Discussion on Cultivating Intellectual Property Talents of International Trade in China

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\textbf{Abstract.} Based on the China-American Trade War, this paper discusses the relationship between international trade and the IPR protection, analyzing the construction and deficiency of IPR system, demonstrating the necessity and urgency of international trade talents cultivation and IPR education with the latest information. Finally, Some suggestions to develop China’s international trade talents of IPR.

\textbf{Introduction}

As a right, IPR is the exclusive right of citizens or legal persons to enjoy intellectual achievements according to laws. It is created through mental activities and widely used in science, technology, culture, art and other fields. The IPR in WTO’s \textit{Agreement on Trade-Related Intellectual Property Rights} (TRIPS) includes Copyrights and related rights, Trademark Rights, Geographical Indication Rights, Industrial Products Design Rights, Patent Rights, Layout Design Rights, etc. International trade is developed when IPR is an object of trade.

\textbf{The Relationship between IPR Protection and International Trade}

In a general sense, the revolution of science and technology continuously promotes the development of international trade. The protection of intellectual property is conducive to stimulating innovation, safeguarding social equity and promoting social economic progress. Since the 1980s, the growth in manufactured goods is on an upward trend in the world, even faster in deep-processed and high-value-added products. On the micro level, the IPR protection will create huge patent royalties and infringement fees for export enterprises, decreasing their market share, compressing profit margins, reducing market competitiveness, and it fundamentally hinders enterprises from improving the technical structure and products structure, reducing the vitality of enterprises in international trade. On the macro level, international trade cannot develop to today without the protection of IPR.

In a special sense, IPR protection is essentially a monopoly which can reduce the motivation of technological innovation. Because of monopoly, enterprises can obtain more profits while consumers obtain fewer technological achievements. The real IPR protection system does not change the number but the direction of innovation. For example, United States Federal Courts ruled that software patents should be strengthened. Then, there were no innovations in software development, and consumers only got the different versions of software. This shows that the development from IPR protection to IPR barrier will weaken innovations and slow the scientific and technological revolution. However, moderate IPR protection can promote the technical exchanges and trade in countries.

It can be seen that appropriate IPR protection can promote the healthy development of international trade.
International Trade Talents Cultivation Promotes the Development of China's IPR Education

In the background of economic globalization, the international industrial structure and trade structure are being reconstructed. It is necessary to change the adverse situation that Chinese enterprises are locating at the end of the international industrial chain and the downstream of the value chain due to the lack of IPR.

IPR is Equal Important to Trade in Goods and Service Trade in International Trade

The TRIPS was valid before and after the WTO was established in 1995. After China's accession to the WTO in 2001, the TRIPS has become an important criterion for the protection of China's IPR. China revised the Patent Law, Trademark Law and Anti-unfair Competition Law, etc. But the disputes on IPR in international trade have never stopped. Malaysia, Russia and China are considered as the largest pirated game software countries; meanwhile, China is blamed as the largest producer, consumer and exporter of counterfeit versions in the world. The US used what they called Section 301 to impose sanctions and accusations on China several times, even though China signed China-US market access and IPR memorandum. Particularly since 2018, the Trump administration persisted in launching a "trade war" against China, the core of imposing sanctions on ZTE and Huawei was IPR. At present, the abuse of international IPR protection and rights has become not only the major obstacle to international trade liberalization, but also the major constraint to China-America trade.

International Trade Major in Universities should not Ignore IPR Education

IPR law has both private and public norms, substantive and procedural standards. From the ownership of legal department, it belongs to the special law of the civil law. Most of the basic principles, systems and legal norms of the civil law apply to IPR. Due to the comprehensive and technical characteristics, it is very common for Chinese export enterprises to lose both fame and wealth in trade wars, which has not attracted enough attention in China. IPR education is scarce in international trade major of most Chinese universities. International trade courses are limited in the practical knowledge. It is only mentioned in the introduction of WTO, this is seriously affecting the legal consciousness and quality of cultivating international trade talents. As IPR education is absent from Chinese universities, It's not alarmist that China's foreign trade enterprises will lose more market share because of the lack of IPR talents.

Inspiration of IPR Education in Western Market Economy Countries

The essence of international trade competition is a talent which is based on education. American IPR education closely connects with students' career planning. It plays not only the guiding role of the career departments, maximizing the satisfaction of personal and social needs, but also avoids the waste of education. The teaching team includes teachers of business management, laws, science and technology, realizing the cross-disciplinary integration of teachers. Max Planck Intellectual Property Research in Munich (Germany) is a world-renowned IPR research institution and the supporter for IPR talents cultivation. It implements a two-level judicial examination system to issue certificates for talents.

The first is the state judicial examination, which requires a certificate to be issued after an internship in a law firm and court. Second, the federal national judicial examination requires rich practical experience. In the 1980s, Japan put forward a slogan of "Nation built on intellectual property" and formulated the "Japanese intellectual property promotion plan". it Emphasizes the promotion of IPR education in graduate schools and universities. The UK Patent Office (UKPO) put intellectual property textbooks as a part of citizens' education in primary and secondary school in 2002. Singapore developed the overall framework and standards of various fields for IPR education, such as the special developed project for business needs, and a number of IPR network service platforms for training. All of these countries establish an efficient and practical IPR talents training system.
Suggestions on Cultivating IPR Talents of International Trade in China

The Time to Consolidate the Foundation of China's IPR Education

It has been nearly 17 years since China became a member of the WTO. China is fully fulfills its commitments. Protecting the IPR against infringement is not only China's consistent position, but also a powerful method for international competition.

Since the entry of WTO, the number of applications for invention patents and the total number of patent applications in China have been increasing (the figure below), which demonstrates that China's IPR legislation and protection is ahead of the world.

![2007-2017 patent application in China (10000 pieces)](image)

Source: China national intellectual property office, 2018

For example, in 2017, the total number of invention patent applications was 1.382 million, up 14.2% year-on-year, ranking the first in the world for seven years. The accepting number of patents was 51,000, up 12.5% year-on-year, ranking the second in the world. There were 9.8 patents per 10,000 people on average. The accepting number of applications for trademarks reached 5.748 million, the growth increased by 55.72%, ranking first for 16 years in the world.

According to the report released by the World Intellectual Property Organization (WIPO) on March 21, 2018, China became the second largest source of international patent applications within the framework of PCT (Patent Cooperation Treaty) in 2017, only second to the US. Huawei and ZTE became the top two Chinese companies with the largest number of international patent applications. Based on the geographical distribution of international patent applications in 2017, China’s 48,900 patent applications was second to 56,600 of the US, higher than Europe, Japan and other countries.

After 2003, China’s growth rate was higher than 10% many times. It is the only country reached the double-digit growth rate per year. The international patents of Huawei and ZTE are at the top of the list with the number of 4,024 and 2,965, more than Intel (2,637), Mitsubishi (2,521) and Qualcomm (2,063). IPR is a subject that covers laws, managements, science and technology, economy and negotiation skills. There are great foundations and conditions for China to cultivate IPR talents of international trade.

It is Urgent to Cultivate High-end Talents for International Trade in IPR

From the intellectual property model under the WTO regime, China is badly short of IPR talents and the structure is unreasonable. IPR education in university mainly focuses on Law. A large number of Chinese trade enterprises cannot prevent intellectual property crisis. High schools should strengthen the training of IPR talents in institutional innovations, high-level talent introductions and educational resource investments. Encouraging Chinese relevant universities to issue master's
degree certificates in IPR and the certificates which issued by WIPO. We both cultivate undergraduate talents and MBA, MPA and master of engineering talents in IPR.

**The Four Parts of Governments, Enterprises, Education and Research Work Together to Implement the National Strategy on IPR**

We should improve the awareness of the relations between IPR and the survival of foreign trade enterprises, launching the national strategy of IPR education, strengthening the studies on TRIPS. In addition to universities, the government, research institutes, enterprises, academic organizations and local public organizations are also important forces for the cultivation of IPR talents. It is necessary for them to strengthen the internal cooperation, information communication. To cultivate a large number of IPR talents such as international trade-oriented talents, management-oriented talents and leader-oriented talents.

China is a developing country with backward level of science and technology. Meanwhile, China is at a disadvantage in international IPR protection. It is a long-term goal for China to follow the TRIPS rules and protect the interests of enterprises and the country to the maximum extent at the same time. Cultivating the talents with global vision and excellent skills can both protect rights in international trade better and undertake the works in international organizations, multinational enterprises and international operations of IPR.

To sum up, China's IPR education and talent cultivation is a systematic project. It is better to train suited talents by multi-modal and multi-channel ways in stages, meanwhile, establishing talent career planning system and assessment incentive mechanism to exploit the potential of talents fully and reasonably, Creating a new era of IPR education in China.

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**References**


