

Learning path for patent administrators

General aspects of the patent system: EPAC – entry level

Version: April 2025



Introduction

This publication, "General aspects of the patent system, EPAC – entry level", is part of the "Learning path for patent administrators" series is edited and published by the European Patent Academy. The series is intended for patent administrators who are taking part in training and certifications organised by the European Patent Office (EPO). It is also freely available to the public for independent learning.

Topics covered include: general aspects of the patent system; the European patent system and the European patent granting procedure; the International Patent System (PCT) and the PCT procedure; European and international publications; filing a European patent application and filing an international application; the formalities during the European and during the international search; the formalities during the European examination and during the international preliminary examination; the formalities during the appeal procedure after refusal (EPC), during the opposition procedure (EPC); national validation (EPC); entry into national/regional phases and entry into the European phase (PCT).

Each chapter focuses on one topic at entry, intermediate or advanced level, as appropriate. The series will be revised annually to ensure it remains up to date.

Disclaimer

This publication is for training and information purposes only. Although it has been prepared with great care, it cannot be guaranteed that the information it contains is accurate and up to date; nor is it meant to be a comprehensive study or a source of legal advice. The EPO is not liable for any losses, damages, costs, third-party liabilities or expenses arising from any error in data or other information provided in this publication.

The opinions expressed in this publication are not necessarily those of the EPO.

This publication may be used and reproduced for non-commercial purposes, provided that the EPO and the contributors are appropriately acknowledged. Reproduction for commercial purposes is not permitted.

All references to natural persons are to be understood as applying to all genders.

Contents

1.	Learning objectives	4
2.	Background to the patent system	4
3.	What is a patent?	4
4.	Structure of a patent specification	5
5.	The three patentability criteria	6
6.	The geographical scope of a patent	6
7.	National, regional (EP) and international routes	7
8.	Priority right and Paris Convention	8
9.	Ownership and inventorship	8
10.	Transfer of rights and assignments	9
11.	Duties and responsibilities of a representative/applicant and of a patent paralegal	9

1. Learning objectives

Participants in this course will learn:

- the definition of a patent and the structure of its specification
- the requirements for patentability
- the geographical scope of a patent
- the different patenting routes
- the priority concept
- the definition of ownership and inventorship as well as transfer of rights

2. Background to the patent system

The role of IP (intellectual property) is to establish and protect ownership of ideas and the way they are represented and applied. Patents are one form of IP. Other forms of IP comprise: trademarks, industrial designs, copyright, etc.

The patent system is designed to support the development of innovation. A patent has two important functions: legal protection of an invention and its disclosure, thereby contributing to economic growth by giving public access to new technologies.

A patent is an exclusive intellectual property right granted for an invention as it prevents others from making or selling a product or implementing a process without the patent owner's consent. A patent can protect an invention for up to 20 years and has territorial effect. The patenting system includes national, regional and international patenting systems. Each patent system is regulated by a corresponding legal framework.

Examples

The Paris Convention defines the protection of intellectual work.

The Patent Cooperation Treaty(PCT) defines the framework to internationally apply for the protection of inventions.

The European Patent Convention (EPC) governs the granting of patents in its contracting states, the member states of the European Patent Organisation.

The German Patent Law governs the granting of patents in Germany.

Legal references:

Art. 87 EPC; Art. 89 EPC;

Rule 157 EPC; Rule 165 EPC

3. What is a patent?

A patent is a legal title granting its holder the right to prevent third parties from exploiting an invention for commercial purposes without authorisation. This right is limited to the territory of country and valid for a certain period of time.

The standard protection term of a patent is 20 years from the date of filing. Provided that the annual renewal fees are duly paid, patents will remain in force for the maximum protection term.

The patent specification describes the invention and defines the scope of protection. Further, the EPC specifies that an invention shall be disclosed in a manner sufficiently clear and complete for it to be carried out by a person skilled in the art.

Remarks

- In each contracting state for which a patent is granted, a European patent gives its proprietor the same rights as would be conferred by a national patent granted in that state. If its subject-matter is a process, protection is extended to products directly obtained by that process. Any infringement of a European patent is dealt with by national law.
- The problem solved by the invention must thus be a technical problem rather than, for example, a purely financial, commercial or mathematical one. This requirement must be met in order for the invention not to be excluded from patentability. An invention can, for example, be a product, a process or an apparatus.

Legal references:

Art. 63 EPC; Art. 64 EPC

4. Structure of a patent specification

The claims define the subject-matter for which protection is sought. The subject-matter must be defined in terms of technical features of the invention. The claims must be clear and concise and supported by the description.

There are two types of claims. An independent claim contains all the essential features of the invention. Dependent claims include further technical features of the same invention: all the features of a claim are contained in the claim depending on it. Dependent claims must contain a reference to the claims on which they depend, which may also be dependent.

The description supports the claims and their interpretation. It generally specifies the technical field to which the invention relates, indicates the background art by citing source documents (patent specifications, books, periodicals), discloses the invention as claimed, indicates the technical problem that the invention solves and describes how to solve it. It should be clear from the description how the invention is susceptible of industrial application.

The patent specification may also contain drawings. These form a useful addition to the description as they illustrate the features of the invention. Any flow sheets and diagrams are considered to be drawings. In that case, the description refers to the embodiments of the invention illustrated in the drawings, providing figure numbers and reference signs.

The patent specification further contains an abstract, which is purely for technical information of the public.

Legal references:

Art. 57 EPC; Art. 83 EPC; Art. 84 EPC, Art. 85 EPC

Rule 42(1)(a); EPC-Rule 42(1)(f) EPC; Rule 43 EPC; Rule 47 EPC; Rule 49 EPC

GL F-II, 4; GL F-III; GL F-IV

5. The three patentability criteria

According to the majority of existing patent laws, an invention must meet the following three patentability requirements to be granted:

- Novelty: the invention should not already be publicly available
- Inventive step: it should not be obvious to a person skilled in the art
- Industrial applicability.

Legal references:

Art. 52(2) EPC; Art. 57 EPC

6. The geographical scope of a patent

A patent is an IP right with a validity limited to the territory covered by the granting authority: it is granted for one country (national patent system) or for a region (regional patent system).

An applicant may file a patent application with a national or regional granting authority. The granting authority will process the application based on the applicable national or regional patent law and a patent may be granted on this legal basis. Applicants may also use the international patent system (PCT) to file an application. On the contrary to a national or regional patent system, the PCT does not result in the grant of a patent.

Patents confer the right to prevent third parties from making, using or selling the invention without their owners' consent in the countries where the patent has been granted. There are different routes to patent protection and the best route for an application will depend on the invention and the markets the company operates in.

When filing a European patent application, all the contracting states for which the EPC has already entered into force on the date of filing are deemed to be designated. The 39 EPC contracting states are: Albania, Austria, Belgium, Bulgaria, Switzerland, Cyprus, Czech Republic, Germany, Denmark, Estonia, Spain, Finland, France, United Kingdom, Greece, Croatia, Hungary, Ireland, Iceland, Italy, Liechtenstein, Lithuania, Luxembourg, Latvia, Monaco, Montenegro, North Macedonia, Malta, Netherlands, Norway, Poland, Portugal, Romania, Serbia, Sweden, Slovenia, Slovakia, San Marino, Türkiye.

At a later stage of the procedure (for European patent applications, within six months of the date on which the European Patent Bulletin mentions the publication of the European search report), a specific extension or validation fee must be paid by the applicant to keep the possibility to validate a potentially granted patent in the extension or validation states (GL A-III.12.2):

- One extension state: Bosnia-Herzegovina

Six validation states: Kingdom of Morocco, Republic of Tunisia, Kingdom of Cambodia, Republic of Moldova, Georgia and the Laos People's Democratic Republic. Remark: the validation agreement signed with Costa Rica has not yet entered into force.

Examples

As an example, patent applications can be filed at the European Patent Office under the European Patent Convention (EPC) or under the Patent Cooperation Treaty (PCT). If an applicant is seeking protection in a plurality of European countries, it may be more economic and efficient to apply at the EPO rather than applying to each individual country. If an applicant is seeking protection for only one country, it may be best to apply for a national patent in that particular country.

Legal references:

Art. 59 EPC; Art. 64 EPC; Art. 65 EPC; Art. 79 EPC

Rule 39 EPC; Rule 159(1) EPC

GL A-III, 12.2

7. National, regional (EP) and international routes

An applicant may choose between different routes of filing.

The applicant chooses the national route when filing the application directly at the national patent office. If a patent is granted, this patent is valid only in the state where the application was filed.

The applicant chooses the European route when filing the application under the European Patent Convention (EPC). The EPO has three procedural languages: German, English and French. If a patent is granted by the EPO, it can be validated in up to 46 states (39 EPC member states, 1 extension state and 6 validation states).

Remark: there are further regional offices beside the EPO: the EAPO, the OAPI, the ARIPO.

The applicant chooses the international route when the application is filed under the Patent Cooperation Treaty (PCT). International applications are filed at the International Bureau (WIPO), the EPO or any other receiving office. However, the PCT procedure does not result in the grant of a patent. To get a grant, applicants must enter the national/regional phase at the end of the international route. A patent can therefore potentially be granted in up to 158 states.

Examples

Filing an application with a national patent office usually has the following advantages: the procedural fees are usually less expensive than for a regional route, the applicants generally can deal with the office in a language they are more likely to be familiar with.

Should an applicant also wish protection in other countries at a later stage, the first national application can serve as the basis for the priority right under which applicants can file an application for the same invention in another country, within 12 months from this first filing, while keeping the original filing date.

Legal references:

Art. 75 EPC; Art. 76 EPC

Rule 35 EPC
Art. 2 PCT; Art. 4 PCT; Art. 11(3) PCT; Art. 64(4) PCT
Rule 4.9 PCT

8. Priority right and Paris Convention

The priority right is triggered by the first filing of an application relating to a given invention: this right allows the filing of a subsequent application for the same invention within 12 months from the date of filing of the first application. This first date of filing will be known as the priority date.

The effect of the priority right is that the priority date is considered as the "effective date of filing" of any subsequent application when assessing the patentability of a subsequent application and the validity of the rights it may confer.

Remark: the priority right exists also for other industrial property rights than patents. The priority rights is defined by the Paris Convention, adopted in 1883 and covering industrial property in the widest sense, including patents, trademarks, industrial designs, utility models, service marks, trade names, geographical indications and the repression of unfair competition.

Examples

If an applicant files a patent application in a state party to the Paris Convention or in any member of the World Trade Organisation (WTO), the applicant may then claim priority when filing a patent application in respect of the same invention.

Legal references:

Art. 54(2) EPC; Art. 54(3) EPC; Art. 60 EPC; Art. 87 EPC; Art. 88(1) EPC; Art. 88(2) EPC; Art. 89 EPC

Rule 52 EPC; Rule 53 EPC

GL A-III, 6; GL F-VI

9. Ownership and inventorship

The concepts of ownership and of inventorship are essential to the functioning of the patent system.

The applicant is the proprietor, or owner, of the patent application. The applicant can be any natural or legal person, or anybody equivalent to a legal person, irrespective of nationality and place of residence and/or business. For the purposes of proceedings before the patenting authority, the applicant will be deemed to be entitled to exercise the right to the patent.

An application may be filed in the name of one or several persons named as joint applicants. The application may also be filed by two or more applicants, which can designate different contracting states of a regional office.

Each application must have designated inventor(s). If the applicant is not the inventor, a designation of inventor has to be filed. This designation of inventor must state both the family and given names, the country and place of residence of the inventor and bear the signature of the applicant or their representative. Inventorship can be regulated differently in different countries.

Examples

For a given application, a first applicant designates a first group of contracting states and a second applicant designates a different group of contracting states while both applicants jointly designate a third group of contracting states. In such a case the applicants will be regarded as joint applicants for the purposes of the proceedings.

Legal references:

Art. 58 EPC; Art. 59 EPC; Art. 60(3) EPC; Art. 118 EPC; Art. 133 EPC; Art. 134 EPC

Rule 151(1) EPC

GL A-II, 2

10. Transfer of rights and assignments

A patent application or a patent may be transferred in whole or in part, by the proprietor for one or more of the countries where the patent application/patent is valid.

Legal references:

Art. 71 EPC; Art. 72 EPC

Rule 14 EPC; Rule 22 EPC; Rule 85 EPC; Rule 142 EPC

GL E-XIV, 3

11. Duties and responsibilities of a representative/applicant and of a patent paralegal

Often, the applicants do not interact with the patent authority, they choose to be represented by patent attorneys, also called representatives. The representation before the European Patent Office is governed by Art. 134 EPC.

When filed, an application must comply with a number of formal requirements in accordance with the implementing regulations, see Art. 90 EPC. The applicant or the representatives are responsible for ensuring that these requirements are met. Administrative staff of the representative, also named paralegals, are usually entrusted with these administrative checks.

Legal references:

Art. 134 EPC; Art. 90(1) EPC

Rule 10(1) EPC

European Patent Academy
European Patent Office
Munich
Germany
© EPO 2025

Responsible for the content
European Patent Academy
academy@epo.org