Business decisions often depend upon accurately determining an asset’s value. Intellectual property is a particularly difficult type of asset to appraise because of its intangible nature and the multitude of complex factors involved in accurate valuation.

Yet intellectual property, particularly a patent portfolio, is often among a company’s most important assets. A business needs to accurately assess patent quality and value to answer questions such as:

- Does existing intellectual property protection cover the company’s products, services and research areas sufficiently?
- Are the company’s patents strong enough to be asserted against a competitor?
- Are the patents a potential source of licensing revenue?
- Are continuation applications, reissue applications or any additional patent applications warranted?
- How much is the patent portfolio worth in the context of the value of the company as a whole?
- How good is the company’s patent counsel?

A number of situations exist in which a business may wish to assess the quality of a patent owned by another company. The risk of potentially infringing another company’s patent depends upon that patent’s applicability, the strength and breadth of its coverage and the viability of a challenge to its validity. It also is important to evaluate the quality of another company’s patents to determine:

- How crowded is the technological field? Should a competitor’s patents affect the company’s decision to enter a product or development area?
- Should the company offer to take a license on a patent?
- Should the company attempt to acquire or merge with a competitor?
- Should the company beef up its own portfolio for defensive purposes or for negotiating strength given a competitor’s patents?

The following is a step-by-step checklist for patent-quality assessment:

**Subject Matter**
First, it is important to consider the overall subject matter addressed by the patent and whether it is related to one’s own market or technological area. Of course, the patent may have some general intrinsic value, and certain companies are interested in acquiring patents regardless of the technological area. Generally, however, is impractical to evaluate every patent that comes along, regardless of whether it is relevant to the company’s business.

**Claims**
Claims define the limits of the property right conferred by a patent. Therefore, once a company determines that the patent’s subject matter is sufficiently relevant to warrant further analysis, the next step is to study the claims.

A good set of claims describes the invention at several levels of abstraction, each providing a different breadth of coverage. Broader claims cover the overall concept. Other claims, such as dependent claims, introduce limitations relating to particular implementations of the invention. While such claims provide narrower coverage, the patent holder may be more successful defending narrower claims against invalidity arguments based on prior art. An alleged infringer usually challenges patent validity whenever a patent holder asserts the patent against it. Thus, it is important for a patent holder to have a robust claim tree,

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**Assessing Patent Value**

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including claims at different levels of abstraction and breadth as fallback positions.

Another issue is whether the claims include all of the invention’s parallel and alternative forms. Typically, patents should include a combination of method claims (a sequence of steps, such as a process, algorithm or business method), system claims (an apparatus, functional architecture or machine) and computer program product claims (software encoded on a medium, such as a disk).

The company also should examine whether the claims specify steps to be performed by more than one party, entity, person or machine. For patents involving multiple entities (such as client/server architectures), it is important to include separate claims for the steps performed by each entity. For example, one set of claims may cover steps performed by the client, and another set may cover steps performed by the server. A competitor then could be liable for infringement by operating or selling just the server or just the client.

In general, any invention involving communication or interaction between nodes, entities, components or users should include separate claims for as many of these entities as is practicable. This avoids any requirement that the infringer sell or operate all entities.

One also should note whether the claims include “means plus function” language, such as “means for encrypting the received signal.” Such claims attempt to define an element of a system according to the function that it performs, rather than its structure. However, the scope of such claims is narrower than it would appear, due to statutory language specifically limiting such claims to the description in the specification, plus equivalents. 35 U.S.C. Section 112. Although there is nothing wrong with including “means plus function” claims, it is important to also include other claim formats.

**Specification**

A patent’s specification can have a significant effect on its scope and validity. Courts will read the claims in light of the specification and use the specification for guidance about the terminology used in the claims and what the applicant intended the claims to protect. If the specification contains limiting language, a court may read those limitations into the claims, even though the claims do not recite those limitations.

One should review the specification for completeness. A patent must describe the “best mode” of practicing the invention known to the applicant at the time of filing. It must describe the invention at a level of detail sufficient to allow an individual having ordinary skill in the art to recreate the invention. If doubt exists as to whether the description is sufficient, then the patent’s value is questionable; a defective specification can lead to invalidation of the claims.

**Prosecution History**

The prosecution history of an issued patent provides information as to the claims that the patent holder originally filed, the number of office actions, responses and interviews that took place and the rejections, arguments and amendments that were made.

This information can have a dramatic impact on the value of a patent and can reveal vulnerabilities that are not always visible from the face of the patent itself.


An infringement defendant can use the prosecution record as a basis for construing the claims narrowly, arguing that such statements in the record indicate what the applicant intended to patent (and the examiner intended to allow) and that the court should read the claims in light of such statements. In general, excessive amounts of arguments, characterizations and assertions during prosecution increase the risk that a patent’s scope may be thrown into doubt at some point.

**Priority Date and Prior Art**

Patents with earlier priority dates are more valuable than later-filed patents because the earlier filing date means that less prior art is available to defeat the patent.

In considering the priority date, one should investigate what prior art existed at the time, as well as what products may have been launched before the application was filed. In the United States, an inventor must file a patent application within one year of any public disclosure of the invention. Therefore, it is important to consider what disclosures may
have been made more than one year before the application’s filing date (or priority date).

If relevant prior art does exist, one should investigate whether the applicant properly cited the art to the examiner in the course of the patent’s prosecution. Art that was considered by the examiner may make the patent stronger, because there is a presumption that the patent is valid over art that was considered, although the presumption is rebuttable. 35 U.S.C. Section 282. If the applicant knew of relevant art but failed to cite it, then the patent may be invalidated due to the applicant’s failure to fulfill the duty of candor, which requires an applicant to disclose any relevant art of which he or she is aware in the course of prosecution. 37 C.F.R. Section 1.56.

Patents that claim priority from other patents or applications are subject to additional avenues of attack. If a patent claims priority from an earlier provisional application, and the provisional application fails to fully support the claims, then the priority claim can be defeated. Similarly, a patent that claims priority as a continuation or continuation-in-part can lose the benefit of the earlier priority date if the specification of the parent application does not adequately support its claims. Therefore, for any patent that claims priority from another patent or application, one should review the specification of any parent application.

Conclusion
Evaluation of a patent is a multifaceted exercise that often requires the skill and expertise of an experienced patent practitioner. However, these basic principles are the cornerstones of such analysis and a good starting point in any attempt to ascertain the overall value of a patent.

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