Globalizing IPR Protection: How Important Might RTAs Be?

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Main points

- There has been very substantial (and ongoing) globalization of IP regimes since 1990s, primarily involving convergence of emerging economies to developed economies.
- A contributor to this trend is the proliferation of RTAs with deep attention to IP issues.
- It is difficult to isolate the impacts of this component of RTAs, which deserves more study.
- But RTAs have other features that emphasize the importance of IP, suggesting the likelihood of extensive “IP creation” within RTAs.
- All of these statements are conditional: we don’t see much evidence for IP-related trade or technological growth in poor countries.

Factors driving continuing IP globalization

- Familiar:
  - Rapid and diverse technological changes that challenge limits of existing IPR.
  - Dominance of IP-sensitive technologies and products in trade.
  - Rising upfront R&D investment costs and declining copying costs in key sectors.
  - Massive increases in cross-border trade and investment.
  - Concerns about technology losses in competitive emerging countries.
- And new:
  - Income-driven growth in product and technology varieties entering trade.
  - Proliferation of technical standards with IPR protection.
  - Growth and complexity of cross-border production and research networks.
  - Needs to organize research for and dissemination of public goods.
- Advocates see stronger IPR as a (partial) solution to all these issues.

IP globalization in the TRIPS and TRIPS-plus era

- Last 20 years have seen unprecedented increases in legislated and perceived protection of patents and other IP rights.
- While true generally these shifts are most prominent in middle-income emerging economies.
- Sources:
  - Multilateral agreements (TRIPS, WIPO);
  - Bilateral pressures;
  - Regional trade agreements;
  - Domestic interests.

Expanding attention paid to IPR over time in RTAs and Partnership Agreements

- US-Israel FTA 1985: one paragraph mentioning NT and MFN.
- NAFTA 1994: essentially anticipated TRIPS.
- US-Jordan FTA 2001 (“gold standard” IPR): 5 pages, added some TRIPS-Plus features in patent standards, pharma, test data, digital CRs and anti-circumvention.
- US-Chile 2004: regularized test data periods, PV patents.
- US-Australia 2005: further pharma protection, linkage, limits on CR exceptions.
- US-Korea 2012: further limits on CR exceptions, patents for new uses, no pre-grant opposition, detailed rules on ISPs, extensive enforcement.
- TPP ? biologics test data protection, trade secrets obligations, criminal enforcement.
- EU Partnership Agreements increasingly focus on IP issues.
- Over 400 RTAs exist. Most that have IP chapters involve a developed country partner but newer developing-country RTAs increasingly feature them.

Broader policy issues in RTAs

- Most recent RTAs extend to areas that influence the productivity of IP:
  - Access commitments in IT markets and technology products.
  - Some liberalization in financial and producer services.
  - More openness to foreign investment.
  - Relaxed restrictions on temporary mobility of skilled labor.
- In TPP the IPR provisions are supplemented by:
  - Investment protection and investor-state dispute settlement (ISDS).
  - Restraints on policies attempting to induce or force technology transfer.
  - Access to procurement contracts.
- RTAs can also raise some impediments to efficiency:
  - The usual trade and investment discrimination issues.
  - Conflicting and high-cost rules of origin.

Potential economic impacts

- The RTA/TRIPS-plus issues are controversial because they focus on pharmaceutical competition, digital rights and enforcement.
- This debate is important but it is qualitative and focuses on worst case/best case possibilities.
- There is very little solid evidence about how IPR variations across RTAs may be affecting fundamental economic variables within or outside of the agreements: this issue needs research.
- One could pose it in two ways:
  - Do RTAs with particularly rigorous IP standards directly generate more activity?
  - Are there complementary provisions in RTAs that strengthen the role of IP?
- These are difficult problems to identify: data scarcity, measurement problems, causation, confounding factors.
- What lessons might be drawn from more general evidence?

Potential direct impacts of IP

- Work is just beginning on characterizing RTAs with respect to differentially stronger IP chapters.
- Early evidence using a gravity framework suggests that bilateral high-technology exports from high-income partners expand significantly. Little impact on high-technology exports of low-income partners.
- No evidence yet in the literature that local innovation and R&D in partner countries is growing any faster in high-IP RTA members.
- Work needs to be supplemented by looking at detailed patenting flows.

Broader evidence

- There is a surprising lack of evidence that patent laws spur domestic R&D and patenting.
- Nonetheless, we have observed large increases in the participation of developing countries in global IP registrations:
  - DC patent apps abroad: 11,459(1995) to 95,168(2010)
  - DC TM apps abroad: 275,647(1995) to 478,718(2010)
  - DC PVP apps total: 671(1995) to 5,119(2010)
- And relatively fast growth in weighted R&D/GDP ratios (2000-2010):
  - 26 developing countries: 3.7% per year;
  - 35 emerging countries without China: 2.8% per year;
  - China: 9.5% per year;
  - 28 developed countries: 1.3% per year.

Broader evidence

- Can any of that be attributed to IP reforms?
- Evidence with aggregate data is mixed, though new econometric evidence (Maskus and Yang) with detailed industries suggests that patent reforms do expand export growth in IP-sensitive goods, with this effect growing over time.
- Micro-econometric studies (Branstetter and others) find expanded R&D activities of US MNE affiliates and extensive margin export growth in 16 middle-income emerging countries post-reforms.
- There appear to be strong threshold effects, especially in human capital.
- But such responses are not found in poor countries.
- Analysis of medical products (Kyle and McGahan) finds no evidence of global or local R&D expansion after developing countries adopt stronger patent laws.

Broader evidence

- On this basis it is difficult to argue that RTAs with differentially stronger IP are likely to generate exceptional economic effects.
- The sectoral focus of TRIPS-Plus elements also argue against broad-based responses.
- But other aspects of RTAs might complement the effectiveness of IP by enhancing the channels of learning.
- There is emerging econometric evidence that patent reforms have relatively larger pro-trade effects in economies with (1) greater openness to FDI; (2) greater stocks of non-resident patent applications; (3) more advanced financial development.
- There is also evidence that RTAs and BITs can attract relatively larger shares of FDI in high-technology goods.
- But each of these in turn is responsive to IP protection in emerging economies.

Modest conclusions

- It is premature to conclude that stronger IP chapters by themselves are likely to improve or damage within-RTA competition and growth.
- But RTAs involving emerging-country partners that have at least transparent IP standards seem likely to create additional economic activity.
- It is evident that such effects would be more likely in larger and more comprehensive RTAs.
- None of this constitutes a calculation of economic welfare effects.