which systems determine which orders are matched first, second, etc. To facilitate orderly and market-efficient transactions, electronic trading systems may establish rules or combinations of rules to determine which buyers and which sellers can trade with each other at a given time. Priority rules may be based on both price, time or other suitable criteria. Typically, buyers and sellers place bids and offers for a defined class of traded goods. Each trading participant may place a bid or offer at a select price and volume. Priority may be awarded to the best or highest bid price from a trading participant who wants to buy the traded good, as well as to the best or lowest offer price from a trading participant who wants to sell the traded good. If multiple competing orders are resident in the system at the same price, then priority may be awarded to the earliest in time order among the competing orders. As such, a

queue (or "stack") of bids and offers develops in price and time
order. Spec. paras. 3–4.

ANALYSIS

As a matter of claim construction, we initially find that the claims and
Specification do not use the term "stack" as a term of art. A stack is a first-
in last-out data structure such that the last one in has a higher priority of
leaving than earlier ones in. The Specification generally describes a first-in
first-out discipline instead, that may be selectively altered based on priorities
other than order of entry. The Specification also shows it uses the terms
"stack" to also refer to a queue. Thus, the recitation of a stack in the claims
is not recitation of a particular data structure implementation, but instead a
referral to discrete one dimensional component storage. General memory
address space is a notorious example of discrete one dimensional component
storage.

*Claims 58–69, 71, 72, and 74–79 rejected under 35 U.S.C. § 101 as directed
to non–statutory subject matter*

The Supreme Court

> set forth a framework for distinguishing patents that claim laws
> of nature, natural phenomena, and abstract ideas from those that
> claim patent-eligible applications of those concepts. First, []
> determine whether the claims at issue are directed to one of
> those patent-ineligible concepts. [] If so, we then ask, "[w]hat
> else is there in the claims before us? [] To answer that question,
> [] consider the elements of each claim both individually and "as
> an ordered combination" to determine whether the additional
> elements "transform the nature of the claim" into a patent-

> eligible application. [The Court] described step two of this
> analysis as a search for an "'inventive concept'"—i.e., an
> element or combination of elements that is "sufficient to ensure
> that the patent in practice amounts to significantly more than a
> patent upon the [ineligible concept] itself."

Alice Corp. Pty. Ltd. v CLS Bank Int'l, 134 S. Ct. 2347, 2355 (2014)
(citing *Mayo Collaborative Servs. v. Prometheus Labs., Inc.*, 132 S. Ct. 1289
(2012)).

To perform this test, we must first determine whether the claims at issue
are directed to a patent-ineligible concept. The Examiner finds the claims
directed to trading an item based on the act of causing the vending of a
trading priority. Final Act. 3.

Although the Court in *Alice* made a direct finding as to what the claims
were directed to, we find that this case's claims themselves and the
Specification provide enough information to inform one as to what they are
directed to.

The preamble to claim 77 does not recite what the claim is directed to,
but the steps in claim 77 result in changing the relative priority sequence of
orders. The Specification at paragraph 1 recites that the invention relates to
an electronic system for trading order priority in accordance with specific
protocols. Thus, all this evidence shows that claim 77 is directed to
affecting order priority, i.e. prioritizing financial security sales.

It follows from prior Supreme Court cases, and *Bilski* (*Bilski v Kappos*,
561 U.S. 593 (2010)) in particular, that the claims at issue here are directed
to an abstract idea. Like the risk hedging in *Bilski*, the concept of

prioritizing financial security sales is a fundamental financial instrument practice long prevalent in our system of finance. The use of prioritizing financial security sales is also a building block of financial trading. Thus, prioritizing financial security sales, like hedging, is an "abstract idea" beyond the scope of §101. *See Alice Corp. Pty. Ltd.* at 2356.

As in *Alice Corp. Pty. Ltd.*, we need not labor to delimit the precise contours of the "abstract ideas" category in this case. It is enough to recognize that there is no meaningful distinction in the level of abstraction between the concept of risk hedging in *Bilski* and the concept of prioritizing financial security sales at issue here. Both are squarely within the realm of "abstract ideas" as the Court has used that term. *See Alice Corp. Pty. Ltd.* at 2357.

Further, claims involving data collection, analysis, and display are directed to an abstract idea. *Elec. Power Grp. v. Alstom S.A.*, 830 F.3d 1350, 1353 (Fed. Cir. 2016) (holding that "collecting information, analyzing it, and displaying certain results of the collection and analysis" are "a familiar class of claims 'directed to' a patent ineligible concept"); *see also In re TLI Commc'ns LLC Patent Litig.*, 823 F.3d 607, 611 (Fed. Cir. 2016); *FairWarning IP, LLC v. Iatric Sys., Inc.*, 839 F.3d 1089, 1093–94 (Fed. Cir. 2016). Claim 77, unlike the claims found non-abstract in prior cases, uses generic computer technology to perform data receiving, analysis, and rearrangement and does not recite an improvement to a particular computer technology. *See, e.g., McRO, Inc. v. Bandai Namco Games Am. Inc.*, 837 F.3d 1299, 1314–15 (Fed. Cir. 2016) (finding claims not abstract because they "focused on a specific asserted improvement in computer animation").

7

As such, claim 77 is directed to the abstract idea of reading, analyzing, and rearranging data.

The remaining claims merely describe the parameters for prioritizing the data. We conclude that the claims at issue are directed to a patent-ineligible concept.

The introduction of a computer into the claims does not alter the analysis at *Mayo* step two.

> [T]he mere recitation of a generic computer cannot transform a patent-ineligible abstract idea into a patent-eligible invention. Stating an abstract idea "while adding the words 'apply it'" is not enough for patent eligibility. Nor is limiting the use of an abstract idea "'to a particular technological environment.'" Stating an abstract idea while adding the words "apply it with a computer" simply combines those two steps, with the same deficient result. Thus, if a patent's recitation of a computer amounts to a mere instruction to "implemen[t]" an abstract idea "on . . . a computer," that addition cannot impart patent eligibility. This conclusion accords with the preemption concern that undergirds our § 101 jurisprudence. Given the ubiquity of computers, wholly generic computer implementation is not generally the sort of "additional feature[e]" that provides any "practical assurance that the process is more than a drafting effort designed to monopolize the [abstract idea] itself."

Alice Corp. Pty. Ltd., 134 S. Ct. at 2358 (citations omitted).

"[T]he relevant question is whether the claims here do more than simply instruct the practitioner to implement the abstract idea [] on a generic computer." *Alice Corp. Pty. Ltd.,* 134 S. Ct. at 2359. They do not.

Taking the claim elements separately, the function performed by the computer at each step of the process is purely conventional. Using a computer to read, analyze, and rearrange data amounts to electronic data query and update—one of the most basic functions of a computer. All of these computer functions are well-understood, routine, conventional activities previously known to the industry. In short, each step does no more than require a generic computer to perform generic computer functions.

Considered as an ordered combination, the computer components of Appellants' method add nothing that is not already present when the steps are considered separately. Viewed as a whole, Appellants' method claims simply recite the concept of prioritizing financial security sales as performed by a generic computer. To be sure, the claims recite doing so by advising one to receive and initially arrange incoming order data and causing some priority rearrangement based on some form of vending, which may involve fee reduction. But this is no more than abstract conceptual advice on the parameters for such prioritizing financial security sales and the generic computer processes necessary to process those parameters, and do not recite any particular technological implementation.

The method claims do not, for example, purport to improve the functioning of the computer itself. Nor do they effect an improvement in any other technology or technical field. The 31 pages of Specification spell out different generic equipment and parameters that might be applied using this concept and the particular steps such conventional processing would entail based on the concept of prioritizing financial security sales under different scenarios. They do not describe any particular improvement in the

manner a computer functions. Instead, the claims at issue amount to nothing significantly more than an instruction to apply the abstract idea of prioritizing financial security sales using some unspecified, generic computer. Under our precedents, that is not enough to transform an abstract idea into a patent-eligible invention. *See Alice Corp. Pty. Ltd.* at 2360.

As to the structural claims, they

> are no different from the method claims in substance. The method claims recite the abstract idea implemented on a generic computer; the system claims recite a handful of generic computer components configured to implement the same idea. This Court has long "warn[ed] ... against" interpreting § 101"in ways that make patent eligibility 'depend simply on the draftsman's art.'

Alice Corp. Pty. Ltd. at 2360.

We are not persuaded by Appellants' argument that the Examiner has not properly identified an alleged abstract idea or sufficiently explained why such alleged abstract idea is abstract. App. Br. 9–10. We identify and provide evidence for the abstract idea supra.

We are not persuaded by Appellants' argument that the Examiner fails to identify any additional elements and fails to explain why each additional element does not add significantly more to the alleged abstract idea. App. Br. 10–11. We identify and provide evidence for such supra.

We are not persuaded by Appellants' argument that the Examiner has not provided a separate analysis of each claim. App. Br. 11–12. As we find supra, the remaining claims only recite further parameters for the abstract idea.

10

We are not persuaded by Appellants' argument that the claims recite significantly more than the alleged abstract idea. App. Br. 12. This is a paraphrased form of the second argument and is equally unpersuasive here.

Appellants further argue that the asserted claims are akin to the claims found patent-eligible in *DDR Holdings, LLC v. Hotels.com, L.P.*, 773 F.3d 1245 (Fed. Cir. 2014). In *DDR Holdings*, the Court evaluated the eligibility of claims "address[ing] the problem of retaining website visitors that, if adhering to the routine, conventional functioning of Internet hyperlink protocol, would be instantly transported away from a host's website after 'clicking' on an advertisement and activating a hyperlink." *Id.* at 1257. There, the Court found that the claims were patent eligible because they transformed the manner in which a hyperlink typically functions to resolve a problem that had no "pre-Internet analog." *Id.* at 1258. The Court cautioned, however, "that not all claims purporting to address Internet-centric challenges are eligible for patent." *Id.* For example, in *DDR Holdings* the Court distinguished the patent-eligible claims at issue from claims found patent-ineligible in *Ultramercial. See id.* at 1258–59 (citing *Ultramercial, Inc. v. Hulu, LLC*, 772 F.3d 709, 715–16 (Fed. Cir. 2014)). As noted there, the *Ultramercial* claims were "directed to a specific method of advertising and content distribution that was previously unknown and never employed on the Internet before." *Id.* at 1258 (quoting *Ultramercial*, 772 F.3d at 715–16). Nevertheless, those claims were patent ineligible because they "merely recite[d] the abstract idea of 'offering media content in exchange for viewing an advertisement,' along with 'routine additional steps such as

updating an activity log, requiring a request from the consumer to view the ad, restrictions on public access, and use of the Internet.'" *Id.*

Appellants' asserted claims are analogous to claims found ineligible in *Ultramercial* and distinct from claims found eligible in *DDR Holdings*. The ineligible claims in *Ultramercial* recited "providing [a] media product for sale at an Internet website;" "restricting general public access to said media product;" "receiving from the consumer a request to view [a] sponsor message;" and "if the sponsor message is an interactive message, presenting at least one query to the consumer and allowing said consumer access to said media product after receiving a response to said at least one query." 772 F.3d at 712. Similarly, Appellants' asserted claims recite reading, analyzing, and rearranging data. This is precisely the type of Internet activity found ineligible in *Ultramercial*.

We are not persuaded by Appellants' argument that each of the claims must be considered separately. App. Br. 13. The Examiner did so. Ans. 19. Consideration of each claim separately does not require separate written analysis for each claim, particularly where the dependent claims are readily grouped as here.

Claims 58–69, 71, 72, and 74–79 rejected under the judicially created doctrine of obviousness type double patenting as claiming the patentably indistinguishable subject matter as another U.S. Patent

The Examiner provided no fact findings and analysis in the Final Action to support the rejection, but subsequently compared instant claim 58 with claim 1 of the '690 patent in the Answer at 10–12. There, the Examiner

finds that the content of both claims are essentially identical, differing primarily in the instant claim 58 spelling out in detail what happens as a matter of course in security trading. Claim 1 of the '690 patent is silent instead.

The Examiner is generally correct, but the instant claim 58 includes at least one additional limitation that would not be in the usual course of operation, viz. modify the position in the stack of the second trading order based on the act of causing the vending of the trading priority and a prima facie case has not been established and accordingly the rejection is not sustained.

CONCLUSIONS OF LAW

The rejection of claims 58–69, 71, 72, and 74–79 under 35 U.S.C. § 101 as directed to non–statutory subject matter is proper.

The rejection of claims 58–69, 71, 72, and 74–79 under the judicially created doctrine of obviousness type double patenting as claiming the patentably indistinguishable subject matter as another U.S. Patent is improper.

DECISION

The rejection of claims 58–69, 71, 72, and 74–79 is affirmed.

No time period for taking any subsequent action in connection with this appeal may be extended under 37 C.F.R. § 1.136(a). *See* 37 C.F.R. § 1.136(a)(1)(iv) (2011).

<u>AFFIRMED</u>