

# A Study on the Standards for Construing Means-Plus-Function Features in Patent Validity Proceedings

— Based on Comparative Analysis of Two Cases a Decade Apart

Zhu Lei

## Introduction

In respect of the construction of means-plus-function claim features, patent grant proceedings and patent infringement proceedings in China have been observing different rules. While the former adheres to the standard of “embracing all the means that are capable of performing the function”<sup>1</sup> (hereinafter referred to as “Maximal Scope Interpretation Standard”) under the Guidelines for Patent Examination, the latter refers to the standard of “specific embodiment and equivalent thereof” (hereinafter “Embodiment-Defined Interpretation Standard”) in accordance with the Judicial Interpretation of the Supreme People’s Court<sup>2</sup>. Although queries concerning the inconsistency of the claim construction standards have been raised time and again within the IP circle, the two standards are still operating in parallel, given that they are applied independently to respective proceedings. However, as regards patent validity

proceedings, neither the Guidelines for Patent Examination nor any judicial interpretations have mentioned about what construction standard shall be adopted, thus leaving a gap in the application of law to be filled. In practice, the absence of a uniform construction standard has led to logically inconsistent judgments in patent validity cases, despite our present-day general respect for the principle of consistent rulings in similar cases. In this article two cases are selected for discussion, and notwithstanding their final judgments being ten years apart, the cases demonstrate how different construction standards have led to inconsistent judgments in similar cases, as well as reflect the plight in the application of law in that area, not only in terms of wasting judicial resources, but also of undermining the credibility of judicial decisions. As a matter of fact, the adoption of different standards for construing means-plus-function claim features in different proceedings by the examination authority and the judiciary, or even the adoption of different

construction standards in the same case by different collegial panels or benches, will all have a direct impact on the understanding of the patentees and the public towards the scope of protection of patent claims, and are likely to give rise to inconsistency in the application of law followed by vexatious suits. This article makes a comparative analysis of two cases to prove that patent validity proceedings should adopt the Embodiment-Defined Interpretation Standard as in patent infringement proceedings, and proposes that the Supreme People's Court should fill the said legal gap in the upcoming judicial interpretation on patent validation, in hopes of ultimately unifying the construction standards applicable to patent validity proceedings.

## I. Two cases which adopt different construction standards

The following illustrates, by studying two typical cases whose final judgments were made a decade apart, the divergence in understanding towards the standards for construing means-plus-function features in patent validity proceedings and the resulting issues.

### 1. Case 1: Method for manufacturing a battery casing

On 16 March 2005, the then Patent Reexamination Board (PRB) set up a five-member collegial panel<sup>3</sup>, which made the Decision No. 6990 in respect of the invention patent<sup>4</sup> titled "a method for manufacturing a novel battery casing". Central to the contention of the case was the construction of means-plus-function features, and the inventive concept of the patent is: using a special mold to stretch a pre-fabricated pipe of fixed length to the two sides so as to form a cylinder having a required shape; and forming a cylindrical hermetic battery casing by attaching the two ends of the cylinder with two substrates by ways of welding, splicing or mechanical deformation; the battery casing made by this method has the advantages of superior strength and large width-to-thickness ratio; the mold and process used in the entire manufacturing process are simple, and the development and production processes are expeditious and require low input. Claim 1 of the patent recites: "A method for manufacturing a battery casing, ... : preparing a pipe with a predetermined length; using a mold to stretch the pipe to the two sides so as to form a cylinder having a required shape; attaching the cylinder at its two ends with two substrates by welding, splicing or mechanical deformation to form a cylindrical hermetic battery casing, the mold com-

prising a wedged upper die and a wedged lower die, the lower die mainly consisting of a wedged slide block and a position-limiting device".

The petitioner submitted a reference disclosing the function and the specific structure of a position-limiting device in addressing the ground for lack of novelty of claim 1. The contentious issue centered on how to construe the means-plus-function feature of the position-limiting device. Adhering to rigorous logical analysis, the Decision No. 6990 first decided on the construction standard, then used the standard to determine the meaning of the controversial term "position-limiting device" in the claim, and finally verified, on the basis of the meaning of the term as construed, whether there is a structure in the reference carrying the same meaning as the "position-limiting device". The details of the process arriving at the Decision are as follows.

First of all, regarding the selection and application of the construction standard, reference was made to Article 56 of the China's Patent Law<sup>5</sup>, which reads: "The scope of protection of the patent right for invention or utility model shall be determined by the terms of the claims. The description and the appended drawings may be used to interpret the claims." Accordingly, the standard adopted by the Decision was: the claim "shall be interpreted on the basis of the whole technical solution disclosed in the claims and in combination with the description and its appended drawings", which is an echo of the Embodiment-Defined Interpretation Standard referred to in this article.

After deciding on the construction standard, the collegial panel, starting from the "terms of the claim", indicated that "in the claim, the 'position-limiting device' is defined as a constituent part of the lower die, wherein the moving component is the lower slide block. Hence, the contents that can be directly understood are, firstly, the 'position-limiting device' is a fixed part of the lower die, and secondly, it is used to directly limit the extreme moving position of the lower slide block - the moving component of the lower die."

Subsequently, the recitation about the objective of the invention in the description was studied, which is, "to ensure the precision of the battery casing by means of the precision of the mold". However, as revealed by the prior art, the precision of the battery casing cannot be guaranteed by relying on the slide block in the lower die alone. In particular, for a rectangular battery casing, the precision of its shorter sides needs to be realized by means of an external pressure, such as a leveling mechanism. But the present

patent ensures product precision by means of a mold *per se*. In light of this, a reasonable construction of the position-limiting device in the claim should be “a fixed component of the mold used for limiting the extreme positions that the lower slide block can reach at the two sides”. Due to the symmetry of the motion of the slide block, the fixed component should also be designed as a symmetrical structure, such as a U-shaped block. Therefore, the collegial panel held that the “position-limiting device” should be construed as “a fixed mechanism having a U-shaped structure, the inner wall of the two arms of which may limit the extreme moving positions of the wedged slide block”.

Finally, after arriving at a reasonable construction of the “position - limiting device”, the collegial panel read through the reference document (Attachment B2), and held that the slide cam therein is not a fixed component having a “U”-shaped structure, but a mobile component moving together with the wedged tool, and that the structure of the slide cam is completely different from that of the “position-limiting device” in claim 1, ..... hence, Attachment B2 does not cover all the technical features of claim 1, which therefore possesses novelty over Attachment B2.

The Decision clarified the claim construction rule <sup>6</sup> for patent validity proceedings, stating that “if both parties in the validity proceedings have divergent understandings towards a component defined by means-plus-function features in a claim, where it is only possible to derive a sole embodiment containing a specific structure of the component from the entire contents disclosed in the description, ... the component in the claim should be construed as the component having that specific structure.” The said rule may be regarded as the predecessor of the Embodiment-Defined Interpretation Standard, and at least shows that the then PRB also considered that the Maximal Scope Interpretation Standard should not be applicable to the construction of means-plus-function claims in patent validity proceedings. In the opinion of this author, if the PRB had the tradition of observing precedents, the construction standard developed and decided upon in the Decision should have been in practice until now.

During the administrative litigation stage of the case, the first-instance court revoked the Decision, <sup>7</sup> also in the light of Article 56 of the Patent Law, holding that “the scope of protection of claim 1 shall be determined according to the meaning of the words used therein, and the description and its appended drawings may be used to facilitate the un-

derstanding of the claim, but not for limiting the claim. The defendant’s construing the position - limiting device as a fixed mechanism having a U-shaped structure has exceeded the scope of claims construed according to the description and its appended drawings, and belongs to limiting the claims by the description and its appended drawings, which stands in violation of the relevant provisions of the Patent Law and the Guidelines for Patent Examination.” The underlying logic of the first-instance court’s judgement reflects an adherence to the Maximal Scope Interpretation Standard provided in the Guidelines for Patent Examination. The second-instance court, however, opined <sup>8</sup> that the construction of the means-plus-function features in a claim shall be limited by the embodiment(s) for performing the function as recited in the description, rather than covering all the means that are capable of performing the function. In view of this, claim 1 of the patent in suit possesses novelty. The second-instance court accordingly revoked the first-instance judgment. It can be seen that the second-instance court also endorsed the Embodiment-Defined Interpretation Standard adopted by the five-member panel. <sup>9</sup>

## 2. Case 2: The “Dry fryer” case

The “dry fryer” patent <sup>10</sup> had dramatically undergone ten invalidation requests and four court hearings <sup>11</sup> involving three levels of courts since 2012 before it was eventually declared invalid. Despite the case having been finally concluded by the Intellectual Property Court of the Supreme People’s Court, the long-drawn battle between the parties has brought up a legal issue worthy of further discussion, i.e., the standard for construing means-plus-function features in patent validity proceedings. As of today, this issue is not yet clear and warrants further studies.

Claim 1 of the patent in suit reads: “1. A dry fryer (1) comprising a main body (2) intended to accommodate food to be fried and, means (5, 6) mounted within said main body (2) for automatically coating said food with a film of fat by mingling said food with fat, said dry fryer further comprising a main heater means (24) mounted on said main body (2) and designed to generate a flow of heat (25), which is oriented to strike at least part of said food directly, and said main heater means (24) providing at least most of the heat for cooking.” The description emphasizes in particular that the fryer according to the present invention is a dry fryer. The term “dry frying” in that context means a mode of cooking food without immersing the food in oil or fat, either partially and/or temporarily during the cooking cycle. That is to

say, “dry frying” refers to such cooking that the food, although “wetted” by a cooking medium (for example, oil), is not immersed in or soaked in that medium.

The description also specifically describes the means (5, 6) of claim 1 “for automatically coating said food with a film of fat by mingling said food with fat”: “the means for automatically coating the food with a film of fat comprise a receiver means 5 and a means 6, the receiver means 5 is preferably designed to directly contain both the food for frying and the fat, in particular when the fat is in liquid form (oil or melted fat), and the means 6 is for stirring food contained in the receiver means 5. Thus, the mingling function is preferably obtained by cooperation of the stirrer means 6 and the receiver means 5, wherein the stirrer means 6 contributes in particular to providing the food and fat with a three-dimensional mixing motion, while the receiver means 5 keeps the food in a predetermined zone of the appliance.”

Fig. 2 in the description provides the specific structures of the means (see 5 and 6 in Fig. 1 below).

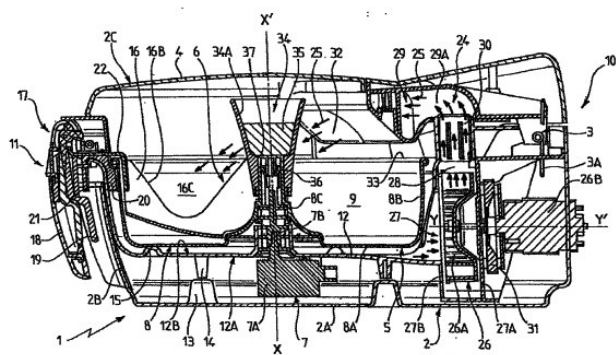


Fig. 1

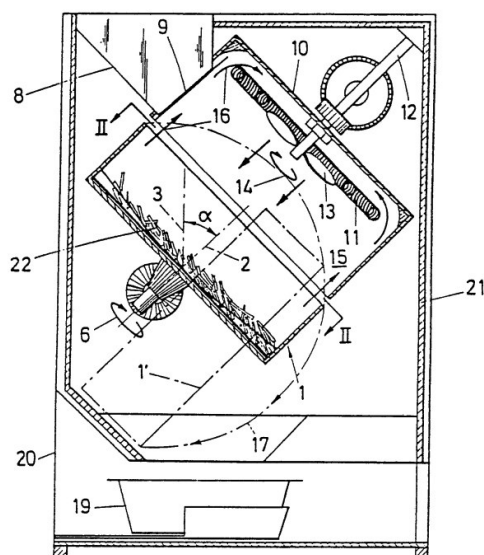


Fig. 2

In the invalidation proceedings, the petitioner evaluated the novelty of claim 1 of the patent in suit by reference to Exhibit 2-1<sup>12</sup>. As shown in Fig. 2, an insulated frame (21) of the frying or warming apparatus is provided with a recipient (1), and a bell glass (10) above the recipient is provided with an electrical heating means (11) and a ventilator (13), both the recipient (1) and the ventilator (13) are rotated around the axis by means of a system consisting of gears and transmission driven by a motor, and during the rotation of the ventilator, a hot air current is created in the room (15) and flows around the french fries to be fried, heating the french fries as well as the bottom of the recipient (1), and during said rotation of the recipient (1) the french fries to be fried may turn at least partially on these rough surfaces (5).

How to construe the feature “automatically coating ... with a film of fat” in claim 1 of the patent in suit is one of the contentious points in this case. The Decision<sup>13</sup> deemed that “this feature defines that the main body is provided with a means for automatically coating said food with a film of fat by mingling said food with fat, which is in essence a means-plus-function limitation with no definition for the specific structures of the means.”

Apparently, the Decision construed the above feature using the Maximal Scope Interpretation Standard, and did not take into account the means (5, 6) disclosed in the description and its appended drawings of the patent in suit. After finding that “the overall apparatus having the recipient (1) mounted within the insulated frame and the rough surfaces (5) in Exhibit 2-1 is equivalent to the means for automatically coating food with a film of fat in claim 1 of the present patent”, the Decision supported the petitioner’s assertion that claim 1 lacks novelty over Exhibit 2-1.

In the subsequent administrative litigation, the first-instance court revoked the Decision<sup>14</sup>, holding that “although Exhibit 2-1 has recited that the rough surfaces at the bottom of the recipient may be used to turn over the food during the rotation of the recipient, it does not disclose adding fat into the recipient, let alone a means automatically coating said food with a film of fat by mingling said food with fat. Even if there is fat in the recipient, the fat is prone to stay in the corrugations of the rough surfaces due to the roughness of the bottom of the recipient, rendering the recipient impossible to automatically coat food, especially large-sized food, with a film of fat.” It can be seen that the first-instance judgment, although holding a different view in fact-finding from the Decision, did not address the rules for con-

struction of means-plus-function claims.

In the second instance of the administration proceedings, whether Exhibit 2-1 has disclosed the feature “automatically coating ... with a film of fat” continued to be the focus of contention. The second-instance judgment held that “when rotating, the recipient (1) and rough surfaces (5) in Exhibit 2-1 take french fries along until a certain height, and french fries, due to the presence of the ribs (5), slip and roll down afterwards and, as a consequence, continuously change the direction of falling, thereby achieving an even-frying effect. “Even-frying” means every surface of food can be evenly coated with fat and heated. Hence, in the technical solution of Exhibit 2-1, food can be mingled with fat and evenly coated with fat during the rolling and falling processes.” It shows that different from the first-instance judgment, the second-instance judgment acknowledged Exhibit 2-1’s disclosure of the feature in dispute. And in response to the fact-finding at first instance that “even if there is fat in the recipient, the fat is prone to stay in the corrugations of the rough surfaces due to the roughness of the bottom of the recipient, rendering the recipient impossible to automatically coat food, especially large-sized food, with a film of fat”, the second-instance judgment pointed out that: “Such finding is a conjecture, and whether an even coating by a film of fat may ultimately be achieved depends on factors including the inclination, rotating speed and time of the recipient, as well as the form of food. Having said that, claim 1 of the patent in suit does not make any relevant limitation, and Exhibit 2-1 has no technical obstacle that hampers mixing and automatical coating with a film of fat<sup>15</sup>, so the finding in the first-instance judgment lacks factual support.” The second-instance court deemed that the first-instance court erred in fact-finding, thus remanding the case to the first-instance court for retrial.

After the remand of the case, the first-instance court set up a separate collegial bench to make a judgment in view of the second-instance court’s judgment, and dismissed the plaintiff’s claims. The plaintiff was dissatisfied with the decision and appealed the case to the newly established Intellectual Property Court of the Supreme People’s Court, which still dismissed the plaintiff’s claims and upheld the first-instance judgment made in the retrial. And at this point the validity of the Decision was finally sustained. The Decision’s undergoing of four trials appears to be a dispute over the finding of technical facts, but in essence is one over the standards for construing means-plus-function

features. And this brings out an issue worthy of our reflection: if and when a uniform construction standard has not yet been established, how can and should we jump to the conclusion of whether the judgments are erroneous or not?

## II. Establishment of the standard for construing means-plus-function claims in patent validity proceedings

By comparing the above two cases we can see that the Embodiment-Defined Interpretation Standard established in the decision of the five-member collegial panel in Case 1 was overturned by the invalidation decision in the “dry fryer” case, exposing the confrontation of two standards in the validity proceedings. It also reflects that in China’s patent law system, there is still a lack of definite provisions as regards the standard for construing means-plus-function claims in patent validity proceedings, which has become a gap in the application of law, and how to remedy such deficiency in legal rules warrants our research and discussion.

This article proposes that in regard to the construction of means-plus-function claims in patent grant and validity proceedings, a parallel approach may be adopted, i.e., applying the Maximal Scope Interpretation Standard in the grant proceedings and the Embodiment-Defined Interpretation Standard in the validity proceedings. The reasons and analysis for this suggestion are delineated as follows.

### 1. The rationale for applying Maximal Scope Interpretation Standard in patent grant proceedings

Patent grant proceedings may be further divided into the procedures of substantive examination and reexamination. Although it is still a controversy as regards whether reexamination is a remedy for substantive examination or a continuation of examination, both procedures are directed to pending patent applications, and thus collectively known as patent grant proceedings. Examination in patent grant proceedings by nature aims at addressing internal as well as external relationships. By internal relationship, it refers to the relationship between the description and the claims; and by external relationship, it refers to the relationship between the claims and the prior art.

According to the principle of “disclosure in exchange for protection”, while the description<sup>16</sup> performs a function of “sufficient disclosure”, the claims are to determine a reasonable scope of protection based on the sufficient disclo-

sure of the description. The description is the parent of the claims, which must be supported by the description. As such, it is necessary to grasp the inventive concept as a whole and accurately understand this internal relationship. The relationship between the description and the claims is to clarify the scope of protection of the claims. It is on this basis that the patent grant proceedings deal with the relationship between the claims and the prior art. If the claims fall within the scope of prior art, they will not be granted. Only when the claims are novel over the prior art and “possess prominent substantive features and make a notable progress” can an application be granted the patent right.

We can see that throughout the grant proceedings, examination has been centering on the above two relationships. How the inventor<sup>17</sup>, after creating an invention, may put forward the claims with a suitable scope of protection involves a process of continual learning and exploration. Similarly, the examiner also needs to listen to the inventor’s views in order to understand the inventive concept as a whole. Therefore, examination in the grant proceedings is a process of discussion or even a tug of war between the inventor and the examiner. During this process, on the basis of the said two relationships, the claims sought for protection by the inventor are likely to be subject to continuous modification, whereas the examiner may also devote unremitting efforts to conducting searches. In face of the interpretation of maximal scope by the examiner, the inventor also has an opportunity to amend or argue, or popularly known as “to bargain”. And upon reaching a consensus, the application will be granted; otherwise, it will be rejected and the inventor may file a request for reexamination and seek judicial remedies. Thus, it has its rational basis if we allow the examiner to apply the Maximal Scope Interpretation Standard to make a broad construction of the claims seeking to be protected, especially in the case of means-plus-function ones, as “covering all the embodiments that are capable of performing the function”, which is not only conducive to proper handling of the two relationships, but also helpful for improving examination efficiency.

## 2. Legitimacy of applying Embodiment-Defined Interpretation Standard to patent validity proceedings

Patent validity proceedings as a collective concept comprise the invalidation procedure and the judicial review that may subsequently occur. The essential difference between the validity proceedings and the grant proceedings lies in the “subject matter under examination”. In the grant

proceedings, the subject matter is subject to change, in which the inventor and the examiner are in constant “negotiation”, with the inventor enjoying ample opportunities to amend the claims; and as to the claims in the validity proceedings, they have been granted and published, and become the demarcation line between the patent right and the public interest such that “no entity or individual may, without the authorization of the patentee, exploit the patent”<sup>18</sup>. As the “subject matter under examination” during the validity proceedings is relatively fixed, in face of the “attack” from the petitioner’s invalidation request, the claims cannot be modified on a large scale even with adequate “support” in the description. At this point, if the Maximal Scope Interpretation Standard is still adhered to, the patentee will lack the resource to defend, thereby resulting in the imbalance of interests between the patentee and the public, which will be contrary to the patent system’s original intention of “disclosure for protection”.

It needs to be emphasized that, first of all, according to basic construction logic, given that the claims to be dealt with in the validity proceedings and those in the infringement proceedings are identical, and it has been clearly stated in the Judicial Interpretation of the Supreme People’s Court that the Embodiment-Defined Interpretation Standard shall be applicable to the construction of means-plus-function claims in patent infringement proceedings, it will obviously defy basic logic and common sense if a different standard is to be applied to the construction of the claims that are also in the post-grant phase. If one argues that different construction standards may be employed simply because the validity proceedings belong to administrative procedure whereas the infringement proceedings belong to civil procedure, it obviously is “differentiating for the sake of differentiation”. Holders of such view are paying excessive attention to the phenomenon while overlooking the essence of matters. The author of this article opines that the logic for construing published claims should be consistent. Second, in the light of the patent law in force, Article 11<sup>19</sup> of the Patent Law provides that patent infringement proceedings can only occur after “the grant of the patent right for an invention or utility model”, and according to Article 45<sup>20</sup> thereof, patent validity proceedings and patent infringement proceedings can only occur after the grant of the patent right, showing that both proceedings belong to the procedure designed for the patent protection phase. In other words, the purpose of the invalidation procedure is to confirm the valid-

ity of a patent, and even if the patent is declared invalid, the patentee may seek remedies through subsequent judicial proceedings, which by nature are still means of protection for the patent right. Hence, when addressing a granted patent in the patent protection phase, the standard for construction should strictly abide by the provisions of Article 59 of the Patent Law: "The scope of protection of the patent right for invention or utility model shall be determined by the terms of the claims. The description and the appended drawings may be used to interpret the contents of the claims." In a word, it makes no sense to adopt different standards in construing claims of the same text, both during the post-grant proceedings, albeit of different procedures thereof.

Following the above analysis, the "dry fryer" case saw the Decision's erroneous insistence on using the Maximal Scope Interpretation Standard and drawing a conclusion that the feature has been disclosed by the reference, which is obviously contrary to the facts, even under the circumstances where the description of the patent in suit has sufficiently disclosed the specific structures of the means (5, 6) <sup>21</sup> "for automatically coating said food with a film of fat by mingling said food with fat", and said structures are apparently dissimilar to the structures disclosed in Exhibit 2-1.

### 3. Rational bases of the parallel approaches

This article proposes, on the basis of case studies, the application of different construction standards to patent grant proceedings and patent validity proceedings respectively, i.e., parallel approaches in applying the construction standards. Strictly speaking, the Maximal Scope Interpretation Standard adopted in patent grant proceedings is not an equal to the Embodiment-Defined Interpretation Standard in patent validity proceedings and should be weighted differently.

The Maximal Scope Interpretation Standard is an examination strategy or tool used in the substantive examination procedure that provides the examiner with a "privilege" based on the priority accorded to efficiency, which embodies the "doctrine of examination discretion". It aims at pushing the applicant to overcome the defect of "lack of support of the claims by the description" in response to "all the embodiments capable of performing the function" that may possibly be covered by the literal wording of the claims, thereby defining the scope of protection of the claims. Thus, such process of "negotiation" between the examiner and the applicant is merely a transitional state. Once "a

consensus or compromise" is reached, such a state will come to an end and a patent right will be granted, while the negotiation process will be preserved as dossiers, clearly recording the applicant's sacrifice, abandonment or voluntary delimitation in pursuit of the patent right to serve as reference in the event of subsequent procedures pursuant to the doctrine of estoppels. These are the rational bases for the adoption of the Maximal Scope Interpretation Standard.

In contrast, patent validity proceedings deal with the claims that have been granted and published. In the quasi-judicial proceedings of patent invalidation, the invalidation petitioner challenges the validity of a patent, while the collegial panel adjudicates but no longer possesses the efficiency-based privilege as mentioned above. Unlike the examiner in the grant proceedings, the collegial panel during the validity phase conducts examination according to the examination principles on the basis of the examined text ascertained in the grant proceedings. It is not supposed to take initiatives in searching reference documents, nor should it conduct a full-scale review. It can be said that patent grant proceedings and patent validity proceedings reflect very different pursuits in the construction of claims, not confining to means-plus-function ones. To be specific, in the grant proceedings, it is more important to urge patent applicants to amend their application documents with a view to defining the scope of protection in clearer wording or terms; whereas in the validity proceedings, both the impact of claims disclosure and the actual technological contributions <sup>22</sup> brought by the claims should be taken into consideration so as to strike a balance between stimulation of innovation and protection of public interest.

Going back to Case 1, the five-member collegial panel as well as the courts of first and second instances all cited Article 56 of the Patent Law (2000 version) as the legal basis for claim construction. Jurisprudentially speaking, in addressing identical granted claims with reference to the same legal basis, we can but follow the same construction rule. As such, it is advisable to uniformly adopt the Embodiment-Defined Interpretation Standard for the invalidation procedure and the judicial proceedings, which both fall within patent validity proceedings.

For the avoidance of confusion, the Maximal Scope Interpretation Standard mentioned herein is different from the Broadest Reasonable Interpretation (BRI) Standard under the Manual of Patent Examining Procedure of the US <sup>23</sup>, though the latter also serves as an examination strategy. In

the BRI standard, “reasonable” is the premise, while the reference herein to the Maximal Scope Interpretation Standard for adoption in patent grant proceedings should be understood in the sense of the “doctrine of examination discretion”.

## Conclusion

Claim construction is an eternal theme of a patent system. It is not so much “a game of the claims” as “a game of the claims and the description”. And the issue related to the construction of means-plus-function features is playing a salient role in such a game, and unfolding a dramatic scene on the stage of patent validity proceedings. It is a pity that the rule embodied and even established in Case 1 was not adopted in Case 2.

To prevent the above situation from occurring again or repeatedly, this article proposes that the Patent Reexamination and Invalidation Department of the China National Intellectual Property Administration (formerly the PRB of the State Intellectual Property Office) should give objective consideration to the legal nature of invalidation proceedings as the procedures for patent protection, and draw the experience from the case law practice<sup>24</sup> of the European Patent Office to set up an internal case guidance system, in particular adopting the doctrine of precedent in which the decision of a larger collegial panel is superior to that of a common collegial panel.

In addition, this article strongly recommends that provisions be added to the interpretations of the Supreme People’s Court on issues related to patent grant and validation, which are now under consultation, to the effect that in the construction of means-plus-function features, the Maximal Scope Interpretation Standard and the Embodiment - Defined Interpretation Standard should be used in patent grant proceedings and patent validity proceedings respectively, as advocated in this article.

As for the collegial panel or collegial bench serving as the examining body, its professional proficiency may be exhibited through active search of relevant cases during examination, treating the precedents with reverence, and exercising prudence in arriving at decisions or judgments. ■

The author: Assistant judge at the Beijing Intellectual Property Court and Master of Law from Tsinghua University

<sup>1</sup> See the contents related to construction of means-plus functions fea-

tures in Part II, Chapter Two, Section 3.2.1 of the Guidelines for Patent Examination.

<sup>2</sup> Article 4 of the Interpretation of the Supreme People’s Court on Several Issues Concerning the Application of Law in the Trial of Disputes over Patent Infringement reads: For technical features described by function or effect in a claim, the people’s court shall determine the content of these technical features according to the specific way of implementation of the functions or effects described in the description and drawings or an equivalent way of implementation.

<sup>3</sup> According to relevant provisions in the Guidelines for Patent Examination, a five-member collegial panel is established only for cases that are important. In the present case, a five-member collegial panel was established, showing that the claim construction issue in patent validity proceedings was considered by the PRB as a major legal issue.

<sup>4</sup> The patent, owned by HYB Battery Co., Ltd., is an invention patent No. 00114037.X titled “Method for Manufacturing a Battery Casing”, which was filed on 22 January 2000 and issued by the SIPO on 17 September 2003.

<sup>5</sup> Article 56 of the Patent Law (2000), which corresponds to Article 59 of the Patent Law (2008).

<sup>6</sup> It is worth noting that the five-member collegial panel made the decision on 16 March 2005, prior to the putting forward of the Embodiment - Defined Interpretation Standard by the Supreme People’s Court in 2009.

<sup>7</sup> See the Administrative Judgment No. Yizhongxingzi 607/2005.

<sup>8</sup> See the Administrative Ruling No. Gaoxingzhongzi 179/2006.

<sup>9</sup> After the remand of the case by the second-instance court, the first-instance court formed a separate collegial panel for the retrial; the case numbers of the retrial in the first instance and the second instance were Administrative Judgment No. Yizhongxingchu 43/2007 and Administrative Judgment No. Gaominzhongzi 782/2009 in the second instance respectively.

<sup>10</sup> The patent is an invention patent No. 200580018875.3 titled “Dry Fryer with Automatic Coating of Fat”, and was issued on 9 September 2009. The application of the patent was filed on 8 June 2005 with a priority date on 8 June 2004. The patentee was SEB S.A., which was subsequently changed to SEB Corporation.

<sup>11</sup> See the Administrative Judgment No. Jing73xingchu 5126/2017; Administrative Ruling No. Jingxingzhong 2767/2018; Administrative Judgment No. Jing73xingchu 1490/2019; and Administrative Judgment No. Zuigaofazhixingzhong 184/2019.

<sup>12</sup> The reference document is an international patent application No. WO89/10085A1, which is titled “Apparatus for Frying or Warming Articles of Food, Particularly French Fries”.

<sup>13</sup> See the Decision No. 31512 issued by the PRB of the SIPO.

<sup>14</sup> See the Administrative Judgment No. Jing73xingchu 5126/2017.

<sup>15</sup> As a matter of fact, “whether Exhibit 2-1 has a technical obstacle that hampers mixing and automatically coating with a film of fat” and “whether Exhibit 2-1 has disclosed the automatic coating of fat” are issues completely different by nature. The former relates to inventive step assessment, and the latter to fact-finding.

<sup>16</sup> For convenience’s sake, the word “description” herein means the description along with its appended drawings, unless otherwise specified.

<sup>17</sup> The inventor herein denotes a collective concept that includes both the inventors and the applicants, unless otherwise specified.

<sup>18</sup> Article 11 of the Patent Law reads: “After the grant of the patent right for an invention or utility model, except where otherwise provided for in this Law, no entity or individual may, without the authorization of the patentee, exploit the patent ...”

<sup>19</sup> See *ibid.*

<sup>20</sup> Article 45 of the Patent Law reads: “Where, starting from the date of the announcement of the grant of the patent right by the patent administration department under the State Council, any entity or individual

considers that the grant of the said patent right is not in conformity with the relevant provisions of this Law, it or he may request the Patent Examination Board to declare the patent right invalid.”

<sup>21</sup> It can be seen from the characterizing portion of claim 6 of the patent that the performance of the mixing and stirring functions depends on the concerted actions of the receiver means (5) and the stirrer means (6), that is, “the receiver means (5) is mounted immovable in position relative to the main body (2), while the stirrer means (6) is mounted for rotation relative to the receiver means (5), and functionally connected to a drive means (7) to be driven in rotation thereby.”

<sup>22</sup> Liu Peng (2018). Basic rules for understanding and interpreting scope of protection of claims in different proceedings. *Intellectual Property*, 12, 44.

<sup>23</sup> Manual of Patent Examination and Procedure, MPEP 2111 Claim Interpretation; Broadest Reasonable Interpretation [R-07.2015].

<sup>24</sup> Richard Hacon (EN), Jochen Pagenberg (GE), comp., He Huaiwen and Liu Guowei, trans., *Concise European Patent Law* (June 2015, 776). The Commercial Press.