Overview of recent reform of PRC Patent Law

China has tried more patent cases in each of the past five years than the US. The State Intellectual Property Office (SIPO) issued over 128,489 invention patents in 2009, continuing the trend of near 30 per cent year-on-year growth. Both domestic and foreign companies are taking advantage of this expansion in the usage of China’s patent systems.

The development curve for the laws that underpin the system has exhibited a similarly accelerated profile. The third revisions to the PRC Patent Law entered into effect on 1 October 2009 (the second round of revisions coincided with World Trade Organization (WTO) accession in 2001). The third revisions brought about several significant changes intended to bring Chinese patent law closer into line with international norms. These reforms should also be seen as part of accelerated efforts by China to grow domestic innovation-based industries since the 2005 National People’s Congress and have received attention in general as well as in specialised media in the country.

We circulated a client briefing in February 2009 summarising the important changes in the third revision¹. While these reforms were generally welcomed by rights-holders, significant uncertainty remained as to how the revised Law would be applied pending the adoption of the revised Implementing Regulations.

After a long wait, the Implementing Regulations for the Patent Law have now been signed into law with effect from 1 February (the Regulations). Significantly, the Supreme People’s Court (SPC), the highest court in China, has also adopted an Interpretation of the new statute and the whole area of patent law generally (on 21 December 2009) (the Interpretation). These instruments introduce changes in law that are as important as some of the reforms of the third revision of the Patent Law itself.

The latest changes are likely to be of widespread interest to clients in the health care, automotive, chemicals, energy and TMT sectors in particular.

Implementing regulations

In a comprehensive overhaul of the existing implementing regulations, among other changes, rules for confidential examination of inventions developed in China have been introduced, statutory rewards for employee inventors have been increased and the rules for compulsory licensing of Chinese patents have been clarified.

‘Confidentiality screening’

One of the more controversial changes in the revised Patent Law was the introduction of a requirement for inventions ‘completed in the PRC’ to undergo a confidentiality screening before filing any foreign patent application. The screening is to be administered by SIPO and is directed at protecting ‘national defence interests’ and other ‘security or material interests of the State’. SIPO’s approval is now required before any filing can be made abroad in respect of the invention. The

rule replaced a previous requirement for the first filing in respect of any Chinese-made invention to be made in China. The new requirement for a confidentiality screening applies to any foreign filing and not only where the foreign filing is the first filing.

Serious concerns were raised when the revised Law was published, not least because the procedure for examination and the grounds for withholding approval were not spelt out. The Regulations go some way to filling in the gaps, but some serious concerns will remain about the impact of the new requirement.

Firstly, the terms ‘national defence interest’ and ‘security and material interests of the State’ are left undefined in the Regulations. Interpretation of these terms will fall to SIPO, and it remains to be seen how wide an interpretation will be given. SIPO is expected to take a cautious approach.

The Interpretation does address the issue of cross-border collaborations. It defines inventions completed in the PRC to mean those ‘in which the substantive contents of their technical solutions have been completed in the PRC’. In some cases this will be clear despite the involvement of both offshore and onshore research groups, but in others much less so. The penalty for failure to submit to a confidentiality screening is not clearly stated in either the Law or the Regulations. However, SIPO has indicated that a failure to submit to examination will bar the patenting of a subsequent application in the PRC for the same invention. Paten
tees are therefore likely to adopt a conservative approach in the case of inventions that have been partially developed using China-based resources.

The Regulations lay down three routes to obtaining approval for a foreign filing:

- first filing abroad/international application: full details of the technical solution are to be submitted to SIPO before filing the foreign application;
- international filing filed through SIPO: this is itself to be deemed a submission for a confidentiality screening; and
- first filing in China: a formal request for a confidentiality screening must be made before filing abroad or for an international application.

The screening will comprise two phases: an initial screening lasting up to four months (extended from three months in the draft circulated last year); followed by a further period of six months for a more detailed examination if national security issues are believed to be involved (up from two months in the draft). A final decision will then be rendered. A spokesperson for SIPO said at a recent press conference that in most cases the confidentiality screening would take only a few days. Applications that are considered by SIPO to involve national security issues will be handled in secret and withheld from the public register.

Rewards for employee inventors

The Regulations established an enhanced scheme of statutory rewards for in-service inventions. Chinese law treats in-service inventions as inventions made by a person in the execution of tasks laid down by the employer and mainly using the employer’s resources.

In the absence of separate agreement with the employer, the employee inventor will be entitled to rewards of:

- not less than 2 per cent of the annual operating profit obtained from exploiting the patent (or a lump sum assessed by reference to that amount);
- not less than 10 per cent of the royalty received from licensing the patent; and
- in addition, a lump sum of not less than RMB3,000 within three months of the date of gazetting.

The statutory amounts are payable in the absence of agreement with the inventor ‘or set forth in its rules and regulations formulated in accordance with law’. Article 16 of the Patent Law requires a reasonable remuneration to be paid ‘based on the extent to which the invention-creation is applied and the economic benefits yielded’. The absence of detailed legal provisions in the Regulations – such as those contained in the Employee Inventors’ Act (1957) in Germany – for the calculation of a reasonable sum of compensation will create uncertainty about what factors should be taken into account and ultimately what will be considered reasonable. It is also not clear whether the minimum percentages are to be applied to pre- or post-tax profits. In addition, while it appears that there is scope to avoid the minimum percentages by agreement, concerns have been voiced that any model for awarding employee inventors that is not also directly linked to profits/
licensing royalties obtained from exploiting the patent might be challengeable.

Significantly, the amended Regulations also provide that inventions made by a person within a year of their retirement or exit from a job (either voluntarily or involuntarily), and which are related to their previous job or tasks assigned to that person in the previous job, will belong to the former employer.

We are witnessing an increasing number of clients choosing to localise research and development functions in China in order to tailor products for the domestic market and take advantage of the high calibre of graduates emerging from China’s technical universities. However, many clients have also indicated to us their concerns that the new rules on confidentiality screening and for rewarding employee inventors will impact adversely on these projects.

Compulsory licensing
The revised Patent Law provides that compulsory licences will be available in a number of different circumstances. These include cases where a patentee has failed to ‘sufficiently’ exploit a patented invention during the first three years of grant or four years from the filing date. The Regulations give meaning to this provision by defining ‘sufficient exploitation’ in terms of the ability to fulfil the domestic demand for the patented product. While this standard has logic, it remains to be seen whether the standard will create problems for patentees given the sheer size of the Chinese market and the high regulatory barriers to entry. What metrics will be applied to measure the domestic demand, especially in the case of an emerging or disruptive technology?

Compulsory licences may also be granted to sell patented medicines for manufacture and distribution in compliance with the Trade-Related Aspects of Intellectual Property Rights Agreement (TRIPS). The Regulations define patented medicines as ‘any patented product or products directly obtained according to patented processes in the medical and pharmaceutical field’ and thereby extends the definition to include diagnostic instruments as well as active ingredients and other pharmaceutical preparations.

Although provisions for the grant of compulsory licences have been contained in Chinese patent law since WTO accession in 2001, to date none has been granted. Commentators have speculated whether the introduction of clear definitions will now provide domestic manufacturers with the incentive required to begin to work the system.

Interpretation
In addition to explaining how key provisions of the revised Law are to be interpreted, the SPC has addressed for the first time in the Interpretation some core concepts in Chinese patent law. SPC interpretations, unlike other court decisions in China’s civil law system, effectively have the status of law. The Interpretation has a harmonisation goal aimed at ensuring that the revised Law is applied consistently across the specialised IP courts of the third Civil Division.

Among the important developments contained in the Interpretation, the SPC has confirmed for the first time its approach to patent claim interpretation and has formally introduced a doctrine of prosecution history/file wrapper estoppel. The Interpretation also offers useful guidance on the new ‘prior art’ defence and existing defence of ‘prior use’. Regrettably, clarification that a cause of action in contributory infringement exists in China was dropped in the final version despite having been put forward in the draft.

Interpretation of patent claims
The approach to be taken to the interpretation of patent claims for the purposes of infringement and validity disputes had not previously been spelt out by the SPC. Uniform standards had been lacking, and the SPC acknowledged in an accompanying commentary3 that local courts had been approaching the question in different ways.

The Interpretation now confirms the primacy of the understanding of the person skilled in the art, taking into account the content of the description and any drawings in the patent. Specifically defined terms in the document are to be given their defined meanings. The understanding of the skilled person is thus to prevail over an interpretation based only on the literal language.

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of the claim and before reference is made to secondary sources such as textbooks and other public literature.

The SPC has in essence adopted the approach to claim interpretation taken by the UK House of Lords in its landmark decision in *Kirin-Amgen Inc v Hoechst* [2005], concerning a patent for the erythropoietin (EPO) hormone. Like the House of Lords, the SPC has chosen to focus on the single, overriding question of what the person skilled in the art would have understood the patentee to have meant by the language of the claim. This may lead to greater use of expert evidence in Chinese patent proceedings. The point in time at which the SPC intends the claim to be interpreted is not clear; but logic and international practice suggest that the relevant time should be the application date.

However, and in contrast to the decision in *Kirin-Amgen*, the SPC has also confirmed its previous view from 2001 that the doctrine of equivalents is part of Chinese patent law. The SPC stated that all of the technical features contained in claims are to be examined by the court (the so-called ‘all elements rule’). An alleged infringing process or device shall fall within the scope of the patent only if the alleged infringement has adopted all of the technical features of the claim or features that are technically ‘equivalent’.

The final Interpretation does not contain the definition of equivalent technical features that had been contained in the consultation draft (published June 2009). The draft had defined ‘equivalent technical features’ as features that perform the same function, in the same way and achieve the same result, and that, at the time of the infringement, are capable of being conceived by the skilled person without engaging in further innovation.

In its earlier Interpretation from 2001, the SPC had put forward a similar definition but without the temporal element. Since the new Interpretation is to prevail over previous interpretations only in the event of conflict, the earlier definition should continue to be referred to.

Lastly, the SPC has confirmed the permissibility of functional limitations in patent claims. The scope of a functional limitation is to be determined by reference to any specific embodiment of that functional feature and related embodiment. The patentability of claims including functional limitations will presumably be based on the novelty and inventiveness of the underlying technical effect described in the patent (as was held in a European context by the Enlarged Board of Appeal in case G2/88).

**Prosecution history estoppel**

The Interpretation provides for the first time that matter disclaimed during patent prosecution or invalidity disputes (either in the claims or the description) may not be re-asserted in later infringement proceedings. While there is no direct statutory support for the SPC’s position, we believe that it was likely based on the general Civil law principles of fairness and equality.

The courts should now recognise submissions based on prosecution history estoppel. This will open up a whole new avenue of attack for a litigant seeking invalidity of a patent or to defend itself against a claim of infringement.

**Defences**

The Interpretation provides useful clarification of the defences of prior art and prior use.

**Prior art defence**

The third revisions of the Patent Law introduced a statutory ‘squeeze/Gillette’-style defence into Chinese patent law for the first time. The defence is available where the allegedly infringing technology is disclosed in the prior art. The SPC has clarified that for the defence to apply, all of the allegedly infringing technical features of the patent must be identical or substantially identical to the corresponding technical features of an existing technical solution. On this basis, a claim of infringement would succeed where even a single patented feature is not contained in the prior art if all the other (ie the non-novel) technical features of the patent have been adopted.

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4 Confirming the position previously put forward in an influential decision of the Beijing Higher People’s Court in *Beijing Lingsheng Tifeke Technology Trading Co Ltd v Mr Zhuo Youwei* [2004], but which had not been consistently applied throughout the court system.

5 This definition could be criticised in addressing the question at the time of infringement rather than as at the application date, meaning the scope of the claim might be held to change over time.


7 Per Article 20 of the Interpretation.


9 As enshrined in the first chapter of the Chinese Civil Law.
by the defendant. Article 62 of the Patent Law places the burden of proof on the defendant seeking to rely on the defence.

Several potential points of uncertainty remain. Firstly, while there does not appear to be any reason to confine the defence to technology that was disclosed in a single prior art document, it is possible that lower courts might still apply the defence in that manner, guided by the strict Chinese approach to anticipation. Second, it is not clear whether the defence will apply where the patent consists only of obvious variations on the prior art. Logic would suggest that the defence should not apply in those circumstances since this would also provide grounds to invalidate the asserted patent. However, under the bicameral system of the PRC, infringement claims are heard separately from validity claims, so there may be some uncertainty even about this until a settled practice develops.

Prior use defence
The continued use by a person of a product or process begun prior to the application date is exempt from a claim to infringement of the patent. This defence would be available where the alleged infringer’s own use of the product or process had not been published and therefore did not form part of the prior art. The comparison is between the prior art and the alleged infringing product, and not between the prior art and the patent claim as in the case of the prior art defence.

The defence is also available where a person had made ‘necessary preparation’ to make or use the technology concerned. The SPC has now clarified that necessary preparation for manufacture or use would involve at least:

- the preparation of major technical drawings or appropriate process documentation; and/or
- the production or purchase of major equipment or raw materials appropriate for making the product or implementing the process.

This is a partial defence only and is limited to a continuation of usage within the ‘original scope’ of use. The Interpretation clarifies that the original scope of use shall mean production on the existing scale attainable by using existing production equipment or the existing production process (ie as of the patent’s later application date).

Lastly, the Interpretation clarifies that the defence is not transferrable except in connection with a sale of the entire enterprise. The benefit of the defence may not be transferred with an assignment or licence of the underlying technology by itself.

Contributory infringement
Contributory or indirect infringement of a patent is not provided for in the Patent Law. However, the cause of action has been recognised in principle in different levels of the court system (and as was recognised by the SPC). The draft Interpretation had provided a clear basis for the courts to grant relief against suppliers of bespoke component parts intended for assembly into an infringing product. A person supplying component parts to a third party knowing that the products can only be used as materials, or an intermediate product, part or device to implement a specific patented invention, would be jointly liable for infringement. Regrettably, this cause of action for contributory infringement has been dropped from the final version.

It remains to be seen whether courts will continue to give effect to this cause of action. It is often said that there is no need to formalise the action since it should be clearly considered to exist on the basis of general tortious principles.

However, clear confirmation from the SPC would have been particularly useful in this case. China’s industrial policies since the late 1970s have led to the development of numerous economic and technological development zones in large- and medium-sized cities throughout the country. High degrees of specialisation and collaboration are seen in these industrial zones, with several different suppliers in effect forming together to produce an infringing device. Typical situations we see might involve one party providing plastic moulded parts, another an electrical motor or other electrical parts, and the final article being assembled by a third party. We will watch with interest for developments in this area.

Summary
Rights-holders are now in a position to assess the full impact of the package of patent reform and adapt their practices accordingly. The Regulations will have particular impact on the conduct of research.
and development operations in China, while the Interpretation promises to bring the whole arena of patent litigation closer to practice in Europe and the US.

There is no question that Chinese courts have become better able to deal with more challenging and complex IP cases in recent years, especially the courts in Beijing, Shanghai and the major coastal towns. However, the level of technological sophistication of infringers has also increased, bringing an alarming array of products within their range. As the complexity of litigation catches up with that seen in more mature IP markets, greater demands are being placed on legal counsel to develop more sophisticated litigation strategies, employ greater resources and skill in evidence preparation, and to implement multijurisdictional enforcement strategies combining actions at source in China with parallel actions in key export markets.