## Center on Capitalism and Society Columbia University Working Paper No. 111Rev.

The Need for a Global Patent Market

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A previous draft was published by *Project Syndicate* on August 6, 2018; this revision was delivered to the Development Research Center of the State Council of the People's Republic of China in Beijing on March 22, 2019 and published in Chinese by *Tencent* on April 25, 2019. A revised version was completed on April 27, 2019.

## THE NEED FOR A GLOBAL PATENT MARKET

## Edmund Phelps and Eskil Ullberg\*

Economic growth is measured by growth in productivity and that is driven by the creation of new methods and products. Progress in the methods of production is mostly driven by innovations conceived and developed in the business sector. These innovations, in general, are not the fruit of exogenous discoveries outside the business sector. Much of this innovation takes place through markets in patent assets involving transfers, licensing and crosslicensing around the world. These markets enable innovators to specialize in the fields they are best in, resulting in further productivity gains.

Innovation is required not only to generate sustained growth but also to provide working people with a sense of engagement and the satisfaction of creating a better method or product and seeing it adopted.

Statistics show that job satisfaction too is driven by the processes involved in creating and developing new methods and products.

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But in today's world, innovation has narrowed to the high-tech sector. Consequently, in nations that had enjoyed rapid growth for decades, productivity growth became a pale shadow of what it had been in previous decades. Similarly, job satisfaction has also declined over several decades – in the countries where it has been measured, at any rate. This slowdown of innovation and the ensuing economic decline can be laid in part to some significant shortcomings in trade rules, to "forced technology transfer," and to the weakening of the various national patent systems.

These factors have lessened the incentives of a range of participants in the private sector to attempt "grassroots innovation." The current environment admits only powerful players, effectively excluding millions of ideas from global markets.

Evidently, something must be done to achieve a resumption of widespread innovation. What can be done?

A more cooperative strategy is needed.<sup>2</sup> My collaborator, Eskil Ullberg, and I believe that a framework of cross-border technological exchange based on patent system protection and enforcement mechanisms could, if instituted, release the creativity of developed and developing economies alike.<sup>3</sup> With the right rules, a non-discriminatory, open market for patented technology – as in

<sup>1</sup> For further elaboration on these ideas, see Phelps, *Mass Flourishing: How Grassroots Innovation Created Jobs, Challenge, and Change* (Princeton, 2013).

<sup>2</sup> See Eskil Ullberg, "The Language of Trust and Reciprocity in Patent Markets: A Sociological Analysis of Property Rights on Messages Resolving Uncertainty in Exchange in Ideas," IP2 Hoover Institute WP#15016 (December, 2015): <a href="https://hooverip2.org/working-paper/wp15016/">https://hooverip2.org/working-paper/wp15016/</a>.

<sup>3</sup> See Ullberg, "Trade in Ideas: Performance and Behavioral Properties of Markets in Patents" (New York: Springer-Verlag, 2012).

the 1883 Paris Convention for the Protection of Industrial Property – would create incentives for more cross-border collaboration.<sup>4</sup>

Of course, making such an initiative work poses major challenges. We need a global framework – which includes all people regardless of their country of origin – that puts into practice the principle of mutual gains through innovations. That means further integrating existing patent systems into the trade system, honoring the creator of the innovation, and adopting common rules that are incentive-compatible with the emerging digital economy.

The focus should be on achieving productivity gains by setting up markets in patent licenses and transfers, by experimenting with different rules and implementing those that produce desirable outcomes. Such an institutional learning process would likely transform the trade system and bring about more cross-border cooperation.

At present, however, WTO rules are holding back growth since they fail to encourage firms to "share" their technology with one another by trading or licensing it. If a firm pursuing specific innovations can license parts of another firm's patent portfolio, even on the margins, then it can focus more on the specialized fields where it is best performing.

Such specialization would lead to more productive innovations. What is needed is WTO trade rules that create the conditions for such specialization by establishing a market for trade in ideas, particularly between developed and developing countries. With such a market in place, investment would be directed to fields where the productivity gains are the highest.

<sup>4</sup> See "Paris Convention for the Protection of Industrial Property," WIPO Database of Intellectual Property Legislative Texts (March, 1883): <a href="https://www.unido.org/sites/default/files/2014-04/Paris\_Convention\_0.pdf">https://www.unido.org/sites/default/files/2014-04/Paris\_Convention\_0.pdf</a>.

Under the framework now envisioned, practices such as forced technology transfers would be curtailed. Conditioning market access on technology transfer does allow developing countries to "catch up" to developed countries, but it also weakens the prospects for long-term productivity growth. By eliminating incentives for innovators to benefit from the trade in patents, forced technology transfers effectively destroy the market in ideas.

Moreover, countries that engage in this practice weaken their own economic potential, by driving their innovators to countries that will protect their rights. The practice is similar to Tudor England's grants of royal monopolies, which were used to replenish the king's coffers. This mercantilist policy was abolished by the 1623 Statute of Monopolies, which granted property rights to the "true and first inventor," thus establishing England's patent system.

And yet, since the 1952-1954 period, advanced economies have adhered to the patentability criteria of "non-obviousness" (in the United States) and "inventive steps" (in Europe). These concepts effectively replaced the "flash-of-genius" doctrine with one of "long toil," with the result that rewards now accrue more easily to "marginal" innovations than to "broad" ones. There is less of an incentive to make high-risk investments in new productivity-enhancing technologies, because one can simply add "features" to existing products. The 500-year-old principle of honoring the innovator – first established in Venice in 1474— has been cast aside.

But creating an international market in patents would likely boost the growth of productivity-enhancing technologies only if effective rules-based incentives are in place. That requires three steps. First, the WTO would need to begin the diplomatic process of transforming itself into a body that enforces market principles for patents (and other intellectual property). As a result, the

WTO's membership could narrow, because a provision for excluding member states may be necessary to enforce compliance in this area.

Second, to start the process of institutional learning, the WTO would encourage member states to test out new rules governing the trade in patents. Once decided, these rules would be incorporated into existing treaties. Last, the WTO would enforce those rules among the participating countries, and among any countries wishing to enter or re-enter the bloc.

Incorporating the national patent systems into the global trade framework would create strong incentives for cooperation, sharing, and exchange between innovators from developed and developing countries. At the same time, strategies based on abusing intellectual property would increasingly fall out of favor, owing to the threat of "expulsion" from the new WTO and especially loss of trade gains.

The new system would empower creative people everywhere – including the least-developed countries. The kind of mass flourishing that we need depends on grassroots innovation, and on a non-materialist "culture of creativity" that maximizes human potential, rather than only seeking to satisfy basic needs.<sup>5</sup>

There is no time to waste. We should start exploring options to integrate patent markets into the trade system. The United States, the European Union, China, Japan, South Korea, and many developing countries all have important roles to play. Those countries that are not on board risk falling behind, just as much of the world did in the 1600s, when Western countries expanded their patent systems and raced ahead.

<sup>5</sup> See Phelps, *Mass Flourishing* idem.