

Patent Quality Taskforce

Preliminary report

Initial Public comments

Roundtable preparation

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Draft 1

Preliminary report

- This preliminary report on enhancing patent quality is intended to serve as the framework for additional public discussion at forthcoming roundtable meetings with a number of inventors, businesses, patent law associations, law firms and academics directed to enhancing patent quality.
- A notice to the public requesting comments on the issue of patent quality was published in the Official Gazette, as required, on Dec 8, 2009. The period to respond to the notice was extended one month to March 8, 2010. The following site is a link to the comments received .
<http://www.uspto.gov/patents/law/comments/patentqualitycomments.jsp>
- In addition to these comments, the Patent Public Advisory Board in collaboration with members of the USPTO (referred to alternatively as the Quality Taskforce) have discussed a number of potential ideas for improving patent quality. The taskforce has attempted to synthesize its ideas with the public comments for discussion at the roundtables.
- Following those roundtable discussions , the taskforce will present a set of recommendations to the USPTO. While the quality taskforce considers reducing application pendency and eliminating patent application backlog as important aspects of patent quality, the USPTO intends to issue a separate notice for public comment on the issue of pendency , and additional roundtables will be held.

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Patent quality defined

- Actions which increase the likelihood that claims granted by the USPTO are legally valid

Plus

- Actions which reduce the likelihood that valid claims are not improperly rejected by the USPTO

Divided by Timeliness

(Actions which increase process efficiency and reduce overall application pendency)

Quality definition : includes/excludes

Patent quality is not being defined to include a legal determination of the patent eligibility of any particular technology or statutory type of invention.

Patent quality is also not being defined to address the economic contribution of a patented invention or the promotion of innovation generally .

The Patent quality definition does apply to all statutory eligible inventions, and for the purpose of this study all technologies and inventions are equal .

The quality of the underlying invention is not a criteria in the definition of patent quality .

The cost of obtaining a patent either by patent registered attorneys and agents , law firms or the administrative fees charged by the PTO are not specifically included in the definition, however the cost impact of any proposed change to procedures which may be recommended to improve patent quality will need to be factored in decisions regarding fees, benefits, priorities and implementation within budget.

Comment :

Comment : The Constitution provides that central purpose of the USPTO is to promote the useful arts through granting to inventors, for limited periods of time, the exclusive use of their discoveries. This central purpose can suffer from poor quality or questionable patents. Granting a patent claim which should not have been issued is a "false positive error. It should also be appreciated that "false negative" errors (failure to issue patentable- valid claims) can also lead to negative impacts on commerce There have been some attempts to quantify the impact of false negative errors, but such losses are more often those of the patent applicant who has had their patentable invention rejected. Losses to society from false negative decisions are more difficult to appreciate. However, these potentially include loss of new innovations reaching the market, loss of investment in new technology, loss of jobs that would result from development and manufacture of

Initial Substantive Areas for Improving Patent Quality

- The Search
- The Examination
- The Application
- Administrative efficiencies
- Training and Education

The notice for public comment focused on the search, examination and patent application. The notice was inclusive and not restrictive and a number of suggestions that were received can be categorized under the general heading administrative efficiencies. For example converting certain paper procedures to electronic procedures, auditing or performance tracking and data transparency are the type of things that can be included under administrative efficiencies for improving quality. The appeal process before the Board of Appeals and the Courts is not the subject of this initial evaluation, however it is clear that appeal and re-exam, reissue or other post grant procedures must also be examined to improve process efficiency and quality, and should be the subject of a subsequent similar analysis.

Quality principles

Each patent application is potentially important regardless of business model or technology

The public and the applicant deserve to rely upon USPTO determinations

The public and the applicant deserve a thorough, accurate and timely examination of each application they pay to file and have examined

How can the existing process be optimized?

Exhaust all existing rules and procedures; enforce existing rules; pilot process changes: do no harm
- identify potential statutory and substantive rule changes

Focus on procedural process simplification, and utilization of information technology and electronic synergies

-Timeliness is not inapposite to improving quality: can do both simultaneously by removing inefficiencies
-avoid introducing unintended consequences

Quality review should address: 1) an incorrect understanding of the scope of the invention; 2) an incorrect understanding of the prior art; or 3) an incorrect application of the law or procedure.

Incent participants adopt best practices for accuracy, efficiency and effective collaboration with PTO

Incent and review performance of PTO staff: examiners, supervisors and group directors

balance metrics: A quality metric that measures incorrect issuances will tend to lead examiners to reduce issuances, which risks increasing incorrect rejections. Similarly, a focus only on incorrect rejections risks the similar unintended effect of increasing improper allowances.

Benchmark against other leading Patent Offices

Comment: Boston patent law assoc re benchmarking “We recommend that the USPTO also consider benchmarking against the operations of the European Patent Office. This would also comport with current trends towards harmonizing patentability standards worldwide and promoting work sharing among the world’s patent offices. “

Quality Improvement Process Principles

Quality requires doing things right the first time

Further align Examiner Production count system with performance and process efficiencies

- Minimize errors, rework and delays: maximize clarity and accuracy
- Move resources and prioritization to early stages of the process
- Minimize premature final rejections, unnecessary appeals and continuing applications
- Reduce overall pendency from date claim is filed to final disposition of that claim whether or not amended, or presented in a continuing application

Quality Improvement does not equal perfection

- A continuous process of improvement
- Incent Best practices for applicants and performance of PTO staff
- Focus examiner training and educate public on best practices
- Measure results
- Use Feedback from measures to make additional changes

Doing it right the first time

- Identify and Prevent “preventable” errors: miscommunication and misunderstanding
- Review and intervene quickly before unnecessary action is required
- Reduce internal patent office delays : reduce patent term extensions
- Build collaborative environment between applicant and PTO to reach closure on issues early ; resolve or appeal
- Examiner and supervisor quality performance is as important as production.
- Give examiners an appropriate amount of time to do their jobs well : don’t confuse quality with production
- Applicants have a responsibility to improve patent quality : can’t expect a silk purse from a pig’s ear
- Conduct in - process quality reviews earlier
- Measure critical process points and results
- Use metrics for continuous improvement
- Make data and measures publicly available :transparency

Measure

- To improve quality we need to be able to measure the right things
- Data can be generated and collected by the PTO to support proper metrics, but too much data collection and too many metrics can lead to analysis paralysis
- Selecting the measures that work requires review
 - Are the metrics measuring most important areas for improvement?
 - Do the selected metrics encourage desired behaviors?
- Metrics and progress or lack thereof must be clear and publicly available in real time to identify what works, what doesn't, and to identify the next opportunities for improvement

Quality Indicia : Process and Result Metrics

- *Process* metrics focus on reducing errors and improving timeliness: efficiency
- *Result* metrics focus on the ultimate quality of PTO determinations
- Examiner's performance should include process and result metrics, as well as production metrics
- Process metrics should include incentives for applicants who follow best practices

Current PTO Quality Metrics

- Pendency to first office action on merits (FOAM)
- Classification Accuracy
- Allowance rate :allowance compliance review
- Backlog of unexamined applications
- First office allowance
- In process review
- Interviews and “compact prosecution”
- RCEs
- Final rejection data
- Examiner performance (QIR)
- Examiner count system
- Overtime and telework
- New examiner hiring and retention

- Others

PTO strategic goals for 2013

- First Office Action on Merits 10.7 months
 - Currently 25.8 months
- Overall pendency 24 months
 - Currently not measured; est. 40 months
- Process efficiency increase of 3%/year
 - Overall result of a number of existing initiatives
- Reduce backlog to 330,000 applications
 - Currently over 750,000
 - Annual new original patent applications filed 450,000

“Ultimate” Quality Goals

- FOAM in 6 months
- Overall pendency 18 months
- No significant backlog
- Significantly reduce RCE trend

- 100% PTO decisions affirmed by BPAI and Fed Circuit

These ultimate goals may also be referred to as “stretch” goals- An applicant and the public should know at the time the application is published whether the claims are allowed or are under appeal (18 months). Applicants should optimally receive the FOAM within 6 months of filing the original application leaving 12 months for prosecution to issuance, appeal or final abandonment. A backlog of 300,000 applications and avg. annual new application filing rate of 450,000 means that new applicants must still wait almost a year before they receive a first office action on the merits. While this may be acceptable for the PTO in terms of maintaining the examiner corp at a steady state number of examiners, the ultimate quality goal should be driven by customer needs and not by PTO personnel management concerns .

The Search

- Quality requires that the closest prior art relevant to determining the patentability, clarity and scope of claims is identified and properly evaluated as soon as possible.
- Search must be comprehensive and done preferably only **once** per application
- Examiners must have ample time necessary to conduct the search :
how much time and credit/count should be given to the search?
- Examiners have primary responsibility to identify, apply and clearly explain either why claim is valid and allowable or should be rejected in view of the closest prior art

The search- Classification

- What aids and hinders a comprehensive and timely search?
- Proper classification before search aids examiner
- Classification : outsourcing pilot: expand if accurate
- Classification : Can it be started sooner?
- Transparency of classification to applicants
- Trilateral work-sharing: best classification algorithms
- Defined terms in specification aids classification

Public comment re classification :In response to the Federal Register notice dated December 9, 2009 regarding comments solicited to improve the USPTO's performance in identifying relevant prior art, I have three words of advice for USPTO management: Classification, Classification, Classification Without better classification, and the trained use of classification tools which already exist, U.S. Examiners will never find the relevant prior art that their European and Japanese counterparts now find with relative ease. The beauty of classification is that a document need only be classified once*, with one time-consuming review (e.g., as part of examination), and then it can be found quickly the next hundred times it may be relevant to any patentability determination. Without classification, each of the hundred Examiners would need to find it (if he/she can) from scratch (e.g., using an imperfect keyword search that inherently has a high "miss" rate) and then review and understand the document, often to the same extent that the initial Examiner did (who examined the claims), lest he/she misconstrue a reference that may have "false positive" keywords. A little classification time up front can save untold examination time down the road for the agency, while increasing patent quality. I could go in depth into the neglectful state that has hamstrung U.S. Classification since the early 1990s, but the whole ordeal is so well documented that another rehashing could not do any good. It will suffice to say that in 1990, no Examiner wanted to switch to the IPC because U.S. Classification was infinitely better. Today, the only way to find all relevant U.S. published applications in a particular technology is to search by using the IPCs (or other non-USPC schema) assigned by the EPO (or other third party sources). This neglectful state, not only of the USPC breakdowns themselves but also of the very classification of documents (e.g., as applied to PGPUBS by contractors), is utterly woeful. 1Domestic classification of U.S. patents is the single most important function that needs to be addressed if the exponentially increasing amount of prior art is to continue to be searchable, in any practical sense, by the agency in the future. The domestic classification may be harmonized with other offices (and perhaps now should be), but that harmonized function cannot be left solely to the other offices' Examiners (as it is today). Only by classification of new inventions (and newly published scientific literature) can U.S. Examiners attain the technical expertise that is essential to the examination of patent claims. Given the current state of domestic classification and the entire revamping that will be necessary due to the neglect of the previous two administrations, it is suggested that, as a mere stopgap measure, U.S. Examiners begin using, along side the USPC, the following classification systems: 1) The European Patent Classification System (EPC) - this is currently being used in only a very few U.S. arts, but should be used in all. For example, Examiners in Classes 360 and 369 can search by EPC breakdowns by using U.S. Class G9B. (NB: It is ludicrous that the USPTO doesn't just use the EPC breakdowns in G11B, and perhaps some contractor got rich off the alphanumeric-to-numeric G11B-to-G9B conversion, but the functionality of USPC G9B appears to be substantially equivalent to that of EPC G11B.) The EPC, as already applied by EPO examiners, currently covers all patent documents, foreign and domestic (though the Japanese coverage is limited to examined or applied documents), and also a very significant amount of literature. The quality (both in the subclass breakdowns and the placement of documents) is orders of magnitude better than the current USPC. This classification scheme should be applied to all documents in EAST, and the literature already classified by the EPO should be added to EAST. (NB: EAST does have an EPC field, but any alphanumeric breakdowns more precise [i.e., detailed] than the IPC have been purposefully stripped from the EAST field; of course, it is these precise breakdowns which have been stripped away from the classification data [by a paid contractor?] that are, or would be, the most valuable - what irony!) 2) The Japanese Patent Classification System (FI and F-Term) - it is possible that no U.S. Examiners (or only a very few) are using this classification scheme. FI is similar to the EPC in the specificity of subclass breakdowns, while F-Terms are an order of magnitude more precise than any other classification. (NB: If you want to see how a good classification system can be arranged, study the F-Terms in classes where the Japanese are prolific.) In technologies where the Japanese are prolific (e.g., semiconductor manufacturing), it is impossible to thoroughly search Japanese art without using FI and F-Terms. And one can almost say that it is accordingly impossible to determine whether a U.S. claim is in fact patentable without searching FI and F-Terms. The FI and F-Term Classifications, as already applied by JPO examiners, currently cover all Japanese patents and publications (including utility models). Since the work has already been done by the JPO, the FI and F-Term classification schemes should be applied to all Japanese documents in EAST, and Japanese Utility Models should be added to EAST. 3) The German Patent Classification System (DEKLA) - it is possible that no U.S. Examiners (or only a very few) are using this classification scheme. DEKLA is similar to the EPC in the specificity of subclass breakdowns, with particular emphasis in technologies where German is strong (e.g., automotive, manufacturing). Because DEKLA's "search file ICP" classification is applied to virtually all worldwide patent documents by German examiners, including U.S. patents and German Utility Models, it adds yet another avenue (besides EPC) to pinpoint relevant prior art that might be e.g. misclassified in the U.S. or have no corresponding English abstracts. Since the work has already been done by the DPMA examiners, the DEKLA "search file ICP" classification scheme should be added to all documents, foreign and domestic, in EAST. 4) DERWENT Manual Codes (EPI and CPI) - Derwent Classifications are already available in the EAST Derwent file, and cover virtually all worldwide patent documents in the electrical and chemical arts. These can be effective in helping to find relevant prior art in cases where the USPC has become or been made ineffective (e.g., by neglect of the breakdowns or improper application to documents). Classification is certainly not the "end all" of good searching, but it most certainly is the foundation of all good searching, and a necessary first step without which effective quality searching at the USPTO cannot be attained. (Validity rates since 1994 can attest to this.) Once the USPTO has its classification "house" in order, advanced search techniques can be implemented (e.g., some F-terms let you search by "image" type, combining full-text searching with F-terms yields super-high precision) and then USPTO patent quality will perhaps again be the strong backbone that U.S. industry can rely on. /David Testard/

Preliminary classification and search of provisional applications?

- Currently no action is taken by the PTO on provisional applications . Applicant obtains early priority date, but provisional application sits idle in PTO for 1 year until original application is filed.
- Can classification , and other pre-search activities be conducted on a provisional application before applicant is required to convert to original application?
- Can provisional be classified, reviewed for 35 USC 112 compliance and searched by classification contractor? Provide applicant with early ,preliminary non-binding advice; examiner still responsible for search and examination of original application. Pre search info provided to applicant and examiner
- Addition of representative claim in provisional plus a fee for such provisional review to be credited against original application filing fee

One comment suggested that the Statute be changed to eliminate provisional applications entirely. Provisional applications are fairly inexpensive relative to a search and a patentability or infringement opinion, and applicants therefore favor the filing of provisional applications without spending considerable initial effort in evaluating the potential patentability of such applications or their likelihood of infringing upon other patentee claims. Having so filed the provisional often without a thorough understanding of the relevant prior art, applicants are not in position to draft precise patent specifications and claims which really focus on what protection they are entitled to since they do not know precisely what their patentable invention might be (claim scope) until after they receive the search and first O/A on the merits (FAOM) from the examiner. This lack of knowledge results in the filing of original applications many different claims of various scope and terminology often requiring additional search time and review by the examiner . After the applicant receives the O/A only then does the applicant begin to modify the application (continuation in part), amend or add claims , re-file as a RCE, or argue vs. the cited references based on words or phrases or data found in the specification to cover multiple potential situations. This leads to extended prosecution increased application pendency and potential claim interpretation issues.

Preliminary , non binding search report on the representative claim

If the provisional application did present a representative claim and desired an advisory action, the PTO could charge the applicant a sum equal to the cost of conducting the advisory action, and such a fee (or a portion thereof) could be credited against the filing fee due upon the filing of the original application, if any. If the USPTO unions were agreeable, it might even be possible for the contractor to conduct a non-binding search of the art relevant to the representative claim for the applicant to review. Such a preliminary search would be useful to assist the applicant in re-drafting the original application or it could result in applicant realizing that since his claim was already anticipated by a prior art publication it would be prudent to abandon the provisional and not file an original application, further reducing backlog.

The art uncovered by the **preliminary search and search strategy used by the contractor would be forwarded to the examiner** along with the original application and thereby provide some assistance to the examiner's search. The examiner would still have the same amount of time as he presently has to conduct the formal binding search of the claims of the original application.

Bright and Grainger comment :Patent Office Provide a Search with Simple Opinion Ratings Require before the filing of a non-provisional application (unless foreign originating) that the Applicant provide a **one paragraph summary of their invention and up to 10 claims** (and optional drawing) to the Office for searching at a low price. The Office will provide the applicant with a simple list of references that are identified as simply X, Y or A (similar to a PCT search report). This process could be required for all applications or it could be incentivized by granting Special Status to applicants who use this process prior to starting the examination process.

35 USC §112 and the search

- Clarity of claimed invention aids search
- Is there an adequate written description to conduct a thorough search?
- Would pre-search review of application (original or provisional) for 35 USC 112 compliance, possibly by classification contractor, aid examiner in search? Are claim terms undefined, inconsistently used within application , lack antecedent basis or support, etc.?
- Could such a review be conducted of provisional applications containing a representative claim? Advisory action on provisional would notify applicant of possible deficiencies within 8 months of filing provisional to permit applicant to make corrective action in original application.

Representative claim in Provisional application

If a provisional applicant were to provide a representative claim(s), would it be possible for a **contractor** to review the provisional application to determine whether if it were to be filed as is, it would meet the requirements of 35 USC 112, and if not, to identify its deficiencies: Inadequate written description, lack of antecedent basis between the provisional claim and the specification or other internal inconsistent, or undefined or unclear terminology? Would such an advisory action lead applicants to file a higher quality original applications that could be searched and examined quicker? Is it possible that certain provisional applicants upon reviewing the advisory action would abandon their application and not file the original application at all? Many who file provisional applications do so to preserve a filing date and then seek financial support for their inventions. While this is one of the advantages of the provisional application, those reviewing the provisional application to determine whether funding should be provided have no clear understanding of either the potential scope of the future patent, if any, or the deficiencies of the application. An advisory action could either reinforce or reduce the applicant's position with investors unless applicant thereafter made modifications as suggested in the advisory action.

Comprehensive Search and Gap Analysis

- Quality requires the search be comprehensive
- The ultimate goal: PTO should never miss any relevant prior art;
 - “Non public” prior art: offers for sale and on sale bars are problematic. Search of foreign language publications and patents must be improved in first inventor to file system
 - Time study for examiner searches by technology area: How much time does an examiner need to conduct a comprehensive search of all claims: one time
- Gap analysis : What types of prior art references are missed by search?
Trends or technology art specific issues?
 - Litigation, post grant opposition and reexamination identification and applicability of new prior art is result metric
 - Categorization of missed prior art type by technology area
 - Benchmark with other patent offices : best practices
 - Search quality metric applied to examiner performance
 - Examiner must read the entire application before search and exam

The thoroughness of a search is dependent on the completeness of prior art databases used, and the search strategies, skill and techniques employed.

Are certain search techniques used in the private sector more advanced than those used by the PTO, and if so, can the PTO gain access to these databases and techniques? It seems that there are some better search software available to private industry than to the PTO.

Would the use ,for example, of semantic analysis (concept identification) improve the identification of the closest prior art over conventional word correspondence searches ? Can the PTO search software be updated and improved, and if so, can private entities be contracted to assist the PTO ?

Can search techniques, strategies and databases used by other major patent offices be shared electronically ? JIPA suggests that they believe this is possible now. Is HTML conversion of us applications the stumbling block- and if so can this be outsourced?

Identify gaps

Can we identify gaps in search thoroughness by technology area or art unit, and if so, how can such deficiencies be cured?

For example, if the contention that the most relevant prior art in certain technology areas are not present in patents or printed publications (data from re-exam and litigation), where are they, and how can the PTO gain access to this data or improve their ability to identify the relevant art? Would private enterprises be willing to post recent developments on some open source available to everyone including the PTO? Some comments were focused on social media and wikis to assist examiners to uncover relevant prior art.

comment : Boston patent law assoc: The quality of the prior art search can be measured, for example, by 1) identifying the frequency of occurrence of new references not cited in the first Office Action, and 2) (where applicable) identifying the correlation (same art cited) between the prior art search and a PCT search conducted by a different authority, or other corresponding international searches, e.g., by the European Patent Office for a corresponding European application. In particular, the presentation of new references not cited in the first Office Action should be monitored and discouraged, except where it is required in view of amendments presented after the first Office Action. Repeated presentation of new prior art after the first Office Action can greatly increase pendency and frustrate the process of expeditiously focusing the claims on allowable subject matter.

Expand and Improve Search Techniques, software and work-sharing

- Address and expand existing database and search techniques
Search software Improvements: concept algorithms
-Partner with private search engines
- Accelerate Trilateral Work sharing : open database , search compatibility
 - Patent offices automatically provide search results of first search authority electronically to other patent offices
 - Can applicant provide “intent to file” form to first filing Office identifying other patent offices the applicant intends to file corresponding applications: Intent to file not binding but used solely by patent offices for enhanced work sharing and notification

Work sharing- expanded: A number of comments focused on expanding cooperation between the major patent offices on the search .

Data from applications that have gone through a search and examination in another patent office , e.g. the patent prosecution highway (PPH) in which the claims of counterpart applications filed and examined first in another major patent office are used by the second office, indicates that such counterpart search and examination reduces re-work by the second patent office and reduces pendency .(PTO has data)

(I would welcome additional thoughts on how PCT applications could be searched differently to speed up the process and what the barriers are to work sharing)

Speeding the transfer of prior art (electronically without need for applicant to receive and then forward) uncovered by other offices among patent offices who will be or are examining counterpart applications should also improve quality and reduce pendency (esp. as long as overall pendency exceeds 28 months).

At the present time, applicants who become aware of new art from the search results of other patent offices on counterpart applications have the burden to notify the first patent office of the existence of the art. Why can't each patent office notify each other directly of the art that was uncovered by the first office and provide the other offices with the results of their search as soon as that search takes place?

Could a mechanism be designed such that an applicant could, at the time of original filing , identify the other patent offices they intend to file counterpart applications (not limiting but solely to allow the search results to be forwarded to such offices) or do so when such applications are filed so that those offices could provide each other the results of their searches as soon as they are conducted?

The positive data from the PPH seems to suggest that, despite legal difference concerning how prior art references should be applied under the laws of different jurisdictions, examiners tend to trust the search and examination results of other examiners, but apparently place less reliance on the search results of applicants.

microsoft comment on worksharing

Deepen and Expand International Cooperation on Search and Examination Although not specifically mentioned in the Federal Register Notice, Microsoft strongly believes that improved work sharing among examining offices can be an effective mechanism to rationalize the use of resources. In brief, work by a patent office where a patent application is first filed, search and examined should be taken advantage of by patent offices of second or later filing. This will allow more resources to be focused on improving quality of patents granted by the USPTO and reducing

Third Party Search Assistance and Search Specialist Examiners

- Third party assistance: examiner posts questions via social media- Wiki:
 - Is voluntary “peer to peer” not enough?
 - Incent third parties to provide prior art : bounty
- Can search efficiency and effectiveness be improved by use of search specialist examiners having state of the art technological knowledge and higher search engine and software expertise?
- Can PTO partner with private search firms to improve search effectiveness and efficiency?
 - Obtain benefit of leading edge search strategies and techniques

Microsoft comment on Peer to Peer:Our experience with the Peer-to-Patent pilot is that art found by the pilot is rarely considered more relevant than the art located by the examiner. However, we are unable to assess the benefit to the examiner from seeing how others characterized the invention and the art that was considered relevant. It may be the case that, while the art found by the pilot was not cited in an office action, the report produced by the pilot helped guide the examiner’s consideration of other art. At a minimum, however, we question the viability of scaling a program such as the Peer-to-Patent pilot to encompass all examined applications. It is unclear that such a program would be viable at a large scale.

Emerging social media technologies could be implemented within the USPTO to improve knowledge sharing, along the model of a motivated patent search community. **Examiners may benefit from more opportunities to collaborate on searches that span technology disciplines, and to share knowledge about effective patent search techniques.**

Implementing social media within the USPTO may be an effective way to support and encourage this type of activity, even for examiners who work remotely. These platforms could also potentially be used to reach out to the community of patent agents and applicants to increase the quality of their prior art searches.

comment from intellectual ventures: Third Party Submissions. We suggest that third parties be allowed to submit prior art at any time after publication and prior to a notice of allowance being issued for any patent application and any patent being reexamined, but only upon the condition that such submissions include (a) an identification of the claim elements to which each prior art reference is relevant, and (b) an identification of the specific wording and/or figures in the prior art that are relevant to each claim element (not merely claims as a whole, but specific elements). To avoid adding excessive burden on examiners and applicants, we suggest that no arguments be allowed with such submissions, or merely minimal explanation to point out the relevance of the cited

Open Source prior art indexing

- Many software inventions are first disclosed to the public when they are included in open source software (OSS). These innovations can be made public before patent filings using similar ideas.
- It can be time-intensive and inconvenient for examiners to inspect all of the many potential open source software projects that might include that particular feature.
- It is an obvious advantage of using OSS as prior art that the source code is available to the public. **An additional feature that makes it especially attractive as a source of potential prior art is that most OSS projects are stored in source code revision control systems (e.g., Subversion5), making it possible to examine the state of a given project on a certain date.**
- **indexing and archiving of public OSS project web sites, such as sourceforge.net, in a form that efficiently stores indexes to source code and documentation for specific dates.** In such a form, examiners could specify the priority date of the patent application in question and be able to identify open source software projects that matched an architectural description or keywords at a specific date.

IBM's comments regarding open source as prior art

Open Source As Prior Art (OSAPAI) Open source software has existed for over two decades and covers many different technology areas. Given its inherent public availability, open source software could be a good source of prior art to be used during the prosecution of many software patent applications. Since 2006, the OSAPA project has been working to create a search tool that enables the identification of open source software that may be valuable as prior art against software patent applications. The OSAPA team includes representatives from IBM, the Office, and the open source community. Currently, the OSAPA team is working with developers to create a search tool that can take advantage of publicly available search engines to identify open source software. This tool would enable examiners to review the information provided in particular open source software to determine whether it could be used as prior art against a specific patent application. Also see comments from Black Duck software and koders.com

The search and the Information Disclosure Statement (IDS)

- Does IDS aid examiner search? If not , why not?
- Why don't examiners utilize IDS as basis for their search? time/credits?
- How can a large number of applicant supplied prior art references be more efficiently and effectively analyzed by examiner before search?
- Should rule 56 be changed to limit IDS to "non public" prior art? Incentives for disclosure of non public prior art
- Expand training and education for examiners and applicants on searching

Putting aside for a moment the cloud of inequitable conduct allegations in subsequent litigation stemming from the applicant's knowledge , disclosure or characterization of the prior art found during searches, one would logically assume that if the examiner reviewed the applicant's pre-filing search results before the examiner began to search, the time taken by the examiner to complete the search would be reduced and the identification of substantive prior art issues involved in examination would occur earlier than if an applicant and the examiner were not aware of the prior art , or if the examiner were not aware of what the applicant considered to be the most relevant prior art before the examiner conducts his or her search.

But since the examiner is required to conduct an independent search (is that interpreted to mean that examiners should not read the references in the IDS before searching?) no efficiency is gained by IDS submissions. Is this an examiner performance issue or a result of the count system? From data collected by the PTO , it does not appear that the existence of an IDS per se reduces pendency suggesting that the examiner may not be reading the IDS references or that the examiner is not interpreting these references the same way as the applicant.

Do applicants require additional education, (on line) training (search strategies etc) or access to databases and techniques used by examiners to search better? Would examiners who take the time to review the prior art identified in and IDS before conducting their own independent search end up doing a better search more quickly if they were confident that applicants IDS was based on a search using the same techniques and databases as they used?

There is a general sense that examiners tend to ignore prior art identified by the applicant or discussed in the background in favor of art found by an examiner or Office Search. The

Applicant searching

- Applicant's knowledge of the closest prior art before filing results in improved quality patent applications with clear claim scope and reduces pendency.
 - Properly defining a patentable invention is guesswork if you don't know the closest prior art
- Without inequitable conduct reform, how can we provide incentives to applicants to conduct thorough pre-filing prior art searches?
 - Accelerate examination for those conducting search; no characterization of prior art nor disclosure of search strategy; just a check box on application transmittal to effect that applicant conducted a pre-filing prior art search
 - Create best practice search papers for applicants
 - Expand PAIR capability to search more than one file history at a time

One would logically postulate, as a general proposition, that if an applicant conducts a thorough prior art search before filing, the claims of the invention that are filed will be drafted to more properly distinguish the invention from the prior art than if no search is done before filing. It would also logically follow that pre-filing search and claims drafted in light of the closest prior art known at the time of filing (raising the question about pending unpublished applications) would reduce pendency as compared with the claims that are initially presented when the application is prepared and filed without the benefit of a pre-filing search. If applicants were incented to conduct pre-filing prior art searches one would likely believe that such actions would improve quality and reduce pendency.

Creation of best practices and "how-to" type articles to help applicants perform initial patent searches.

For example, the USPTO could use either an internal or external wiki platform to collect best practices for search procedures by class, with an incentive system for examiners to contribute. An example of wiki best practices related to patent searching can be found at <http://www.intellogist.com>; users must complete a free registration process on the site before adding to the existing literature on the subject. The **USPTO could utilize discussion forum technology or live chat to provide assistance to those submitting an application or responding to an office action.**

Finally, it's important to acknowledge that the creation of a **public USPTO forum will need to be heavily moderated** and require an extra investment of both time and money, possibly to the point that such a venture would be prohibitively complex and difficult. Thus, we suggest that rather than the creation of such a forum, **the USPTO could encourage patent examiners and/or support staff to register and communicate with the public via an online community hosted by a third party**, such as <http://www.intellogist.com>. Using this strategy, examiners would be able to make comments in a non-official capacity while still experiencing the knowledge transfer that is generally associated with participation in a community of practice.

The current inability to search more than a single PAIR record at a time is a significant problem hampering public access to useful data regarding applications' prosecution history. The PTO should lift this restriction as it interferes with the public's ability to search and work with this valuable source of information.

Incent Applicant searching

- Applicant pre-filing search is desirable for patent quality; proper scope and knowledge of closest prior art as soon as possible helps applicant properly define and distinguish claimed invention from prior art
- Willful infringement and Inequitable conduct allegations hinders some applicants from conducting pre-filing search and characterizing prior art found: statutory remedy required to change applicant behavior
- What incentives can PTO provide to applicants who conduct pre-filing search to compensate from potential litigation risk? Would expediting examination of applications with IDS or applicant's top 5 five references change behavior despite risk?

Penalty : One comment suggested that perhaps there should be a penalty fee for patent requesters who have submitted patents whose patent requests are rejected or their issued patents to be revoked (as anticipated) by the 'prior art'.

Comment from Pharma:***The PTO Should Appreciate That Applicants Want To Assist Examiners But Are Constrained By The Inequitable Conduct Doctrine To Characterize Prior Art Under the doctrine of inequitable conduct, a court can render an entire patent unenforceable based on a finding that the patentee withheld or misrepresented any material information with the intent to deceive the PTO. Courts have stated that the original purpose of the inequitable conduct doctrine was to prevent patentees from enforcing patents that were acquired by fraud.^{25/ Over the years through case law, however, the courts have significantly weakened the requirements for proving inequitable conduct and strayed far from the important purpose of the doctrine. Using malleable and vague judicially created standards, the Court of Appeals for the Federal Circuit has upheld inequitable conduct findings based on litigation- inspired second guessing of minor mistakes made during patent prosecution that have no bearing on patent validity.^{26/ Such cases make the application of the inequitable conduct doctrine highly unpredictable.}}***

Former Under Secretary Dudas acknowledged that the unpredictability of the inequitable conduct doctrine “results in counterproductive behavior before the [PTO]” that reduces the quality of patent prosecution.^{28/ He explained that the inequitable conduct doctrine creates an environment that discourages applicants from explaining their submissions, for fear of making a misrepresentation, and encourages applicants to disclose an excessive number of prior art references, for fear of omitting a material reference.^{29/ To the extent that the PTO is suggesting in its Federal Register notice that patent applicants should characterize prior art for the examiner, or otherwise lead the examiner to the “best}}

Incent Expanded Search Access

- Inventors desire electronic access PTO search facilities : what is the barrier to public access and utilization of PTO search tools and databases?
- Open sources : How can PTO utilize open source platform to enhance search in emerging technologies?
- Encourage third party prior art submission early-incentive : Peer to Peer pilot's limited effectiveness result of added third party work with no credit
- Assignee filing, and small and micro entity designations could provide mechanism for financial credits for such third party submission of prior art .

Provide access to the data that examiners use for searching.

Access needs to be opened up to WEST and EAST terminals over the Internet. The PTO should partner with multiple search providers to make this information available for free.

IBM's comments on Peer to peer

Peer-to-Patent Pilot The Peer-to-Patent Pilot is a project that IBM has long supported and continues to support with enthusiasm. It represents a much-needed improvement in openness, by recognizing that expertise residing in the general public can be put to effective use in helping to find relevant prior art, and in transparency, by providing a means **for the public to openly collaborate to find and refine helpful information. This shift to a more cooperative approach is welcomed and encouraged. IBM believes the Peer-to-Patent pilot has demonstrated the powerful potential of open collaboration to put the best prior art before the examiner. In the course of the pilot, participating applications received many times the number of prior art submissions received in traditional third party processes. At the same time, early fears of some that examiners would be deluged with an excess of art did not materialize. Also encouraging is the much higher incidence of non-patent prior art submissions resulting from the pilot; this was a desired outcome since non-patent prior art has traditionally presented a challenge for examiners to find and apply. Importantly, there were many cases in which the examiner relied on the Peer-to-Patent submissions to reject claims, leading either to abandonment, narrowing of overly broad claims, or clarification of unclear claims. We are encouraged by the results so far, but we also think the program needs to be nurtured and further developed to maximize its effectiveness. In moving forward, IBM would like to see the Office take a stronger leadership role in transitioning the program to the next logical stage. Some particular suggestions for actions the Office might consider taking to signal the seriousness of its interest in pursuing collaborative solutions to the problem of finding prior art include: Re-opening the pilot and expanding its scope in terms of eligible technologies and increased sample size. Taking a more active role in building awareness**

Examiner Search Performance

- Examiners should read all prior art references in IDS and the entire specification – not just claims before conducting search. Is current time and count system commensurate?
- Result metric from litigation, opposition and re-exam should be feedback to examiner and used to measure examiner performance (plus and minus)
- Are search gaps a function of application technology? Utilize PTO QIR data : measure time for search vs. results

The USPTO provide incentives to examiners to follow **Compact Prosecution**, issue only relevant and meaningful Office Actions rapidly, to identify patentable subject matter early, and to provide timely and complete responses to Applicant's papers. Examiners are currently provided incentives in the form of bonus payments for exceeding production goals. Similar incentives could be created to encourage examiners to carry out examination according to high examination quality metrics,.

Pre- Examiner Search Interview

- Permit applicants an opportunity to conduct an interview with the assigned examiner. after the examiner has read the application, but prior to any search.

Comment from 3m : Pre-Search Interview. 3M IPC suggests that applicants be allowed an opportunity to conduct an interview with the assigned examiner. after the examiner has read the application, but prior to any search. The scope of the interview would be limited to achieving a mutual understanding of how the claim terms will be interpreted for purposes of the art search and subsequent prosecution. Prior art might be discussed, but only in the context of explaining the meaning of the claim language, e.g., by establishing or distinguishing the intended scope of a claim term from terms used in the prior art. Prior art from a patentability point of view in terms of 35 USC § 102 and 103 would not be discussed. **The process used to inform applicants of their opportunity to request a pre-search interview could be similar to current restriction requirement practice, whereby the scope of the search is also defined. That is, the examiner would contact the applicant after having reviewed the specification and claims and prepared a restriction requirement, if appropriate. The applicant would then have a fixed period of time to request and conduct this preliminary interview. In addition, the examiner could request the interview if he or she believes additional clarity of the scope and meaning of claim terms is required. Consistent with the needs to interpret claims broadly during prosecution and to provide clear public notice of the claim scope, a pre-search interview summary should be required, and applicants should be permitted to file claim amendments resulting from such an interview, if necessary. This approach would provide a sound basis for a more focused search, and consequently reduce the examiner's search burden. This approach should also reduce the need for subsequent searches and RCEs that are caused by applicant's need to make amendments solely to reconcile differences between the intended meaning of a claim term and its broadest reasonable interpretation as determined by the examiner. Finally, by starting from a common understanding of the claim scope, the subsequent prosecution should be more effective and efficient.**

Reporting the Search Results to Applicant

- Provide applicant with examiner search report indicating relevance of closest prior art

Move applicant IDS requirement to follow search report:

If applicant subsequently identifies more relevant prior art than identified by examiner in search report (reference used by examiner in rejection), applicant would receive a financial credit against patent fees in that application

Consider benefit of pre examination, post search teleconference with applicant

Search report to applicants before first O/A

Would pendency be improved if, before the examiner took the time to draft a first office action on the merits, the examiner were to provide the applicant with the results of the search- indicating the most relevant prior art (like EPO), and **then applicant were to submit an IDS and thereafter schedule a telephonic interview with the applicant to discuss the art.** During such a pre O/A interview/teleconference both the applicant and the examiner would exchange views on the relevancy of the art uncovered. In this manner, the applicant might realize that certain amendments (preliminary amendment) may be required to the claims to distinguish the invention from the references, and it might also help the examiner realize why the applicant feels that certain references are distinguishable from the claimed invention. If there is a technical issue in terms of appreciating the underlying technology an ombudsman could be employed to resolve the issue.

With this information in hand, the applicant could simply state that a preliminary amendment or no amendment will be presented until an O/A is presented, or conversely the examiner would be in a better position to issue a better first O/A on the merits.

The examiner's count system would need to be modified to give examiner's credit for such a pre O/A interview, but the first office action interview pilot (interview after first O/A issued) clearly demonstrates that the additional time taken by examiners at the earliest stages of the prosecution provides significant benefits in reducing overall pendency, therefore such additional time for the search report/ review of subsequent IDS and pre-first O/A interview teleconference should also reduce pendency and improve efficiency.

Comment Bright and Grainger :Eliminate the Requirement for Applicant to Cite Patent Literature

Patent examiners are generally better than applicants in finding the most relevant patent literature. Applicants are generally better than examiners in finding the most relevant non-patent literature. Eliminating the applicant "dumping" a bunch of patent references on the examiner will allow each party to focus on the most relevant prior art references. Applicant will still provide the patent references that are the most relevant in

The Examination

- Quality examination requires the proper interpretation and application of the closest prior art to the claims and clear statements for rejection and allowance.
- Focus on the first Office Action on the merits: review first office actions
- Cite the best references and make the best rejections immediately: compact prosecution
- Enforce 37 CFR 1.104 (c)(2)
- Proper balance in examiner performance for allowance and rejection. Current balance favors rejection and continuing prosecution. Monitor new count system and drive further to increase front end credits and reduce later stage count credits.
- Rejection and allowance must explain examiner's technical reasoning; not conclusory unsupported statements
- Create standards for examiners to identify portions of cited reference of relevance
- If rejection and objections are overcome, claims should be allowed; not subjected to another search and application of new prior art. Do it right once
- Reject all inadequately described claims
- Require antecedent basis for amended claims
- Active amendment suggestions by examiner
- Explore accelerated exam and Fast tracking examination mechanisms: cap and trade

Review first office actions for quality: Comment Intellectual ventures: the issuance of a first office action should be closely monitored for quality. We recommend that at least a certain percentage of first office actions issued by non-primary examiners be reviewed by a panel of examiners for quality. For example, in the accelerated examination program, the examiner's Supervisory Primary Examiner, a primary examiner, and a third examiner are required to review and approve the proposed first office action. In our experience, it appears that the current review of junior examiner work product by senior examiners in regular applications is, at times, cursory at best. **A panel review of a first office action** leads to a substantially higher quality first office action, which increases the quality of prosecution while reducing the pendency of applications. Additionally, examiners are more likely to be thorough knowing that their work product will be subject to panel review, at least with some of the first office actions.

3m comment:**Detailed Citations in Office Actions.** As a further aide to ensuring a common understanding of the examiner's interpretation of both claim terms and corresponding elements in the prior art, the examiner should provide specific citations indicating what elements in the cited references he or she believes correspond to each claim term. This step may seem unnecessary; particularly where the reference and the application being examined use the same word. However, even when the examiner provides a citation to a portion of the specification or a drawing, it is often difficult to determine precisely which element he or she is relying on. In addition, the examiner should indicate where the reference describes these elements, aiding the applicant in understanding why the examiner concluded the element of the prior art corresponds to the claim term. Again, in some cases this step may seem unnecessary. However, it can be unclear whether the examiner is intending to rely on an identical element used for the same purpose, the identical element used for a different purpose, or an obvious variant used for the same or a different purpose. Without knowing why an examiner is relying on a particular teaching

Examination : Technical Accuracy and Ombudsman Pilot

- Understanding of technology and terminology used by applicant is critical to proper examination
- Finding the closest art doesn't mean it is properly understood or applied
- Does the cited reference actually disclose, or suggest the claim limitation? Identify improper instances of word matching without technical explanation
- PTO ombudsman pilot : applicant should have access to ombudsman when applicant feels that examiner is not understanding claimed invention compared with the prior art
- Consider formation of an external technical advisory board for examiner consultation
- Examiner should not reject applicant's technical statements and arguments ("merely attorney argument" not worthy of full credit) and insist on declarations

Comment :In quality discussions, applicants postulate that prosecution pendency is unnecessarily extended because the examiner doesn't understand either applicant's claimed invention , the data in the application or that of the prior art references, or properly interpret and apply the data to applicants claims. Clearly if the applicant believes that the examiner is misunderstanding the prior art disclosure or teachings, closure on anticipation and obviousness determinations is not possible or is delayed.

IBM comment regarding **Ombudsman pilot:**

Ombudsman Pilot Program The Ombudsman pilot program can improve examination by ensuring that applications proceed through prosecution in accordance with established Office procedures. To enhance efficacy, the public should be made aware of the issues the Ombudsman has authority to address and those issues which will be referred to others for resolution. Also, the Office should provide an avenue for further pursuing an issue if an applicant is not satisfied with the Ombudsman's proposed resolution or the resolution proposed by other entities within the **Office to whom the issue was referred. To promote transparency, the Office should establish a database for tracking issues handled through the Ombudsman Program and it should be open to the public. Useful metrics to evaluate the program would include: the number of requests received; the types of requests received (to determine if the system is being used correctly); the time elapsed until applicants' issues are resolved {to determine if the program is becoming more or less efficient in resolving process related issues -evaluated perhaps through a customer survey), and over the longer term, whether there is any incremental reduction in application processing time. These metrics should also be broken down by Technology Center so that the Office can identify areas that have higher problem rates. The Office should consider what adjustments would be needed if there is a flood of requests relating to issues not appropriate for the Program, or if there simply are more requests than can be resolved in the committed time periods due to lack of resources.**

Here's a place for that ombudsman or technical advisory board.

An examiners reasoning to reject or allow claims based on the prior art reviewed must be clear and technically correct so that applicants and others who review the file history understand exactly the examiner's position. If the rejection merely points to the existence of similar words in prior art references and doesn't provide a clear technologically sound explanation for the rejection, closure is not possible and pendency will not be reduced. (one comment focused on improving the stated reasons for allowance to limit future disagreements concerning how the examiner interpreted the art)

Examiner's may conversely postulate that applicant's may not properly appreciate the prior art or understand why their claims are anticipated or unpatentable as being obvious in view of the data.

Examiner Examination Performance

- Acknowledge that not all applications are of equal complexity: more time required to examine some vs. others
- Develop mechanism for applicants to address examiner performance
- Enforce correct examination practices
- Increase MPEP case citations
- Improve 35 USC 103 guidelines
- Encourage more examiner suggestions as to how to advance prosecution
- All US Examiners must be able to communicate clearly in English
- Ombudsman can assist if applicant doesn't understand Examiner
- QIR data should evaluate examiners where English is their second language

Tiered examination for complex applications: GSK comment Tiered examination process for applications The PTO should consider differentiating (in addition to the fast track option discussed above) applications based on objective criteria that determine the degree of time and expertise required on the part of an Examiner during the examination process. Such differences could be based on criteria such as, but not limited to, the underlying technology of the application, the overall length of the specification, number of working examples, number of references cited by the Applicant and number, type and scope of the claims. Based on these criteria, it would be possible to categorize each application. For example, a rating of 1 would be assigned to a very complex case based on the mentioned criteria, a rating of 2 would be of moderate complexity and a rating of 3 would be of low complexity. Each categorized application would then be tiered to the number of counts and the time allotment allowed for the initial search and subsequent examination process. A mechanism for Applicants to petition the category assigned by the Examiner and to interview with the Examiner solely to discuss category assignment would be suggested to ensure objectivity. Using this system, Examiners would receive sufficient time for a comprehensive initial search and review. The result would be an examination process aligned with the appropriate amount of time needed to complete a high quality comprehensive search and consideration based on the **broadest claim and** complexity of the art. This would also help with providing Applicant with a comprehensive first Office Action on the merits.

Application fees and possible other fees associated with a tiered examination process could be adjusted to allow for an increase in fees for more complex cases. While statutory considerations would need to be taken in to account, an increase in fee for more complex applications might be justified based on opportunity costs and would further provide incentives to Applicants to submit a comprehensive initial application with the appropriate scope and number of claims.

Mechanism for examiner performance: Microsoft comment Quality of a case in

Role of Supervisors and Quality review

- Do Supervisors aid or hamper quality and pendency? Who is reviewing supervisors?
- When do examiner's become involved in examination?
- Are supervisors supervising? Are they reading the O/A s of those they supervise?
- Do they review FOAM or only upon final rejection: get it right the first time
- Improper rejections identified by Supervisors should be tracked and used for examiner performance review ; factor into count system
- If examiner does not qualify to be a supervisory examiner within reasonable time should examiner be retired?
- Result metrics should include supervisors
- Supervisors should review O/A, restriction requirements , final rejection, allowance and examiners answer on appeal before mailing
- Initiate Quality review after first O/A, and first O/A following RCE
- Focus Quality review on 35 U.S.C. 5 132(a) and 37 CFR § 1.104 Requiring Compact Prosecution
- PTO should publish standards used for Quality Review
- Use QIR to focus quality review on "outliers"
- Reduce use of form paragraph rejections
- Expand Examiner training : 102 (e) and PCT unity of invention

Comment:

It would be helpful if there was some mechanism by which anomalous activities by PTO personnel (e.g., OIPE staff, Examiners, Primary Examiners, and SPEs) that adversely affect quality and/or pendency could be brought to PTO management attention for targeted training, without risk of negative consequences to the attorney or applicant in current and future patent applications. For example, we have had instances in 2009 where different Examiners have stated that "my SPE will not allow a case unless at least two RCEs have been filed" and "I [or my art unit] never allow applications." We have also had instances where the Primary Examiner has been wrong, the SPE agreed the Primary Examiner was wrong, but the SPE indicated he was powerless to do anything.

Supervisors add to pendency? : track actual examiner and Supervisor results- use it for performance management and training :QIR

Increasing the examiner's technical and English language linguistic understanding concerning the art would improve the quality of examiner determinations. The patent office presently points to the supervisory role that a primary or more experienced examiner has in reviewing the appropriateness of junior examiner determinations, but do Supervisors review each O/A before it is sent out and each subsequent review of an initial determination and argument regarding that determination only increases pendency. The objective should be to get it right the first time and not rely on back up reviews to catch mistakes.

Supervision is said to be useful to reduce improper interpretations by less skilled supervised examiners (should an examiner have a limited period of time to advance to supervisory rank or be retired?), and data concerning the affirmation or reversal of determinations made by individual examiners and their supervisors at the BPAI and Fed Circuit on the same art that was before them during examination should be useful to identify which examiners and supervisors are doing higher quality work than others as well as identifying areas for improvement and/or additional training for individual examiners.

The PTO is collecting (QIR) detailed data concerning individual examiner performance on both pendency and quality (as currently measured by the PTO) by tech sector/art unit, and this should be useful data to base decisions for additional areas for improvement for individual examiners. This data should be maintained by the PTO in confidence , not be made public to applicants, and should only be used to provide constructive feedback to examiners. It should not be used, except possibly in extreme circumstances, to penalize or terminate examiners.

Examiner and Supervisor Performance Reviews

- Establish and Publish Performance review metrics for Examiners and Supervisors: best practices
 - mentoring for hotelling examiners
- Conduct annual performance reviews according to standards: rank examiners and supervisors in art units according to performance as well as production
- Address performance issues promptly

GSK comment re mentoring Examiner Availability, Retention and Training We understand that the PTO is able to hire more Examiners through the use of hotelling and remote working, and we support these accommodations. However, we also have a concern that it is more difficult to contact Examiners under these circumstances. We have also observed that junior Examiners may not get the same level of training where their supervisors are not physically located near them on a regular basis, which reduces the amount of informal training and mentoring. A mentoring program could facilitate enhanced interactions between more experienced and junior Examiners. Experienced Examiners are valuable and should be given extra merit based incentives.

Performance quality of attorneys and agents

- Most important role of patent attorney is to prepare and prosecute patent applications in highest quality manner : Can't expect to be able to successfully enforce claims if they are of questionable validity
- Develop mechanism to address attorney/agent performance
 - PTO mechanism to inform law firm or corporation of attorney /agent performance : best practices
- Would Quality improve if performance data of attorneys and agents were public?
 - What is track record of attorney/agent?
 - What is attorney/agent's pendency?
 - Frequency that attorney/agent utilizes RCEs
 - Result metrics : allowances, appeals, litigated claims
 - Data could incent attorneys/agents to improve performance: best practices

PTO feedback to firms re attorney/agent performance

Similarly, it would be helpful if there was a more formal mechanism by which anomalous activities by practitioners could be brought to their attention and I or the attention of their firm's management for performance management and targeted training, without rising to the level of PTO disciplinary measures. On occasion, senior examiners have called firm management to discuss, for example, unproductive approaches taken by practitioners at interviews. This is very helpful to the firm and applicants, but is very uncomfortable for the examiners and thus generally only used in extreme circumstances.

Microsoft comment: mechanisms should be instituted by major applicants for USPTO concerns about the behavior or conduct of individuals representing applicants in prosecution efforts. For example, Microsoft has instituted an initiative to provide examiners with a point of contact to provide concerns or complaints about any attorney working on behalf of Microsoft before the USPTO. The response by the Office has been positive, and the information received has helped Microsoft improve not only the quality of our representation, but also relationships with examiners. The USPTO should encourage examiners to take advantage of any such arrangements provided by applicants in order to make quality adjustments in the course of business, rather than as a reaction to an organization-wide initiative.

Patent attorney quality/pendency rankings

Patent attorneys and agents performance also varies in terms of the quality of the applications and claims presented in view of the prior art and the time they take to advance a case from filing until final disposition. Merely the number of years of experience one possesses does not necessarily translate into the ability to obtain better results nor should it justify higher hourly rates. A colleague of mine often says that he is dismayed that the most important part of the patent process (the preparation and prosecution of patent applications) is often done by the least experienced patent attorney. I believe there is some truth in this and rankings could even the playing field for patent practitioners vs. ip litigation attorneys.

Would attorneys/agents individually, and the public generally, benefit from knowing the track record of each attorney who is representing them in terms of pendency and quality of the claims they have handled previously? Individual inventors as well as corporations who either employ attorneys in-house or outsource patent preparation and prosecution might be interested in such an approach.

Does this attorney often get reversed by the BPAI or the Fed Circuit ? Does the attorney take more or less time to advance a case to final disposition than others? Would such data be useful for them to improve their skill ?

If an attorney routinely receives the claims presented without amendment within a period

Examination : Change Restriction practice and thorough first O/A

- Move to unity of invention under PCT/EPO
- Examine all claims when presented: eliminate piecemeal search and examination- reduce pendency, eliminate serial examination and double patenting
 - Limit number of restrictions/application
- Calculate additional time required for examiner to search and examine all claims at time of filing and modify count system/per case accordingly: overall less time than serial search and exam of all divisional applications separately
- **All possible grounds for rejection should be presented in the first Office action** - not emerge after applicant overcomes the stated rejection
 - Examiners who save references for subsequent actions on same claim should be penalized

GSK comment re limiting restrictions: Examiners should be limited in the number of restriction requirements issued. Multiple restriction requirements are a significant concern in that they generate multiple applications that further burden the overall case load of the PTO. Applicants, faced with multiple restriction requirements face a more burdensome, time consuming and expensive prosecution process. By providing Examiners with tiered number counts and time allotment based on the complexity of an application, Examiners would be incentivized to complete a comprehensive first search, which in turn would provide a better quality first Office Action on the merits.

Comment Boston patent law assoc: Identify enumerated species claims groupings in restriction/election practice. Many BPLA members have perceived that the USPTO has been relying more on restriction/election practice in recent years as a means of reducing the number of claims which may be examined in a given application. This reliance may grow particularly in the wake of the USPTO's recent abandonment of the proposed rules designed to restrict the number of claims filed in a given application and number of follow on continuation applications. In many applications, for example, in chemical cases, the Office often requires provisional election of claimed species in addition to election of claim groups. While the election choices for claim groups in a restriction requirement are usually clearly given, some BPLA members have experienced that the election requirement as to species may often be more vaguely worded. To promote clarity and efficiency of the prosecution process, the applicant should in every instance be given clearly enumerated species and claims groupings to choose from, so that it is clear which election choices with respect to species the examiner has in mind. Further, some examiners have provided a restriction/election Office Action, and then provided a species restriction for the elected invention group as a separate Office Action after an invention has been elected. Examiners should be strongly encouraged to provide the species restriction for each invention group with the first restriction Office Action.

Examination : Notice of non compliance

- If examiner believes applicant's response is non compliant for any formal reason, examiner should initiate teleconference with applicant within 30 days of receipt of response and provide applicant with explanation for non compliance
- Applicant should be given 30 days from teleconference to correct non compliance

Examination : First Office Action Interviews

- Expand PTO pilot program for first office action interviews : successfully leading to early allowances: Expand pilot to all art units
 - Consider modifications for independent claims
- Identify situations where interview unsuccessful- improve interview process
 - Examiner production credit for interview
- Examiners must be available for interviews: whether in person or by phone
- Supervisors should participate in interviews with examiners who lack signatory authority or review strategy of interview
- Allow attorney's in firm to participate in interview
- Interviews should be collaborative: identify allowable subject matter and potential claim amendments
- Address claim interpretation
- Agreements reached at interview should be honored : binding
- All RCEs should have interview before first action within 30 days of RCE filing
- Provide applicants with interview guidance /education
- Monitor examiner performance regarding interview success

Microsoft comment on first action interview pilot : Microsoft's experience with the First Action Interview pilot was not very encouraging. We found that because an examiner did not receive production credit until a first office action was issued, the examiner always chose to issue the preliminary action in its current form before addressing the substantive prosecution of the case. This was true even when the case could move forward with the interview by suggestions on amendments or by indicating areas where the art would not address the claims as written. Therefore, while it is beneficial to engage the applicant and examiner in a conversation, we saw no benefits to shortening prosecution beyond what could be achieved via a standard interview after first action. In Microsoft's view, this is another example of the power of the incentive system in shaping behavior. Appropriate credit must be given for moving the case forward in prosecution, and not simply issuing an office action. **Refocusing the First Action Interview pilot to a stage prior to the examiners search and preliminary opinion might be more beneficial, assuming appropriate credit could be given.** Such a pilot would allow applicant to inform the examiner on the invention and applicant's view of the scope of the claims prior to the examiner searching and examining the invention. This may result in more focused searches and quicker identification of issues in the case.

First Action Interview Pilot is available only to applications having no more than three independent and twenty total claims, and therefore primarily impact Technology Centers having a higher proportion of applications with such claim limitations. Similarly, applicants would benefit from detailed information regarding the type of prior art (for example non-patent prior art, or patents from other art areas) examiners rely on in a particular art unit for office action rejections, to help direct the applicant's search and analysis.

Venable comment on modifying pilot: Modifications of the current First Action Interview pilot program could make the program universal, although applicants could opt out if desired. The modifications include an initial action based on an early search of independent claims identifying either patentable subject matter or areas where there is a significant amount of art. This will allow for an early identification of what are likely to be the primary issues and, where appropriate, early claim amendments that allow the Examiner and the applicant to focus rapidly on points of contention. Providing for an early interview encourages cooperation between the Examiner and applicant at the beginning of the process before positions become too engrained. Evidence that could be provided to support patentability can also be identified and submitted before substantive prosecution begins. The result of this early initial action and response is a more efficient and effective narrowing of the gap between opposing positions.

First Action Interview Pilot This pilot program should have a direct positive impact on both patent quality and examination quality because it provides an opportunity for the applicant to interact directly with the examiner early in the examination process, before the examiner has reached any erroneous conclusions based on a misunderstanding of the applicant's disclosure. Thus, improper rejections and misdirected applicant arguments can be averted. The applicant and the examiner can engage in an interactive discussion, which is effectively impossible or prohibitive in written office actions and responses. The openness of dialogue may result in a faster disposal of the application and more appropriate claim scope since clarifying amendments can be discussed and agreed upon, avoiding the addition of unnecessary claim limitations that do not address the examiner's rejection. Therefore, the number of actions per disposal in applications that utilize the first action interview pilot should be compared to the number of actions per disposal in applications examined in the normal course of prosecution to measure the pilot's efficacy and impact on pendency. We also recommend expanding the program to include more complex applications involving more than the 20 claim minimum, as these should benefit at least as much as the less complex applications from use of the pilot. In general, for applicant/ examiner interviews to have a positive impact on patent quality and examination quality, it is important for the examiner to be willing to participate in the interview process and be prepared to discuss any

Examination

- Explore different examination procedures for applications of differing complexity
- Consider multiple dependent claims- alternatively
- Are dependent claims really necessary?
- Do examiner's really search and examine all dependent claims at same time as independent claims?
- Proper claim scope should be evaluated independently of dependent claims
- Guidelines for Secondary considerations and functional limitations
- Reducing Double Patenting Rejections

Comment from GSK: Providing Applicants with a reasonable number of options for the examination process would address differences in the complexity of different applications. Using this approach, Applicants could choose a fast track option which would provide expedited prosecution while providing Applicants with a commensurate scope of patent protection. Such an option would decrease overall application pendency. A differentiated approach to examination based on the complexity of an application as measured by, for example, the number of references cited, scope and number of claims, complexity and technology of an application should be taken into consideration. The count system should be revised to provide additional counts and time allotments for examining complex applications, to conduct interviews and importantly, to issue more than one non-final Office Action. Conversely, Examiner conduct that may negate quality examinations, such as conducting a limited search based on a claim narrower than the broadest submitted claim, refusing an Applicant's written request for an interview or issuing multiple restriction requirements might be discouraged by some degree of count subtraction.

Comment Intellectual ventures : multiple dependent claims : The USPTO could consider allowing use of multiple dependent claims that are in alignment with other patent offices, such as the Europe Patent Office. Under such systems, for example, multiple dependent claims are allowed to depend from other multiple dependent claims. Multiple dependent claims can accomplish the goals of applicants in terms of obtaining the broadest coverage, while helping to minimize the number of claims being examined, thus easing the work load of the examiners.

Comment: Intellectual ventures on secondary considerations and function limitations

One type of response that patent practitioners may rely upon to overcome rejections of obviousness is the use of secondary considerations (e.g., the invention's commercial success, long-felt but unresolved needs, the failure of others, skepticism by experts, copying of the invention by competitors, etc.). Many examiners, however, have difficulty understanding how such secondary considerations affect the patentability of the claims. This lack of understanding leads to declarations of secondary consideration not being given proper weight, or, in some instances, being completely ignored by the Examiner. This leads to an extended prosecution and/or appeal. It is our suggestion that the USPTO adopt improved guidelines for examiners to handle such arguments based on secondary considerations and provide additional training so that examiners are more capable of handling such arguments. We suggest that the examiners be provided with several specific examples of how such secondary considerations have been applied. Similarly, functional limitations that appear in claims are not properly given weight by many examiners. There are many instances where a patent practitioner will need to use a combination of structural and functional limitations. There is significant legal precedent which states that such limitations are allowable and help define the scope of protection of the claims. Many examiners, however, do not properly take into account functional limitations, even when such functional limitations are tied to specific structures. We propose that further education, as well as guidelines governing the handling of functional limitations (including additional examples), may help overcome the reluctance of examiners to give such limitations their proper weight.

Comment bright and grainger double patenting : Reducing Double Patenting Rejections Examiners spend a significant amount of time and effort searching and reviewing files for the purpose of ensuring that Patentees are not granted multiple patents on the same invention or an obvious variation thereof. However, today this rational only applies to a very small and rapidly declining percentage of patents and the effort expended provides little or no benefit given the 20 years from earliest priority date limits that apply to substantially all patents issuing today. We, therefore, believe that examiners should be relieved of the obligation to make these searches and issue these rejections. One option would be to request a terminal disclaimer in every prosecution and conduct the search only if the Applicant refused to enter the terminal disclaimer.

Examination work sharing and PCT

- Trilateral office examiners should have common database with full file history of counterpart applications
- How often does USPTO, examining a national-stage application from a PCT, give full faith and credit to its own work, allowing a case if it was treated favorably in the ISA/US written opinion? Hardly ever- why?

Comment :Incentives to abandon PCT national phase applications in which applicants have lost interest should be established to eliminate the wasted time used in generating unnecessary office actions. There is a cost and finality of express abandonments that should be compensated to encourage abandonment and avoid the delays created by generation of unwanted and unneeded office actions. The refund provisions in non-provisional applications have been very effective in encouraging express abandonment of unwanted applications before preparation of a first office action among our firm's clients. However, we are aware of at least dozens of our firm's cases in which clients have lost interest in their pending PCT national phase applications, but will not expressly abandon them without some incentive.

Examination : “Non- final” Final rejections

- When should second rejection over same reference be Final and when should amendment after final be considered?
 - Is there an appealable issue or could more discussion resolve or close issue and prevent RCE
 - Should examiner be required to suggest claim amendments in final rejection that would place claims in condition for allowance?
 - Should 132 declarations be considered as of right after final
 - Data on examiner withdrawal of Final Rejection upon filing Notice of Appeal or Appeal brief: QIR
 - Final rejection data by art unit
 - Should examiner count be reduced when final rejection is withdrawn or when RCE is subsequently allowed without substantial claim amendment

One significant time expansion (pendency problem area) is the final action/ re filing (RCE) problem, which recent data clearly indicates is getting worse (more RCEs). Whenever an applicant and examiner do not reach agreement on the allowability of claims after the first response to an office action, the examiner may (often) make the next action final and not consider amendments submitted after final- arguing a new search would be required (really?). Applicants who wish to continue prosecution because they feel the examiner did not understand the importance of an argument or amendment or where they want to submit a new amendment or present comparative data, are typically forced to file a RCE. Would extending prosecution in the case rather than making the case final, actually reduce overall pendency (overall pendency to include the time for prosecuting the same or amended claims in the RCE or RCEs along with the time taken from original filing)? One comment : Current after-final practice commonly amounts to zero consideration of the merits until a request for continued examination or appeal is filed. Even if a response after final is entered (usually because it includes no claim amendments or new evidence), the Examiner usually just goes through the motions, stating in a sentence or two that the arguments have been considered but are not persuasive. At a minimum, the Examiner should be required to provide specific rebuttal of an applicant's arguments on the merits if an amendment is entered. This would require a specific statement by the Examiner explaining why the line of reasoning asserted by the applicant lacks merit. The Examiner should not be allowed to simply say that the applicant's arguments are moot or not persuasive, without more.

Another comment : The Office should be willing to accept rebuttal evidence in the form of declarations submitted after a final rejection or as part of the appeal process. While this approach may not be consistent with the Office's view of compact prosecution, depending upon the extent to which the appeal process is considered to be more of a formal agency process than the informal agency process represented by ex parte examination before an examiner, the Office may be required to consider such rebuttal evidence under the

Final O/A Conference

- "Should the examiner still deem the application not in condition for allowance, the examiner is respectfully requested to make any suggestions in a telephonic interview or otherwise that may further advance prosecution in accordance with the mandate of MPEP 707.07 (j); page 700-101 8th Ed
- Move pre-appeal conference to conference after final rejection: include a member of Appeal board or ombudsman
- Measure and track instances of "new grounds for rejection" on appeal (new art or new statute)
- How frequent is allowance after filing of appeal brief?
- Should notice of appeal be eliminated?
- Eliminate continuation in part applications

Final O/A interviews and conferences

Instead of trying to limit the number of continuing applications by regulation (as proposed by previous PTO administrations and opposed by applicants as in violation of the statute) are there other less drastic means for resolving issues before applicants need to appeal or re file as a RCE? Just as first office action interviews seem to help focus applicants and examiner on the key issue earlier, and pre appeal conferences also are helpful after an appeal is filed, would a post final (before re filing or filing an appeal) interview or conference with the examiner, the SPE, an ombudsman or member of the BPAI assist in increasing the percentage of amendments after final that place claims in condition for allowance and thereby reduce the number of appeals and RCEs? What would such a post final interview/ conference look like? If an ombudsman or member of the BPAi with no prior knowledge of the case were to review each case where no agreement has been reached and a final action has been issued, and make a few suggestions for how applicant could amend the claims for allowance or why the examiner is correct or incorrect in his or her position, the number of appeals and RCEs would likely be reduced and pendency would be improved (see comment regarding prior practice in biotech art unit). At least 8-10 months or more is typically spent after the issuance of a final rejection before claims in a RCE are allowed. If the need for the RCE and the reconsideration of the preliminary amendment filed with the RCE could be eliminated, overall pendency would drop dramatically .

Comment : eliminate notice of appeal:

The Notice of Appeal serves no discernable purpose except for encouraging prosecution delay, extending patent terms and facilitating wasteful post-final submissions. It is an easy fix, e.g.: § 41.31 Appeal to Board. (3) Every owner of a patent under ex parte reexamination filed under § 1.510 of this title on or after November 29, 1999, any of whose claims has been finally (§ 1.113 of this title) rejected, may appeal from the decision of the examiner to the Board by filing a notice of appeal an appeal brief pursuant to § 41.37

Pre appeal brief conference pilot

- From PTO data the pre-appeal brief conference pilot , 40% of the applications participating in the pilot avoid unnecessary appeals, which should ultimately reduce pendency and the workload of the Board.
- The percentage or number of applications that were reopened or allowed as a result of the pre-appeal brief conference, broken down by Technology Center, reveals that the impact of the program depends strongly on this variable.
- Consider changes to composition of conference

Data from the pre-appeal brief conference pilot, approximately 60% of applications are appealed, while for 35% the Office reopens prosecution and the remaining 5% of applications are allowed. This data reveals that 40% of the applications participating in the pilot avoid unnecessary appeals, which should ultimately reduce pendency and the workload of the Board. Over time, use of the pilot should thus reduce applicant expense for applications that would otherwise be subject to the presumably lengthier appeal process. The percentage or number of applications that were reopened or allowed as a result of the pre-appeal brief conference, broken down by Technology Center, reveals that the impact of the program depends strongly on this variable. **The Office should continue to collect and disseminate this information, since it should help evaluate the success for the program over time, help applicants to best take advantage of the program, and should help the Office tailor the program for maximum effectiveness, including making appropriate adjustments to increase impact in areas where it is currently less effective. We submit herewith two charts showing pre-appeal brief conference data referenced herein, the first shows outcomes following pre-appeal brief conferences on an annual basis for 2005 through 2009, the second shows outcomes by Technology Center for the time period 2006- 2007. Evaluation of pendency, regardless of the outcome of the pre-appeal conference, would also help determine the pilot's efficacy. For example, on the one hand, many direct appeals are resolved relatively quickly through withdrawal of the final rejection at the appeal conference stage, while on the other hand, applications that initially used the pre-appeal pilot may nevertheless experience protracted prosecution including an eventual appeal. Therefore, another useful metric to verify whether the pilot is effective would be to compare average pendency (in terms of time and/or number of actions per disposal) for applications that used the pre-appeal brief conference pilot and those that proceeded to appeal without using the pilot. Further metrics that would be useful in tracking the program's overall impact would include the number of pilot-eligible applicants that took advantage of the pilot and whether usage trended up or down during the life of the pilot. Also, the metric representing the total number of pre-appeal conference requests, minus the number of new non-final office actions and allowances immediately following the request, could be used to determine the overall effect on patent quality. Going forward, we suggest the Office also evaluate those cases that do not go on to appeal after use of the pilot, to determine whether improvements in examination might enable applicants and the Office reach closure without need for the appeals process in the first instance.**

Comment : boston patent law assoc:Analyze results of Pre-Appeal Brief Conferences and Appeal Brief Conferences We recommend using the Pre-Appeal Brief Conference and Appeal Brief Conference as formal quality check points, with formal collection, analysis, and compilation of quality analysis of the rejections presented for review. This seems to be a point at which the USPTO could collect a rich source of data into examination delays at low cost—the per-case analysis is done, all that needs to be done is to collect it into a form that permits broader analysis. While these results from the appeal process may be skewed in the sense that there is already an indication of disagreement between the applicant and the examiner, and in the sense that some worthy applications in which there are legitimate areas of disagreement may not enter the appeal stage for lack of funding, the Request for Review operates as an executive summary of the outstanding areas of dispute in the prosecution of an application. The follow-on Decision on the Request is also a summary of the issues. Thus, the results of the Pre-Appeal Brief Conference Pilot program can provide a focused view of areas of prosecution in need of improvement. Possible inquiries include: • whether the rejection was procedurally complete—did the examiner make all the showings required by the

Requests for Continuing Examination (RCE)

- Understanding the Causes for Filing **RCEs**
- Examine RCE within 1 month of filing
- Maintain same examiner on RCE as original
- Purgatory RCE's : RCE to remain unexamined until applicant pays fee and requests continued prosecution : Is this a good idea?

3m comment on root causes of RCEs

Understanding the Causes for Filing RCEs 3M IPC recommends the PTO consider gathering information on the "root causes" of RCEs. This information could then be used to devise a more efficient way to address the various issues that lead to RCEs, rather than trying to devise a one-size-fits-all procedure for RCEs in general. For example, some RCEs are filed simply to cite new prior art references. For example, new prior art may be cited during prosecution in a related foreign patent application. Often, these RCEs do not include claim amendments or additional arguments, and are mainly filed to stave off any allegation of a failure to comply with Rule 56. 3M IPC recommends consideration of a way to expedite or provide an alternative path for resolution of RCEs that are not filed to present claim amendments or additional arguments for patentability.

Microsoft comments on RCE:

Both applicants and the examining corps have shared responsibility for reducing unnecessary continuations. Statistics on Microsoft's portfolio demonstrate the variability from year to year we experience without changing our practice before the USPTO. The percentage of cases that were allowed without RCE or other continuation dropped from 42% in 2006 to 30% in 2009. We have been unable to identify any cause for the reduction that can be attributed to our practice or the types of claims we pursue. We have concluded, therefore, that it is unlikely that most cases in our technology area can be prosecuted within the allotted 'two' office actions of a non- RCE period. This analysis on our own portfolio shows that it generally takes at least two real amendments to bring the claims into condition for allowance. Unfortunately having two real amendments considered typically requires at least one RCE. Microsoft traces the decline in our ability to issue a case within the first two allotted office actions directly to: (1) the incentives caused by the count system that measures the production of examiners within the USPTO, and (2) the challenges the USPTO faces in retaining experienced examiners. The incentives created by the count system to push a case into a needless RCE to increase the credit given with little or no additional work is widely known and recognized, but little discussed. While the changes the USPTO has made in the count system is a step in the right direction, the step comes with the risk of being abandoned if examiners are unable to achieve more credit under the new system than they received under the former system. As applicants, we believe this is an unacceptable risk to quality, and more strides must be taken by the Office to eliminate the incentive to push cases into needless RCEs. Examiners should be rewarded for the work they do. As such, if there is little or no work needed to allow a case on an RCE, no production credit should be given. One measure of the amount of work an examiner puts into an RCE is the character of amendments made after an RCE and before the case is allowed. If the character of the amendments is minimal, there is no reason the examiner should not have considered such amendments as part of the case prior to the RCE. In such a situation no production credit should be given. Applicants have a shared responsibility to reduce unnecessary continuations by presenting clear claims that capture the invention sought to be patented early in the process. Incentives should encourage such behavior. Fees that increase with the number of continuing applications (RCEs, Continuations, etc.) would provide such incentives without eliminating an applicant's right to file continuations.

Reasons for Allowance^(MPEP 1302.14)

- Examiner's statement of reasons for allowance should be comprehensive and clear. Reasons for allowance should not introduce unsupported claim limitations or broadening language not of record.
- Examiner should identify claim elements or how combination thereof distinguish claimed invention over prior art
- Identify priority date for each claim element in continuing and continuation in part applications: which supported by original application, which have later effective date
- Examiner should state the interpretation given in prosecution to claim preamble and any field of use or functional terminology. If preamble not relied upon by examiner, patentee and public would know how to interpret claim scope
- Identification of file history estoppel: Examiner should indicate claim amendments and arguments presented by applicant, e.g. disclaimers, admissions, etc. which formed the basis for allowance. Purpose to eliminate subsequent analysis by public concerning scope
- Continue to review allowance

For software and other patents which rely on 112(6) **"means plus function" claiming, software could attempt to link the function recited in the claim with structure recited in the specification.** Merely identifying such linkage could assist the examiner; a failure to do so might indicate that stronger linking language is needed, or that in fact there is a missing structure.

Comment on reexamination: Intellectual ventures Expedite Reexaminations. Reexaminations generally take far longer than they should, particularly in view of the requirement of 35 USC Section 305 that reexaminations and their appeals be conducted with "special dispatch." The many years required for completion of a reexamination and any appeals greatly reduces the useful life and hence the value of a patent, and consequently reduces the incentive for U.S. innovation and the patent protection of that innovation. The use of a reexamination allows the public an opportunity to initiate a patent office review of a patent, and was originally intended to ensure the quality of patents as an alternative to litigation. The general process of a reexamination requires that a detailed analysis of the relevant prior art is provided to an examiner. Given that most of the work (search and interpretation) has been done for the examiner, the reexamination process should be expected to be expedited. Instead, the process takes as long, or in many instances longer than a regular examination. We propose imposing a strictly observed, accelerated reexamination schedule. For example, a schedule that allows the reexamination to be finished in one year could be imposed upon the parties and the USPTO.

3m comment :Allowance The Patent Office, applicants, and the public share the same goal of having patents issue with valid claims providing clear notice of the protected scope. Internal review by the PTO after an examiner's decision to allow claims should align with this goal. Thus, the record should be reviewed to ensure that the reasons for allowance

The Application

- Accelerated examination incentive for applicants who file higher quality applications
- Prepare application checklist for applicants, and provide samples of high quality applications in each art unit: best practice
- Higher quality applications example: applications with defined terms, 30 pages or less of specification, examples that support claim limitations, 10 or fewer claims and IDS, and request for first o/a interview
- Consider Multiple dependent claims

See: The Journal of Patent and Trademark Society (*89 JPTOS 809*), **guidelines the USPTO could consider to provide incentives**, e.g. the USPTO could consider an accelerated-type examination of an application which meets any number of guidelines.

Contrary comment : No measures of application quality The Office should not permit measures of the quality of an initial application to be made as any such measures could be used to undermine the presumption of validity accorded to an issued patent?

: Provide Examples of High Quality Patent Applications and Sample Claim Formats for each Art Group Unit The Office should make available examples of what the Office considers to be high- quality patent application in each art group unit to provide examples for the practitioners and public to review. The Office should consider creating example claim templates for each art group unit that also could be published, particularly for claims that use different kinds of claiming techniques.

Defining Terms Improves Quality

- Applicant can be own lexicographer: provide definitions of terms in specification
- In absence of such definitions : use standard dictionaries : adopt IBM proposal
- Claim construction : examiner should specify the definition of terms relied upon in prior art and applicant's claim and source of that claim construction

Defining terms

The applicant is entitled to be his own lexicographer, meaning that the applicant can define terms that she utilizes in the application and claims as the applicant deems appropriate. If the definitions are presented in the specification, the examiner should refer to these definitions in the specification to better understand the claimed invention. In the absence of defined terms in the specification there is a higher probability for misunderstanding. In the absence of defined terms what reference source should the examiner rely for her interpretation of the terms in applicants claimed invention? Is there a mutually agreed independent dictionary that both applicants and examiners should rely upon to interpret claims?

One excellent proposal we have received (IBM) is directed to a process for selecting the appropriate third party dictionary for technical term interpretation.

This proposal will also aid in 112 determinations concerning adequacy of the disclosure and clarity of the claims.

Claim Clarity Through the Use of Claim Dictionaries (The following section is also directed to Section V (2): Specific Areas of Particular USPTO Interest, Comprehensive Initial Application) IBM believes that patent quality would be significantly enhanced **by improving the clarity of patent claims. Under current U.S. patent law, applicants must present a written description, or specification, in their initial patent application that supports and provides antecedent basis for the claims. Applicants may assign a specific or unconventional meaning to any claim term by clearly defining it in the specification. Conversely, for those claim terms having known conventional meanings in the state of the art, applicants may leave those terms undefined in the specification, choosing instead to rely on their ordinary meanings. Under this scenario, examiners must also rely on those ordinary meanings to determine the claims' true meaning and scope during the examination process. Unfortunately, claim terms do not always have a single meaning in**

The application: format

- Adopt trilateral common format application
- Initial application should include fully automatic Line numbering, line spacing, page numbering, paragraph numbering starting with **[0001]**, followed by 4 character hard space, Arial font, 8.5x11 portrait or landscape for description and drawings; or A4 size.
- The rigorous adherence to margin requirements at top and left borders, and similar scale for drawings that are largely identical, which permits the examiner to toggle between drawings to instantly view what is different about the drawings.
- The use of bookmarks and destinations in the application for ease and speed of comprehension by the examiner. With destinations buttons to efficiently jump over several drawings, to compare FIG 1 with say FIG 10.
- The entire application should be in press quality at least 4000dpi for both black and white and color.
- . Communication is all important and an applicant should have as a minimum two-22inch, high resolution, 1600dpi monitors. So the inventor can converse with the examiner with the description on one monitor and the figures on a second monitor.

Standard Algorithms in applications

- Applicants should be required to utilize standard algorithm descriptive language when source code is not disclosed: It would aid in search, exam and claim construction in computer science and software applications
- Algorithms should be compended into a searchable database that applicants could use as a reference

Administrative efficiencies

- ***The PTO Should Consider Additional Changes to the Count System***
- Docket Visibility for Examiners and Applicants
- Examiners should return applicant's telephone call within 24 hours
- Ensure same day responses are properly entered
- How long should it take to obtain a filing receipt when entering the US national stage from a PCT ?
- Revision controls: Use of track change software for all responses to make it easier for everyone who reads the claims and specification to see where and when changes and amendments are made: front end interface to file history
- Submit all applications electronically in XML format
- Electronic tracking : use of bar codes to determine location of all documents: eliminate misplaced files and documents
- Monitor examiners

Count system, Comment from Phrma:The count system should be adjusted (or replaced) so that it provides a more robust measurement of examiner productivity. Under the current count system, all applications are treated equally no matter how complicated or lengthy (and no matter the number of claims or references). The PTO's recent revision to the count system, which provides a greater amount of credit for the first Office Action on the merits and comparatively less credit for the first Office Action after the filing of an RCE, is a step in the right direction; however, the system should be adjusted further. Just as patent attorneys spend widely varying amounts of time on different applications, so too should patent examiners, and the count system should recognize this. The count system should allow examiners to spend more time on complex applications by, for example, providing a greater amount of "credit" for applications that are lengthy, contain a large number of working examples or claims, or cite a large number of prior art references. This change would give the examiner adequate time to produce a more comprehensive first Office Action on the merits and conduct a more thorough review of the prior art, thereby enhancing the efficiency of patent prosecution and increasing patent quality. The count system, along with restriction practice, creates perverse incentives for examiners to issue multiple-way restriction requirements for complex applications so that they can receive multiple counts for each divisional application that is filed. The count system should be amended so that examiners receive additional credit for examining complex applications without having to issue restriction requirements. For example, when composition of matter and therapeutic use claims are presented in the same application, the examiner usually issues a restriction requirement.^{21/} If the composition of matter claims are found to be allowable, the examiner sometimes withdraws the original restriction requirement and rejoins the therapeutic use claims, which are subsequently examined for patentability.^{22/} This process unnecessarily lengthens the pendency of the application. In other cases, the therapeutic use claims are not rejoined and the applicant is forced to file a divisional application in order to have these claims examined. The examination of a single application, as opposed to the examination of multiple divisional applications, would be more efficient and produce higher quality patents. The inefficiency of examining multiple applications directed to related inventions can be reduced by providing examiners with a

Administrative efficiencies

- Respond to applicant status inquiries within 3 days
- Establish remote from Alexandria PTO locations
- Remove the requirement to submit U.S. Patents and Published U.S. Patent Applications in IDS's
- Allows applicant to identify/link to related cases (US or foreign) that have prosecution histories of possible interest to the examiner.
- Electronic copy of the patent as shown on the PTO website should be the "official" copy. This copy must have accurate searchable text.
- Is there a need for filing IDS that cross refers related cases and related office actions, even if the office actions are generated by USPTO?
- Automatically and instantaneously docket Appeals to Board when Reply Brief submitted
- Investigate stale case
- Review OIPE policies for hypercriticality
- Improve scanner quality for new applications- esp drawings

As noted in the Federal Register Notice, the USPTO has excellent software tools to search databases **Remove the requirement to submit U.S. Patents and Published U.S. Patent Applications in IDS's**, including the USPTO's own patent and published application databases.

Accordingly, I would welcome a rule that absolves patent applicants and their attorneys from having to submit U.S. Patents and Published Applications to the USPTO (this might need to happen at the Congressional/Statutory Level .

Currently new electronic copies of patents have OCR errors and do not handle objects such as equations and tables. Drawings

should not be static 8.5 X 11 black and white images. Drawings must use some more advanced format(s) that allows color, grey scale, zooming, panning, vector graphics, video, etc. Drawings should not be on a separate page, but integrated with the specification. Applicants should provide the specification and drawings in electronic format so that scanning by the PTO is not necessary. If hard copies are provided, applicant should be charged accordingly

USPTO can enable the public to build efficiency with accuracy such that once a single reference is housed with the PTO, or in possession of the USPTO, it is not need to be re-submitted to USPTO. The better approach is to cross refer electronically to the desired document rather than re-submit an identical reference to the USPTO, esp when the reference is generated by USPTO, like in an office action of a related case.

Automatically and instantaneously docket Appeals to Board when Reply Brief submitted. The prosecution delay from filing a Reply Brief to appeal docketing is about half a year, and sometimes over a year. After filing over 200 appeals, I have had only two where the Reply Brief was not entered without further ado, and the case forwarded to the Board. In 99% of my cases at least, the 6-12 month delay to Board docketing is just a waste of process, time and expense. Instead, when an Applicant submits a Reply Brief, either (1) have it clerk-reviewed for form only and quickly (within a week) generate a combined entry/docketing notice; or (2) automatically/instantaneously generated an entry/docketing notice (as is currently done with petitions to make special because of age, or with assignment recordations).

Stale cases:adherence to the guidance of MPEP 707.02 should be applied to stale cases. Any application pending for more than 5 years or up for a third action should always be reviewed by a SPE, as instructed.

Hypertechnical application of policy by the OIPE also creates delays and extended pendency. For example, the OIPE routinely refuses to accept declarations when the inventor corrected address information immediately adjacent his signature and date, but did not separately initial and date the address correction. This creates delay and unnecessary work when applicants have to petition the OIPE action, or go back to the inventor(s) for execution of a new declaration. Either situation can increase pendency of an application for months, for no apparent reason.

improved scanner quality for new applications - especially drawings -should be used to avoid Notices to File Corrected Applications Papers required due to scanning artifacts created by PTO scanners. These Notices unnecessarily increase applicants' costs, reduce PTO credibility, and generate unnecessary delays before examination can begin. There has been recent improvement, but it needs to be maintained -e.g., by dedicated high-quality and well-maintained scanners for new applications

Data transparency

- Make certain that quality metrics are available to public
- Make the entirety of PTO official data available to public in raw form.
- Make available the Office Actions that were evaluated and the scoring and evaluation sheets that were developed in response. Similarly, the USPTO should make available applications that were called back by Allowance Quality Review and the following Action.
- Regularly publish, by Group Art Unit (and by every entity having a customer number), the start date and filing date of the oldest pending application at each stage of the prosecution process;
- Regularly publish, at the end of each stage, by Group Art Unit, the results of the review conducted by Quality Assurance, both:
 - a. the percentage of claims which were allowed and shouldn't have been; and
 - b. the percentage of claims which weren't allowed and should have been

From ibm comments :Transparency and the Availability of Patent Office Data The optimal mechanism for assessing patent quality should be objective and reproducible by the public. Only where metrics and measurement techniques can be observed and evaluated by all will the patent community have confidence in reliability and accuracy. Public access also allows collaborative development of quality metrics, reflecting the views and potentially the consensus of the patent community, including applicants, patent owners, licensees, and examiners. Objective measurement of patent quality would **be significantly facilitated by enhancing public access to Office data, including both scope of data available and ease of access. We recognize that the Office makes prosecution history and application information available through PAIR, including for published applications. However, the ability to evaluate and use this data effectively is very difficult, if not impossible, unless it is collected and distributed in a form that is subject to review and analysis. We also recognize and thank the office for providing certain statistical data, such as that relating to numbers and distribution of issued patents by assignee per year, information on reversal or affirmance on appeal, and information on reexaminations. However, we believe that much more useful information could be collected by the Office that would be of value to the public. For example, statistics showing the percentage of office actions with different types of rejections (i-e.101, 102, 103, 112), and their ultimate outcomes (amendment or cancellation of claims, abandonment, RCE filing, etc.), overall and by Technology Center would be very useful. Such information would enable tracking of the impact of major changes in the law such as KSR and Bilski.**

This information, as well as the information and statistics outlined further below, would be highly relevant for determining the effectiveness and efficiency of prosecution, including existing and proposed efforts by the **Office and applicants to improve patent quality. IBM suggests the Office make available as much of this information as is practicable on an ongoing and annual basis, for the Office overall as well as by Technology Center, type of**

Data Analysis

- Consider use of third party and software to compile and analyze data

Define scope of analysis

An initial inquiry should be the scope of the analysis. For review of examination quality for the very large number of patents and applications, representative samples of issued patents and the entire gamut of prosecution papers for pending applications should be evaluated.

For initial review, the numbers of different categories are open, but should include those in all Technology Centers and many representative Art Units. The exact number of patents and applications to be evaluated should be selected based on the overall "accuracy" of the analysis, which reflects the "within-group" error. **Use Raw Data Initially**

Use "raw data"

The most information in any analysis is based on "raw" data rather than "derivative" data (e.g., ratios, sums etc.). Once raw data is obtained, it can be aggregated, and expressed as ratios or other mathematical expressions.

We are fortunate in being able to obtain relatively simple binary metrics of many of the quality issues. For example, a claim is either allowed or not, a rejection is proper or not, and a response to an Office Action overcomes a rejection, or not.

Data Aggregation

Aggregation of data may be prone to losing important information. For every calculation of a parameter based on a data set, one "degree of freedom" is lost.

More degrees of freedom provide increased reliability. Therefore, initial data should be collected as raw data on a "per application" or "per patent" basis, and then, if desired, derivative metrics can be calculated. Then aggregation will not result in permanent loss of important information, and trends can be identified.

Because there should be a number of different metrics for each patent or application, there is a possibility that not all of the metrics will be independent of each other. If a certain application suffers from poor search, poor application of prior art, rendering of a poor *prima facie* case for unpatentability, and the like, those metrics will tend to track one another. Therefore, assumptions made regarding sampling and the independence of the metrics should be defined.

Data collection and quality metrics

- Evaluate QIR data for examiner outliers
- Data regarding the application as filed, including number of dependent and independent claims, whether an IDS was initially filed, and how many references were cited therein broken down by type (US patents, non-US patents, non-patent prior art);
- Inventor, applicant, assignee information, including size (small large entity, independent inventor, university, etc.), number of inventors, joint owners, assignees;
- Number and proportion of applications published;
- Counterpart and continuation application information, including priority and family members identified as continuations, divisionals, continuations-in-part, RCEs, provisionals, PCTs and national applications, and information on any patents issuing thereon;
- Number of office actions per application, number of rejections therein broken down by basis (obviousness, written description, etc.) and correlated to outcome (amendment/cancellation of claims, abandonment, continuation, etc.);

Stages of Monitoring and Review

- Monitor quality metrics at the following stages of prosecution:
 - (1) When the application is filed in the USPTO;
 - (2) when the initial search for the application has been completed;
 - (3) when the first Office Action for the application has been completed;
 - (4) when an interview for the application has been conducted;
 - (5) when a reply to the first or any subsequent non-final Office Action has been filed;
 - (6) when an Office Action (non-final or final) or notice of allowance in response to a reply to a non-final Office Action has been completed;
 - (7) when an after-final submission has been filed; and
 - (8) when an appeal brief or other appeal-related paper has been filed.
-
- PTO/industry working groups

Comment boston patent law assoc:” While expressing agreement with the stages outlined in the Request for Comment, we think that the USPTO is probably in the best position to decide the adequacy of the stages of monitoring quality outlined in the Request for Comment. However, we note that increasing the quality of the earlier stages from the filing of the application to the completion of the First Office Action can have a significant effect on quality and on pendency. Further, we think that conducting an interview after the First Office Action can have a significant effect on quality and on pendency. Also, the Initial Review of the Appeal Brief provides, similar to the Pre-Appeal Brief Conference, an opportunity for a focused review of areas that need improvement in the examination process. Furthermore, improved quality assurance prior to the Appeal Brief ideally would lead to the need for fewer pre-Appeal Brief Conferences resulting in returning the application to prosecution. Regarding Feedback from the USPTO, while a quality measure reported to the public could be useful, it is probably more important that, at each stage, the significant stakeholder be apprised of the quality measure and the quality comments; for example, quality comments back to the applicant after initial review of the application and quality comments back to the examiner after review of the initial search and first Action.

Comment : Intellectual Ventures re Quality review:We recommend drawing the samples for review equally from all applications (e.g., those having no allowed claims as well as those having allowed claims). Additionally, we suggest providing incentives to quality reviewers equally with respect to indicating unallowed claims that should be allowed – e.g., for lack of prima facie unpatentability -- as well as indicating allowed claims that should not have been allowed. Alternatively, we recommend having highly skilled patent bar members propose objective standards for quality review that do not “second guess” on issues of judgment where reasonable minds could differ.

Data Analysis

Procedures for Analysis, Implementation and communication

To avoid bias due to timing, the above metrics should be analyzed throughout each bi-week, for each bi-week of the year.

PTO should consider an independent, external body to collect and perform the analysis.

Errors identified should be promptly corrected by the USPTO.

The USPTO should develop positive incentives to encourage all personnel to decrease errors of all types, and to be recognized for successfully decreasing errors. The purpose of this process is to continually train examiners to increase the level of their competence, to recognize their successes, and ultimately to decrease the loss of high-quality examiners due to attrition. The USPTO should report results of this analysis publically and in a timely fashion.

Finally, all associated with this process should keep track of “lessons learned” and use those lessons to further refine further analyses

These examination quality procedures should be made a permanent part of USPTO operations. It is likely that as application complexity and technology evolve, additional metrics or other analytical tools may be needed.

All Office personnel should be encouraged to understand that high quality examination is the core purpose of the USPTO, and that only through experience can Office procedures be consistently evaluated and improvements made

Specific Quality Metrics

- Number of applicant responses, including number of claim amendments and type (canceling, amending, or adding claims);
- -claims examined rather than case disposals. For example, examiners could get one count per twenty claims examined, instead of one count per case.
- Correlation of key claim terms to definition or description in the specification; for applications as filed, issued patents, and terms added by claim amendment;
- Data on appellate practice, such as pre-appeal conference statistics regarding allowance, reopening prosecution, etc.;
- Basis for decisions on appeal (obviousness, written description, etc.);
- Duration of prosecution, measured from time of filing and/or first office action to issuance, with pendency broken down for original and any continuing applications, RCEs, appeals, interferences, etc.;
- Combinations of the above, for example (i) those that measure effect on pendency or issuance of number or type of substantive actions by the applicant (amendments) or Office (rejections); (ii) those that measure characteristics of applications as a function of type of filer (large entity, individual inventor) or type of invention (chemical, mechanical, electrical).
- Patent term adjustments maintained in real time and printed on every O/A

While data on an individual application-by-application basis would be ideal, availability of statistics on a larger scale, such as by Technology Center or type of applicant / assignee would also be very useful. Such data would be helpful to both the ***Office and applicants in crafting improvements to the patent process and making strategic decisions regarding patent procurement, respectively. A specific example is identification of applications assigned to small entities or sole inventors. Pilot programs such as Backlog Reduction for Small Entity Inventors are targeted to Technology Centers that experience a large proportion or absolute number of small entity filings***

Specific Quality metrics (continued)

False Negative Error Metrics

On a per-application basis and for each measured Working Group:

- what is the sample size?
- how many *prima facie* claim rejections were overcome without claim amendments or narrowing remarks?
- how many claim rejections were overturned by Primary Examiners?
- how many Primary Examiner's claim rejections are overturned by SPEs/QAS?
- how many claim rejections were overturned on pre-appeal?
- how many claim rejections were overturned on appeal?
- how many claim rejections by the BPAI were reversed by the Courts?
- how many rejections of previously presented claims were presented for the first time in a second or subsequent Office Action?
- how many subsequent searches were performed without new claims being presented?
- are there any "hot spots" in the examining corps with false negative errors greater than average + 1 Standard Deviation or + 2 SDs?

Aggregated Quality metrics

On an aggregate basis (e.g., per 1000 applications) and for each measured Working Group:

- how many improper final rejections were made?
- how many improper *prima facie* rejections were made?
- how many cases were reopened after filing an appeal brief?
- how many applications were opened after a pre-appeal conference?
- how many applications were allowed after a pre-appeal conference?
- what was the allowance rate per year?

Administrative software

- Integrate filing, docketing, searching, and office action correspondence to allow the USPTO to focus its resources on substantive examination
- These processes currently live in separate silos—EFS-Web, eDan, EAST, and OACS—consuming excessive resources and distracting examiners from their critical mission.

Social networking

- Transform PTO search template unto dynamic collaborative platform (e.g. wiki) to improve content and obtain third party feedback

Currently the USPTO search template collection, available at <http://www.uspto.gov/web/patents/searchtemplates/class.htm>. are static HTML web pages listing very general sources (e.g. Dialog Newsroom) over and over again throughout each page. **If these pages were transformed into a more dynamic collaborative platform, such as wiki pages, their content could improve as examiners discover and add more niche sources to the templates, or as members of the community suggest them.** The community feedback process could cause new, useful sources to be added to the templates, while pruning those that are not particularly helpful. Because these templates are currently the recommended search guidelines for those seeking to submit Accelerated Examination applications at the USPTO, their improvement could have an impact on the quality of accelerated examination searches especially.

Result Metrics

- Ultimate Result metrics:

Outcome of claims at trial : validity upheld/
reversed along with rationale ; anticipation,
obviousness, indefiniteness, inadequate
description, non enablement: different claim
construction, lack of proper antecedent basis;
problems with means plus function claim
support

Metrics

- Evaluate patent Quality metrics study by Professor Mann Columbia University: certain characteristics of patents and applications are associated with validity in a statistically significant manner. For example, if claims are "closer" to the description in the specification, they are more likely to be valid
- a number of characteristics relating to applicants' and examiners' identification of prior art and its use to evaluate claims in examination are tied to validity.
- **focus on optimizing the process for procuring patents by identifying and evaluating objective characteristics will lead to a better understanding of the process and thus enable applicants and the Office to make improvement**

The Patent Quality Index project (PQI) IBM initiated PQI in late 2005 to create metrics that could be used to evaluate the quality of patents, patent applications, and the patent procurement process. We believe that in order to improve patent quality, metrics are needed to determine what aspects of the process are problematic and need improvement and similarly what aspects work well and should be emulated. The appropriate metrics should evaluate characteristics reflecting how well the statutory requirements for validity are met, including for example strength and accuracy of applicant and examiner search, sufficiency of support provided by the specification for the claims, and effectiveness of office actions. We refer the Office to the parallel submission on PQI in response to the Request by the US project leader, Prof. Ronald Mann of Columbia Law School. Preliminary results indicate that certain characteristics of patents and applications are associated with validity in a statistically significant manner. For example, if claims are "closer" to the description in the specification, they are more likely to be valid. Improvements in this area should promote patent clarity and enable easier examination. In addition, a number of characteristics relating to applicants' and examiners' identification of prior art and its use to evaluate claims in examination are tied to validity. Identification of those sources of art most likely to lead to substantive examination and valid claims should help applicants and the Office ensure that the best prior art is considered during examination. The relationship and significance of these and other characteristics to patent validity may vary over time as innovation and patent law evolves, and as a result of awareness of the characteristics themselves. However, continued focus on optimizing the process for procuring patents by identifying and evaluating objective characteristics will lead to a better understanding of the process and thus enable applicants and the Office to make improvements. PQI is also relevant to Category 6, "Tools", as it could provide the basis for automating evaluation of the quality of patent applications and the examination process, and Category 2, "Stages of Monitoring", as it seeks to identify critical steps in the examination process affecting validity.

Metrics

- Automated textual analysis can be used as tool to track metrics
- Use of checklists of types of rejections in PAIR
- Track examiner responses which don't address how applicant can move case forward
- Evaluate IBM Simple and Patent optimizer (lexusnexis) preparation checklists

Computerized Data Collection of the Types of Rejection in Every Case The Office should create some form of standardized check boxes in PAIR for each Office Action or Examiner's Answer to an Appeal Brief that examiners would be required to complete for identifying the type of rejections (e.g., Section 101 rejection, Section 102 rejection, etc.). Data collected and made available by this computerized reporting would permit an overall statistical evaluation of the type of rejections without the need for manual review and coding of the basis for actions in a sampling of cases. The data collected using such a scheme could be reported, for example, by art group unit, in order to document potential trends over time or differences among art group units. This data can provide high-quality feedback, as well as increase public awareness of the reasons for rejections in a given art area, for applications claiming priority to a given period of time, or even for a given examiner over a period of time. Similarly, applicants could be requested in their responses to check boxes indicating the basis for the response. By collecting and analyzing standardized characterizations of the basis of actions, and even responses, the Office will be better able to use best-in-class process- feedback control mechanisms to improve quality.

Quality assurance processes should focus on instances where examiners take a position that there is nothing that could be done to put the case in condition for allowance and offer no suggestions in terms of allowable subject matter, claim amendments or additional evidence in support of patentability. It is believed that focus placed on these cases is likely to capture the bulk of cases in which the applicant and the examiner are like "ships passing in the night." Analysis of this smaller set of cases could provide insight into potential reasons for this problem.

Tools

- Evaluate commercial software tools
- PTO should develop a URL naming scheme that makes it easier to cite documents uniformly
- Develop harmonized electronic filing forms
- Evaluate error software
- Modification of office action forms or database portals to enhance data collection

Microsoft comment re tools : ***Tools to Enhance Quality More technology should be brought forward to enhance the ability of examiners to efficiently understand the scope of the invention sought to be patented. Microsoft has specific research 5 indicating that many people have difficulty reading long documents on an electronic screen. Thus, tools that can assist examiner focus on important parts of application documents may help examiners better understand the scope and subject of inventions. Microsoft's experience in many of our cases indicates that examiners make extensive use of the search function to find similar terms across multiple documents. However, it is also clear to us that searching for terms alone will not highlight the relevance between or within a document. The context surrounding terms is almost more important than the term itself in determining relevance. Tools exist to help applicants identify inconsistencies between terminology used in the claims and terminology used in the specification. LexisNexis® Patent Optimizer™ is an example of a commercially available tool incorporating this type of technology. Microsoft also has an internal tool for this purpose that we can demonstrate to the USPTO if there is interest. This same technology can be brought to bear to help examiners draw conclusions about the consistency of the disclosure and claims in an application. This technology can automatically analyze the language of the claims and corresponding specification to identify where the concepts in the claim language exist (if they do) in the specification. The technology can also identify similar language used to describe figures and, through reference numbers, identify figures that might have relevance to the particular claim language. Such technology can help an examiner establish a rich context without the hit and miss that term searching can bring. In more future looking scenarios, the specification, claims and figures could be linked together so that navigating around a complex document would become much easier and examiners would be more likely to draw better conclusions about the scope of inventions. An audio version of the disclosure would allow examiners to hear as well as see the disclosure. This could be done using text to speech technologies. Thus, as an***

Training and education

- PTO should engage the patent community in the creation of programs for cross-training of applicants, practitioners, and examiners.
- Continuing education for practitioners (CEP Pilot).
 - CEP was originally conceived as a tool for educating patent practitioners.
 - The content can be utilized more broadly, to ensure that patent practitioners are kept informed of new, as well as existing, Office examination policies and procedures.
 - It would be especially useful if the modules were available for practitioners to review at their convenience -in a format that would allow practitioners to print out all or portions of the module for future reference
- ***The PTO Should Establish and Enforce Rigorous Patent Examination Training and Guidelines for Examiners***
- ***Enhance Examiner legal training***

3m comment on cross training: A greater understanding of the objectives, procedures, and concerns of each group will lead to more efficient communication and exploration of solutions. For example, an examiner may not appreciate why an applicant concerned about obvious design-arounds does not simply narrow a claim to overcome a rejection. Similarly, an applicant or practitioner may not understand how examiners balance the need to interpret claims in light of the specification, without reading limitations into the claims, when arriving at the broadest reasonable interpretation. As but one example of possible opportunities for mutual training, companies such as 3M, industry organizations, and others could host seminars, videoconferences, webcasts or other events to provide information to examiners about certain industries or technologies, enabling more efficient prosecution of applications in such areas. Other means might be used to ensure that examiners, applicants and practitioners have a common understanding of a technology field, the state of the art in that field, and the terminology used in that field and which often appears in patent specifications and claims directed to that technology

Comment from Pharma re examiner training:***The PTO Should Establish and Enforce Rigorous Patent Examination Training and Guidelines for Examiners There are over 6,000 examiners at the PTO, with varied levels of experience.^{23/} It would be helpful to have rigorous guidelines for examiners. The PTO's quality initiative for fiscal year 2010, which involves review of Office Actions for the purpose of providing individual examiner feedback and training,^{24/} is a worthwhile task. Training could be improved further through initiatives such as encouraging mentoring and collaborative work on applications, making use of retired examiners as trainers, training examiners in areas such as negotiation and communication*** skills, and inviting practitioners (e.g., practitioners who are past examiners) or bar associations to educate new examiners on the roles of the patent attorneys and agents. Such steps would result in enhanced recognition of the best prior art and comprehensive first Office Actions on the merits, which would ultimately increase patent quality. These efforts to strengthen examiner quality depend on the PTO improving retention of its most experienced examiners. Patent examination is a complex process. Examiners develop expertise in technical areas, and this leads to better quality examination and better control over the backlog of applications. The PTO should consider

Surveys regarding Quality

- Connect surveys with real time experience per application
- Ask questions about quality of examination, understanding of claimed invention and technology
- Ask about administrative efficiencies, interviews , pilots, restriction practice, finals and RCEs, preappeal conferences, etc

Last surveys by the Office broadly targeted top filers submitting six or more patent applications within a given year. IBM suggests that a better approach would be surveys directly tied to examiner prosecution activities for specific applications, as well as to specific **Office processes, programs and applicant populations**. The detailed information obtained from the survey results could be used to focus examiner training on particular problem areas or to determine the effectiveness of a particular Office practice or procedure. Past surveys have inquired whether an examiner is citing prior art appropriately, whether all claims were addressed in a rejection, and whether a rejection was consistent with the requirements of the statutory section cited, i.e. 35 USC Sections 101, 102, 103 or 112. IBM recommends further inquiry regarding the quality of Office Actions, such as whether the applicant believed the examiner demonstrated familiarity with the applicant's specification and sufficient understanding of the claimed invention, whether the rejection was clearly and concisely written, and whether the examiner identified where the specific claim elements were cited in a prior art reference. Surveys should include questions regarding administrative processes such as Interview Practice, Restriction Practice and RCE practice. In some instances, actions agreed upon during interviews are not subsequently followed by examiners. Improper restrictions increase pendency and are costly to the applicant. In order to determine if examiners are improperly using RCE practice, applicants should be asked about issues such as how often they have to request reconsideration of a premature final rejection, or how often they feel that they have to file an RCE in order to have a clarifying amendment entered. Questions should also be directed to specific user communities such as applicants who have prosecuted before the Board of Patent Appeals and Interferences, and/or tailored to the effectiveness of programs such as Pre- Appeal Conferences. Further, since enhancing the quality of patent examination and issued patents is a shared responsibility, patent examiners should be able to similarly evaluate the performance of patent professionals. Lastly, Customer Panel Quality Survey results should be made publicly available, without identifying the respondents, and should be conducted by organizations or persons clearly affiliated with the Office. Public availability will promote transparency and allow the public to assess quality issues and trends, and anonymity will promote candid responses and protect respondents' interests. Verification of Office authorization of those performing surveys has not been consistently provided in the past, and is important to ensure full and frank participation. The Office could publicize the surveys more fully and provide information to help respondents identify authorized representatives.

Sample Survey questions

- In rejections under 35 U.S.C. § 101, do examiners consistently follow the flowcharts and make the findings required by MPEP § 2106 and memoranda to the examining corps
- In rejections under 35 U.S.C. § 102, do examiners consistently consider all claim language, including interconnections and limitations of arrangement?
- Are "portions relied on" designated "as nearly as practicable?" - If the citation of a portion of a reference is not sufficient to make the examiner's position absolutely "apparent," do examiners "clearly explain the pertinence?" - When asserting inherency, do examiners consistently make showings of "technical fact or reasoning" to establish that the asserted subject matter is indeed inherent?
- In rejections under 35 U.S.C. § 103, do examiners consistently follow one of the rationales for obviousness set out in MPEP § 2142, with a showing of all legal elements? - When asserting official notice, do examiners consistently follow MPEP § 2144.03(A) and (B)?
- When an issue of the examiner's personal knowledge is challenged under 37 C.F.R. § 1,104(d)(2), do examiners consistently replace personal opinion with substantial evidence?
- When raising obviousness double patenting issues, do examiners consistently make all the showings required, including precisely identifying the difference between **one claim in the pending application and one claim in the reference patent/application, and making a precise showing of obviousness of the difference?**
- **When making rejections under the enablement requirement of 35 U.S.C. § 112 ¶ 1, do examiners consistently make the showings required by MPEP §§ 2161 - 2163?**
- **When making rejections under 35 U.S.C. § 112 ¶ 2 (indefiniteness), do examiners call out genuine ambiguity or indefiniteness, or do they rely on "rules of thumb" and formulae that exist solely for historical reasons, but do not indicate genuine ambiguity? Note that the above sample survey questions are couched in general terms about the examining corps rather than about the actions of a specific examiner. The PTO needs to recognize that applicants and their attorneys are often reluctant to comment about specific examiners and their SPEs, because applicants and their attorneys are frequently assigned to the same examiner or SPE in follow-on or related applications.**

The above are some sample survey questions submitted by commentor

Note that the above sample survey questions are couched in general terms about the examining corps rather than about the actions of a specific examiner. The PTO needs to recognize that applicants and their attorneys are often reluctant to comment about specific examiners and their SPEs, because applicants and their attorneys are frequently assigned to the same examiner or SPE in follow-on or related applications.