

The Legal Regulation Impact of Industrial Property Rights on Achieving Sustainable Development "A comparative analytical legal study"

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Abstract:

Property of industrial rights are linked to creativity and innovation, which makes them, have an important role in the process of development and progress in all countries, both developed and developing. Among the most important forms of property of industrial property are patents, as they are the effective legal means of protecting inventions. Countries' positions on their legal regulation differ according to the prevailing circumstances in each country and the requirements for achieving sustainable development in it. It is true that they depend primarily on the general legal regulation contained in the Paris Convention in 1883, which is supervised by the WIPO, but each country has sufficient space in which it can adapt the legal regulation of these rights to the requirements of development in it. As for the problem of the study, it revolves around an important idea related to the effectiveness of using the legal rules regulating industrial property as a basic factor in sustainable development programs, through the direct positive impact of the legal regulation of industrial property on the economies of countries.

Keywords: Patent, Industrial Property, Sustainable Development, Innovation, Technology Transfer.

الأثر القانوني لتنظيم حقوق الملكية الصناعية في تحقيق التنمية المستدامة "دراسة قانونية تحليلية مقارنة"

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كلية الادريسي الجامعة

المخلص:

ترتبط حقوق الملكية الصناعية بالابداع والابتكار، مما يجعل لها دوراً هاماً في عملية التنمية والتقدم في جميع الدول، سواء المتقدمة أو النامية. ومن أهم أشكال الملكية الصناعية براءات الاختراع، إذ تُعد الوسيلة القانونية الفعالة لحماية الاختراعات. وتختلف مواقف الدول بشأن تنظيمها

القانوني حسب الظروف السائدة في كل دولة ومتطلبات تحقيق التنمية المستدامة فيها. صحيح أنها تعتمد أساساً على التنظيم القانوني العام الوارد في اتفاقية باريس لعام 1883، التي تشرف عليها المنظمة العالمية للملكية الفكرية (الويبو)، إلا أن لكل دولة مساحة كافية يمكنها من خلالها تكيف التنظيم القانوني لهذه الحقوق مع متطلبات التنمية فيها. أما مشكلة الدراسة فتدور حول فكرة هامة تتعلق بفعالية استخدام القواعد القانونية المنظمة للملكية الصناعية كعامل أساسي في برامج التنمية المستدامة، من خلال التأثير الإيجابي المباشر للتنظيم القانوني للملكية الصناعية على اقتصادات الدول.

الكلمات المفتاحية: براءة اختراع، الملكية الصناعية، التنمية المستدامة، الابتكار، نقل التكنولوجيا.

1: Introduction:

The legal protection of industrial property rights plays a very important role in driving the wheel of economic development and determining the degree of progress in all countries, regardless of their degree of technological advancement or economic growth, whether those countries are technologically advanced or poor countries., because they are linked to creativity and innovation, which contribute to the creation of different and varied forms, models and types of products and services. Among the most important forms of property of industrial are patents, which are the most widespread means of protecting inventions, and industrial designs, which are aesthetic creations related to the appearance of industrial products, trademarks, service marks, integrated circuit designs, trade names, geographical indications and Legal Protection from unfair competition. Together, they constitute important categories within the framework of general property of industrial, and property of industrial in particular, which is credited with the first legal regulation of it at the international level, in the Paris Convention for the Legal Protection of Property of industrial concluded in 1883, which the WIPO oversees to ensure its proper implementation.

Focuses on a basic idea: the effectiveness of using the legal rules regulating property of industrial as a basic factor in sustainable development programs, through the direct positive impact of the legal regulation of property of industrial on the economies of countries.

A number of important questions branch out from this problem, the most prominent of which are:

How should countries adopting sustainable development policies develop their legislation and practices for the Legal Protection of property of industrial?

How does the effectiveness of the property of industrial legal system contribute to the development of sustainable development policies in developing countries?

How can the legal system established to protect industrial property rights strike a balance between the interests of developing countries that need technology and the interests of developed countries that seek to preserve the technology they possess?

What are the ways to facilitate the transfer of technology and knowledge to developing countries that adopt sustainable development policies?

Adopts a scientific analytical approach, which aims primarily to reach a general framework that brings together the subject and highlights its scientific importance, in order to reach what is best to be applied to the reality of developing countries, including Arab countries, in addition to including the comparison of relevant national laws and relevant international agreements.

As for the study plan, we will divide the study into an introduction, three main sections, and a conclusion. We will dedicate the first to the impact of Legal Protection For rights Ownership Industrial in investigation Development Sustainable, while the second, for efficiency order Legal To protect Ownership Industrial in investigation Development Sustainable, and the third, for the role means Legal used in transfer Technology To achieve Development sustainable

In the last part of the study, we present a conclusion that highlights the results and proposals we have reached.

2: The Legal Protection of industrial rights property impact in achieving sustainable development:

2-1: The legal organization of industrial rights property difference according to the circumstances of countries:

The "wrong" legal regulating of the property of industrial practice in developing countries generally has much greater immediate negative effects than it would have in developed countries, as most developing countries have sophisticated systems to regulate the state of competition, which ensure

that the abuse of any monopoly rights cannot unduly affect the public interest. In the United States, for example, Congress passed the Act (DMCA) in 1998, which prohibits, among other things,

This law prohibits many actions that could be considered a form of circumvention of the legal protection provided for these rights, especially circumvention of technological protection systems such as encryption. This position means that in the United States, these protection systems are still strong and entrenched in the legal system of industrial property rights in particular, while they are moving away from this strict level in many developing countries⁽¹⁾. Developed countries seek to apply legal systems that are not suitable for industrial property rights in technologically poor countries, while they can take into account the possibility of benefiting from the experience of some developing countries, when they created their own protection systems that are compatible with their prevailing legal system and the economic situation in which they live.

It is worth noting here that trade agreements and regular investment agreements, whether bilateral or regional, concluded between developed and developing countries, generally include mutual obligations regarding industrial property rights, Where it exceeds the minimum standards set in the Agreement on Trade-Related Aspects of Intellectual Property Rights, we find that developing countries are under constant pressure to increase the level of legal protection provided for industrial property rights, in the legal rules established in their applicable legal systems. to be equal to the bases and standards adopted in developing countries.

In general, we emphasize here that the impact of property of industrial rights often depends on specific circumstances and contexts, specific to each country individually, so we may be in a difficult position, in assessing the success or failure of the legal systems applied, especially if the social benefits of intellectual property rights exceed their costs , and this harmonization is greatly required today, as it is almost impossible to imagine the survival of any commercial or industrial institution existing without (the patent system) from the fierce competition⁽²⁾.

So we see here that our starting point is that providing a level of system that grants some property of industrial Legal Protection is likely to be appropriate at some stage to develop the economic and social reality of developing

countries, In comparison with the experience of developing countries, it can be said that it is necessary to involve developing countries in the research and innovation process, especially the agricultural sector and the health and pharmaceutical industries. Such a system motivates individuals and companies alike to create, innovate, develop, and invent new technologies that can benefit society. These incentives will not be effective in one way, it may work differently, depending on the state or society's ability to respond to it, for example, and this may be done by granting exclusive rights, or by imposing additional costs on users of protected technologies or on consumers.

Benefits must differ depending on how the legal system is applied, according to the economic and social conditions, and the requirements of comprehensive development, in accordance with the standards of property of industrial Legal Protection that may be appropriate for the development of countries. For example, the globalization of property of industrial Legal Protection may cause costs greater than the benefits expected from it, especially when applied in developing countries. It relies mainly on creativity or innovation generated from knowledge acquired in other countries, to meet basic needs and enhance the development cycle therein⁽³⁾.

Therefore, from this perspective, it can be said that expanding the Legal Protection of property of industrial rights would benefit developing countries, which is not surprising, but rather it also explains the reason behind the lack of pressure from industrial projects in developing countries to adopt the agreement. TRIPS is essentially, but from another angle, this does not negate the fact that property of industrial rights are beneficial to developing countries, which will need to benefit from them to help in reaching technical inventions and technological innovations at the national level, and thus work to enhance the state of development and modernization at the national level in general.

2-2: The link between local innovation and sustainable development

It is worth noting here that there is a direct link between development and local innovation in developing countries and the property of industrial rights system, as these studies show that relying on easing the conditions of innovation in patents can encourage innovation, which means that the legal system can allow for the Legal Protection of innovation that does not reach

the level of a patent, by working to grant it a utility model certificate. Such an approach was previously applied in Germany and later in East Asian countries (including China), where it is easy to obtain utility models⁽⁴⁾, which combine a lower level of innovation, rely on registration instead of examination, and grant a shorter Legal Protection period. When this system⁽⁵⁾ was applied in Germany in 1891, the Legal Protection period was three years (renewable for another three years). By the 1930s, a double number of utility patents were granted, as were invention patents, in vital fields as well⁽⁶⁾.

Utility models contributed more than patents to the growth of productive sectors, and the reason for this is that the “simple” legal protection system⁽⁷⁾ contributed to increasing innovation by small enterprises, and contributed to the localization of technology and then its dissemination. This situation was also linked to the lack of legal protection for patents for pharmaceutical and chemical products, which it worked on until 1976, and other countries such as Taiwan and South Korea were affected by this Japanese experience⁽⁸⁾.

In addition to the above, patents can be used by some companies, especially small and medium-sized ones, as a means of promoting their innovations, or as an important source of useful technical knowledge, in many industrial or commercial sectors in developing countries, where they can be considered part of their intangible property, and one of their commercial assets⁽⁹⁾.

2-3: The role of rights Ownership Industrial in sustainable development

The question is; to what extent do property of industrial rights promote economic growth in developing countries? The answer here could be that the more open the economy is, the greater the potential impact of patent rights on growth. According to this view of open economies, the strength of patent rights may increase growth rates by 0.66% per year⁽¹⁰⁾. It is worth mentioning here that there is a discussion about the content of the effective reasons for this growth, as trade openness and the solidity of the legal system established to protect industrial property rights could be a reason for this increase, as in fact the effect of each does not affect the other, and many indications indicate that the strength of the legal protection established for patents increases with the increase in the rate of economic development, and in fact there is a reasonable consistency to a large extent in the direct relationship between the strength of the legal protection of industrial property rights and the level of national development, as in the case of low

levels of development, the levels of legal protection decrease in parallel, but nevertheless, this link does not necessarily always exist.

Therefore, it can be said that the Legal Protection of property of industrial rights is not a high priority in the policy of developing countries, because their per capita income is relatively low in general. In South Korea, for example, 35,900 patents were issued to residents, compared to 16,990 to non-residents, while in contrast, the numbers in the United States were between 80,292 for citizens and 67,228 for foreigners⁽¹¹⁾.

It is clear here that the main conclusion that can be reached is that there is a weak link between the ability of developing countries to acquire technological and innovative capabilities, on the one hand, and the policies adopted in the legal protection of industrial property rights in them, especially in the stage of their economic growth.

Most countries with low income levels actually have low scientific capabilities and do not enjoy a strong technological infrastructure. Accordingly, the legal protection of industrial property rights according to the levels previously determined by the International Agreement on Trade-Related Aspects of Intellectual Property Rights is not an influential factor in determining the level of growth, and on the other hand, we find the opposite, rapid growth is often associated with the weakest property of industrial Legal Protection that can be established.

3: The effectiveness of the legal system for the Legal Protection of property of industrial in achieving sustainable development

3-1: Differences in the legal regulation of property of industrial rights between developed and developing countries

The legal rules relating to the enforcement of property of industrial rights, which are required to be adopted in technologically advanced developing countries, are relatively different from those that can be applied in developing countries with advanced technological capabilities, where most of the poor people live, such as India or China. It is also assumed that the impact of the Legal Protection policies for property of industrial types on society will change according to the social and economic conditions of each country. What may succeed in China will not necessarily work at the same level in other developing countries, such as the Arab countries, for example.

The purpose of enacting laws to protect property of industrial rights is to be the legal means to limit the ownership of property of industrial rights to one person, and to create a legal organization that guarantees the right of society as a whole to the knowledge generated by these rights. The better this knowledge is used, the greater the benefit is achieved for society ⁽¹²⁾. In this regard, we can say that knowledge has the character of a non-competitive public good in this field.

But from another angle; The products that embody knowledge are still the core of the subject, as they are the ones that others are prohibited from using and copying, as the cost of copying is often less than the cost of invention and marketing, and it is the criterion for the failure or success of the market, because this situation can be a reason for reducing the returns or financial incentives resulting from the invention, and therefore there will be no general encouragement to devote resources to invention, because one of the factors for the success of any economic entity or project today is granting temporary exclusive rights, which allow producers to recover the costs of investing in research, development and innovation, and then making profits, in exchange for making the knowledge on which innovation depends available in order to spread knowledge, while the patent holder is granted the right to him alone to grant permission to put that knowledge into potential commercial use, the result of this Legal Protection will be reflected on society represented by consumers as a whole, as on the one hand, if it is absent, there will be no sufficient innovation and invention, and on the other hand, the positive results at the level of consumers in general will appear in the long term, it is true that in the short term the costs imposed by the monopolistic pricing of the commodity or product will increase, because the project will be Under the pressure of the desire to compensate for the losses incurred in the way of development and innovation, In fact, this will improve production efficiency and dynamism, as it contributes to stimulating technical development in general, even if this is done at the expense of fixed efficiency that can arise from costs associated with innovation, which will push other projects to exert more efforts towards creativity and innovation, which creates a competitive character at the level of production efficiency and price as well.

Here, what was mentioned above may be a logical basis for patent Legal Protection, but it is nothing more than an assumption that may or may not be realized in practical reality. Here we can ask: Can the degree of Legal Protection of the invention play a role in achieving a greater or lesser benefit for society?

Here this question can be answered through two hypotheses:

The first hypothesis: The weakness of the Legal Protection provided for patents, then the development process will be hindered, because it will prevent technological development in the medium and long term, due to the insufficiency of incentives allocated to investment in research and development.

The second hypothesis: Excessive Legal Protection will lead to consumers not benefiting as a whole, even in the long term, which reflects a situation that leads to making huge profits that far exceed the costs incurred for research and development, but that will at the same time be an incentive for more innovations, based on the positivity of the natural situation that stimulates innovation and invention in projects, and the most prominent example of this is the length of the Legal Protection period for the invention or the expansion of the scope of the Legal Protection granted.

This assumption will not be easy to achieve in practice. On the one hand, this excessive Strict legal protection may discourage subsequent innovations by inventors and other innovators in general. patent field, and on the other hand, it will stimulate claims that encourage overcoming the patent or at least demanding the removal or easing of restrictions on research related to the subject of the protected patent, in addition to the possibility of creating stronger patent rights that may be less likely to be challenged even in court. Therefore, many patent holders - in such systems - resort to a licensing policy, which has an important impact on the dissemination of new technologies and additional trends associated with the granted rights⁽¹³⁾.

Therefore, we conclude from the above that the optimal degree of effective Legal Protection that can be decided on patents will also differ according to the product and sector, which are in fact related to the changes that occur in demand as well as the costs of research and development, the changes that occur in the market structure, as well as the nature of the original renewable and changing creative process.

3-2: Optimal level of Legal Protection of property of industrial rights

In practice, property of industrial rights systems cannot be designed with great precision, but in general the level of Legal Protection granted in practice must necessarily be flexible, and sometimes a compromise may be wrong - either too much Legal Protection or too little Legal Protection, depending on whether the application of such Legal Protection is costly to society, especially in the long run.

Therefore, the most important thing we can assume in this regard is that we will have a huge flood of creative capabilities that the private sector can contribute to innovating, and they are waiting to be unleashed, through the Legal Protection afforded by the property of industrial system. This may be true even in developing countries with significant research capacity, but in most developing countries domestic innovation systems are still weak. The greater this Legal Protection, the greater the capacity of these enterprises to innovate⁽¹⁴⁾.

In fact, in such hypotheses, the benefit resulting from the application of the legal protection rules for industrial property rights is uncertain. It is true that, for example, a flexible legal system for the protection of patents can provide a strong incentive for innovation, but there is limited opportunity to benefit from it at the local level. The reason for this is that even if some technology is developed at the local level, it is rare for national companies to have the ability to bear the expenses and costs of acquiring ownership of these rights as well as maintaining them, if we take into account, above all, their ability to bear the litigation costs associated with seeking legal protection for the industrial property rights they obtain⁽¹⁵⁾.

Therefore, it can be said that establishing the infrastructure for a legal system for property of industrial, which includes flexible mechanisms for its enforcement, is costly for both governments and private stakeholders in developing countries, due to the scarcity of efficient financial and human resources.

Often suffer from the lack of development of legal systems as required, and therefore bear the costs of activating the legal system with great merit. These costs include, for example, the costs of verifying the validity of claims for patent rights (both at the application stage and in the litigation stages) and deciding on litigation procedures. Large costs are incurred due to the

uncertainty of the outcome of litigation, which means that there is also a need to balance the costs with the benefits arising from the property of industrial system.

Therefore, we believe that the evaluation of the success of the legal system of patents must be done in a balanced manner, especially if we take into account the costs that we can bear, versus the benefits that can be obtained. Therefore, it is likely that the degree of evaluation will differ clearly according to the different circumstances in which it is being applied. Therefore, looking at industrial property rights in a general, accurate manner shows that these rights in fact include restrictions on competition, which are in fact at the expense of consumers and freedom of trade.

3-3: Balancing the costs of Legal Protection and the incentives granted to property of industrial rights holders

The important question here is: Do these costs exceed the amount of incentives for research and invention or not?

The answer to this question is linked to two trends, the first of which is traditional and the other is modern.

As for the traditional approach, some people go to the idea of global economic unity, and they rely on it to justify their approach that states that countries do not lose when they are granted monopoly privileges in the local market, based on the difference between countries in export capabilities, according to the difference in their manufacturing and production capabilities, which is linked to the extent of their benefit from the patents offered for sale, as there are agricultural countries and others that depend on exporting raw materials and others⁽¹⁶⁾.

Therefore, the supporters of this approach see the futility of patent Legal Protection systems, and they base this on the experience of the United States of America in protecting patent systems, where the issue is viewed from a purely economic perspective. Thus, they say that it is possible to reach a stage in which opposing calls can mature, which may lead in the future to its cancellation altogether⁽¹⁷⁾.

The modern trend is a trend that emerged at the end of the last decade of the twentieth century, which is the need of the global economy for a unified system of property of industrial rights, reflecting the needs of both developing and developing countries alike. The argument of the proponents

of this approach is that the problem is not in fact the same in all its dimensions, for countries in general, with regard to the knowledge available to the public in the developed world compared to less developed countries such as developing countries. For example, the need of third world countries in particular for low-cost pharmaceutical drugs is not compatible with their need for low-cost tablets. Therefore, any legal system that treats such needs with equal protection, as we find in the traditional legal system, will not necessarily be an ideal system, and will not work well in the long run⁽¹⁸⁾.

Others add that we are certainly better off with the patent system than without it, as many inventions would not have happened without Legal Protection. Some levels of Legal Protection may actually be better, but too much Legal Protection is not necessarily good. There is growing skepticism about whether these monopolies imposed by legal systems help in a rapidly evolving market such as Internet-related applications or not?!

Here we should ask whether extended patent Legal Protection will give good results to development plans or not?

no The answer to this is undoubtedly yes, it will certainly make some people very rich, but this differs on the other hand according to the factors and circumstances of each country individually, and therefore the balance in the Legal Protection of property of industrial rights now seems an urgent need⁽¹⁹⁾.

What prompts us here to say that there is an opportunity to rethink the legal system of property of industrial rights linked to global trade systems is that this system is always facing the poorest countries in the world. There is no doubt that new property of industrial rights may make the situation more difficult for consumers in the poorest countries to access the key Technologies, any tightening of Legal Protection of property of industrial rights may slow the spread of technology, and hinder its entry into developing countries, which can traditionally come through copying and reverse engineering, which means that these traditional methods of technological spread are slowing down and gradually undermining⁽²⁰⁾.

We believe that one of the prerequisites for achieving sustainable development in any country is the extent to which that country is able to develop its domestic scientific and technological base. In fact, this is necessary, it allows countries to develop their own capabilities for

technological innovation and creativity, as this enables them to localize innovative technologies abroad, and it works to enhance the state of benefiting from them locally in an effective manner.

Accordingly, it can be said that the development of these capabilities depends on a set of influential factors, the most important of which are:

1-The existence of an effective education system, especially at the tertiary level, which directly affects research, development and innovation systems in general.

2-The presence of a network of supportive institutions and flexible legal structures.

3- Providing financial resources, whether public or private, to support the research process and continue technological development.

4- The need to enhance the effectiveness of many other influential factors related to the innovation process, which can contribute to the development of national innovation systems.

5-Improving the legal legislation regulating property of industrial rights in general, and property of industrial rights in particular.

If we look at it in this way, the question that deserves particular attention is whether property of industrial rights can contribute to strengthening national innovation systems effectively in principle, and given the wide differences in theoretical and applied sciences and the disparity in technological capabilities, we must know how to apply this effectively in practice, taking into account the specificity of the prevailing conditions and policies in the countries concerned.

4: The role of legal means used in technology transfer to achieve sustainable development

In this regard, we can find many historical experiences related to the subject, especially for developing countries, whether in the nineteenth century, or for economies whose growth began to accelerate last century, such as:

4-1: The experience of the United States of America & Japan:

Historically, some countries have used property of industrial systems to promote what they consider to be their own systems that embody their economic interests, and have changed their property of industrial legal systems at various stages of economic development. A prominent historical example in this regard is what happened in the United States of America

between 1790 and 1836, when it was an importer of technology, as the technologies were not yet native to it. It worked to determine the patent fees for inventions obtained by its citizens and residents at a lower rate than the patent fees for foreigners, as it imposed on foreigners ten times the amount of fees imposed on citizens, and increased by thirty times if the inventors were British. This discrimination continued until 1861, when foreign inventors were treated on an equal footing with the British.

In this connection the United States Commissioner of Patents says in his annual report for 1858, "It is a fact, as much as it is regrettable, that of the 10,359 inventions which have been registered in the world during the last twelve months, only 42 have been registered in the United States. The heavy duties imposed on foreigners, and the extreme discrimination which has resulted from its prejudice, afford a sufficient explanation of the result which has been obtained, and it would not be proper for the Government of this country to regard an invention which transcends the seas as a dangerous thing. ... As the common property of the world, inventors and geniuses ought to be warmly welcomed, and their products may be a cause of permanent improvement." (21)

As for the situation in Japan, Japan, at an advanced stage of its development, exempted various types of inventions in certain industrial sectors from being subject to patent Legal Protection systems, as the law often restricted patents to products whose production processes were restricted. These sectors were generally the food, chemical and pharmaceutical industries, where no monopoly should be granted for essential or basic goods, because there is a greater benefit in encouraging free access to foreign technology, which is done by stimulating the capacity for innovation in local industries.

4-2: The experience in some European countries

Industrial property rights in general have sometimes been the subject of political controversy, as the debate in the countries of the European continent revolved around patents specifically between 1850 and 1875, whether at the level of academic circles or at the level of political circles, whether the legal system of patents conflicted with the established principles of freedom of trade on the one hand, and being the best means of stimulating invention and innovation, and for this reason in this regard specifically, it was agreed to establish an exclusive franchise right for the owner of the invention that

would continue for a temporary period, as a practical means of stimulating invention.

At the same time, opposition to patent Legal Protection has been advanced on various grounds, "The privileges granted to inventors by the laws of patent Legal Protection are prohibitions to other men," and consequently, patented improvements, which have long been put to an end, and then similar and subsequent improvements, will prove to be more monopolized than the inventions to which they are applied by the patentee, and the Legal Protection may therefore extend to a longer period than the patent itself. This privilege will benefit the patentee, but it cannot benefit society as a whole, which is a hindrance to general progress..."⁽²²⁾

This means that, if the legal system protects one group of inventions, can it avoid deterring those who seek to make improvements to the first invention or innovation?

Here it must be clarified in this regard that at first the prevailing argument in the nineteenth century was linked to the debate over the principle of free trade, by saying that the patent system, through the advantage of granting a monopoly, was viewed by some as a violation of the principles of free trade, but this became a short-sighted view, after it was linked to self-interests required by the requirements of practical reality. In Switzerland, for example, until 1880, industrialists did not want to pass a patent law, because they wanted to continue using the inventions of foreign competitors, and this opposition prevailed for a period of time, despite the fact that Swiss patents themselves were subject to infringement in other countries, until the conviction was achieved that a country like Switzerland, which maintained a low rate of patents, would be in a position that would make it vulnerable to foreign competitors imitating its patents, and then leading to competition with Swiss products themselves.

It was this which eventually led Switzerland to adopt a patent law, with various exceptions and guarantees, not because of the conviction of obtaining a net benefit from patents, and its legislation included guarantees in the form of mandatory provisions urging the use of compulsory licenses⁽²³⁾, This enables the government to impose its local production on the market in one way or another. In addition, chemicals and textile dyes have been excluded from the legal protection provided by patents⁽²⁴⁾.

Elsewhere in Europe, calls for a patent system largely prevailed, with the result that calls for free trade in Europe declined, with the anti-patent movement only succeeding in the Kingdom of the Netherlands, with the result that no Dutch patents were issued from 1869 until 1912.⁽²⁵⁾

4-3: The experience of some developing countries in the Asian continent:

One of the most prominent examples that can be mentioned in the history of development that occurred in developing countries in the Asian continent is what happened in Taiwan, which had previously adopted a weak form of legal protection for industrial property rights, in a manner that was consistent with the special circumstances experienced by Taiwan at that historical stage of its development. The Taiwanese economy grew gradually between 1960 and 1980, and the same situation was paralleled in another country with similar circumstances, namely South Korea, where the policies of these countries emphasized the importance of encouraging the process of imitation of invention and developing innovation based on reverse engineering was adopted as an effective means of developing local technological and creative capabilities in 1961. It adopted flexible legislation that was consistent with its policies and enhanced its ability to create and innovate. It originally excluded food, chemicals, and medicines from patent protection, and reduced the term of protection stipulated by patents to 12 years. These laws remained in effect until the mid-1980s, when the South Korean patent law was amended due to the measures taken against it by the United States, under Section 301 of the Uniform Federal Trade Act of 1974, although it was trying to apply the standards required by the Trade-Related Aspects of Intellectual Property Rights Agreement, and we also witnessed (TRIPS). A similar experience in India, where the ownership of industrial legal protection in the legal protection of pharmaceutical preparations was weak, under the Patents Act of India No. 29 of 1970, which later contributed as an important factor in accelerating the pace of growth in the Indian pharmaceutical industry, which contributed to India occupying an important position in the production of medicine and exporting it at the lowest costs in the world.⁽²⁶⁾

From the above, history shows us a general experience and a lesson in that countries were able to adapt the legal systems of property of industrial rights to facilitate access to technological knowledge and its localization, and to

enhance the objectives of their industrial policy, the reason for this is that the policy followed in a country affects, to one degree or another, the interests of other countries. Therefore, we find that there are always international dimensions to discussions about industrial property rights, and this is something that the Paris and Berne Conventions explicitly recognized, and therefore we find them recommending the application of the principle of reciprocity, but they allowed great flexibility in designing property of industrial systems at the national level in many places.⁽²⁷⁾

In fact, with the entry into force of the TRIPS Agreement, a great deal of flexibility in legal protection has been removed, and these countries cannot follow the approach of a country like Switzerland, Taiwan or South Korea in developing their own technologies, or advance by imitation and reverse engineering. Therefore, enhancing the indigenous innovative capacity of indigenous peoples must be done differently than in the past.

Most developing countries are in fact net importers of technology from developed countries, and it is private companies and privately owned enterprises that hold the largest number of patent rights worldwide. and whose economic models have been built according to their estimates and orientations, and this is reflected in the global impact of the implementation of the TRIPS Agreement (meaning the globalization of minimum standards of property of industrial Legal Protection).

Therefore, previous World Bank estimates indicate that most developing countries will be the main beneficiaries of the TRIPS Agreement, in terms of the improved value of their patents, with the United States seeing a significant benefit of about \$19 billion annually, while developing countries and a few developing countries will be among the losers, with the country that will suffer the biggest loss being South Korea (\$15 billion)⁽²⁸⁾, This necessarily means that the impact of compliance with patent rights will be of great benefit to the owners of these patents, especially in developed countries, at the expense of importers or users of the protected technology in developing countries.

5: Conclusion:

5-1: Results:

1-that impact rights Ownership Industrial he in a lot from Sometimes It stops on conditions and contexts Certain, especially with all nation on sharpness, especially in what if It was Benefits Social Rights Ownership intellectual exceed Its costs, and this Alignment commander required in a way big, So who? Impossible imagine escape any institution from Competition Feverish.

2-that to provide level Flexible for system Grants some Legal Protection Ownership Industrial possible that He is Suitable in phase what to develop reality Economic And social for countries developing, by measure on what Got it Historically with regards for countries Advanced.

3-One Terms Pre-order to achieve Development sustainable in any country, he bezel capacity that Country on development The base Scientific and technology Local, this necessary to allow for countries to develop practical Innovation Technology Private With it, and enable it from Absorption And with all effectiveness Technologies that I was created in outside

4-He should evaluation value system Patents Invention by way balanced, with Recognition with that on end whether on level Costs or level Benefits, And Likely that It varies. balance Costs And the benefits in a way marked in conditions Miscellaneous, from during Look to rights Ownership Industrial In a way monetary generally, on that involves This is amazing Rights necessarily, on Restrictions on Competition that may Be on account Consumers And freedom commerce in that together.

5-That Degree The ideal from Legal Protection Effective that maybe that Decide on Patents invention, it varies. According to Product And the sector that Related With variables in demand and structures the market, and costs Search And development and nature The process Innovative.

6-in Countries same Income Low, where it is weakness Capabilities Scientific And the structure Infrastructure Technology, no Be Legal Protection Ownership Industrial High Specific Important For growth, and it is related Growth Fast in a lot from Sometimes, weaker Legal Protection for Ownership Industrial Maybe Her approval.

5-2: Recommendations:

1-To achieve the requirements of sustainable development, it is necessary to draw up appropriate development policies that take into account the requirements of development plans and are compatible with the country's circumstances. This should be done in a phased manner, especially in the

field of adapting and using the legal system of industrial and property of industrial to bridge the technological gap between developing and developing countries.

2-Working to involve governments in developing countries concerned with sustainable development on a broad scale, and representing stakeholders from industrialists and businessmen, in the process of formulating and preparing plans related to property of industrial systems and laws that affect development plans.

3-Working to grant developing countries, A degree of freedom to be free to amend its laws, if it sees that this is important within the requirements of implementing development plans, and is justified within the general circumstances and conditions of the country.

Footnotes

- (1) Shada J. A M,(2017) *Insurance against the Risks of Infringement of Digital Property Rights*, Master's Thesis, College of Law, University of Nahrain , Baghdad, (2017), p.66.
- (2) J. Jewkes. , D. Sawers , & R. Stillerman, “*The Sources of Invention*”, St Martins Press, New York, (1959) p.255.
- (3) UNCTAD, “*The TRIPS Agreement and Developing Countries*”, UNCTAD, Geneva; UNDP (2001) “*Human Development Report 2001*”, UNDP, Geneva. Source: <http://www.undp.org/hdr2001/>; World Bank (2001), Chapter 5; and Bystrom , M. & Einarsson , P. mimeo (2001) “*TRIPS: Consequences for Developing Countries: Implications for Swedish Development Cooperation*”, SIDA, Stockholm. Source: <http://www.grain.org/docs/sida-trips-2001-en.PDF>.
- (4) This type of utility model was adopted by the aforementioned Bahraini law in Article 30 and beyond within the provisions of Chapter Two of the applicable law, but the Iraqi legislator did not adopt it.
- (5) The term of protection for a utility model under Bahraini law is 10 years, according to the provisions of Article 32 of the Patents Law.
- (6). Z, Khan, “*Intellectual Property and Economic Development: Lessons from American and European History*”, Commission on Intellectual Property Rights, London. (2002), p. 16. Source: <http://www.iprcommission.org>
- (7) K. Maskus , & C. McDaniel, “*Impacts of the Japanese Patent System on Productivity Growth*”. Japan and the World Economy, vol. 11, . (1999 pp.557-574.& Dahab , S. “*Technological Change in the Brazilian Agriculture Implementations Industry*”, Unpublished PhD dissertation, Yale University, New Haven; (1986), & Mikkelsen , K. “*Inventive Activities in Philippine Industry*”, Unpublished PhD dissertation, Yale University, New Haven. (1984)
- (8) N. Kumar, “*Intellectual Property Rights, Technology and Economic Development: Experiences of Asian Countries*”, Commission on Intellectual Property Rights

- Background Paper 1b, Commission on Intellectual Property Rights, London, (2002) pp.27-35. Source: [http:// www.iprcommission.org](http://www.iprcommission.org)
- (9) S. Thomas, “*Intellectual Property in Biotechnology SMEs*”, in Blackburn, R. (ed.) (in press) “*Intellectual Property and Innovation Management in Small Firms*”, Routledge , London.
- (10) Gould, D. & Gruben , W. “*The Role of Intellectual Property Rights in Economic Growth*”, Journal of Development Economics, vol. 48, (1996), pp. 323-350.
- (11) WIPO Statistics. Source: <http://www.wipo.int>
- (12) I. Kaul , I. Grunberg , & M. Stern, (eds) “*Global Public Goods in the 20th Century: International Cooperation in the 20th Century*”. Oxford University Press, Oxford. (1999).
- (13) See Article 24 and following of the Bahraini Patents Law issued in 2004, which corresponds to Article 27 and following of the Iraqi Patents Law No. 65 of 1970, as amended.
- (14) Here we can give an example of the experience of an "emerging" economy such as South Korea, where the public sector was at the forefront of growth at first, but over time the private sector's capacity for innovation began to increase, which enabled it to gain the lead later, such that most of the patents obtained there were granted to the private sector, especially in the field of electronics. In another experience, we find in a developing country such as India, where the public sector still has the upper hand in dominating inventions, and studies indicate evidence of an increase in the level of patents in the private sector recently. Source: http://www.uspto.gov/web/offices/ac/ido/oeip/taf/asgsc/inx_stc.htm
- (15) Saddam F. K. Al- Mihimdi, *Automation of Insurance and Insurance against the Risks of Infringement of Industrial Property Rights through the Digital Space*, Dar Al-Fikr, Alexandria,(2024) P. 26 etc.
- (16) E. Penrose, “*The Economics of the International Patent System*”, The John Hopkins Press, Baltimore, (1951) pp.116-117.
- (17) F. Machlup , “*An Economic Review of the Patent System*”, US Government Printing Office , Washington DC, (1958) p.80.
- (18) L. Thurow, “*Needed: A New System of Intellectual Property Rights*”, Harvard Business(1997), Review, Sept. - Oct. 1997, p.103. Source: <http://harvardbusinessonline.hbsp.harvard>.
- (19) L. Lessig, “*The Problem with Patents*”, *Industry Standard*(1999), 23 April 1999.Source: <http://www.thestandard.com/article/display/0,1151,4296,00.html>
- (20) J. Sachs, “*The Global Innovation Divide*”, in Jaffe, A., Lerner, J. and Stern, S. eds. (forthcoming) “*Innovation Policy and the Economy: Volume 3*”, MIT Press, Cambridge MA. Source: <http://www.nber.org/books/innovation3>
- (21) Therefore, it can be said that the matter is not limited to patent protection only, but also copyright protection in the United States of America, which was limited to the rights of American citizens only, until 1891, and due to the many restrictions imposed on foreigners, copyright remained in effect, for example, printing had to be in accordance with the requirements stipulated by American laws, which led to the United States not signing the Berne Convention on Industrial Property Rights until 1989, a hundred years after the United Kingdom joined it, and accordingly, readers became accustomed when buying books printed in the United Kingdom, to the

presence of a phrase, that this book is not permitted to be circulated in the United States: "For copyright reasons this edition is not for sale in the United States of America." Source: <http://www.myoutbox.net/poar1858.htm>

- (22) F. Machlup, & E. Penrose, "*The Patent Controversy in the Nineteenth Century*". The Journal of Economic History, vol. 10:1(1950), p p.20.24.
- (23) The Iraqi Patent Law includes texts regulating compulsory patent licensing, in Articles 27 and 28 thereof, and Articles 24 and 25 of the Bahraini Patent Law.
- (24) The same approach followed by the Bahraini legislator in the aforementioned Patent Law, in Article 3 thereof, as well as the aforementioned Iraqi Patent Law, in Article 3.
- (25) E. Schiff, "*Industrialization without National Patents: The Netherlands 1869-1919, Switzerland, 1850-1907*", Princeton University Press, Princeton. (1971).
- (26) E. Eilam, *Reversing: secrets of reverse engineering*. John Wiley & (2005), Sons. ISBN 978-0-7645-7481-8.
- (27) The locations of this flexibility in the Berne Convention, for example, are found in the texts of Articles 2 to 11 of the Convention.
- (28) It is worth noting here that between 1991 and 2001, US imports of royalties and fees related to transactions related to industrial property rights increased from \$14 billion to more than \$22 billion. World Bank figures in 1999 indicate a deficit in imports by developing countries of about \$7.5 billion for the same fees related to licenses related to industrial property rights. Source: <http://www.worldbank.org/data/wdi2001>.

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- [1] Bystrom , M. & Einarsson , P. mimeo, "*TRIPS: Consequences for Developing Countries: Implications for Swedish Development Cooperation*", SIDA, Stockholm. (2001) Source: <http://www.grain.org/docs/sida-trips-2001-en.PDF>
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- Property Rights, London (2002).. Source: <http://www.iprcommission.org>
- [7] Kumar, N. *"Intellectual Property Rights, Technology and Economic Development: Experiences of Asian Countries"*, Commission on Intellectual Property Rights Background Paper 1b, Commission on Intellectual Property Rights, London, (2002) pp.27-35. Source: <http://www.iprcommission.org> .
- [8] Lessig, L., *"The Problem with Patents"*, Industry Standard (1999), 23 April 1999. Source: <http://www.thestandard.com/article/display/0,1151,4296,00.html>
- [9] Machlup , F. & Penrose, E *"The Patent Controversy in the Nineteenth Century"*. The Journal of Economic History, vol. 10:1. . (1950)
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- [11] Maskus , K. & McDaniel, C., *"Impacts of the Japanese Patent System on Productivity Growth"*. Japan and the World Economy, vol. 11, (1999) pp.557-574.
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- [13] Penrose, E. *"The Economics of the International Patent System"*, The John Hopkins Press, (1951) Baltimore, pp.116-117.
- [14] Sachs, J. *"The Global Innovation Divide"*, in Jaffe, A., Lerner, J. and Stern, S. eds. (forthcoming) *"Innovation Policy and the Economy: Volume 3"*, MIT Press, Cambridge MA. Source: <http://www.nber.org/books/innovation>
- [15] Shada Juma Abd Musa, *Insurance against the Risks of Infringement of Digital Property Rights*, Master's Thesis, Submitted to the College of Law, University of Nahrain , Baghdad, (2017) .
- [16] Saddam Faisal Kokaz Al- Mihimdi, *Automation of Insurance and Insurance against the Risks of Infringement of Property of industrial Rights through the Digital Space*, (2024) Dar Al- Fikr Al- Jami'i , Alexandria, Egypt 2024 .

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- [18] Source: <http://www.myoutbox.net/poar1858.htm> .
- [19] Source:
http://www.uspto.gov/web/offices/ac/ido/oeip/taf/asgstc/inx_stc.htm
- [20] Kaul , I. Grunberg , I. & Stern, M. (eds) “ *Global Public Goods in the 20th Century: International Cooperation in the 20th Century*”. Oxford University Press, Oxford. (1999)
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- [24] WIPO Statistics. Source: <http://www.wipo.int>
- [25] World Bank, “ *World Development Indicators 2001*”, World Bank, Washington DC, Table 5.11. Source: [http://www.worldbank.org/data/wdi\(2001\)](http://www.worldbank.org/data/wdi(2001)) .
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- [27] Digital Millennium Copyright Act (DMCA) of 1998
- [28] Berne Convention for the Legal Protection of Literary and Artistic Works of 1886 .
- [29] The Agreement on Trade-Related Aspects of Intellectual Property Rights or the (TRIPS) Agreement of 1994 .
- [30] Paris Convention for the Legal Protection of Property of industrial, and its amendments dated On March 20, 1883, amended at Brussels on

December 14, September 1900, Washington on June 2, 1911, The Hague on November 6, 1925, London on June 2, 1934, Lisbon on October 31, 1958, Stockholm on July 14, 1967, and revised on October 2, 1979.

[31] Law No. (1) Of 2004 regarding patents and utility models applicable in the Kingdom of Bahrain.