



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
12/268,773	11/11/2008	Russell Wayne Anderson	47004.000555	8924

131244 7590 03/27/2018
Hunton & Williams LLP/JPMorgan Chase
Intellectual Property Department
2200 Pennsylvania Avenue, NW
Suite 800
Washington, DC 20037

EXAMINER

BROWN, ALVIN L

ART UNIT	PAPER NUMBER
----------	--------------

3682

MAIL DATE	DELIVERY MODE
-----------	---------------

03/27/2018

PAPER

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.

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

Ex parte RUSSELL WAYNE ANDERSON, YINGXIA CHEN, ROBERT
SARKISSIAN, and XIAOFENG HE¹

Appeal 2017-003268
Application 12/268,773
Technology Center 3600

Before ROBERT E. NAPPI, MONICA S. ULLAGADDI, and JASON M.
REPKO, *Administrative Patent Judges*.

NAPPI, *Administrative Patent Judge*.

DECISION ON APPEAL

This is a decision on appeal under 35 U.S.C. § 134(a) from the
Examiner's final rejection of claims 25 through 44, 46 through 48 and 50.
We have jurisdiction under 35 U.S.C. § 6(b).

We AFFIRM.

¹ According to Appellants, the real party in interest is JPMorgan Chase Bank
N.A. App. Br. 1.

INVENTION

Appellants' disclosed invention is directed to storing and manipulating customer purchase information received from a plurality of sources. The method includes generating a model of customer spending patterns and validating the model using a portion of the customer data, using the model to estimate past spending of an individual customer and offering an additional account to a user based upon the estimated past spending. This information can be used to generate marketing information. *See Spec.* 1–2, 11, 47, and 48. Claim 25 is representative of the invention and reproduced below.

25. A method for modeling consumer behavior to estimate consumer spending, comprising:

receiving, at a preference engine, individual and aggregated consumer data including consumer bureau data, purchase data and existing customer data;

splitting, by the preference engine, the individual and aggregated consumer data into portions, the portions including a development dataset and a validation dataset that is distinct from the development dataset;

analyzing, by the preference engine, the development dataset to determine spending behavior for at least one category of consumers;

generating, by the preference engine, a model of consumer spending patterns for the at least one category of consumers based on the spending behavior determined by the analysis of the development dataset; and

validating, by the preference engine, the model using the validation dataset,

wherein the model is used to measure past consumer spending by an individual consumer over a previous period of time using a first bank account of the individual consumer maintained by a first banking entity, and to estimate past consumer spending by the individual consumer over the previous period of time using one or more other

bank accounts of the individual consumer maintained by one or more other banking entities different from the first banking entity,

the method further comprising offering an additional account associated with the first banking entity to the individual consumer based on the estimated past consumer spending by the individual consumer using the one or more other bank accounts over the previous period of time.

REJECTION AT ISSUE²

The Examiner has rejected claims 25 through 44, 46 through 48, and 50 under 35 U.S.C. § 101 for being directed to patent-ineligible subject matter. Answer 2–4.

PRINCIPLES OF LAW

Patent-eligible subject matter is defined in § 101 of the Patent Act, which recites:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

There are, however, three judicially created exceptions to the broad categories of patent-eligible subject matter in § 101: laws of nature, natural phenomena, and abstract ideas. *Alice Corp. Pty. Ltd. v. CLS Bank Int'l*, 134 S. Ct. 2347, 2354 (2014); *Mayo Collaborative Servs. v. Prometheus Labs., Inc.*, 566 U.S. 66, 70 (2012). Although an abstract idea, itself, is patent-

² Throughout this Decision we refer to the Appeal Brief filed March 8, 2016, Reply Brief filed December 22, 2016, Final Office Action mailed October 29, 2015, Appellants' Specification submitted November 11, 2008, and the Examiner's Answer mailed October 31, 2016.

ineligible, an application of the abstract idea may be patent-eligible. *Alice*, 134 S. Ct. at 2355. Thus, we must 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.” *Id.* (citing *Mayo*, 566 U.S. at 78–80). The claim must contain elements or a combination of elements that are “sufficient to ensure that the patent in practice amounts to significantly more than a patent upon the [abstract idea] itself.” *Id.* (citing *Mayo*, 566 U.S. at 72–73).

The Supreme Court sets forth a two-part “framework for distinguishing patents that claim laws of nature, natural phenomena, and abstract ideas from those that claim patent-eligible applications of those concepts.” *Id.* at 2355.

First, we determine whether the claims at issue are directed to one of those patent-ineligible concepts. [*Mayo*, 566 U.S. at 76–77]. If so, we then ask, “[w]hat else is there in the claims before us?” *Id.*, at [77–78]. To answer that question, we 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. *Id.*, at [77–78]. We have 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.” *Id.*, at [71–73].

Id.

Our reviewing court has said the “relevant inquiry at step one [of the *Alice* steps] is ‘to ask whether the claims are directed to an improvement to computer functionality versus being directed to an abstract idea.’” *In re TLI*

Commc'ns LLC Patent Litig., 823 F.3d 607, 612 (Fed. Cir. 2016) (internal citation omitted).

Under the second step of the *Alice/Mayo* framework, we examine the claim limitations “more microscopically,” (*Electric Power Group, LLC v. Alstom S.A.*, 830 F.3d 1350, 1354 (Fed. Cir. 2016)), to determine whether they contain “additional features” sufficient to “transform the nature of the claim’ into a patent-eligible application.” *Alice*, 134 S. Ct. at 2355, 2357 (quoting *Mayo*, 566 U.S. at 78). “Mere recitation of concrete, tangible components is insufficient to confer patent eligibility to an otherwise abstract idea. Rather, the components must involve more than performance of well-understood, routine, conventional activit[ies] previously known to the industry.” *In re TLI Commc'ns LLC Patent Litig.*, 823 F.3d at 613 (citing *Alice*, 134 S. Ct. at 2359).

ANALYSIS

We have reviewed Appellants’ arguments in the Briefs, the Examiner’s rejections, and the Examiner’s response to Appellants’ arguments. Appellants’ arguments have not persuaded us of error in the Examiner’s determination that the claims are unpatentable.

Appellants argue on pages 5 through 7 of the Appeal Brief and pages 2 through 5 of the Reply Brief that the Examiner has not established the claims are directed to an abstract idea. Appellants argue that the Examiner quotes independent claim 25 and makes statements that are irrelevant. Appellants state “the Examiner never explains how ‘generating . . . a model of consumer spending patterns’ is related to ‘using categories to organize, store and transmit information.’” App. Br. 5. Further, Appellants state

the Examiner never explains how these limitations are related to “organizing information through mathematical correlations.” The detailed limitations in the claim do not merely claim in the abstract “organizing information through mathematical correlations.” Rather, the claim recites a very particular way to “predict share of wallet and off-us spending, i.e., spending exercised through another banking entity.” Specification at 34:10-13. These are not merely abstract limitations that can be substantively ignored when determining eligibility under § 101.

App. Br. 6.

The Examiner has found that the claims are directed to an abstract as set forth on pages 3 and 4 of the Final Action. We concur with the Examiner, and Appellants’ arguments have not persuaded us that representative claim 25 does not recite an abstract idea. Initially, we note that Appellants’ argument that the claim recites a way to “predict share of wallet and off-us spending,” is not commensurate with the scope of the claim and is importing limitations from the Specification into the claim. Further, Appellants’ Specification describes a model as “a mathematical representation of a behavior, phenomenon, process or physical system” and one type of model is “designed to discriminate classes of objects from a set of observations.” Specification 9. Thus, when interpreted in light of the Specification the claimed generating a model and using the model to estimate data, is organizing information through mathematical correlations.

The Federal Circuit has explained that “examiners are to continue to determine if the claim recites (i.e., sets forth or describes) a concept that is similar to concepts previously found abstract by the courts.” *Amdocs (Israel) Ltd. v. Openet Telecom, Inc.*, 841 F.3d 1288, 1294 (Fed. Cir. 2016)n.2.

In the instant case, the Examiner has equated the steps of the claims with claims held to be abstract by the court in *CyberSource*. We concur. The claim 25 limitations directed to: receiving purchase and customer data, splitting the data, analyzing the dataset, generating a model, validating the model, estimating spending using the model and making an offer based upon the estimates; are limitations directed to gathering, organizing and analyzing, information. Similar limitations were held to be abstract in *Electric Power Group*. See *Electric Power Group* at 1354 (holding that claims directed to a process of gathering and analyzing information of a specific content are directed to an abstract idea).

In *Electric Power Group*, the court stated “we have treated collecting information, including when limited to particular content (which does not change its character as information), as within the realm of abstract ideas.” *Electric Power Group* at 1353. Further, the court stated that “merely presenting the results of abstract processes of collecting and analyzing information, without more (such as identifying a particular tool for presentation), is abstract as an ancillary part of such collection and analysis.” *Id.* at 1354.

Claim 25 is also similar to the claims at issue in *Content Extraction and Transmission LLC. v. Wells Fargo Bank, Nat’l Ass’n*, 776 F.3d 1343, 1347 (Fed. Cir. 2014) (holding that the claims were “drawn to the abstract idea of 1) collecting data, 2) recognizing certain data within the collected data set, and 3) storing that recognized data in a memory.”).

Thus, Appellants’ arguments have not persuaded us the Examiner erred in finding the claims are directed to an abstract idea as representative claim 25 recites a concept similar to those held to be abstract by the courts.

Appellants argue on pages 8 and 9 of the Appeal Brief and pages 5 through 7 of the Reply Brief that the rejection under 35 U.S.C. § 101 is in error as the claims recite significantly more. Specifically, Appellants assert that the claim 25 limitation directed to the model being used to measure past consumer spending and estimate past consumer spending as well as the method of offering an additional account to a consumer amount something more and as such the claim is directed to patent eligible subject matter. App. Br. 8–9, Reply Br. 6–7.

We are not persuaded of error in the Examiner’s rejection by these arguments. As discussed above, under the second part of the *Alice* test, the claims are considered to determine if the components involve more than performance of well understood conventional activities. We do not find that the limitations argued by Appellants, directed to using the models or making an offer of an additional account involve anything more than known conventional activities. Appellants’ Specification states “[a] common objective of scientific inquiry, engineering, and economics is to develop ‘mechanistic’ models that characterize the underlying mechanisms, causal relationships, or fundamental ‘laws’ underlying the observed behavior” thus, demonstrating that use of models is conventional. Specification 9. Further, the step of extending an offer is a basic financial and legal principal, which is part of commerce and contracts. As such, the claim 25 limitations argued by Appellants do not draw the claim to recite something more than the abstract concept and we are not persuaded the Examiner erred in rejecting representative claim 25, and claims 26 through 44, 46 through 48, and 50, under 35 U.S.C. § 101 for being directed to patent-ineligible subject matter.

Appeal 2017-003268
Application 12/268,773

DECISION

We affirm the Examiner's rejection of claims 25 through 44, 46 through 48, and 50 under 35 U.S.C. § 101.

No time period for taking any subsequent action in connection with this appeal may be extended under 37 C.F.R. § 1.136(a)(1)(iv). *See* 37 C.F.R. § 41.50(f).

AFFIRMED