

Unregistered IP rights and innovation: What is the evidence?

Muthu De Silva
Birkbeck, University of London
m.desilva@bbk.ac.uk

SOTA Review No 20: February 2019

What does the evidence suggest in relation to the relationship between unregistered IP rights—including unregistered design rights, unregistered trade marks, and copyrights—and the innovation outcomes of firms? While some argue that unregistered IP rights incentivise innovation due to the convenience and savings—both in terms of time and costs—associated with a process that requires neither registration nor maintenance, others argue that unregistered IP rights hinder cumulative innovation and increase monopoly power. Yet, the influence on innovation seems to depend on firm size and sector, industry lifecycle length, and on the stage of the collaborative innovation process. It's been proposed that a lack of reported litigation suggests that unregistered IP rights work more in terms of restricting copying than as enablers of prosecution for an infringement. Other than review articles, there is a dearth of empirical evidence pertaining to potential impacts on innovation outcomes of firms. By gathering data from firms on the use and experience unregistered IP rights and firm innovation outcomes, future research could shed light on this topic.

Background

In the UK, unregistered IP rights fall mainly within three categories:

- **Unregistered Design Rights**, which were introduced by the Copyright, Designs and Patents Act 1988 (Bradshaw, Bowyer and Haufe 2010) and cover the shape and configuration (whether internal or external) of three-dimensional, original designs. These rights last for up to 15 years and their licence should be given during the last five years if requested. Prosecuting for infringement requires proving the deliberate duplication of an original design (Derclaye 2004; Hargreaves, 2011; Bradshaw, Bowyer and Haufe 2010).
- **Unregistered Trade Marks**, can protect words, symbols, or their combinations as a trade mark used by a business. These are protected

under a Common Law tort known as 'Passing off' and action is taken depending on similarities of field of operation and trading status of the owner, and on the damage caused to the goodwill of the unregistered trade mark owner (Mendonça, Pereira and Godinho 2004).

- **Copyright**, another form of unregistered IP, protects artistic or literary expressions ranging from books, paintings, computer software, databases, music, TV or radio broadcasts to promotional material. They last up to 70 years from the death of the author (exceptions are broadcasts—50 years—and layouts of published editions—25 years) (Hargreaves, 2011; Bradshaw, Bowyer and Haufe 2010).

Having conducted an extensive analysis, Farooqui, Goodridge, and Haskel (2011) suggested that almost 50% of all UK investments are protected by IP rights, the majority of which pertain to assets protected by unregistered design rights and copyrights. Similar findings were reported by Andersen, De Silva and Levy (2013) in relation to the UK, and by Hall et al. (2014) in the case of the US.

What does the evidence suggest in relation to the relationship between unregistered IP rights and innovation?

Evidence

There has been some evidence on valuing the economic contribution of copyright industries (WIPO 2015; Siwek 2014) and design intensive industries (Europe Economics 2015). Also, CREATE, UK Copyright and Creative Economy Centre, offers a collection of past research and their own working paper series on copyrights. Yet, there seems to be significant knowledge gaps in relation to the firm level innovation impacts of unregistered IP. With the exception of a few review articles indicating potential impacts, on which the discussion below is based, there is a dearth of empirical evidence specifically focussed on firm level innovation impacts of unregistered IP rights.

Innovation impacts seem to vary depending on firm size and sector, and on the stage of collaborative innovation. Unregistered IP rights also seem to fill a gap needed for the effective use of a portfolio of IP.

Unregistered IP Rights and Firm Size:

As the application and management of registered IPs can prove expensive (Graham et al. 2010; Hall, Helmers, Rogers, and Sena 2014; Hall et al. 2013), SMEs are more likely to rely on unregistered IP rights, thus increasing their motives for innovation. Specifically, it is stated that unregistered design rights are more important for young, small, and less established independent designer firms that do not have sufficient resources and knowledge for registering (Beltrametti 2010), compared to luxury firms that are protected by other rights, such as trade marks (Hemphill and Suk 2009), in any case: thus, unregistered design rights are perceived as a mechanism suited to ensure equity (Monseau 2011). It has also been reported that unregistered design rights positively influence innovation by firms that have shorter lifecycles and provide opportunities for market testing before moving to registered IPs (Burrone 2005; Beltrametti 2010). Also, unregistered design rights are believed to motivate some lower-end, inexpensive designer firms—that, before the introduction of

unregistered design rights, often engaged in copying (Monseau 2011)—to engage in some form of incremental innovation, at least to the end of maintaining some distance from the original design.

Similarly, unregistered trade marks are also considered to be more applicable to small firms, which are unlikely to register their trade marks (Holgersson 2015). However, so far, trade marks have not been used as an indicator of innovation (Mendonça, Pereira and Godinho 2004).

It is suggested that the awareness of unregistered IP rights needs to be increased, specifically among SMEs, by parties such as universities, intermediaries, or R&D centres, which are increasingly working with this type of firms (Burrone 2005).

Unregistered IP Rights and Sector of Operation:

The empirical evidence suggests that firms in the pharmaceutical and chemical industry are more likely to use registered rights (Hall, Helmers, Rogers, and Sena 2014); conversely, those in business, creative and cultural, and information and communication services are more likely to use unregistered/informal forms of IP (Anderson, De Silva and Levy 2013; Greenhalgh and Rogers 2007; Europe Economics 2015).

Unregistered IP Rights and Open Innovation:

Unregistered IP rights enable companies to clarify issues of ownership and control over any resources that are shared during collaborative innovation processes (Toma, Secundo, and Passiante 2018; Granstrand and Holgersson 2014). Unregistered IP rights, in conjunction with other forms of informal IP, play a role in ensuring the effectiveness of collaboration by minimising the risk of IP loss especially during the assembly and disassembly stages of open innovation projects, when the objectives are unclear and the market potential is yet to be realised (Granstrand and Holgersson 2014).

Yet, a lack of IP rights, either registered or unregistered, is often considered as opening doors for cumulative innovation and reducing monopoly power (Levin et al., 1987, Dahlander and Gann 2010). Wikipedia and open source software are highlighted as examples supporting this assertion, which enhances opportunities for individuals to collectively innovate (West and Gallagher, 2006). Strong IP rights seem to make firms obsessed with protection, thus reducing the leveraging of external resources to bring inventions to markets (Laursen and Salter, 2006).

Specifically, in relation to copyrights in the digital products and services sector, it is argued that, in conjunction with Digital Rights Management (DRM) and contract laws, they could hamper innovation, particularly that by non-commercial innovators, user co-creators (i.e., user generators of content), and small firms, increasing monopolistic power. (Erickson 2018). Also, it has been argued that the impacts of copyrights vary depending on agents such as creators, investors, distributors, users or society as a whole, thus requiring more specific policies (CREATe 2018).

Commented [CP1]: Appreciate this isn't an IPO publication though would we usually suggest an (RTM) after this?

Portfolio of Unregistered IP Rights and Other Rights:

Generally, due to innovation being dependent on multiple technologies and to the associated complexity of products and services (Granstrand and Holgersson 2014), firms tend to use a portfolio of IP rights (e.g., Levin et al. 1987; Andersen, De Silva and Levy 2013; Monseau 2011; Tylecotea and Ramirez 2006; Europe Economics 2015). Some even suggest that what matters is the valuing and packaging of different IP rights rather than the differentiation between registered or unregistered ones (Goldense 2014). As open and collaborative innovation are quite complex, the combination of unregistered IP rights with registered IP provides a more strategic approach to engaging in open innovation (Manzini and Lazzarotti 2016).

Summary and evidence gaps

Past research has acknowledged the efforts made by the UK IPO to gather evidence, and has highlighted the need for further empirical evidence on the value and innovation impacts of unregistered IP rights on both firms and industries, which was also recommended by Gowers Review (Greenhalgh and Rogers 2007; Harhoff 2006). Policies aimed at strengthening unregistered IP rights without evidence are highlighted as not serving a purpose (Harhoff 2006).

Yet, compared to patents, unregistered IP rights are largely unobservable to third parties as there is no registry to check, thus reducing the potential for the empirical investigation of their value and impacts on innovation, (Hall, Helmers, Rogers, and Sena 2014; Greenhalgh and Rogers 2007; Monseau 2011; Hargreaves, 2011). Although it should be possible to look at litigation, there has been little of it (Monseau 2011). Therefore, by gathering data from firms on the use and experience of unregistered IP rights and firm innovation outcomes, future research could shed light on this topic.

Future research could aim to fill the evidence gaps specifically in relation to how firms use a portfolio of registered and unregistered rights and to the innovation outcomes of unregistered IP rights, particularly in relation to emerging technological advances (e.g., digitalisation) and to new modes of collaborative innovation, which have a clear policy relevance (Hall, Helmers, Rogers, and Sena 2014; Toma, Secundo, and Passiante 2018; Granstrand and Holgersson 2014).

Sources

- Andersen, B., De Silva, M., and Levy, C (2013) Collaborate to innovate: How business can work with universities to generate knowledge and drive innovation. Commissioned report by the Intellectual Property Office, UK. Big Innovation Centre: London.
- Beltrametti, S (2010). Evaluation of the design piracy prohibition act: is the cure worse than the disease? An analogy with counterfeiting and a comparison with the protection available in the European community. *Northwestern Journal of Technology and Intellectual Property* 8 (2): 147–173.
- Bradshaw, S., Bowyer, A., and Haufe, P (2010). The intellectual property implications of low-cost 3-D printing. *Scripted* 7(1): 5–31.

- Burrone, E (2005). Intellectual property rights and innovation in SMEs in OECD countries, *Journal of Intellectual Property Rights* 10: 34–43.
- CREATe (2018) Copyright Evidence Wiki. Available at https://www.copyrightevidence.org/evidence-wiki/index.php/Copyright_Evidence
- Dahlander, L., and Gann, D.M (2010). How open is innovation?, *Research Policy* 39: 699–709.
- Derclaye, E (2004). The British Unregistered Design Right: Will It Survive Its New Community Counterpart to Influence Future European Case Law? *Journal of European Law* 10: 265-294.
- Europe Economics (2015). The Economic Review of Industrial Design in Europe — Final Report. Available at [file:///C:/Users/ubldes001/AppData/Local/Packages/Microsoft.MicrosoftEdge_8wekyb3d8bbwe/TempState/Downloads/20150223%20The%20Economic%20Review%20of%20Industrial%20Design%20in%20Europe%20\(1\).pdf](file:///C:/Users/ubldes001/AppData/Local/Packages/Microsoft.MicrosoftEdge_8wekyb3d8bbwe/TempState/Downloads/20150223%20The%20Economic%20Review%20of%20Industrial%20Design%20in%20Europe%20(1).pdf)
- Erickson, K (2018). Can creative firms thrive without copyright? Value generation and capture from private-collective innovation. *Business Horizons* 61(5): 699-709.
- Goldense, B. L (2014). The Enculturation of Intellectual Property In R&D Practices Is Coming, *2PLM* 16(18): 1-3.
- Graham, S. J. H., Merges, R. Samuelson, P and Sichelman, T (2010) High Technology Entrepreneurs and the Patent System: Results of the 2008 Berkeley Patent Survey. *Berkeley Technology Law Journal* 24(4): 1255-1328.
- Granstrand, O. and Holgersson, M (2014). The challenge of closing open innovation: the intellectual property disassembly problem. *Research Technology Management*, 57 (5): 19–25.
- Greenhalgh, C. and Rogers, M (2007). The value of intellectual property rights to firms and society. *Oxford Review of Economic Policy* 23 (4): 541–567.
- Hall, B., Christian, H., Rogers, M. and Vania, S (2014). The Choice between Formal and Informal Intellectual Property: A Review. *Journal of Economic Literature* 52(2): 375-423.
- Hall, B., Christian, H., Rogers, M. and Vania, S (2013). The Importance (or Not) of Patents to UK Firms. *Oxford Economic Papers* 65 (3): 603–629.
- Hargreaves, I (2011). *Digital Opportunity: A Review of Intellectual Property and Growth*. London: UK Government Department for Business, Innovation & Skills. Available at: https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/32563/ipreview-finalreport.pdf
- Harhoff, D (2006). Intellectual Property Rights in Europe – Where do We Stand and Where Should We Go?, discussion paper, Economic Council of Finland, available at http://www.vnk.fi/hankkeet/talousneuvosto/tyokokoukset/globalisaatioselvitys-9-2006/artikkelit/Harhoff_06-09-20.pdf
- Farooqui, S., Goodridge, P. and Haskel, J (2011) *The Role of Intellectual Property Rights in the UK Market Sector*, London: Intellectual Property Office.
- Hemphill, C.S. and Suk, J (2009) *The Law, Culture, and Economics of Fashion*, *Stanford Law Review* 61:1147- 1199.
- Holgersson, M (2015) Intellectual Property in *The Wiley-Blackwell Encyclopedia of Consumption and Consumer Studies*. Eds. Cook, D. T. and Ryan, J.M. Wiley Blackwell. Chichester. 366-368.
- Laursen, K. and Salter A.J (2006) *My Precious Technology: The Role of Legal Appropriability Strategy in Shaping Innovative Performance*. Working Paper Tanaka Business School, Imperial College London.

- Levin, R.C., Klevorick, A.K., Nelson, R. and Winter, S (1987) Appropriating the returns from industrial research and development Brookings Papers on Economic Activity 3: 783-831.
- Manzini, R. and Lazzarotti, V (2016) Intellectual property protection mechanisms in collaborative new product development. R&D Management Journal 46 (S2): 579-595.
- Mendonca, S (2004) Trade marks as an indicator of innovation and industrial change. Research Policy, 33 (9): 1385-1404.
- Monseau, S (2011) European Design Rights: A Model for Protection of All Designers from Piracy. American Business Law Journal 48(1): 27-76.
- Siwek, S. E (2014) Copyright industries in the US Economy. International Intellectual Property Alliance: Washington.
- Toma, A., Secundo, G. and Passiante, G (2018). Open innovation and intellectual property strategies: Empirical evidence from a bio-pharmaceutical case study. Business Process Management Journal 24 (2): 501-516.
- Tylecotea, A and Ramirez, P (2006). Corporate governance and innovation: The UK compared with the US and 'insider' economies. Research Policy 35: 160–180.
- West, J. and Gallagher, S (2006). Challenges of open innovation: the paradox of firm investment in open-source software. R&D Management Journal 36 (3): 319-331.
- World Intellectual Property Organization (2015) Guide on Surveying the Economic Contribution of the Copyright Industries. Available at: https://www.wipo.int/edocs/pubdocs/en/copyright/893/wipo_pub_893.pdf

About the author



Muthu de Silva is a Lecturer in Entrepreneurship and Innovation at Birkbeck, University of London, UK. Her research investigates strategies and practices adopted, opportunities pursued, and organizational forms designed in relation to co-creation, intermediation and university-business interactions. She has published in Research Policy, Journal of Organizational Behaviour, R&D Management Journal, International Small Business Journal, Technological Forecasting and Social Change and Studies in Higher Education and received best paper awards in Innovation by the BAM Conference in 2015 and 2016. She has secured major grants from Innovate UK, Intellectual Property Office, EU and British Academy/Leverhulme, and British Academy of Management. She is a fellow of Royal Society for the encouragement of Arts, Manufactures and Commerce. She can be contacted at m.desilva@bmk.ac.uk.

Other SOTA Reviews are available on the ERC web site www.enterpriseresearch.ac.uk. The views expressed in this review represent those of the authors and are not necessarily those of the ERC or its funders.

