

19 System for Comprehensive Protection of Invention —Through the comparison between the U.S. CIP application system and the Japanese internal priority system—

Researcher: Atsushi Mizuno^(*)

This report discusses the ideal modalities for the comprehensive protection of inventions. Specifically, the report first overviews the current systems for comprehensive protection of inventions, focusing on the continuation-in-part (CIP) application system in the United States and the internal priority system in Japan. Then, it examines the problems and the ideal modalities in the case where an application system similar to the U.S. CIP application (hereinafter referred to as the “CIP-type application”) is introduced in Japan, based on its relation to the system of publication of unexamined applications.

Positive consideration should be given to allowing the filing of a CIP-type application before the publication of the earlier application in Japan. However, the filing of such an application after the publication of the earlier application would have little merit to the applicant because the Japanese patent system does not have provisions for a grace period as in the United States. At the same time, thorough study should be made on the negative effects, such as an increase in third parties’ monitoring burdens and the occurrence of incidences where an applicant repeatedly files CIP-type applications on purpose in order to keep related applications pending for a long time.

I Introduction

This report compares the continuation-in-part (CIP) application system in the United States and the internal priority system in Japan, examines the problems and the ideal modalities in the case where an application system similar to the U.S. CIP application (hereinafter referred to as the “CIP-type application”) is introduced in Japan, and examines ideal modalities of comprehensive protection of inventions.

II Appropriate Protection of Inventions

1 Background

In recent years, technological development seems to be taking place through active importation and fusion of technologies of different fields under a social environment where technological innovation is constantly sought. In this course, not only basic/fundamental inventions, but improvement inventions, etc. are also developed one after the other. Therefore, it is desirable for Japan to have a system that protects improvement inventions, etc. comprehensively and exhaustively. A representative system in Japan is the internal priority system.

At the same time, the United States has the systems of CIP application and provisional application. Under the CIP application system,

the applicant may file a CIP application as long as the earlier application is pending in examination or appeal. In contrast, under the Japanese internal priority system, the period for filing an application claiming priority is limited to within one year from the filing of the earlier application. Thus, there are advocates for the introduction of a system similar to the U.S. CIP application system in Japan as well.

2 Comprehensive Protection of Inventions

(1) Systems for comprehensive protection

If there were no system that enables comprehensive protection of inventions, the applicants would have to file separate, independent patent applications for the series of created inventions. Then, the claims for the later application would have to be drafted in such a way as to avoid double patenting with the earlier application. As a result, there could be gaps between the scopes of the respective patents, and the inventor may not be able to receive sufficient protection for his/her inventions.

The typical modalities of comprehensive protection of inventions are to “fill in the gaps” between the scopes of the patents obtained by filing multiple patent applications and to “expand” the scope of the claim of a single patent application.

(*) Assistant Manager, Intellectual Property Department, Legal Division, Toppan Printing Co. Ltd.

(2) Paris Convention priority claim

The priority right system under the Paris Convention allows multiple priorities and partial priority. Therefore, it allows the applicant to add new matter to the first application in filing the second application, and to seek comprehensive protection of the inventions in the other member countries.

(3) Scope of effect of a patent right and the relation with the doctrine of equivalents

In Japan and the United States, there is the concept of doctrine of equivalents, but application of the doctrine of equivalents is still subject to debate.

The systems of comprehensive protection would have greater institutional significance when the scope of application of the doctrine of equivalents is narrow. In other words, it would be possible to establish literal infringement without relying on the doctrine of equivalents when interpreting the scope of the acquired patent.

3 Systems for Amendment

The Japanese and U.S. patent laws allow the applicant to amend the claims and the specification. In Japan and the United States, amendment is allowed for the matter described in the originally filed specification, in principle, and it would not be allowable to add an improvement invention created after the filing of a patent application or add new data obtained after the filing of a patent application to the specification of the earlier application by amendment. Therefore, it is difficult and inappropriate to use the system of amendment as a means for comprehensive protection of inventions.

4 Summary

From the viewpoint of protecting inventions, the modalities for protecting improvement inventions, etc. are important. Therefore, it is desirable to improve the system that allows applicants to seek comprehensive protection. In the current Japanese internal priority system, the problem seems to be the fact that an applicant can only file an application claiming priority within one year from the filing of the earlier application.

III Comprehensive Protection of Inventions in the United States

1 Systems for Protection in the United States

In the United States, the CIP application system and the provisional application system are available as systems for filing an application that adds new matter when an improvement invention, etc. has been made after the filing of the original application. Also, if the matter added by amendment would not be determined as new matter, the applicant can simply amend the specification. In addition, from the viewpoint of not creating gaps between the scopes of the acquired patents, the determination standards for double patenting would also be important.

2 Continuation-in-Part (CIP) Application System

(1) Definition of a CIP application

A CIP application is one type of continuing applications along with a continuation application and a divisional application. It is defined as “an application filed during the lifetime of an earlier nonprovisional application, repeating some substantial portion or all of the earlier nonprovisional application and adding matter not disclosed in the said earlier nonprovisional application” (MPEP^{(*)1} 201.08).

(2) Related systems

(i) Continuation application

A continuation application is “a second application which contains the same disclosure as the original application.”^{(*)2} A continuation application can be filed based on 37 CFR^{(*)3} 1.53(b). As a system in place of the continued prosecution application (CPA) under former 37 CFR 1.53(d), a request for continued examination (RCE) was introduced.

(ii) Divisional application

A divisional application is “a later application for an independent or distinct invention, carved out of a pending application and disclosing and claiming only subject matter disclosed in the earlier or parent application” and “a divisional application is often filed as a result of a restriction requirement made by the examiner” (MPEP 201.08). Therefore, no new matter can be included in a divisional application.

(*)1 MPEP: Manual of Patent Examining Procedure. It is referred to as “MPEP” in this report.

(*)2 See Donald S. Chisum, *Chisum on Patents*, Matthew Bender, §13.03[2].

(*)3 Title 37 - Code of Federal Regulations Patents, Trademarks, and Copyrights. It is referred to as “37 CFR” in this report.

(3) Legislative history of the continuation application

The U.S. continuation application system is said to have been put in the statutory form in the law amended in 1952, based on a court judgment in 1864.^(*)4) A CIP is also an application by which a patent is sought for a part of the substance of the invention as originally claimed, as referred to in the above judgment.

(4) Objectives of a CIP application

The objectives of filing a CIP application are regarded to include addition of a later-developed improvement to the earlier application.

(5) Requirements for a CIP application

(i) Inventor

In the United States, the applicant of an invention must be the inventor. Meanwhile, a requirement for filing a CIP application is that “the first application and the alleged continuation-in-part application were filed with at least one common inventor” (MPEP 201.08).

(ii) The invention is disclosed in the parent application

In order for the invention claimed in a CIP application to enjoy the benefit of the filing date of the parent application, the invention needs to be described in the specification, etc. of the parent application in accordance with the first paragraph of Section 112. In a case where a further CIP application (grandchild application) is filed based on a CIP application (child application), continuity of disclosure is required.

(iii) The parent application is pending

A CIP application can be filed as long as its parent application is pending in examination, etc., but as mentioned later, the filing is practically limited in relation with the publication system.

(iv) Indication of being a CIP application

A CIP application must indicate its dependency on the parent application. This allows one to identify the parent application from the CIP application and to easily refer to the progress of examination of the parent application.

(v) Obligation to update the best mode

When filing a CIP application that adds new matter pertinent to the best mode described in the parent application, the applicant has the obligation to update the best mode.

(6) The effect of a CIP application and the term of the patent

(i) Effect of CIP application

Among the inventions claimed in a CIP application, those disclosed in the parent application can enjoy the benefit of the filing date of the parent application, as long as they meet the above-mentioned requirements, and the patentability, such as the novelty and nonobviousness, of those inventions would be determined based on the filing date of the parent application, while that of the other inventions would be determined based on the filing date of the CIP application.

(ii) Term of patent

The term of the patent acquired by a CIP application is counted from the filing date of the earliest application and ends 20 years from that date. As a result, the term cannot be extended by repeatedly filing CIP applications. Therefore, even if an improvement invention, etc. has been added by a CIP application, the term of patent would end before 20 years pass from the filing date of the CIP application.

(7) Relation with the publication system

(i) The possibility for a CIP application to be rejected based on its own publication

There is a provision for a grace period (Section 102(b)) in the United States. Therefore, it would be possible in effect to file a CIP application adding new matter during one year after the publication of the parent application.

Conversely, if a CIP application is filed after that, it is very likely that the invention would be rejected in light of the publication of the parent application.

Therefore, there would be little merit in filing a CIP application after one year from the publication of the parent application in the United States in most cases.

(ii) Exceptions to the publication system

If an applicant makes a request upon filing, certifying that the invention disclosed in the U.S. application has not and will not be the subject of an application filed in another country that requires publication of applications 18 months after filing, the application will not be published. A report^(*)5) by the United States General Accounting Office (GAO) has illuminated that applications for which a valid request for non-disclosure is made constitute less than 10% of all applications. Thus, it seems rather rare for

(*)4) Godfrey v. Eames, 68 U.S. 317 (U.S., 1864).

(*)5) PATENTS Information about the Publication Provisions of the American Inventors Protection Act (May 2004) (<http://www.gao.gov/new.items/d04603.pdf>).

applicants to take the advantage of the exceptions to the publication system in order to be able to file CIP applications over a long term from the filing date of the parent application. In addition, a report^(*6) by the Federal Trade Commission (FTC) also reveals that 90% of all applications have been published. The FTC's report also states that "the Commission recommends legislation requiring publication of patent applications 18-months after filing."^(*7)

(8) Issue of prosecution history estoppel

When an amendment to a claim is judged to be new matter, and the applicant later files a CIP application, there is an issue of whether the claim would be denied of the benefit of the filing date of the parent application on a basis that the applicant was aware that the amendment was new matter. A CAFC (Court of Appeals for Federal Circuit) judgment^(*8) held that when the final rejection of the parent application is not based on Section 112, the applicant would not be deemed to have been aware that the matter added by the CIP application was new matter.

(9) Prosecution laches

A CAFC judgment^(*9) indicated that, when an applicant acquires a patent through sequential filing of continuing applications including CIP applications, the issue of prosecution laches may arise, and the patent may become unenforceable. After the case was remanded to the district court, the district court held that the patent was unenforceable due to prosecution laches.^(*10)

(10) Status of use of the CIP application system

As for the status of use of the CIP application system, a paper^(*11) that surveyed the number of CIP applications indicated that the number of CIP applications filed increased until 1995, but it decreased for a time in 1996. Before the law amendment that entered into force in 1995, the term of patent was 17 years from the patent issuance. Thus, there would have been a considerable merit in filing CIP applications.

After that, the number of CIP applications

has been increasing, but their proportion to all applications has been slightly declining.

(11) Criticisms against CIP applications

There are criticisms against continuation applications and CIP applications. These do not solely criticize CIP applications, but refer to CIP applications in a criticism against continuation applications. Some of these criticisms are that they invite delays in examination and inventors rewrite the claims after monitoring developments in the marketplace.

(12) U.S. experts' opinions on CIP applications

(i) Should an applicant file a CIP application or a separate, independent application when he makes an improvement invention, etc.?

The question of whether to choose a CIP application or a separate, independent application when an improvement invention, etc. has been made is an extremely difficult question, so a separate determination is made for each case. However, it is not necessarily common to file a CIP application when adding an improvement invention. It is because the term of patent will be shortened.

(ii) What are the objectives of filing a CIP application?

A CIP application is sometimes effective for circumventing prior art that became publicly known after the filing date of the first application.

(iii) Is there a merit in filing a CIP application after one year from the publication of the parent application?

Such a CIP application would be rejected based on the publication of the parent application, so it would have little meaning.

3 Provisional Application System

The provisional application system, which was introduced by the law amendment in 1994 (Section 111(b) and MPEP 201.04(b)), is a system that can be used for comprehensive protection of

(*6) *To Promote Innovation: The Proper Balance of Competition and Patent Law and Policy* (FTC, October 2003) Chapter 5, 14 (<http://www.ftc.gov/os/2003/10/innovationrpt.pdf>).

(*7) *Ibid.*, Chapter 15, 15.

(*8) See *Waldemar Link, GmbH & Co. v. Osteonics Corp.*, 31 U.S.P.Q.2d 1855.

(*9) *Symbol Technologies, Inc. v. Lemelson Medical Education & Research Foundation, Ltd.* P'ship, 277 F.3d 1361 (Fed. Cir.2002).

(*10) *Symbol Technologies, Inc. v. Lemelson Medical Education & Research Foundation, Ltd.* P'ship, 2004 U.S. Dist. LEXIS 1499 (U.S. Dist., 2004).

(*11) See Cecil D. Quillen, Jr., Ogden H. Webster, and Richard Eichmann, *Continuing Patent Applications and Performance of the U.S. Patent and Trademark Office – Extended*, *The Federal Circuit Bar Journal*, Vol.12, No.1 pp35-55 (2002).

inventions. The system of provisional applications has been reported^(*12) in detail in the past. The applicant of a provisional application does not need to include a claim in the application, and he/she must file a nonprovisional application or convert the application to a nonprovisional application within a year from the filing of the provisional application. In this respect, it is subject to similar time limitation as the Japanese internal priority system. The term of patent is 20 years from the date of filing the nonprovisional application.

4 Amendment of the Specification, etc.

In the United States, an applicant is allowed to amend his/her claim or specification, etc., but he/she may not add new matter by amendment. It would not be possible to add an improvement invention, etc. or new data by amendment, in principle.

The handling of amendment that adds new matter differs between when new matter is added to the claim and when it is added to a different part, such as the specification, etc. When matter that has not been described in the original specification, etc. is added to the claim by amendment, it will be a breach of Section 112. On the other hand, if such matter is added to the specification, etc. by amendment, it will be a breach of Section 132 as an issue of prohibition to add new matter.

5 Double Patenting

In the United States, double patenting becomes a problem when multiple applications have been filed by the same inventor(s) or the same assignee(s). The purpose of the system of double patenting is to prevent a practical prolongation of a patent term, and can be divided into the case of a same invention and the case of an obvious invention. As for the aspect of considering an invention whose scope is obvious to be double patenting as well, the U.S. provisions are regarded to be stricter than the provisions on double patenting in Japan. However, since both claims could be patented by using a terminal disclaimer as long as the claims do not have an identical scope, a gap would not easily occur between the scopes of the patents and comprehensive protection of inventions would be possible.

6 Summary

Although the CIP application system in the United States can be used for comprehensive

protection of inventions, filing a separate, independent application seems to be a more frequent option when filing an improvement invention, etc. of the invention claimed in an already filed application, because the term of the patent would be counted from the filing date of the parent application. Also, due to the introduction of the publication system, the significance of filing a CIP application after one year from the publication is considered to have weakened in the United States, and it can be considered that the time for filing a CIP application is now practically limited.

IV Comprehensive Protection of Inventions in Japan

1 System of Protection in Japan

The internal priority system is available as a system for protecting improvement inventions, etc. under the Japanese Patent Law. The allowable scope of amendment will also be discussed briefly.

2 Internal Priority System

(1) Objective of legislation

Since the Paris Convention allowed multiple priorities and a partial priority, the internal priority system was introduced in order to establish a national filing system that has the similar functions. The objective of legislation is to allow an applicant to acquire a more comprehensive and complete right.

(2) Outline of the internal priority system

(i) Requirement for applicants

When filing an application claiming internal priority, the applicants of that application and those of the earlier application must be the same.

(ii) Requirements for the earlier application

The requirements include that, when filing an application claiming internal priority, the earlier application must not be a divisional application or a converted application.

(iii) Period for filing an application claiming internal priority

The period for filing an application claiming internal priority is one year from the filing date of the earlier application. This length is said to have been decided to achieve harmony with the period of priority under the Paris Convention and the Patent Cooperation Treaty (PCT).

(*12) "Research and Survey on Rights and Duties of Applicant regarding Patent Application" (FY 2000 Japan Patent Office [JPO] Research Report on Problems Relating to the Industrial Property System) (Institute of Intellectual Property, March 2001).

(3) Relation with the publication system

In terms of procedure, the one-year period from the first filing date for claiming internal priority is compliant with the time of the publication, which is 18 months after the first filing date.

(4) Status of use of the internal priority system

The number of applications claiming internal priority that have been filed and their proportion to all patent applications are slightly increasing every year.

3 Amendment of the Specification, etc.

Amendment will not be allowed unless the matter on the improvement invention, etc. is matter originally described in the specification. In short, it will not be allowed to add an improvement invention, etc. that was not described at the time of the filing or was created after the filing.

4 Summary

In Japan, an application claiming internal priority may only be filed within one year from the filing of the earlier application. This fact is likely to be the basis for a suggestion to introduce a system similar to the U.S. CIP application in Japan. Therefore, one idea is to introduce a CIP-type application system in Japan in order to achieve appropriate protection of such inventions.

V Considerations

1 Appropriateness of Introducing a CIP-type Application System in Japan

The opinion suggesting introduction of a CIP-type application system in Japan is considered to be based on a dissatisfaction regarding the fact that when an applicant wants to add an improvement invention or data after the period for claiming internal priority, the only means the applicant can take is to file a separate, independent application, and that such a separate application could cause the problem of double patenting, etc.

The government should constructively examine introduction of a CIP-type application system in Japan from the viewpoint of extending better protection for basic inventions.

2 Problems Pertaining to Introduction of a CIP-type Application System in Japan

This section examines the problems, etc. in the case where an application system similar to

the U.S. CIP application is introduced in Japan.

(1) Objective of introducing the system

The reason for considering introduction of a CIP-type application system in Japan is to achieve comprehensive protection of inventions and appropriately protect basic/fundamental inventions.

(2) Requirements for applicants

The requirements for applicants eligible to file CIP-type applications will be examined in this section. It would be worthy of consideration to require the applicants of a CIP-type application to include the applicants of the parent application, while also allowing addition of applicants, and to grant the benefit of the filing date of the earlier application even if the applicants were not exactly the same.

(3) Requirements for the subject matter of the parent application

If the parent application of a CIP-type application is a divisional application or a converted application, it is likely to increase the examination burden and third parties' monitoring burden. Therefore, it would be reasonable not to allow a CIP-type application in such a case.

(4) Period for filing a CIP-type application

The period during which a CIP-type application could be filed would be the biggest problem in respect to the significance of introducing the CIP-type application system.

(i) Until one year and six months after the filing

It may be appropriate to consider allowing the filing of a CIP-type application for as long a period as possible until one year and six months from the filing date of the earlier application.

(ii) After one year and six months from the filing

There seems to be a considerable difference between allowing the filing of a CIP-type application until one year and six months from the filing of the parent application and allowing it even after that period.

When a CIP-type application is filed after publication of the parent application, it is very likely to be rejected for lack of an inventive step based on the invention described in the publication of the parent application.

(iii) Relation with other procedures, etc.

Since the period for filing a CIP-type application could be more relaxed than the period for amending the specification, etc. or filing a divisional application with respect to the earlier

application, when allowing the filing of a CIP-type application for a long period after the filing of the parent application, it would be necessary to consider the relation with the procedures that are expected to be carried out with respect to the parent application.

(iv) Grace period

The merit of filing a CIP-type application after the publication of the parent application would be larger if there are U.S.-type provisions on the grace period. The issue of the grace period has been discussed in examination of the Substantive Patent Law Treaty (SPLT) at the World Intellectual Property Organization (WIPO), so it is considered to be appropriate to examine it along with these discussions.

(5) Term of patent

With regard to the patent term when a CIP-type application has been patented, there is a concept to count it from the filing date of the CIP-type application, and when the filing date is later than one year from the parent's filing date, to count it from one year after the parent's filing date, as well as a concept to make the patent term 20 years from the filing date of the parent application, among other concepts.

(6) Benefit of the filing date of the parent application

The content of a CIP-type application that is entitled to the benefit of the filing date of the parent application should be stipulated in the same manner as the current provisions on the internal priority system.

(7) Publication of CIP-type applications

The time for publishing a CIP-type application should probably be one year and six months from the filing date of the parent application. However, when a CIP-type application is filed immediately before publication, the parent application could be published one year and six months after its filing date and the CIP-type application could be promptly published after that.

(8) Handling of the parent application

(i) When deeming the parent application to have been withdrawn

Deeming the parent application to have been withdrawn is likely to comply with the purpose of CIP-type applications. It would be reasonable to deem the parent application to have been withdrawn three months from the filing of the CIP-type application, and an applicant should be allowed to change the CIP-type application into an ordinary application after filing a CIP-type application.

(ii) When not deeming the parent application to have been withdrawn

This is a concept of not deeming the parent application to have been withdrawn when a CIP-type application has been filed. However, the problem of double patenting could occur between the parent application and the CIP-type application, and if the applicant tries to avoid this, a gap could be created between the scopes of the two patents; thus, not leading to comprehensive protection of inventions.

(9) Relation with amendment

Introducing a CIP-type application system seems to be more desirable for adding new matter after the filing of an application, rather than relaxing the requirements for amendment of the specification, etc., from the viewpoint of the impact on third parties.

(10) Relation with the internal priority system

If a CIP-type application system were to be introduced, its relation with the current internal priority system would be a question. Since the objectives of the two systems are very similar, it would be desirable to integrate these systems.

(11) Relation with the divisional application system

The relation between CIP-type applications and divisional applications should also be considered. There is room to consider a divisional application system in which new matter can be added upon filing a divisional application. In this manner, if the parent application is not to be deemed to have been withdrawn under the CIP-type application system, the relation of the system with the divisional application system must be sorted out, also with an eye to allowing addition of new matter in a divisional application.

3 Other Problems

(1) Third parties' monitoring burden

When a CIP-type application is filed, third parties would have to determine what kind of matter has been added by the CIP-type application and whether or not that matter is new matter, among other things. Also, there could be many applications whose outcome is undecided.

(2) Examination burden

If a CIP-type application system were to be introduced in Japan, an increase in examination burden should also be considered. Also, analysis should be made regarding the examination burden by also making comparison with the case of filing a separate, independent application.

(3) Prosecution laches

With regard to an act of repeatedly filing CIP-type applications, an applicant will not be able to delay the expiration of the patent term unless the patent term is counted from the filing date of the CIP-type application under the system, so this kind of problem will not occur, in principle.

(4) Convenience in terms of patent strategy and patent management

If a CIP-type application system is introduced, an applicant will be able to choose between filing a separate, independent application and filing a CIP-type application according to his/her patent strategy. Also, improvement inventions, etc. can be integrated into a single application by filing CIP-type applications, so the system will also have a merit on applicants and patentees in terms of patent management.

VI Concluding Remarks

A CIP-type application system is considered to be beneficial for applicants, and the appropriateness of its introduction would boil down to the question of how to achieve balance between protection of the applicant or the owner of the patent and the interests of the public. Considering the present Japanese policy, positive study should be made on allowing CIP-type applications to be filed within one year and six months from the filing date of the parent application, in order to achieve appropriate protection of basic/fundamental inventions and comprehensive protection of improvement inventions, etc. As for the filing of a CIP-type application after publication of the parent application, consideration should be made along with the debate on provisions on the grace period.

Under the CIP-type application system, new matter is not entitled to the benefit of the parent's filing date, so it differs from the argument seeking relaxation of the requirements for amending the specification, etc. At the same time, consideration should be made as to such detriments as a concern for an increase in third parties' monitoring burden.

