

Patent search in corporate practice

Dr Lars Zanzig

Serviva GmbH

The information from by now more than 100 million patent files worldwide constitutes a true 'treasure of data' as well as a very big challenge if a very specific protection right is to be found for a specific issue. Therefore, it is not surprising that, despite continuously improved data sources and software tools, the quality of a patent search depends significantly on the knowledge and experience of the researcher.

Data sources

As a basis for a patent search, either free database access comes into question, which is provided by various patent offices and Google, or paid commercial providers. The latter usually have more data and have often enriched their data with useful additional information. The various offers also differ, for example, in the scope and quality of the legal statuses and English translations as well as in the presentation of the results and the export possibilities.

Tasks for patent searches

With an overview search, many questions can be answered, for example, which companies in a selected technological area particularly engage actively in development work (and apply for many patents), which technical characteristics the patent applications focus on, if temporal developments are recognisable and much more. This form of research often takes place right at the start before a proper development project starts.

In addition, there are "classic" occasions for conducting a patent search: for example, the examination of an invention disclosure in the run-up to a patent application or the search for suitable state of the art, if an objection to a third-party protection right is to be filed. In addition, before the market launch of a new product, a check should be made with the help of a patent search as to whether third-party property rights are not being infringed. These specific tasks will be discussed in more detail in the following sections.

Novelty search and state of the art search

Before the effort is made to file for a patent application, it makes sense to use a compact novelty search to see whether there is any realistic prospect of granting a patent. The aim of a novelty search is to primarily ensure in the most efficient way that the invention has not already been registered for patent approval by third parties, and thus is no longer new. If detailed information on state of the art is required for further development work, a more comprehensive state of the art search is recommended.

Legal validity searches

Legal validity searches are usually carried out in preparation for an objection or an action for annulment. With regard to the respective application or priority date, such a search aims to find previously published state of the art which questions the inventive step or even better the novelty of the patented

invention. In addition to the patent documents, non-patent literature such as publications in scientific journals or conference papers is often taken into account.

Freedom to operate (FTO) search

A patent search for checking the freedom to operate (abbreviated FTO) should be firmly anchored in modern product development processes. The aim is to detect industrial property rights of third-party companies at an early stage whose claims could possibly violate their own product. When such a risk is identified, there are often different courses of action. One can try to develop a workaround or start a licence request or try to challenge the patentability of the 'interfering' intellectual property right.

The quality of the research increases the more precisely the features of the product to be examined can be defined. In the first search step, with the assistance of suitable software tools and databases, a search is carried out for property rights in force that contain these features. With a detailed analysis, the researcher compares the claims of the patents or patent applications in order to make an initial assessment of relevance and to facilitate the work of decision-makers in the company or supervising patent attorneys.

FTO searches are always a difficult balancing act for the researcher. On the one hand, completeness is to be ensured so that no relevant documents are overlooked. On the other hand, the number of documents subjected to a detailed analysis must also be limited.

Summary

Depending on the occasion and the specific task, the requirements for a patent search differ considerably. Accordingly, the effort invested in such a search varies from a few hours for a simple novelty search to many man-days for a comprehensive legal validity or FTO search.

In any case, high-quality patent searches require a high degree of experience in order to find an efficient way to meet the requirements for relevance and completeness of the documents.