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Post-sale restrictions in patent and trademark licensing agreements: Validity and compliance with competition law

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Abstract

Post-sale restrictions in patent and trademark licensing agreements and their validity and compliance with competition law emphasize the problematic to what extent the intellectual property holder may enforce its IP rights. In today's innovative markets, licensing is a one form of how the IP holder may exploit its IPR and obtain revenues. Post-sale restrictions are part of the scope of the license, when the IP holder grants a right to, for instance, single-use of the IP protected product or part of it. The IP holder may also aim to prohibit the use of another supplier's products in relation to its main product. In other words, a prohibition to reuse the spare part may be imposed.

Post-sale restrictions as a licensing practice raise several legal questions, which are examined in the thesis, such as whether such restrictions are valid and in compliance with competition law. Ultimately, the discussion concerns the interaction between IP and competition law and which assessment should prevail. Comparative aspects are also considered by contrasting the EU approach with the U.S. one.

From the perspective of validity under patent and trademark laws, the application of the exhaustion doctrine is an essential parameter to be considered. The exhaustion may be limited either by justifications under patent law or alterations limitations under trademark law. Licensing may be also considered as a limitation for the exhaustion doctrine, however, with reservations. Post-sale restrictions in licensing agreements under patent or trademark law can be said being generally valid, when within the scope of patent or trademark protection. The consent of the IP holder is the key element in order to determine validity. However, post-sale restrictions may not interfere with other areas of law such as competition law or internal market freedoms.

Considering the more flexible protection of trademark licensing with postsale restriction compared to patent one, a shift from patent licensing can be considered as a possible solution. It is suggested that the most beneficial option would be a hybrid license benefiting from both types of protection. Ultimately, the use of post-sale restriction in licensing is a strategic decision of companies, which requires allocation of risks, especially given the possible competition law scrutiny.

From the perspective of competition law, the validity of post-sale restrictions under patent or trademark laws cannot be considered as a presumption of compliance with competition law. Regardless the validity, such conduct could constitute an abuse of dominant position in the form of tying or abuse of procedure. Even though a dominant company has a legal right to exploit its IPRs under patent or trademark law, such exploitation must not be excessive resulting in anti-competitive disclosure of neither the

primary nor the aftermarket by misusing its IP as tying. Neither any abuse of procedure is accepted. In this context, a theory of harm is an essential consideration in assessing the competitive effects of post-sale restrictions.

At a policy level, competition law is not generally subordinate to IP laws, even in the case of valid restrictions under IP laws. However, in the case of parallel proceedings, competition law may *exceptionally* be subordinate to IP laws when the competition law assessment may be dependent on the outcome of the IP procedure as far as the scope of IP is concerned. For the sake of clarity, *good faith* infringement procedures resulting in a *res judicata* decision should be followed in the competition law assessment. Considering the ideal balance between competition and IP law assessment, such assessments should be complementary with each other. However, for expediency reasons, in certain cases, competition law scrutiny may not be conducted simultaneously before the scope of IP has been considered under IP laws.

Preface

Law is not an isolated discipline. Interactions may be seen within the concept of law itself and with other sciences. Generally, different fields of law may affect a particular legal matter or issue. This is exactly the case with post-sale restrictions, which emphasize the interaction between intellectual property laws, competition law and contract law. This interaction causes inevitable conflicts leading to the main question at issue – whether the application of one field of law prevails or should prevail over the other. From a policy perspective, I find this an interesting dilemma, to which this thesis aims to answer, together with specific questions on the validity and compliance with competition law of post-sale restrictions in the context of patent and trademark licensing.

I would like to thank my family and friends for their support during the writing process. Also, thanks to my supervisor, Anna Tzanaki, for sharing the knowledge on the substantive law and academia by advising and giving supportive feedback facilitating development of my research project during the thesis process.

Abbreviations

CJEU The Court of Justice of the European Union

ECJ The Court of Justice

EEA The European Economic Area

EU The European Union

EULA End User Licensing Agreement

FCCA Finnish Consumer and Competition Authority

ICA Italian Competition Authority

IPR Intellectual Property Right

MA Marketing Authorization

NCA National Competition Authority

SCA Swedish Competition Authority,

Konkurrensverket

SULA Single User Licensing Agreement

TFEU Treaty on the Functioning of the European Union

TRIPS World Trade Organization Agreement on Trade

Related Aspects of Intellectual Property Rights

TTBER Technology Transfer Block Exemption

U.S. The United States

U.S.C. Code of Laws of the United States of America

1 Introduction

1.1 Background

In today's innovative markets, intellectual property rights (IPRs) play a central role. The protection of IPRs facilitate innovation and also enable companies to obtain revenues for their intellectual property by means of licensing.¹ By licensing, the IP holder gives a right to use of its IP to the licensee.² The scope of the licensing agreement is the most essential part of this licensing relationship.³ This contains the possible field-of-use restrictions of IPR, which refer to the licensee's right only to a *specified* type of use of an IP protected product or technology granted by the license agreement.⁴ In other words, apart from a "*pure*" patent or trademark license, the licensor may limit the exploitation of the protected patent or trademark only to one or more specific fields of application, which are covered by the IPR.⁵ However, it can be questioned whether IPRs could be exploited excessively affecting the scope of IP as well as competition on a particular market.

In this context, post-sale restrictions are at the centre of this question. Postsale restrictions are types of field-of-use restrictions, which limit the use of

¹ Alexander Korenberg and Stephen Robertson, *Intellectual Property Strategy – A Practical Guide to IP Management* (Globe Law and Business 2017) p. 137. See also, John Pafrey, *Intellectual Property Strategy* (Massachusetts Institute of Technology 2012), p. 87-109.

² Jeff Dodd and Raymond Nimmer, *Modern Licensing Law* (Westlaw 2016) § 6:1. Michael Rustad, *Global Internet Law* (2nd edition West Academic 2016) p. 205-206.

³ A license refers to a contract where the licensor grants the licensee the right to use its intellectual property right, e.g., patent or copyright. Based on the license agreement, the licensor is obliged to transfer its IP and reciprocally, the licensee is obliged to pay the licensing fee or royalties for the use of IP. Jeff Dodd and Raymond Nimmer (n 2) § 6:1. Michael Rustad (n 2) p. 205-206.

⁴ Communication from the Commission - Guidelines on the application of Article 101 of the Treaty on the Functioning of the European Union to technology transfer agreements 2014/C 89/03 [2014] OJ C 89/3, para 179, 181.

⁵ For example, the use in a specific market, territory or technology or related to consumer or educational use or use in a single computer. Nimmer and Dodd (n 2) § 6:12-15. Vivien Rose and David Bailey, "Intellectual Property Rights - Licensing Intellectual Property Rights" Vivien Rose and David Bailey (*eds*) in *Bellamy and Child: European Union Law of Competition* (7th edition Oxford Competition Law 2013), p.726.

the IPR after the sale of the product protected by the particular IPR.6 The term "post-sale restriction or restrain" is originally established in the U.S. case-law, whereas, in the EU, such restrictions have not been explicitly analyzed as post-sale restrictions. However, several different types of postsale restrictions may be recognized in the EU case-law.⁸ For the purposes of this Master's thesis, any prohibition to use another supplier's products and "single-use" conditions are defined and analyzed as specific types of postsale restrictions (referred to together as "the prohibition to reuse"). The prohibition to use another supplier's products refers to a situation, in which the licensor prohibits the use of another supplier's product as a spare part in its main product. The spare part protected by the IPR is licensed to the endcustomer, whereas the main product is sold.9 For instance, under SodaStream, the licensee has the right to only use the gas bottles of the licensor in the carbonation machine or, under Lexmark, use only licensor's ink in the printer. On the other hand, "single-use" refers to a field-of-use restriction in the licensing agreement, pursuant to which licensing of the IPR is limited to a single usage. Both the prohibition to use another supplier's product or single-use include the prohibition of reuse and thus aim at facilitating price discrimination.¹⁰

Under IP law, different protection occurs for different types of intellectual property, although similar basic concepts are recognized, such as the exhaustion doctrine. The exhaustion or "first-sale" doctrine refers to the first sale of the patented product, after which the patent owner's restrictions on

⁶ Herbert J. Hovenkamp, "Post-Sale Restraints and Competitive Harm: The First Sale Doctrine in Perspective" (Faculty Scholarship 2011) p. 101. Received at http://scholarship.law.upenn.edu/faculty_scholarship/1815.

⁷ Adams v. Burke 84 U.S. (17 Wall.) 453 [1873].

⁸ A common type of post-sale restriction is prohibition to reuse, which has been seen in cases, such as, *Peak Holding, Ranks and Vasilevičs, Viking Gas, Hoechst, Zino Davidoff, Coty Prestige Lancaster Group GmbH, Greenstar-Kanzi Europe* or *Copad*.

⁹ Similar situation in Soda Club case. Hans Henrik Lidgard, *National Developments in the Intersection of IPR and Competition Law: From Maglite to Pirate Bay* (Hart Publishing 2011) p. 147.

¹⁰ The licensor may charge different royalty rates to different customers due to the restriction of copying or reusing the patented product or software. Christina Bohannan and Herbert Hovenkamp, *Creation without Restraint: Promoting Liberty and Rivalry in Innovation* (Oxford University Press 2012) p 21-22.

the use of the patented product are unenforceable and invalid.¹¹ In this setting, the distinction between a license and a sale of IPR must be made. When the product protected by a patent or trademark is sold, the exhaustion or "first-sale" doctrine applies. However, the trademark holder may also limit the product's use if the product protected by a trademark is altered. This alteration doctrine is not applicable to patents. Nevertheless, the patent holder may have justified grounds to object wider placement of the patented product on the market.

On the other hand, it can be questioned whether a licensing agreement may be exempted from the exhaustion doctrine in both patent and trademark situations. Regarding the prohibition to reuse, licensing could be beneficial when it extends the scope of the patent or trademark holder's right to limit the use. If the exhaustion or first-sale doctrine applies, the IP holder's rights are exhausted meaning that it is not generally possible to limit the use after the first sale. Additionally, the benefits of trademark vis-à-vis patent licensing should be considered due to the fact that the protection of trademarks includes alterations.

From a competition law perspective, IPRs involve always some level of market power, which could be misused.¹² Particularly, post-sale restrictions indicate the tension between the protection of intellectual property rights under IP law, the parties' freedom to contract and competition law. When the owner of an IP right is restricting the use of the IP after the sale of the product under the licensing agreement, such conduct may cause conflicts in the application of IP and competition laws. It can be said that in principle, post-sale restrictions are permitted if they do not infringe other areas of

¹¹ Michael A. Epstein and Frank L. Politano, *Drafting License Agreements* (4th edition Wolters Kluwer 2017) p. 4-10.

¹² On the misuse of IP, see Thorsten Käseberg, *Intellectual Property, Antitrust and Cumulative Innovation in the EU and the US* (Bloomsbury Publishing 2012) p. 24. Commission Decision of 15 June 2005 relating to a proceeding under Article 82 of the EC Treaty and Article 54 of the EEA Agreement (Case COMP/A. 37.507/F3 - AstraZeneca) [2005] OJ L 332. Kevin Coates, Lars Kjøbye and Luc Peeperkorn, "Specific Practices - Intellectual Property" in Jonathan Faull and Ali Nikpay, *Faull & Nikpay: The EU Law of Competition* (3rd Edition Oxford Competition Law 2014) p.1509.

laws, such as competition law. However, the issue is that although there is no infringement, the legally protected interests might still be conflicting. For instance, the prohibition to reuse could have harmful effects on competition in the aftermarket when two products are tied together.

The legal assessment of post-sale restrictions can be considered being at the intersection of IP, contract and competition law. The validity of post-sale restrictions in licensing agreements stems from contract law principles, but nevertheless, a contractual clause against the law is not valid or enforceable. IP law is relevant for this validity assessment and particularly in relation to the exhaustion doctrine. Under Article 102 of the Treaty on the Functioning of the European Union (TFEU), a potential abuse of a dominant position and in particular tying considerations should be also considered. Post-sale restrictions may inevitably restrict competition on the aftermarket when reuse is restricted. In this relation, the theory of harm is an inevitable consideration for the assessment of competitive effects.

The legal approach on post-sale restrictions varies between the European Union (EU) and the United States (U.S.), although the two approaches are moving towards convergence. The European attitude towards post-sale restrictions can be considered restrictive in the patent context due to the internal market objective¹³. After *Lexmark*, the U.S. Supreme Court has explicitly considered patent rights being exhausted regardless of post-sale restrictions. In this context, however, it must be noted that the factual situation varies in every case. Generalizations on post-sale restrictions could be made, but the factual background remains critical. The outcome can be

¹³ For instance, Opinion of AG Mengozzi in Case C- 428/08 Monsanto Technology LLC v Cefetra BV and Others [2010] ECR I-06765, footnote 4. Case 187/80 *Merck & Co. Inc. v Stephar BV and Petrus Stephanus Exler (Merck & Co. Inc.)* [1981] ECR 02063, para 9. In the trademark context, Case C-291/16 Schweppes SA v Red Paralela SL and Red Paralela BCN SL (*Schweppes SA*) [2018] OJ C 72, para 15, 30. Joined Cases C- 427/93, C- 429/93 and C- 436/93 *Bristol-Myers Squibb v Paranova A/S (C-427/93) and C. H. Boehringer Sohn, Boehringer Ingelheim KG and Boehringer Ingelheim A/S v Paranova A/S (C-429/93) and Bayer Aktiengesellschaft and Bayer Danmark A/S v Paranova A/S (C-436/93) (Bristol-Myers Squibb and Others)[1996] ECR I-03457, para 25-27. Case C- 352/95 <i>Phytheron International SA v Jean Bourdon SA (Phytheron International SA)* [1997] ECR I-01729 para 17-18.

different depending on the form of legal relationship (a sale or a license), the parties (who sells/licenses to whom and on which level of contractual relation) or the rights attached to a subject of IP (a subject protected by patent, trademark or both).

1.2 Research questions

The thesis examines the key legal issues associated with post-sale restrictions in the patent, trademark and competition law context. The main research question is whether post-sale restrictions in patent and trademark licensing agreements are valid, enforceable and compliant with competition law. Particularly, the prohibition to reuse is examined from a patent, trademark and competition law perspective. In other words, the question is to what extent post-sale restrictions fall within the scope of patent or trademark protection and thus the exhaustion or first-sale doctrine does not apply. Yet, competition law concerns may arise due to practices such as tying and price discrimination. Also, any abuse of procedure and considerations of the misuse of IP may raise competition law issues.

From a strategic licensing perspective, an ensuing question is whether the application of substantive law could be circumvented by the licensing agreement. For instance, whether the application of patent or trademark law could be extended or the liability under competition law could be avoided. Importantly, however, misuse of IP may be also examined under Article 102 TFEU. Thus, it must be considered whether licensing is necessary or even desirable in view of its purported aims and effects.

From a policy perspective, the issue is which legal assessment should prevail. If the restrictions are in compliance with IP law and valid clauses in contractual sense, it is questioned whether competition law should intervene. Additionally, if infringement action had been successfully sought

address under Article 101 of the TFEU but these Article 101 TFEU considerations are outside the scope of this essay.

¹⁴ Other competition law concerns such as market allocation are possible to capture and

by an IP holder against a company active in the aftermarket, it is further questioned whether it is even possible for competition law to intervene. Even pending IP infringement proceedings, running in parallel, could influence the competition law assessment. Depending on the outcome of such IP proceedings, the competition law assessment may be different. From the viewpoint of legal certainty, this may be problematic. Ultimately, the question is: what is the ideal balance between such conflicting interests?

Currently, there is no comprehensive study on post-sale restrictions in licensing agreements in the EU. The concept of post-sale restriction has been established in the U.S. in *Adam v. Burke*.¹⁵ Generally, both the EU and the U.S. cases relate to either direct sale or sale through a distributor. However, this thesis merely examines the licensing option, which is however debated¹⁶. Several scholars¹⁷ have recognized the problematic relationship between IP and competition law. Although the post-sale restriction examples in the thesis are related to physical products, the trend

¹⁵ Adams v. Burke (n 7).

¹⁶ For instance, certain line of the CJEU's case-law suggests that licensing may not prevent the application of the exhaustion doctrine or competition law rules. Case C-140/10 Greenstar-Kanzi Europe NV v Jean Hustin and Jo Goossens (Greenstar-Kanzi Europe NV) [2011] ECR I-10075, para 41-43. Case C-143/00 Boehringer Ingelheim KG, Boehringer Ingelheim Pharma KG, Glaxo Group Ltd, The Wellcome Foundation Ltd, SmithKline Beecham plc, Beecham Group plc, SmithKline & French Laboratories Ltd and Eli Lilly and Co. v Swingward Ltd and Dowelhurst Ltd. (Boehringer Ingelheim KG) [2002] ECR I-03759, para 35. Case C-46/10 Viking Gas A/S. v Kosan Gas A/S (Viking Gas A/S) [2011] ECR I-06161, para 42.

¹⁷ For instance, legal scholars, such as, Herbert Hovenkamp, Hans Henrik Lidgard, Ioannis Lianos, have considered the relationship in their writings. See, for instance, Hans Henrik Lidgard, "Nordic perspectives on competition in innovation markets" (Maria Magle Publishing 2013). Hans Henrik Lidgard, National Developments in the Intersection of IPR and Competition Law: From Maglite to Pirate Bay (Hart Publishing 2011). Hans Henrik Lidgard and Jeffery Atik, "The Intersection of IPR and Competition Law - Studies of recent developments in European and U.S. law" (Konkurrensverket 2007). Herbert Hovenkamp, Mark D. Janis, Mark A. Lemley, Christopher R. Leslie, Michael A. Carrier, IP and Antitrust: An Analysis of Antitrust Principles Applied to Intellectual Property Law (3rd edition, Wolters Kluwer 2017). Herbert J. Hovenkamp, "The Intellectual Property-Antitrust Interface" (Faculty Scholarship 1789, 2008). Ioannis Lianos, "Competition Law and Intellectual Property Rights: Promoting Innovation" in Ioannis Lianos and Valentine Korah, Competition Law: Analysis, Cases and Materials (Hart Publishing 2017). Ioannis Lianos and Rochelle C. Dreyfuss, "New Challenges in the Intersection of Intellectual Property Rights with Competition Law - A View from Europe and the United States" (CLES 4/2013, UCL Centre for Law, Economics & Society 2013). Ioannis Lianos, "Competition Law and Intellectual Property Rights: Is the Property Rights' Approach Right?" (8 Cambridge Yearbook of European Legal Studies 153 2006).

of using post-sale restrictions is also increasing in relation to software and other intangible technologies.¹⁸

The hypothesis underlying the thesis is that post-sale restrictions used in licensing agreements which are within the scope of specific IP laws are valid but not necessarily in compliance with competition law. Being within the scope of IP law means that the IPR is not exhausted. The "narrower" protection of patents shifts the focus on trademarks. When choosing licensing strategy with the objective of creating valid post-sale restrictions, trademark licensing is a more beneficial option compared to, or combined with, patent licensing. As a result, depending on the aim and the subject of licensing, a hybrid model can also be utilized. Post-sale restrictions are in compliance with competition law when they are within the scope of IP and their exercise does not interfere with competition law. However, there are also situations, which are within the scope of IP but may nonetheless cause competitive concerns. With "proper" use of post-sale restrictions and procedure, competition law may be ultimately and exceptionally subordinate if IP law grants such protection. However, competition law problems such as misuse of IPR and abuse of procedure will come into question. Arguably, tradeoffs between competition law and intellectual property law are inevitable in terms of expediency.

1.3 Methodology and scope of the research

The research is conducted by using legal methodology of doctrinal analysis, which refers to the interpretation and systematization of valid law.¹⁹ Several

¹⁸ For instance, single-use restrictions are common in software licensing referring to a license subject to right to use software for the terms of agreement. Such restrictions are commonly included in the Single User Licencing Agreements (SULA) and the End User License Agreements (EULA). Michael Rustad (n 2) p. 206-207, 210.

 ¹⁹ Enrico Pattaro, "A Treatise of Legal Philosophy and General Jurisprudence" in Volume
 4: Scienta Juris, Legal Doctrine as Knowledge of Law and as a Source of Law (Springer 2005) p. 1. Jaakko Husa, Anu Mutanen, Teuvo Pohjolainen, Kirjoitetaan juridiikkaa: ohjeita oikeustieteellisten kirjallisten töiden laatijoille (Talentum 2nd edition 2008) p. 20.

areas of laws are considered and systematized in the research - patent, trademark and competition law. Also, some contract law considerations are taken into account. The EU legislation is the main subject of examination. However, due to the lack of uniform national legislation, Finnish patent law is examined from a product patent²⁰ perspective. Although the EU does not have a harmonized patent system operating at national level (excluding the European patent and uniform patent), the Court of Justice of the European Union (CJEU) has still interpreted patent law doctrines in other contexts, such as in the context of internal market or competition law cases. The EU Directive (EU) 2015/2436 of the European Parliament and of the Council of 16 December 2015 to approximate the laws of the Member States relating to trade marks²¹ has harmonized the field of trademarks within the EU. For the competition law assessment, the examination is limited to Article 102 TFEU and particularly to tying practices. This limitation is chosen due to the fact that post-sale restrictions are directed to the time after the sale and thus, having effect on the aftermarket. The textual interpretation of legislation is supported by teleological interpretation whereby preparatory acts and other related documents are examined. Jurisprudence and legal scholarship perspectives are also considered through writings of legal scholars included in books and articles.

In addition to legislative instruments, case-law of the CJEU is analyzed. Due to the lack of "pure" post-sale restriction licensing case-law, analogy is used by reference to related cases, such as ones including purchasing agreements. Besides EU case-law, national court cases and in particular decisions of National Competition Authorities (NCAs) are examined. Specifically, cases from Finland and Sweden are analyzed but cases from other European countries, such as France or Germany, are also considered

Ari Hirvonen, "Mitkä metodit? Opas oikeustieteen metodologiaan" (Yleisen oikeustieteen julkaisuja 17 Helsinki 2011) p. 21–22.

²⁰ Process patents are outside the scope of this thesis.

²¹ Directive (EU) 2015/2436 of the European Parliament and of the Council of 16 December 2015 to approximate the laws of the Member States relating to trade marks [2015] OJ L 336.

as examples. Several cases on different aspects of this thesis are examined whereas fewer cases are investigated by means of a more detailed analysis.

Together with legal doctrinal analysis, a comparative approach is employed. In addition to the European considerations, the United States (U.S.) is taken as a comparison. The U.S. approach on post-sale restrictions can be considered more sophisticated in light of the case-law analysis. In a recent case, *Lexmark*, the U.S. Supreme Court has explicitly taken post-sale restrictions into account in the patent context, which indicates the shift from patent licensing to trademark licensing. Although the competition law assessment varies in the EU *vis-à-vis* the U.S., it is interesting to consider also the U.S. perspective.

For the purpose of the competition law assessment, "law and economics" perspectives are also essential to consider. Law and economics refer to a behavioral theory aiming to predict how addressees of legislation respond to it.²² From predictions, efficiency considerations can be drawn.²³ For instance, it may be inquired whether IP or competition law is effective in terms of deterrence or cost-efficiency objectives. Thus, law and economics provide a rational approach of scrutinizing legislation. Competition law is heavily based on economic considerations, such as economies of scale²⁴ and scope²⁵, when effects on competition are being assessed.²⁶ For the purposes of this thesis, a theory of harm needs to be established to analyze the effect of post-sale restrictions on the market and company behavior by reference to competition law rules. In particular, the theory of harm is beneficial in analyzing Article 102 TFEU abuse of dominance cases, which are usually

²² Robert Cooter and Thomas Ulen, *Law and Economics* (Addison-Wesley 2016) p. 3.

²³ *ibid.* p. 4.

²⁴ Economies of scale mean that the average cost of producing a commodity decreases the more is produced or "where efficiency in production is achieved as output is increased." Alison Jones and Brenda Sufrin, EU Competition Law: Text, Cases and Materials (Oxford University Press 6th edition 2016) p. 6.

²⁵ Economies of scope mean that "it is cheaper to produce two different products jointly than each separately". ibid. p. 6.

²⁶ *ibid*. p. 45-46.

scrutinized under an effect-based approach.²⁷ Efficiency implications are also considered when licensing strategies and policy considerations are discussed.

Post-sale restrictions are discussed as a general matter in the thesis. However, single-use and prohibition to use another supplier's product are considered as examples of such restrictions. The common characteristic of both types of post-sale restrictions is the "prohibition to reuse" element. Case-law containing such prohibitions is analyzed in the context of patent, trademark and competition law. Considerations regarding licensing are inferred from this analysis. Additionally, an effect on the aftermarket due to post-sale restrictions for competition law purposes is examined by considering the element of prohibition to reuse.

1.4 Structure of the research

The research is structured as follows. The first section examines the validity of post-sale restrictions in patent and trademark licensing agreements from an IP law perspective within the EU. The exhaustion doctrine is the main focus of the analysis where its relationship with a *resale* and its limitations are assessed. Licensing is considered as a type of limitation to the exhaustion doctrine. In this relation, the *Huawei* and *Viking Gas* cases are examined in greater depth. In the case of non-application of the exhaustion doctrine, the relevance of the scope of IP is emphasized. The discussion on validity of post-sale restrictions in patent and trademark licensing agreements is concluded by considering the shift from patent licensing to trademark licensing.

In the second section, compliance with EU competition law is assessed from an abuse of dominance and in particular a tying perspective. A theory of harm is established, which is analyzed and appraised by reference to the

²⁷ Jones and Sufrin (n 24) p. 45-46.

competition law problems related to the practice of tying. Generally, the relationship between IPRs and competition law is examined in the licensing context. The *Hoffmann-La Roche* and *SodaStream* cases are considered in relation to this matter. *SodaStream* is used as a national example on the problematic of combining the application of IP law and competition law in relation to post-sale restrictions and licensing. Ultimately, questions on validity are considered in the competition law context where the presumption of compliance is assessed. Additionally, questions on the misuse of IP are closely related to this discussion.

The third section on the comparative perspective regarding post-sale restrictions assesses matters of patent and trademark exhaustion and abusive tying from the U.S. perspective. In this relation, the *Lexmark* and *Beltronics* cases are analyzed in greater depth. The fourth section discusses the research findings at more practical level by analyzing different licensing strategies and drawing policy considerations. The fifth section concludes.

2 The validity of post-sale restrictions in patent and trademark licensing

This chapter is divided in two parts. First, the exhaustion doctrine is considered in relation to a *sale* of a product, which limits the scope of patent and trademark protection. The statutory limitations of the exhaustion doctrine - justified grounds under the Finnish patent law and alterations limitation under the EU trademark law – are examined. From a post-sale restriction and a prohibition to reuse perspective, the relationship between a resale and the exhaustion doctrine are essential to consider. Second, the legal analysis examines *licensing* activity – whether the licensing limits the exhaustion doctrine. Additionally, if any limitations are applicable and the exhaustion doctrine is not, the relevance of the scope of patent or trademark protection is examined under the so-called "*Windsurfing doctrine*" (a field-of-use restriction is valid if within the scope of patent grant). ²⁸ The discussion aims to assess the validity of post-sale restrictions in cases of patent and trademark licensing.

2.1 The exhaustion doctrine as a starting point for the validity analysis

When assessing generally the validity of post-sale restrictions in patent or trademark licensing, the exhaustion doctrine is a fundamental parameter to be considered. The exhaustion doctrine refers to the first sale of the product protected by a patent or trademark, after which the IP holder's restrictions on the use of the patent or trademark protected product are unenforceable

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²⁸ Case 193/83 Windsurfing International Inc. v Commission of the European Communities (Windsurfing International Inc.) [1986] ECR 00611.

and invalid.²⁹ The requirement for the exhaustion is that the product is manufactured and sold directly to purchasers or through distributors by the patent owner or with his consent.³⁰ The patent or trademark itself remains valid but an IP holder no longer has an exclusive right to limit the use of that particular product. The exhaustion doctrine also limits the IP holder's right to bring an infringement action.³¹

In the EU, the exhaustion doctrine has been recognized by the CJEU in case law concerning harmonized procedures regarding IP enforcement in relation to the level of IP protection or internal market freedoms.³² The CJEU has recognized the exhaustion doctrine as a consequence of Article 34 and 35 TFEU prohibitions on quantitative restrictions and measures having equivalent effect. Once a product is placed on the market, restrictions are not possible to be employed due to their restrictive effect on the free movement of goods.³³ Moreover, the CJEU has confirmed that it is the IP holder's exclusive right to first place the product into market circulation.³⁴ After the exhaustion, further restrictions on use (i.e. *post-sale restrictions*) within the internal market in the licensing agreements are not possible and in any event, are subject to scrutiny under the EU or national competition law rules.³⁵ However, the CJEU has recognized that imports from outside

²⁹ Michael A. Epstein and Frank L. Politano (n 11) p. 4-10. On trademark exhaustion, Directive 2015/2436 (n 21) Art. 15.1. Regulation (EU) 2017/1001 of the European Parliament and of the Council of 14 June 2017 on the European Union trade mark [2017] OJ L 154/1 Art. 15.1. The meaning of the exclusive rights specific subject-matter in Case C-16/74 *Centrafarm v. Winthrop* [1974] ECR 01183.

³⁰ Tu Thanh Nguyen, *Competition Law, Technology Transfer and the TRIPS Agreement: Implications for Developing Countries* (Edward Elgar Publishing 2010) p. 150. Kevin Coates, Lars Kjøbye and Luc Peeperkorn (n 12) p. 1450. Joined Cases 51/75, 86/75 and 96/75 *EMI Records Limited v CBS United Kingdom Limited (EMI Records Limited)* [1976] ECR 00811, para 26-27.

³¹ Patents Act (550/1967) Section 3, 38. Directive 2015/2436 (n 21) Art. 10. Regulation 2017/1001 (n 29) Art. 9.

³² Opinion of AG Mengozzi in Case C- 428/08 Monsanto Technology LLC (n 13) footnote 4. Case 187/80 *Merck & Co. Inc.* (n 13) para 9. In the trademark context, Case C-291/16 *Schweppes SA* (n 13) para 15, 30. Joined Cases C- 427/93, C- 429/93 and C- 436/93 *Bristol-Myers Squibb and Others* (n 13) para 25-27. Case C- 352/95 *Phytheron International SA* (n 13) para 17-18.

³³ ibid

³⁴ *ibid*.

³⁵ Kevin Coates, Lars Kjøbye and Luc Peeperkorn (n 12) p. 1454. Nguyen (reference 30) p. 150.

the EU can be limited.³⁶ Additionally, the exhaustion doctrine may not be invoked if the IP holder has withdrawn its consent.³⁷

2.1.1 The relationship between the exhaustion doctrine and a resale of a patent or trademark protected product in the CJEU's case-law

When post-sale restrictions as a prohibition of reuse are aimed to restrict the resale of an IP protected product, it is essential to consider the relationship between the exhaustion doctrine and a resale of a patent or trademark protected product. The CJEU has taken a stance on this relation in several cases, particularly in a trademark or copyright context.

In Peak Holding, a condition in a contract of sale concluded between the trademark holder and an operator³⁸ of a prohibition on resale in the EU does not mean that there is no putting on the market in the meaning of the exhaustion doctrine. Such condition does not preclude the application of the exhaustion doctrine in the event of resale within the EU in breach of such prohibition.³⁹ In Ranks and Vasilevičs, the first acquirer of a copy of software having an *unlimited* user license was entitled to resell the copy and his license (the rights of the licensor were exhausted).⁴⁰ However, the

Mehta, Bharat Himatlal Mehta and Necessity Supplies Ltd and Beecham Group plc v Europharm of Worthing Ltd [1996] ECR I-06285, para 54. Joined Cases 51/75, 86/75 and 96/75 EMI Records Limited (n 30) para 6-11.

³⁶ Joined cases C-267/95 and C-268/95 Merck & Co. Inc., Merck Sharp & Dohme Ltd and Merck Sharp & Dohme International Services BV v Primecrown Ltd, Ketan Himatlal

³⁷ In trademark context, C-661/11 Martin Y Paz Diffusion SA v David Depuydt, Fabriek van Maroquinerie Gauquie NV [2013] OJ C 344, para 57. Case C- 173/98 Sebago Inc. and Ancienne Maison Dubois & Fils SA v G-B Unic SA [1999] ECR I- 4103, para 19-20. C-127/09 Coty Prestige Lancaster Group GmbH v Simex Trading AG (Coty Prestige Lancaster Group GmbH) [2010] ECR I-04965, para 31.

³⁸ Established in the EU.

³⁹ Case C-16/03 Peak Holding AB v. Axolin-Elinor AB (Peak Holding AB) [2004] ECR I-11313, para 56.

⁴⁰ Case C-166/15 Aleksandrs Ranks and Jurijs Vasiļevičs v Finanšu un ekonomisko noziegumu izmeklēšanas prokoratūra and Microsoft Corp. [2016] OJ C 462, para 57.

exhaustion doctrine does not apply to the backup copy in terms of distribution.⁴¹

The aforementioned cases emphasize the broad scope of the exhaustion doctrine. It can be inferred that a purchase agreement with a post-sale restriction, such as a prohibition to resell, is not effective. Additionally, even with an unlimited license, the first acquirer was able to resell the copy. The exhaustion doctrine was applicable in all these cases. However, in case of a limited license, the situation might have been different. In addition to the possibility of licensing, both patent and trademark legislation provide certain limitations to the exhaustion doctrine.

2.2 Limitations to the exhaustion doctrine

Limitations to the exhaustion doctrine vary under patent and trademark legislation. First, the grounds for justifications under patent law are examined, and thereafter the limitations under trademark law are considered. These limitations are provided by written law. Subsequently, licensing is also considered as a limitation to the exhaustion doctrine, particularly by examining the difference between a sale and a license.

2.2.1 Grounds for justifications under patent law

Under patent law, there are generally no grounds for justifications for limitations to the exhaustion doctrine⁴². However, when the Agreement on a Unified Patent Court and its implementation into Member States legislation

⁴¹ If the original material medium of software delivered to the first acquirer has been damaged, destroyed or lost, the first acquirer may not provide his backup copy of that program without the copyright holder's permission. *Ibid*.

⁴² Section 3(3) subparagph 2 of the Finnish Patents Act currently in force states as follows: "The exclusive right shall not apply to use of a patented product that has been put on the market within the European Economic Area by the proprietor of the patent or with his consent".

will enter into force⁴³, legislation will provide an explicit provision on the grounds for justification. Amendment of these justifications under Finnish patent law are considered in the following section.

2.2.1.1 Finnish patent law: Justified grounds to object wider placement of the patented product on the market

Under Finnish patent law, if a patent holder has "justified grounds to object wider placement of the patented product on the market", the exhaustion doctrine does not apply.⁴⁴ These justified grounds refer to a situation, in which the patent holder could have grounds for objection according to the case-law of the CJEU. In the preparatory works of the Finnish Patents Act, it has been stated that the aim is not, however, to broaden the patent protection.⁴⁵ Such grounds for objection can be the situation where the product has been placed on the market due to a compulsory license.⁴⁶ As an example of a compulsory license⁴⁷, the CJEU's case *Hoechst* of 1985 was mentioned.

In *Hoechst*, the CJEU noted that it follows from the inventor's exclusive right of first placing the product on the market that it is necessary "to allow the patent proprietor to prevent the importation and marketing of products manufactured under a compulsory license in order to protect the substance

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⁴³ The Unified Patent Court and Unitary Patent System is expected to enter into force approximately in 2018 or 2019. Unified Patent Court, Ratification Update – 27 April 2018 (Unified Patent Court Website 2018). Unified Patent Court, Progress on the Unified Patent Court Project – 21 September 2017 (Unified Patent Court Website 2017). Unified Patent Court, Summing up and Looking Forward to 2018 (Unified Patent Court Website 2017).

⁴⁴ Patents Act (n 31) Section 3(2), subpara 2.

⁴⁵ HE 45/2015 vp, Government proposal for the Parliament on the ratification of the Agreement on a Unified Patent Court and on the acts implementing and the application of the Agreement and acts amending the Patents Act and other related acts, p. 93-94.

⁴⁶ In order to comply the Article 29 of Agreement on a Unified Patent Court. Case C-19/84 *Pharmon BV v. Hoechst AG (Hoechst)* [1985] ECR 2281. HE 45/2015 (n 43) p. 93-94. Agreement on a Unified Patent Court [2013] OJ C 175/01, Art. 29.

⁴⁷ SEP being licensed in FRAND terms may be considered as nowadays a case of mandatory licensing. In case of a compulsory license, Member States may grant compulsory licensing, in order to patent the abuses of patent rights in certain circumstances. Paris Convention for the Protection of Industrial Property [1883] Article 5A. The World Trade Organization Agreement on Trade Related Aspects of Intellectual Property Rights (TRIPS) [1995] Article 31. Case C-19/84 *Hoechst* (n 46).

of his exclusive rights under his patent." When the substance of the patent holder's exclusivity is the right to first place the product on the market, it follows that this right would be devoid of purpose if the compulsory license would exhaust the patent holder's rights. The CJEU stated that the exhaustion doctrine, presuming that the product has been marketed freely and voluntary by the patent holder or by a third party with the patent holder's consent, does not apply to a compulsory license lacking these elements. 49

Hoechst can be considered as an example of grounds for justifying the limitation of the exhaustion doctrine giving guidance on other possible grounds. In order for the exhaustion doctrine apply, the marketing of a product protected by a patent has to be free and voluntary and there has to be the patent holder's consent for these actions. Additionally, the provision of Finnish law arguably gives rather broad discretion to the EU Courts to indirectly affect the interpretation of national patent law as these grounds have to be in compliance with the CJEU's case-law.

The CJEU's case of 2015, *Huawei v. ZTE*, on a standard essential patent (SEP) and its mandatory licensing under Fair, Reasonable and Non-Discriminatory (FRAND) terms or price as in Europe reflects a similar thematic as the compulsory license of 1985 in *Hoechst*.⁵⁰ SEP refers to a situation, in which technology covered by a patent has been incorporated into a standard as its essential part.⁵¹ All uses of the standard would infringe the patent covering the standard, therefore the compulsory license on FRAND terms is required.⁵² The case will be discussed in the following section.

⁴⁸ Case C-19/84 *Hoechst* (n 46) para 26.

 $^{^{49}}$ ibid. para 20.

⁵⁰ In the U.S., the wording "RAND terms" is preferred meaning Reasonable And Non-Discriminatory terms. Ioannis Lianos and Rochelle C. Dreyfuss (n 17) p. 94.

⁵¹ *ibid*. p. 94.

⁵² The European Commission has considered SEP and FRANDs from a competition law perspective under 101 TFEU. It can be said that "if participation to the standard-setting process is open and equal access is ensured, allowing all competitors and/or stakeholders in the market affected by the standard to take part in choosing and elaborating a standard,

2.2.1.2 The EU case on Huawei v. ZTE: Standard essential patents and (F)RAND terms as a justification

The judgment of the CJEU in Huawei v. ZTE case considers the SEP holder's right to bring an infringement claim regardless of the fact that the SEP holder has given an irrevocable undertaking to the standardization body that it will grant licenses on FRAND terms.⁵³ Huawei Technologies (referred as Huawei) is the holder of the European Patent EP 2 090 050 B 1 ("patent"), which covers the "Method and apparatus of establishing a synchronization signal in a communication system". 54 The patent was notified to the European Telecommunications Standards Institute ("ETSI") by Huawei as an essential patent for the "Long Term Evolution" standard. 55 Ultimately, Huawei undertook to grant licenses to third parties on FRAND terms.⁵⁶ ZTE Corp. (referred as ZTE), in addition to Huawei, marketed products, which are equipped with software linked to the Long Term Evolution standard. Parties entered into discussions regarding licensing agreement on FRAND terms in relation to those products. However, the agreement was not finalized.⁵⁷ ZTE continued using Huawei's patent without paying any royalty to Huawei.⁵⁸ As a result, Huawei brought an action for infringement against ZTE before the German court (Landgericht Düsseldorf), "seeking an injunction prohibiting the infringement, the rendering of accounts, the recall of products and an award of damages".⁵⁹ The German court requested for a preliminary ruling regarding Article 102 TFEU and abuse of dominance. The matters related to abuse of procedure are discussed in a later section on competition law. The judgment is also

the risks of a likely restrictive effect on competition will be low". Ioannis Lianos and Rochelle C. Dreyfuss (n 17) p. 93. Communication from the Commission – Guidelines on the applicability of Article 101 TFEU on horizontal co-operation agreements [2011] C 11/1, para 285, 295. Also, on standardization, Damien Geradin, "European Union Competition Law, Intellectual Property law and Standardization" in Jorge L. Contreras, Cambridge Handbook on Technical Standardization Law (Cambridge University Press 2017).

⁵³ Case C-170/13 Huawei Technologies Co. Ltd v ZTE Corp., ZTE Deutschland GmbH (Huawei Technologies Co. Ltd) [2015] OJ C 302, para 51.

⁵⁴ *ibid.* para 21.

⁵⁵ *ibid*. para 22.

⁵⁶ idem.

⁵⁷ *ibid*. para 24–25.

⁵⁸ *ibid.* para 26.

⁵⁹ *ibid.* para 27.

relevant from the point of view of the exhaustion doctrine and its limitations.

The CJEU considered that a SEP and "normal" patents are different. The use of a SEP is "indispensable to all competitors which envisage manufacturing products that comply with the standard to which it is linked." Patents not essential normally allow third parties to manufacture competing products without that particular patent and still being able to innovate without conceding the product's essential functions. 61

There is also a need to enforce IPRs aiming to ensure "a high level of protection for intellectual-property rights in the internal market, and the right to effective judicial protection guaranteed by Article 47 of the Charter", such as access to justice. 62 This means that the patent holder may not be deprived of the right to effective enforcement of patent rights. The user of patent rights, other than the patent holder itself, "is required to obtain a license prior to any use."63 It is, however, possible to impose obligations on the SEP licensor with regard to infringement claims.⁶⁴ The CJEU concluded that the SEP holder may bring an action for infringement, when it has, prior the action, alerted the alleged infringer of the infringement, specified the way of infringement and offered licensing the SEP in writing and on FRAND terms and specified the royalty. 65 Thereafter. if the infringement continues, the alleged infringer has acted negligently in response to the offer. In evaluating denial of the offer, commercial practices in the field and good faith objectively defined must be examined. The alleged infringer must also respond to the offer without delay.⁶⁶

The outcome of the case was that the SEP holder could bring an infringement claim although it had previously agreed licensing on FRAND

⁶⁰ Case C-170/13 Huawei Technologies Co. Ltd (n 53) para 49.

⁶¹ *ibid.* para. 50.

⁶² *ibid.* para 57. Case C-199/11 *Europese Gemeenschap v Otis NV and Others* [2012] OJ C 9, para 48.

⁶³ Case C-170/13 Huawei Technologies Co. Ltd (n 53) para 58.

⁶⁴ *ibid.* para 59.

⁶⁵ *ibid.* para 71.

⁶⁶ *ibid*. para 71.

terms and products were placed on the market including the standard with the SEP. It follows that using technology covered by a patent incorporated in a standard and placing the product including such standard on the market does not exhaust the SEP. The CJEU noted that the SEP holder could bring a claim for a patent infringement against a party, which has not agreed on licensing with FRAND terms. Ultimately, this means that although a product covered by a patent has been place on the market (in which case rights are generally exhausted), a SEP holder retains some rights to its patent protected technology. Thus, a SEP as a type of compulsory licensing could be considered as grounds for justifying limitation of the exhaustion doctrine.

2.2.2 EU trademark law: Legitimate reasons to oppose further commercialization of goods and alterations

Under EU trademark law, a trademark holder may have legitimate reasons to oppose further commercialization of the goods.⁶⁷ Especially, where "the condition of the goods is changed or impaired after they have been put on the market"68. The CJEU has also considered this limitation to the exhaustion doctrine in the context of alterations. However, it has recognized that alterations are only one example of what may constitute legitimate reasons.69

In Viking Gas, the CJEU stated that legitimate reasons exist particularly when a third party uses a sign "identical with, or similar to a trade mark"

⁶⁷ Directive 2015/2436 (n 21) Art. 15.2. Regulation 2017/1001 (n 29) Art. 15.2. ⁶⁸ Directive 2015/2436 (n 21) Art. 15.2. Regulation 2017/1001 (n 29) Art. 15.2.

⁶⁹ "The use of the adverb 'especially' in Article 7(2) of the Directive indicates that alteration or impairment of the condition of goods bearing a mark is given only as an example of what may constitute legitimate reasons" Case C-46/10 Viking Gas A/S (n 16) para 36. Case C-59/08 Copad SA. v Christian Dior couture SA and Others (Copad) [2009] ECR I-3421, para 54.

and seriously damages the reputation of that mark. 70 Justifications may be claimed when the use gives "the impression that there is a commercial connection between the trade mark proprietor and that third party" and particularly that the third party "is affiliated to the proprietor's distribution network or that there is a special relationship between those two persons".71 The CJEU concluded that the exclusive licensee may not prevent that the bottles after the sale are reused and refilled by a third party unless the holder is able to justify the restriction by some legitimate reasons.⁷²

In Boehringer Ingelheim KG and Others, the CJEU stated that a trademark holder may rely on its rights to prevent parallel imports of repacked pharmaceutical products.⁷³ However, if "the exercise of those rights contributes to artificial partitioning of the markets⁷⁴ between Member States", parallel imports cannot be prevented by the trademark holder.⁷⁵ Additionally, repacking can be considered as an objective necessity in certain situations, in which a prior notification by the trademark holder is required. ⁷⁶ The CJEU stated that, in the context of generic pharmaceuticals, competition could be reduced extensively if alterations are not possible.⁷⁷

The exhaustion doctrine may be limited by legitimate reasons and particularly, the alteration justification. However, in certain markets, an alteration activity can be considered as an objective necessity, in which the

⁷⁰ Case C-46/10 Viking Gas A/S (n 16) para 37. Case C-558/08 Portakabin Ltd and Portakabin BV v Primakabin BV (Portakabin) [2010] ECR I-0000, paras 79-80.

⁷¹ Case C-46/10 Viking Gas A/S (n 16) para 37. Case C-558/08 Portakabin (n 70) paras 79-

⁷² Case C-46/10 *Viking Gas A/S* (n 16) para 42.

⁷³ Case C-143/00 *Boehringer Ingelheim KG* (n 16) para 35.

⁷⁴ Established in Case 102/77 Hoffmann-La Roche & Co. AG v Centrafarm Vertriebsgesellschaft Pharmazeutischer Erzeugnisse mbH (Hoffmann-La Roche) [1978] ECR 1139 and in Joined Cases C-427/93, C-429/93 and C-436/93 Bristol-Myers Squibb and Others [1996] ECR I-3457.

⁷⁵ Case C-143/00 Boehringer Ingelheim KG (n 16) para 35.

⁷⁶ For instance, in the context of generic pharmaceutical products. *ibid.* para 54, 68. Case C-443/99 Merck, Sharp & Dohme GmbH v. Paranova Pharmazeutika Handels GmbH. [2002] ECR I-03703, para. 33. Case C-348/04 Boehringer Ingelheim KG and Others v Swingward Ltd and Dowelhurst Ltd. (Boehringer Ingelheim KG and Others) [2007] ECR I-03391. Case C-379/97 Pharmacia &c Upjohn SA, formerly Upjohn SA v. Paranova A/S [1999] ECR I-06927.

⁷⁷ *ibid*.

pleading of legitimate reasons might be difficult due to the high barriers to entry. Additionally, markets may not be segregated artificially. Thus, justifications on limitations of the exhaustions doctrine are balanced with considerations of effective competition.

2.2.3 Licensing as a limitation to the exhaustion doctrine?

A license refers to a contract where the licensor grants the licensee the right to use its intellectual property right, e.g., patent or copyright. Based on the license agreement, the licensor is obliged to transfer its IP and reciprocally, the licensee is obliged to pay the licensing fee or royalties for the use of IP.⁷⁸ This right to use may be limited by the field-of-use restrictions of IP, which refers to the licensee's right only to a specified type of use of IP protected product or technology granted by the license agreement.⁷⁹ In other words, apart from a "pure" copyright or patent license, the licensor may limit the exploitation of the protected technology or work only to one or more specific fields of application, which are covered by the IPR.⁸⁰

In the context of the exhaustion doctrine, licensing activity does not confer the ownership of the license product in the meaning of sale. However, the question is whether consent to license constitutes consent to a "reserved sale" or whether the licensing activity can be distinguished from a sale, and thus further limit the exhaustion doctrine.⁸¹ Thus, the difference between a sale and a license must be assessed.

⁷⁸ Jeff Dodd and Raymond Nimmer (n 2) § 6:1. Michael Rustad (n 2) p. 205-206.

⁷⁹ Guidelines 2014/C 89/03 (n 4) para 179, 181.

⁸⁰ For example, the use in a specific market, territory or technology or related to consumer or educational use or use in a single computer. Jeff Dodd and Raymond Nimmer (n 2) § 6:12-15. Vivien Rose and David Bailey (n 5) p.726. Regarding the limited use on consumer or educational purposes only, e.g., *ProCD, Inc. v. Zeidenberg*, 86 F.3d 1447 [7th Cir. 1996]. *Adobe Systems Inc. v. One Stop Micro, Inc.*, 84 F. Supp. 2d 1086 [N.D. Cal. 2000]. ⁸¹ Rochelle C. Dreyfuss and Katherine J. Strandburg. *The Law and Theory of Trade*

2.2.3.1 The difference between a sale and a license: Relevance of consent?

The CJEU has taken into consideration the difference between a sale and a license in several cases in the context of IPRs and the exhaustion doctrine. In *UsedSoft*, the CJEU ruled that the copyright holder's right of distribution is exhausted if the copyright holder has authorized the downloading of the software from the Internet and at the same time conferred the right to use the copy of the software for unlimited period in return for a payment fee. ⁸² The CJEU defined the term "sale" in a copyright context, which, however, can be considered also in the context of patents or trademarks. The CJEU stated that "a 'sale' is an agreement by which a person, in return for payment, transfers to another person his rights of ownership in an item of tangible or intangible property belonging to him." Thus, the commercial transaction giving rise to exhaustion of a right must involve an element of "a transfer of the right of ownership". ⁸⁴

In *Hoechst* and *Zino Davidoff*, the CJEU has considered that contractual reservations may not be relevant for the application of the exhaustion doctrine. In *Zino Davidoff*, the CJEU noted that an implied consent cannot be inferred from a *sale* (a transfer of ownership) without imposing any contractual reservations or that according to the governing law of such contract includes an unlimited right of resale or market within the European Economic Area (EEA) in the absence of such contractual reservations.⁸⁵ Neither is it relevant that authorized retailers and wholesalers have not imposed contractual reservations on their own purchasers.⁸⁶ In *Hoechst*, the CJEU has noted that it makes "*no difference* [...] whether a prohibition on exportation is attached to the compulsory licence."

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⁸² Case C-128/11 UsedSoft GmbH v Oracle International Corp. (UsedSoft GmbH.) [2012] OJ C 287 para 72.

⁸³ *ibid*. para 42.

⁸⁴ idem.

⁸⁵ Case C-128/11 *UsedSoft GmbH*. (n 82) para 60.

⁸⁶ *ibid*. para 66.

⁸⁷ Case C-19/84 *Hoechst* (n 46) para 30.

In contrast, in *Coty Prestige Lancaster Group GmbH*, there was an agreement containing a prohibition on sale that only the content of perfume testers was made available for use but the perfume testers themselves remained as the property of the trademark holder. In light of these circumstances, the CJEU noted that the intermediaries were also contractually bound to the trademark holder and that the trademark holder may recall the testers at any time. The CJEU concluded that the fact that those testers are bottles of perfume bearing the words "*Not for sale*" and "*Demonstration*" preclude the implied consent of the trademark holder to putting the product on the market in the absence of any evidence to the contrary. The outcome of *Coty* suggests that an agreement (not characterized in the case) with a use restriction (a prohibition on sale) does not exhaust trademark rights.

Similar outcome has been suggested in *Greenstar-Kanzi Europe* or in *Copad* explicitly in relation to licensing agreements. A license agreement does not constitute an absolute and unconditional consent of the trademark holder to "the licensee putting the goods bearing the trade mark on the market". In Copad, the CJEU stated that a trademark holder can invoke its rights against a licensee who breaches a provision in a license agreement prohibiting sales to discount stores "on grounds of the trade mark's prestige". Additionally, such breach "damages the allure and prestigious image which bestows on them an aura of luxury". In *Greenstar-Kanzi Europe*, the CJEU stated that "an infringement of any clause of the licensing contract does not always result in vitiation of the holder's consent", particularly if a breach of licensing agreement "does not affect the consent

⁸⁸ Case C-127/09 Coty Prestige Lancaster Group GmbH (n 37) para 23.

⁸⁹ *ibid*. para 48.

⁹⁰ *ibid*. para 48.

⁹¹ Case C-140/10 *Greenstar-Kanzi Europe NV* (n 16) para 39. Case C-59/08 *Copad* (n 69) para 47.

⁹² Case C-59/08 *Copad* (n 69) para 37. On this also, Case C- 230/16 *Coty Germany GmbH v Parfümerie Akzente GmbH* (*Coty Germany GmbH*) [2017] OJ C 52, para 21-58. In the recent Coty decision, the CJEU explicitly allowed that the preservation of luxury, i.e., brand may be enforced via contractual clauses in the Article 101 TFEU context.

⁹³ *idem*.

to the placing of the goods on the market". 94 In other words, the breach does not have any effect on the exhaustion of the holder's right and thus does not prevent the exhaustion. 95

To sum up, although the CJEU's case-law differentiates a sale and a license, it does not provide an unambiguous answer to the question about licensing as a potential limitation to the exhaustion doctrine. The CJEU has stated that a key element for a sale is the transfer of ownership for the purposes of the exhaustion doctrine. This approach suggests that a license, by retaining ownership for the IP holder, is exempted from the exhaustion doctrine. On the other hand, the CJEU has also considered that this reservation of ownership by means of contractual reservations may not be relevant for the exhaustion assessment. However, the CJEU has recognized that a licensing agreement does not automatically constitute absolute and unconditional consent of the IP holder under the exhaustion doctrine. In contrast, breaching a provision of a licensing agreement may not have an effect on the IP holder's consent. However, the question remains: what if a provision breached is a clause, which has an effect on the IP holder's consent, such as a post-sale restriction in the form of a prohibition to reuse?

Legal scholars have also presented views that contractual restrictions on use cannot preclude the application of the exhaustion doctrine. On the other hand, the CJEU's case-law on the matter can be interpreted as being either in favor or against such statement. However, in *Viking Gas*, the CJEU has analyzed post-sale restrictions and tying explicitly in the context of the exhaustion doctrine and a sale. The case is discussed in the following section.

⁹⁴ Case C-140/10 Greenstar-Kanzi Europe NV (n 16) para 41.

⁹⁵ *ibid.* para 41-43.

⁹⁶ Kevin Coates, Lars Kjøbye and Luc Peeperkorn (n 12) p. 1454. Case C-16/03 *Peak Holding AB* (n 37). Case C-128/11 *UsedSoft GmbH*. (n 82).

2.2.3.2 Viking Gas case – CJEU's analysis of post-sale restrictions in the trademark context

The case consisted of proceedings between Viking Gas A/S ("Viking Gas"), a seller of gas, and Kosan Gas A/S ("Kosan Gas"), a seller and a producer of bottled gas. Kosan Gas uses composite bottles under an exclusive licensing agreement "for use in Denmark of the three-dimensional mark constituted by the shape" of the composite bottle and also is the owner of "the word and figurative marks affixed to them". Real A consumer buying a composite bottle filled with gas from Kosan Gas in Denmark pays also for the bottle, which becomes property of the consumer. On the other hand, Viking Gas sells gas by refilling Kosan Gas's composite bottles, which are attached with its label. The word or figurative marks of Kosan Gas were not removed or covered. Thus, consumers can return their empty Kosan Gas bottles to the Viking Gas dealer and in return for payment, get a similar one filled by Viking Gas.

The issue was whether Viking Gas infringed Kosan Gas's trademark rights by refilling and marketing composite bottles. ¹⁰² The CJEU recognized that there are two interests clashing – on the one hand, the licensee's legitimate interest in "the right to the trademark constituted by the shape of the composite bottle" and being "the proprietor of the marks affixed to that bottle" in order to profit from his rights, and on the other hand, the bottle purchasers' legitimate interests, especially the interest to enjoy the property rights of the bottles and "the general interest in maintaining undistorted competition". ¹⁰³ In balancing these interests, the CJEU stated that "a sale which allows the realization of the economic value of a mark" exhausts the trademark rights. ¹⁰⁴ Also, the consumers would be "tied to a single gas

⁹⁷ Case C-46/10 Viking Gas A/S (n 16) para. 8, 11.

⁹⁸ *ibid.* para 28.

⁹⁹ *ibid.* para 10, 32-33.

¹⁰⁰ *ibid*. para 11.

¹⁰¹ *ibid*. para 11.

¹⁰² *ibid.* para 13.

¹⁰¹ ibid. para 31.

¹⁰⁴ *ibid.* para 32. C-16/03 *Peak Holding* (n 37) para 40.

supplier for the subsequent refilling of those bottles."¹⁰⁵ This would also cause unjustified reduction of competition in the downstream market for gas refilling and close off that market, which is not the intention of trademark law.¹⁰⁶

Viking Gas sums the discussion clearly for the part of a purchase agreement and post-sale restrictions. The wording of "the realization of the economic value" indicates the CJEU attitude towards strict interpretation of the exhaustion doctrine. The trademark or other IP holder may not benefit from its IP other than once per product. Additionally, competition law considerations are closely related to the discussion on the exhaustion of IPRs.

As discussed in the former section, the legal sphere regarding *licensing* and post-sale restrictions and its contours are ambiguous. The CJEU's case-law does not present any clear view rather the outcome varies depending on the circumstances. It can be said that licensing can be considered as a limitation to the exhaustion doctrine depending on the circumstances and interests involved, such as a type of IP. The protection of brand can be considered being stronger, particularly in relation to luxury goods, than patent protection. Further, this requires taking competition law considerations also into account by considering the scope of IP. If the IP holder is successful in pleading the aforementioned limitations under patent or trademark law or in licensing, the exhaustion doctrine is not applicable. Such scenario is discussed in the following section.

¹⁰⁵ Case C-46/10 *Viking Gas A/S* (n 16) para 33. Opinion of AG Kokott in Case C-46/10 Viking Gas A/S v Kosan Gas A/S [2011] ECR I-06161, para 66.

¹⁰⁶ Case C-46/10 *Viking Gas A/S* (n 16) para 34.

2.3 Non-application of the exhaustion doctrine: Relevance of the scope of patent or trademark protection

In case of non-application of the exhaustion doctrine, field-of-use restrictions, such as post-sale restrictions, must still be within the scope of the IP grant, as established in *Windsurfing*. The scope of patent and trademark protection is considered in the following sections.

2.3.1 The scope of patent protection

Under the Finnish Patents Act, a patent confers an exclusive right implying that an exploitation of an invention, without the proprietor's consent, is not allowed by means of "making, offering, putting on the market or using a product protected by the patent, or importing or possessing such product for these purposes." The person infringing this exclusive right to limit the use of a patented product shall be deemed to be an infringer. ¹⁰⁹

Patents protect inventions by providing a monopoly "granted in return for the disclosure of technical information". A patent could take the form of either "a product patent, a process patent, or a product-by-process patent", classified according to the nature of their protected interest. The scope of patent grant is determined by interpreting the patent claims of a particular invention. The patent claim refers to "a precise statement of the subject matter for which patent protection is sought". In connection to the invalidation process of a patent, the patent holder may request the Court to

¹⁰⁷ Case 193/83 Windsurfing International Inc. (n 28).

¹⁰⁸ Patents Act (n 31) Section 3.

¹⁰⁹ *ibid*. Section 58.

¹¹⁰ Lionel Bently and Brad Sherman, *Intellectual Property Law* (3rd edition Oxford University Press 2009) p. 335.

¹¹¹ *ibid*. p. 336.

¹¹² *ibid.* p. 553-554.

¹¹³ Patents Act (n 31) Section 8.

limit these patent claims. 114 Thus, the scope of patent protection considers essentially the *subject-matter* of an invention protected.

2.3.2 The scope of trademark protection

Trademarks refer to signs or symbols "used in trade in connection with particular goods or services". Trademarks could be divided into word marks, figurative marks, composite marks (a combination of words and figures), three-dimensional marks, color marks or sensory marks (combining sound or smell). The proprietor of an EU trademark has an exclusive right to exclude all third parties from using signs identical or similar to the trademark protected without the proprietor's consent in the course of trade in relation to goods or services. To instance, "affixing the sign to the goods or to the packaging" and "offering the goods or putting them on the market, or stocking them for those purposes, under the sign, or offering or supplying services" are prohibited.

However, the scope of protection does not cover all identical or similar signs unless the situation falls under one of the following criteria. Firstly, a sign is *identical* with the protected trademark and is used in relation to identical goods or services of trademark protection. Secondly, the sign is *identical* with or *similar* to the protected trademark and is used in relation to identical or similar goods or services of trademark protection. In this situation, the likelihood of confusion from a public perspective has to be established, which includes also the likelihood of association between a sign and the protected trademark. Thirdly, a sign is *identical* with or *similar* to

¹¹⁴ Patents Act (n 31) Section 52.

¹¹⁵ Lionel Bently and Brad Sherman (n 110) p. 709.

¹¹⁶ *ibid.* p. 709 fn 1.

¹¹⁷ Directive 2015/2436 (n 21) Art. 10. Regulation 2017/1001 (n 29) Art. 9.

¹¹⁸ Directive 2015/2436 (n 21) Art. 10.3 (a). Regulation 2017/1001 (n 29) Art. 9.3(a).

¹¹⁹ Directive 2015/2436 (n 21) Art. 10.3 (b). Regulation 2017/1001 (n 29) Art. 9.3(b). ¹²⁰ *ibid*.

¹²¹ *ibid*.

¹²² Directive 2015/2436 (n 21) Art. 10.2(a). Regulation 2017/1001 (n 29) Art. 9.2(a).

¹²³ Directive 2015/2436 (n 21) Art. 10.2 (b). Regulation 2017/1001 (n 29) Art. 9.2(b).

the protected trademark and *irrespective* of whether the sign used in relation to identical, similar or not similar goods or services of trademark protection. In this situation the protected trademark has a reputation value in the Member State (national trademark) or within the EU (EU trademark) and use of the trademark without due reason takes "*unfair advantage of, or is detrimental to, the distinctive character or the repute of the protected trademark*". ¹²⁴

Trademark protection may be considered being wider than patent protection since it includes not only identical but also similar marks. Patent protection considers only a particular invention. In the context of post-sale restrictions, the scope of patent or trademark protection must be respected since extensive restrictions may interfere with competition law, and thus be invalid. In the following section, the discussion on the validity of post-sale restrictions is concluded.

2.4 The validity of post-sale restrictions

Under the general principles of contract law, a contractual clause against the law is not valid or enforceable. In other words, courts do not examine claims based on contracts or contractual clauses, which are against the law or good faith (*the principle of non-interference*). ¹²⁵ In the patent and trademark law context, this denotes that a contractual clause against (European or national) patent or trademark law would be invalid and unenforceable.

The exhaustion doctrine is an essential consideration in this relation. If the exhaustion is applicable, post-sale restrictions are generally invalid and unenforceable. The exhaustion doctrine pre-empts the IP holder's right to enforce its IP against the alleged infringer under patent or trademark law.

¹²⁴ Directive 2015/2436 (n 21) Art. 10.2 (c). Regulation 2017/1001 (n 29) Art. 9.2(c).

¹²⁵ For instance, the Finnish Supreme Court decision no. 2005:72, para 4.

Post-sale restrictions, *prima facie*, aim to restrict use at the time after the sale, which is not explicitly possible according to the exhaustion doctrine.

On the other hand, legal scholars have considered that "exhaustion does not as such render invalid and unenforceable restrictions imposed on the parties to a license agreement". This may also be correct depending on the restriction. Generally, field-of-use restrictions could limit the use of the IP to one particular use, for instance, of a patent claim, or to use a trademark only in a certain course of business. Although the product is sold, these types of restrictions are still valid and enforceable unless they interfere with other areas of laws. Post-sale restrictions, on the other hand, fall under the scope of the exhaustion doctrine as a prohibited conduct. Thus, validity and enforceability of post-sale restrictions is dependent on the application of the exhaustion doctrine.

As discussed above, the application of the exhaustion doctrine could be limited by several means. Under patent law, a patent holder may have justified grounds to object wider placement of the patented product on the market. Currently, a compulsory license or a SEP license in FRAND terms could fall into this category. However, this category could be broadened by the CJEU. On the other hand, under trademark law, a trademark holder may have legitimate reasons to oppose further commercialization of goods, such as alterations of goods bearing the trademark. The alteration of the good provides leeway for the trademark holder to effectively oppose further commercialization of the good. This could also be a resale. Legitimate reasons are dependent on the circumstances, such as dealing with a luxury good or market circumstances.

Licensing could be also considered as a limitation to the exhaustion doctrine, although the legal sphere in this regard is ambiguous. In relation to a prohibition to reuse or resell, the CJEU has stated that such restriction is not possible in relation to a product sold. In the EU, there has been no

¹²⁶ Kevin Coates, Lars Kjøbye and Luc Peeperkorn (n 12) p. 1454.

explicit case on post-sale restrictions in relation to licensing. However, compared to case-law on a sale, in case of a license several elements of a sale are lacking. For instance, there is no transfer of ownership and no consent of the IP holder other than for the particular use (a prohibition to reuse means that only the right to a single-use granted). Other uses are not consented by the patent or trademark holder.

A more complex situation occurs if the IP holder has consented to sell or license the main product and licensed the spare part. The IP holder has given the right to use both products, however, retained the ownership of the spare part for itself and also the right to limit the use of the spare part (or the main product if provided under a license). Here the scope of the post-sale restriction is more extensive, but the same logic applies. Considering spare parts, ownership has not been transferred and consented uses are limited.

It follows that post-sale restrictions in licensing agreements under patent or trademark law are generally valid when within the scope of patent or trademark protection. The consent of the IP holder is the key element in order to determine validity. If the IP holder has not given its consent to use the product in a certain way and retained the right for that specific use for itself, ownership does not transfer entirely. This means that the rights have not been exhausted and such post-sale restrictions can be valid and enforceable not only under contract law but also under trademark or patent law. However, it must be noted that post-sale restrictions should not interfere with other areas of law, such as competition law or internal market freedoms.

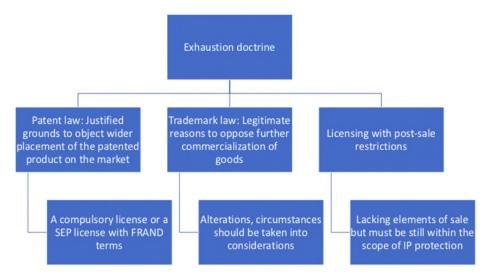


Table 1. Validity of post-sale restrictions depending on the limitations to the exhaustion doctrine.

As illustrated in Table 1, there are several options for enforcing post-sale restrictions. Patent and trademark law limitations are applicable regardless of whether there has occurred a sale or whether the product has been licensed. With licensing, there might be a risk that a license would be treated as a sale. Thus, a combination of legislative limitations and licensing could be beneficial to be used. Additionally, the scope of IP protection itself is a relevant consideration for cases of "pure" licensing.

2.4.1 A shift from patent licensing to trademark licensing?

From the perspective of the scope of IP protection, patent and trademark licensing have different benefits in relation to the validity of post-sale restrictions. The scope of patent protection is limited to a particular invention and using such invention is considered as a patent infringement. However, trademark protection covers not only identical marks but also similar marks. Also, a trademark's reputation has significance. Trademark protection gives broader discretion to the licensor in terms of post-sale restrictions.

In terms of validity, a trademark license could be a more beneficial option compared to a "traditional" patent license. The problem with a sole patent license can be the uncertainty of the broadened patent scope when protection is being extended through post-sale restrictions. This leaves room for interpretation. Trademark licensing may offer a more predictable legal environment for the post-sale restriction due to the broader scope of trademark protection. The scope of trademark protection includes also a right to limit alterations, which implies more flexibility in terms of licensing. This settled alteration limitation to trademark exhaustion could suggest that licensing in the trademark context might not even be needed.

Although a trademark licensing agreement with post-sale restrictions can be considered as the most reliable option, actual protection in practice must be borne in mind. Different types of IP protect different subject matter such as patents inventions and trademarks. For one product, there might be several IPs protection the product as a whole. Thus, it might not be sufficient to rely on only one type of protection but may rather be preferable to employ a hybrid model combining the best elements of more IP protections.

Prior to considering licensing strategies in detail, compliance with competition law must be considered. Post-sale restrictions have an effect on the aftermarket when other suppliers are restricted to reuse the product protected by a patent or trademark. Particularly, restrictions on competition could occur when a dominant company is enforcing its IP rights unlawfully by tying products together. In the following section, post-sale restrictions are considered in the context of abuse of dominance and tying.

3 Abuse of dominance and post-sale restrictions – compliance with competition law?

The main question for purposes of the thesis, regarding compliance of post-sale restrictions with competition law, is whether such restrictions can be considered to amount to anticompetitive tying by a dominant company. Post-sale restrictions target after sales and thus have effect on the aftermarket. Firstly, a theory of harm is established by considering harmful effects of post-sale restrictions for competition. Against the established theory of harm, compliance with competition law is assessed.

3.1 Theory of harm

In order to assess compliance with competition law, one needs to establish a coherent theory of harm. Under Article 102 TFEU, Sherman Act Section 2 or Clayton Act Section 15 there are no clear categorical or "by object" restrictions of competition. As a result, the theory of harm aims to provide an intellectual framework to examine actual or likely anticompetitive effects on the basis of the actual facts of each case. This also means assessing the counterfactual situation, where the absence of alleged infringement is compared to the effects of the agreement or commercial practice under review. The purpose of such theoretical framework in the

¹²⁷ Article 102 TFEU. Sherman Act 15 U.S. Code § 2. Clayton Act 15 U.S. Code § 14.

¹²⁸ Jones and Sufrin (n 24) p. 46-47.

¹²⁹ The effect-based approach refers to an economic approach since its basic premise is economical. Damien Gerard, "The effects-based approach under Article 101 TFEU and its paradoxes: modernisation at war with itself?" in Jacques Bourgeois and Denis Waelbroeck (eds), *Ten Years of Effects-Based Approach in EU Competition Law Enforcement* (Bruylant 2012). Available at SSRN: http://ssrn.com/abstract=2117780, p. 3. Damien Geradin and Ianis Girgenson, "The Counterfactual Method in EU Competition Law: The Cornerstone of

context of an individual case is to derive a testable hypothesis concerning the underlying theory of harm of the commercial practice. ¹³⁰ The theory of harm does not aim to provide the ultimate answer but only to explain case specific relationships between different variables. ¹³¹ Moreover, the party alleging that competition law is infringed is incumbent to provide a sufficient theory of harm in order to prove that the alleged abusive behavior causes competitive harm ¹³². Thus, first, the counterfactual situation must be assessed, on which the developed theory of harm must be based.

Zenger and Walker state that a well-developed theory of harm has certain specific characteristics. Harm on competition and consumers are established by an appropriately defined counterfactual, which is internally and logically consistent with the incentives that parties are facing and the available economic evidence. This means that the theory of harm must describe how competition is or could be prevented, restricted, or distorted in this particular case, which requires case specific consideration of the nature of competition and of the mechanism negatively affecting consumers 134.

Considering post-sale restrictions in licensing agreements generally, the effect on the aftermarket (reuse or spare part market) is significant. When the consumer is tied to use the same supplier according to the licensing agreement, the possibility to use another supplier's products or reuse the

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the Effects-Based Approach" (2011) Available at SSRN: http://ssrn.com/abstract=1970917, p. 12.

This underscores that competition policy decisions need to be based on empirical evidence. Lars-Hendrik Röller, "Economic Analysis and Competition Policy Enforcement in Europe" in Peter A. G. van Bergeijk and Erik Kloosterhuis (*eds*) Modelling European Mergers: Theory, Competition Policy and Case Studies (Edward Elgar, ed. 2005) p. 16.

¹³¹ Ioannis Lianos and Damien Geradin, *Handbook on European competition law:* enforcement and procedure (Edward Elgar Publishing Ltd. 2013) p. 35.

¹³² Economic theory is required to frame a case, which in turn is fundamental to develop a particular theory of harm. Jones and Sufrin (n 24) p. 46-47.

¹³³ Hans Zenger and Mike Walker, "Theories of Harm in European Competition Law: A Progress Report" in Jacques Bourgeois and Denis Waelbroeck (*eds*), *Ten Years of Effects-Based Approach in EU Competition Law Enforcement* (Bruylant 2012) pp. 185-209. Available at SSRN: http://ssrn.com/abstract=2009296, p. 1.

¹³⁴ Röller (n 130) p. 16.

product in the aftermarket is restricted.¹³⁵ Thus, serious harm to consumers and also to competition in the aftermarket may occur by the post-sale restrictions due to such tying arrangements.

3.2 IPRs in the context of Article 102 TFEU

Generally, under EU competition law, IPRs need to be taken into account in the competitive assessment but the extent is not clear. Firstly, one must distinguish between the exercise and the existence of an IPR. Exercise of IPRs is scrutinized under EU competition law but, given the existence of IPRs, IP right holders may impose use restrictions upon downstream purchasers via the license agreement. 136 Secondly, the scope of the IPR is essential to consider since generally field-of-use restrictions including postsale may only be imposed in relation to the subject matter of the IP.¹³⁷ In other words, competition scrutiny cannot be avoided by misuse of IP. 138 Thirdly, although the IP agreement could fall within the scope of the Technology Transfer Block Exemption (TTBER), this exemption to Article 101 TFEU scrutiny does not prevent scrutiny under 102 TFEU. 139 Moreover, in Windsurfing, the CJEU stated that although the Commission does not have jurisdiction to scrutinize the scope of IP, "it may not refrain from all action when the scope [...] is relevant for the purposes of determining whether there has been an infringement of Article 101 or 102 TFEU". 140 However, in Windsurfing, use restrictions being within the

¹³⁵ See, for instance, Phillip E. Areeda and Herbert Hovenkamp, *Antitrust Law – An Analysis of Antitrust Principles and Their Application* (Wolters Kluwer Legal & Regulatory U.S. 1978, updated 2016) section 1782g.

¹³⁶ Relationship between the licensor and the licensee. Nguyen (n 30) p. 150. Case 56/64 Établissements Consten S.à.R.L. and Grundig-Verkaufs-GmbH v Commission of the European Economic Community [1966] ECR 00429.

¹³⁷ Otherwise those restrictions could be considered as infringements of Article 101 or 102 TFEU. Case 193/83 *Windsurfing International Inc.* (n 28). ¹³⁸ *ibid.*

¹³⁹ Guidelines 2014/C 89/03 (n 4) paras 2, 179.

¹⁴⁰ Case 193/83 Windsurfing International Inc. (n 28) para 1. Case T-460/13 Sun Pharmaceutical Industries Ltd, formerly Ranbaxy Laboratories Ltd and Ranbaxy (UK) Ltd v European Commission (Sun Pharmaceuticals Industries Ltd) [2016] OJ C 383, para 141.

subject matter of the IP, i.e. the scope of the patent, were considered complying with competition law.¹⁴¹

In the context of Article 102 TFEU and the abuse of dominance¹⁴², IPRs affect both the undertaking's dominance and a potential abuse of its dominant position. IPRs may contribute to the existence of a dominant position.¹⁴³ However, mere possession of IPRs may not confer a dominant position but in certain circumstances are capable of creating such position.¹⁴⁴ For instance, the holder of the SEP may not necessary hold a dominant position under Article 102 TFEU, which has to be determined on a case-by-case basis. 145 Regarding an abuse of dominant position, it has been stated that if an exercise of an intellectual property right is lawful under Article 36 TFEU, it is not an abuse under 102 TFEU on the sole ground that it is the act of a dominant undertaking unless the right has been used as an instrument for an abuse of dominant position.¹⁴⁶ However, only in exceptional circumstances, the exercise of the IPR may involve abusive conduct.147

Consolidated version of the Treaty on the Functioning of the European Union (TFEU) [2012] OJ C 326 Art. 102(1).

¹⁴¹ Case 193/83 Windsurfing International Inc. (n 28).

¹⁴² Article 102 of TFEU prohibits the abuse of a dominant position in the EU. The legal criteria for finding an abuse of a dominant position are fulfilled, when one or more dominant undertakings have abused their dominance within the internal market or in a substantial part of it and the abuse may affect trade between Member States. Consolidated version of the Treaty on the Functioning of the European Union (n 140), Art. 102.

¹⁴³ Jonathan D.C. Turner, *Intellectual Property and EU competition law* (Oxford University Publishing 2015).2015 p. 127. On the matter, Case 24/67 Parke, Davis and Co. v Probel, Reese, Beintema-Interpharm and Centrafarm [1968] ECR I 00327. Case 27/76 United Brands Company and United Brands Continentaal BV v Commission of the European Communities [1978] ECR 00207. Case T-30/89 Hilti AG v Commission of the European Communities [1991] ECR II-01439. C-457/10 P AstraZeneca AB and AstraZeneca plc v European Commission (AstraZeneca) [2012] OJ C 26.

¹⁴⁴ Turner (n 143) p. 127. Joined cases C-241/91 P and C-242/91 Radio Telefis Eireann (RTE) and Independent Television Publications Ltd (ITP) v Commission of the European Communities (Radio Telefis Eireann (RTE) and Independent Television Publications Ltd (ITP)) [1995] ECR I-00743.

¹⁴⁵ idem. Opinion of AG Wathelet in Case C-170/13 Huawei Technologies Co. Ltd v ZTE Corp. and ZTE Deutschland GmbH [2014] OJ 302, para 57.

¹⁴⁶ Turner (n 143) p. 135. Case 102/77 Hoffmann-La Roche (n 74). Case 402/85 Basset v SACEM [1987] ECR 01747, para 18.

¹⁴⁷ In the context of refusal to supply. Case C-418/01 IMS Health GmbH & Co. OHG. v NDC Health GmbH & Co. KG. (IMS Health GmbH & Co. OHG) [2004] I-05039 para 35. Case T-198/98 Micro Leader Business v Commission of the European Communities [1999] ECR II-03989, para 56-58. Joined cases C-241/91 P and C-242/91 P Radio Telefis Eireann

In Huawei, the CJEU noted that an abuse of a dominant position is an objective concept "relating to the conduct of a dominant undertaking which, on a market where the degree of competition is already weakened precisely because of the presence of the undertaking concerned". 148 The abuse "has the effect of hindering the maintenance of the degree of competition still existing in the market or the growth of that competition". 149 According to settled-case law, the IPR holder's exclusive right to bring an action for infringement and the effects of it "cannot in itself constitute an abuse of a dominant position". 150 However, the Court also recognized that the exercise of an IP right may, in exceptional circumstances, involve abusive conduct for the purposes of Article 102 TFEU. 151 In the context of a refusal to supply, such exceptional circumstances were concerning (1) a product, (2) "the supply of which was indispensable for carrying on the business". 152 Additionally, considerations such as the prevention of an emergence of a new product with a potential consumer demand¹⁵³, no objective justifications¹⁵⁴ and that the conduct "was likely to exclude all competition

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⁽RTE) and Independent Television Publications Ltd (ITP) (n 144) para 50. Case 238/87 AB Volvo v Erik Veng (UK) Ltd. (AB Volvo) [1988] ECR 06211 para 9. Case C-7/97 Oscar Bronner GmbH & Co. KG v Mediaprint Zeitungs- und Zeitschriftenverlag GmbH & Co. KG, Mediaprint Zeitungsvertriebsgesellschaft mbH & Co. KG and Mediaprint Anzeigengesellschaft mbH & Co. KG. (Oscar Bronner GmbH & Co. KG) [1998] ECR I-07791 para 39. Commission decision of 29.04.2014 addressed to Motorola Mobility LLC relating to proceedings under Article 102 of the Treaty on the Functioning of the. European Union and Article 54 of the EEA Agreement (Case AT.39985 - Motorola - Enforcement of GPRS standard essential patents) [2014] para 278.

¹⁴⁸ Case C-102/77 Hoffmann-La Roche (n 74) para 91. Case C-62/86 AKZO Chemie BV v Commission of the European Communities [1991] ECR I-03359, para 69. Case C-549/10 P Tomra and Others v Commission [2012] OJ C165 para 17. Case C-170/13 Huawei Technologies Co. Ltd (n 53) para 45.

¹⁵⁰ Case C-170/13 *Huawei Technologies Co. Ltd* (n 53) para 46. See also on the matter, Case 238/87 *AB Volvo* (n 147) para 8. Joined cases C-241/91 P and C-242/91 *P Radio Telefis Eireann (RTE) and Independent Television Publications Ltd (ITP)* (n 144) para 49. Case C-418/01 *IMS Health GmbH & Co. OHG* (n 147) para 34.

¹⁵¹ Case C-170/13 Huawei Technologies Co. Ltd (n 53) para 47. Case 238/87 AB Volvo (n 147) para 9. Joined cases C-241/91 P and C-242/91 P Radio Telefis Eireann (RTE) and Independent Television Publications Ltd (ITP) (n 144) para 50. Case C-418/01 IMS Health GmbH & Co. OHG (n 147) para 35.

¹⁵² Case C-7/97 Oscar Bronner GmbH & Co. KG (n 147) para 49. Joined cases C-241/91 P and C-242/91 P Radio Telefis Eireann (RTE) and Independent Television Publications Ltd (ITP) (n 144). Case C-418/01 IMS Health GmbH & Co. OHG (n 147) para 37.

¹⁵³ Joined cases C-241/91 P and C-242/91 P Radio Telefis Eireann (RTE) and Independent Television Publications Ltd (ITP) (n 144) para 54.

¹⁵⁴ ibid. para 55.

in the secondary market" must be taken into account. 155 These exceptional circumstances may also be considered as indications of abusive conduct in the context of other potential abuses, such as tying.

3.2.1 Criteria for assessing tying

Tying can be defined as "making the conclusion of contracts subject to acceptance by the other parties of supplementary obligations, which, by their nature or according to commercial usage, have no connection with the subject of such contracts." The EU Commission has set out the test for tying constituting an abuse of a dominant position in the *Microsoft* case:

"First, the tying and tied products are two separate products, second, the undertaking concerned is dominant in the market for the tying product, third, the undertaking concerned does not give customers a choice to obtain the tying product without the tied product and, fourth, the practice in question forecloses competition."157

Interestingly in EFIM, the Commission found that dominance on the aftermarket is excluded "to the extent that a customer can make an informed choice including lifecycle pricing, that he is likely to make such an informed choice accordingly, and that in case of an apparent policy of exploitation being pursued in one specific aftermarket, a sufficient number of customers would adapt their purchasing behavior at the level of the primary market within a reasonable time." 158 The emphasis has been put on consumer

¹⁵⁵ Joined cases C-241/91 P and C-242/91 P Radio Telefis Eireann (RTE) and Independent Television Publications Ltd (ITP) (n 144) para 56.

¹⁵⁶ Consolidated version of the Treaty on the Functioning of the European Union (n 140)

¹⁵⁷ Commission Decision of 24 May 2004 relating to a proceeding pursuant to Article 82 of the EC Treaty and Article 54 of the EEA Agreement against Microsoft Corporation (Case COMP/C-3/37.792 — *Microsoft*) 2007/53/EC [2004] OJ L 32/33, para 842. Guidelines 2014/C 89/03 (n 4) para 50. Case T-201/04 Microsoft Corp. v. Commission of the European Communities [2007] ECR II-3601, paras 842, 859-862, 867, 869.

¹⁵⁸ Commission Decision of 22 September 1995 in Case No IV/34.330 - Pelikan/Kyocera [1995] para 61. Commission Decision of 7 January 1999 in Case No IV/E 2/36.431 - Info-

behavior and the possibility to switch at the primary market. On the other hand, in CBEM, the CJEU concluded that an abuse is committed where "without any objective necessity, an undertaking holding a dominant position on a particular market reserves to itself [...] an ancillary activity which might be carried out by another undertaking as part of its activities on a neighboring but separate market, with the possibility of eliminating all competition from such undertaking." For instance, spare part markets can be considered as such an example.

There may also be justifications for the tying. For instance, reduced manufacturing and distribution costs, customer transaction and searching costs, improved product performance or convenience and quality or safety considerations can be considered as examples of efficiency justifications. ¹⁶⁰ In the IPR context, a licensor may be able to justify post-sale restrictions on the basis that the trademark holder has a responsibility for "maintaining the quality of the goods being made available for sale under its trademark". 161 This means that the licensor has to have the control of the manufacture or supply of such product or service. 162 In assessing of these justifications, one must consider whether the tying arrangement is the least restrictive means

Lab/Ricoh [1999] para 37-46. Commission Decision of 20 May 2009 in Case COMP/C-3/39.391 *EFIM* [2009] para 16, confirmed by GC and ECJ.

¹⁵⁹ Ioannis Lianos and Rochelle C. Dreyfuss (n 17) p. 101. Case 311/84 Centre belge d'études de marché - Télémarketing (CBEM) v SA Compagnie luxembourgeoise de télédiffusion (CLT) and Information publicité Benelux (IPB) [1985] ECR 03261.

¹⁶⁰ The Unilateral Conduct Working Group of International Competition Network, Unilateral Conduct Workbook Chapter 6: Tying and Bundling (International Competition Network 2015) p. 31-33. Richard Whish and David Bailey, Competition Law (8th edition Oxford University Press 2015) p. 730, 736-737. Miguel de la Mano, Renato Nazzini, Hans Zenger, "Article 102 - Tying and Bundling" in Jonathan Faull and Ali Nikpay, Faull & Nikpay: The EU Law of Competition (3rd Edition Oxford University Press 2014) p. 450-454. Renato Nazzini, The Foundations of European Union Competition Law: The Objective and Principles of Article 102 (Oxford University Press 2011) p. 396-397. Lars Kjølbye, "Patent Misuse" in Alan Devlin, Antitrust and Patent Law (Oxford University Press 2016) p. 393-398. Communication from the Commission - Guidance on the Commission's enforcement priorities in applying Article 82 of the EC Treaty to abusive exclusionary conduct by dominant undertakings [2009] OJ C 45/7 para 30-31, 62. European Commission, DG Competition discussion paper on the application of Article 82 of the Treaty to exclusionary abuses [2005] p. 60.

¹⁶¹ World Intellectual Property Organization, Committee on Development and Intellectual Property (CDIP), Guide on Trademark Licensing CDIP/16/INF/2 [2015] p. 54.

¹⁶² C-16/03 Peak Holding (n 37) para 38. Case C-299/99 Koninklijke Philips Electronics NV v Remington Consumer Products Ltd. [2002] ECR I-5475, para 30.

(the principle of proportionality) and whether the efficiencies outweigh the competitive harm. 163

In the context of post-sale restrictions, limiting the use by field-of-use restrictions is generally within the scope of the IP having a pro-competitive effect when increasing the companies' output and lowering purchase prices. However, post-sales restrictions may also have anti-competitive effects: for instance, in the case of tying if competition on the downstream market is restricted unjustifiably as emphasized in *Viking Gas* and in the context of exceptional circumstances as illustrated in *Magill*. A recent example of the intersection between substantive laws applicable to pharmaceuticals is the CJEU's case *Hoffmann-La Roche and Novartis v. Italian Competition Authority* (ICA) of 23 January 2018 ("*Hoffmann-La Roche*"). The case is discussed in the following section.

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¹⁶³ The Unilateral Conduct Working Group of International Competition Network (n 160) p. 33-34.

¹⁶⁴ EU competition law generally encourages licensing arrangements, but pro-competitive effects of these arrangements have to outweigh the negative impact on competition for an individual exception under Article 101(3) TFEU to be granted. Guidelines 2014/C 89/03 (n 4) para 212. Leigh Hancher "The EU pharmaceuticals market: parameters and pathways" in Elias Mossialos et al. *Health Systems Governance in Europe: The Role of European Union Law and Policy* (Cambridge University Press 2010) p. 640. In the U.S., for instance, price discrimination schemes could be enforced via field-of-use restrictions, as in Akzo N.V. v. International trade Commission, 808 F.2d 1471 [Fed. Cir. 1986]. Christina Bohannan, Herbert Hovenkamp (n 10) p. 22. Herbert Hovenkamp, Mark Janis, Mark Lemley, and Christopher R. Leslie, *IP and Antitrust: An Analysis of Antitrust Principles Applied to Intellectual Property Law* (2nd edition Aspen Publishers 2010) p. 3–56.

¹⁶⁵ Case C-46/10 Viking Gas A/S (n 53) para 33–34. Joined cases C-241/91 P and C-242/91 P Radio Telefis Eireann (RTE) and Independent Television Publications Ltd (ITP) (n 144) para 50-56.

3.2.2 Hoffmann-La Roche case – CJEU's interpretation of EU competition law's relation with other substantive areas of law – IP licensing in the pharmaceutical and competition law context

The *Hoffmann-La Roche* case concerns a reference for a preliminary ruling on the interpretation of Article 101 TFEU in a context of pharmaceuticals. ¹⁶⁶ The ICA had imposed fines on F. Hoffmann-La Roche Ltd and its subsidiary Roche SpA (Roche) and on Novartis AG and its subsidiary Novartis Farma SpA (Novartis) on the ground that the parties had concluded a market sharing agreement contrary to Article 101 TFEU. ¹⁶⁷ The ICA concluded that the agreement was "designed to achieve an artificial differentiation between the medical products Avastin and Lucentis by manipulating the perception of the risks of using Avastin in the field of ophthalmology". ¹⁶⁸

Genentech, Roche's subsidiary, developed both medicines and licensed them to the parties to commercially exploit the medicines outside the United States. Avastin was licensed to Roche and Lucentis to Novartis. Under Regulation 726/2004¹⁷⁰, the European Commission granted a marketing authorization (MA) regarding Avastin for the treatment of certain tumorous diseases. The medicine was also fully reimbursable in Italy. Avastin was used to treat eye diseases without label, thus the medicine was relabeled and repacked for sale purposes. Under Italian law, off-label use was allowed

¹⁶⁶ Case C-179/16 Case C-179/16 F. Hoffmann-La Roche Ltd and Others v Autorità Garante della Concorrenza e del Mercato (Hoffmann-La Roche and Novartis) [2018] OJ C 104, para 1.

¹⁶⁷ *ibid*. para 22.

¹⁶⁸ Case C-179/16 Hoffmann-La Roche and Novartis (n 166) para 22.

¹⁶⁹ *ibid*. para 23.

¹⁷⁰ Regulation 726/2004 laying down Community procedures for the authorization and supervision of medicinal products for human and veterinary use and establishing a European Medicines Agency [2004] OJ L 136.

¹⁷¹ Case C-179/16 Hoffmann-La Roche and Novartis (n 166) para 25.

¹⁷² Case 1760 Avastin/Lucentis, Hoffmann La Roche Limited and ors, Regione Emilia-Romagna (intervening) and AltroConsumo (intervening). 27th February 2014. Italian Competition Authority. Oxford Competition Law 144 (IT 2014) F2.

"in the absence of an authorised valid therapeutic alternative for the treatment of the disease in question". ¹⁷³ At the same time, Lucentis was explicitly produced for the treatment of eye diseases and had an authorization for those purposes. However, the price of Lucentis was significantly higher than the price of Avastin. ¹⁷⁴ Thus, when Lucentis was introduced into the market, Avastin was not able to be used off-label and reimbursed for purposes of eye diseases. ¹⁷⁵

In this setting, the main issue was whether the off-label medicinal product without the MA for the particular use can be considered being interchangeable and thus in the same relevant market as an on-label product having the MA when applying Article 101 TFEU.¹⁷⁶ Additionally, it is questioned whether parties to a licensing agreement can be regarded as competitors solely by virtue of the agreement and whether the licensing agreement falls within the exception under Article 101(3) TFEU.¹⁷⁷

On the questions of substitutability and relevant market, the CJEU considered that in principle pharmaceutical products manufactured or sold illegally cannot be considered as substitutes.¹⁷⁸ Under Article 6 of Directive 2001/83 on the Community code relating to medicinal products for human use, no medicinal product may be placed on the market of a Member State unless an MA has been granted.¹⁷⁹ However, the Directive does not prohibit the use of medicinal products for therapeutic indications not covered by their MA.¹⁸⁰ EU rules on pharmaceutical products do not prohibit the offlabel prescription of a medicinal product or repacking for such use, when in compliance with those rules.¹⁸¹ Thus, on- and off-label medicinal products

¹⁷³ Case C-179/16 *Hoffmann-La Roche and Novartis* (n 166) para 28. David Hull and Michael Clancy, "The Application of EU Competition Law in the Pharmaceutical Sector" (Journal of European Competition Law & Practice 2016, Vol. 7, No. 2.) p. 156.

¹⁷⁴ Case 1760 Avastin/Lucentis (n 172) F2.

¹⁷⁵ Hull and Clancy (n 173) p. 156.

¹⁷⁶ Question 4. Case C-179/16 Hoffmann-La Roche and Novartis (n 166) para 36.

¹⁷⁷ Question 1. Case C-179/16 Hoffmann-La Roche and Novartis (n 166) para 36.

¹⁷⁸ *ibid*. para 52.

¹⁷⁹ *ibid*. para 53.

¹⁸⁰ *ibid*. para 56

¹⁸¹ *ibid*. para 59.

are able to be considered to be within the same relevant market regardless of the lack of MA of the off-label medicine if the medicine is actually used for the off-label purpose. National competition authorities must take into account the outcome of competent authorities on manufacturing and marketing of pharmaceutical products.¹⁸²

The CJEU concluded that an arrangement put in place between the parties to a licensing agreement regarding the exploitation of a medicinal product, aiming to reduce competitive pressure on the use of the licensed product for treatment of certain diseases, is designed to restrict the conduct of third parties promoting the off-label use.¹⁸³ Such arrangement falls within the scope of Article 101 TFEU and is considered a "by object" restriction of competition if the undertakings marketing two competing products disseminate misleading information to the European Medicines Agency, healthcare professionals and the general public aiming to reduce off-label use.¹⁸⁴ It is only for the MA holder to inform regarding risks of its medicinal products, not for another undertaking marketing a competing product covered by a separate MA.¹⁸⁵ Such arrangement cannot be exempted under Article 101(3) TFEU.¹⁸⁶

The judgment is interesting because the CJEU attempted to balance IP, competition law as well as sectoral regulation such as pharmaceutical regulation. In theory, the application of competition law and market definition is not dependent on other areas of law. However, as the CJEU noted in the case, NCAs must take into account other competent authorities' decisions on the matter. However, the extent of such consideration is unclear. In practice, it can be difficult to deviate from another authority's final decision. This could be, for example, a pharmaceutical authority's decision or a decision of a court. In the IPR context, this could mean that a NCA could be tied to a particular market definition if the product could not

¹⁸² Case C-179/16 Hoffmann-La Roche and Novartis (n 166) para 61.

¹⁸³ *ibid*. para 95.

¹⁸⁴ *ibid*. para 95.

¹⁸⁵ *ibid*. para 91.

¹⁸⁶ *ibid*. para 100.

be used legally for another use. This could be, for instance, if reuse is considered as an IP infringement and confirmed by the court.

Another point to consider in *Hoffmann-La Roche* is that the parties' arrangement resembles field-of-use restriction. It is interesting to examine whether in case of an explicit use of field-of-use restrictions, the competition law assessment could have been different. Instead of an implied field-of-use restriction, the intended use of Avastin could have been agreed upon explicitly in a licensing agreement¹⁸⁷. Thus, field-of-use restrictions, such as post-sale restrictions, cannot be implied. Similar legal issues can be found in the *SodaStream* case, which concerns parallel proceedings before a national competition authority and an IP infringement action at a national court. In the first place, the case was handled in Sweden, but recently similar questions were considered in Finland.

3.2.3 Example of national application of competition law in post-sale restrictions cases – SodaStream case

In the *SodaStream* case, the factual situation is more or less the same in Finland and Sweden. SodaStream is a global company engaged in manufacturing, distributing and marketing home carbonation systems. SodaStream sold carbonation machines but provided the gas bottles to consumers under a license. The license stated that the consumers have the right to use the gas bottles in relation to the machine but SodaStream retained ownership of the bottles. Additionally, the license included a condition on refilling, i.e. that the gas bottle can only be refilled by an authorized SodaStream retailer. Further, SodaStream claimed that a product

¹⁸⁷ Hull and Clancy (n 173) p. 157.

¹⁸⁸ Ulf Maunsbach, "Swedish Soda club dispute – Competition law and IPR intersection" in Hans Henrik Lidgard, *National developments in the intersection of IPR and competition law: From Maglite to Pirate bay* (Hart Publishing Ltd 2011) p. 147.

warranty was only in force if SodaStream's gas bottles were used. ¹⁸⁹ In Finland and Sweden, there was an entrant in the refilling market (aftermarket). A company refilled gas bottles, which had engraved SodaStream's trademark, and attached to the bottles its own labels while removing SodaStream's labels. ¹⁹⁰ SodaStream brought trademark infringement proceedings against companies in the aftermarket. ¹⁹¹ Simultaneously, the NCA launched parallel proceedings on the same matter regarding alleged infringement of Article 102 TFEU by means of tying the two products together. ¹⁹²

In 2010, the Swedish Competition Authority, Konkurrensverket (SCA), had first issued an opinion to the Court of Appeals in proceedings for interim measures regarding a trademark infringement. It noted that the exercise of IP can constitute an Article 102 TFEU infringement if unduly extending the scope of IP. Ownership of IP is not absolute but can be limited if the public interest as under Article 102 TFEU requires. However, any competition law intervention cannot be unjustified, disproportionate or affect to the core of the ownership. When a dominant company is protecting its IP, it must take due account of whether such behavior constitutes unjustified restriction of competition. 193 The SCA concluded that the behavior of SodaStream and its license had an exclusionary effect on the refilling market, which could be a breach of Article 102 TFEU. The national court should also take into consideration competition law aspects when assessing a trademark infringement action.¹⁹⁴ However, SodaStream withdrew its appeal regarding interim measures and the Court of Appeal did not have the chance to take the NCA's opinion into account. 195

¹⁸⁹ Ulf Maunsbach (n 188) p. 147.

 $^{^{190}}$ idem.

¹⁹¹ idem.

¹⁹² *ibid.* p. 147-149. Decision of the Finnish Competition and Consumer Authority, docket no. KKV/601/14.00.00/2017 p. 2.

¹⁹³ The legal opinion of the Konkurrensverket, Yttrande till Svea hovrätt i mål Ö 1561-10, enligt artikel 15(3) Rådets Förordning nr 1/2003 om tillämpning av konkurrensreglerna i artiklarna 81 och 82 i fördraget, docket no. 632/2009 p. 5.

¹⁹⁴ *ibid.* p. 9.

¹⁹⁵ Ulf Maunsbach (n 188) p. 149.

In 2012, the SCA issued a decision terminating a competition law infringement investigation on the matter between the same parties. ¹⁹⁶ The SCA stated that there were no sufficient reasons to continue further the investigation. It stated that the exclusivity clause does not take effect in practice and that it is clear that consumers cannot be legally bound by the bottle license. ¹⁹⁷ Interestingly, the SCA highlighted that it is for the national court in the trademark infringement proceedings to also take into account competition law aspects. ¹⁹⁸ SodaStream won the infringement case in the Stockholm District Court; this ruling was later upheld by the Court of Appeals. ¹⁹⁹

At the end of 2017, a similar decision was made by the Finnish Consumer and Competition Authority (FCCA). It noted that the exercise of IPRs can constitute a breach of Article 102 TFEU, and the dominant company must exercise its IPR in a way, which is not restricting competition unjustifiably.²⁰⁰ The IP infringement proceeding is not itself within the scope of the Finnish Competition Act, but the outcome of such proceedings could affect the assessment under competition law.²⁰¹ The FCCA considered that the request for initiating investigation was early and it was not expedient to investigate the matter in parallel with the national court.²⁰²

By comparison, the German Competition Authority, Bundeskartellamt, had imposed fines against SodaStream for abusing its dominant position. The Bundeskartellamt held that other companies on the aftermarket must be given the possibility to refill the gas bottles. SodaStream undertook binding commitments to change its license.²⁰³ In France, there was a similar case in

¹⁹⁶ The decision of the Konkurrensverket, Ifrågasatt missbruk av dominerande ställning, docket no. 632/2009.

¹⁹⁷ *ibid*.

¹⁹⁸ *ibid*.

 $^{^{199}}$ DAF/COMP/WD(2017)8, Competition Issues in Aftermarkets - Note from Sweden (OECD, Directorate for Financial and Enterprise Affairs Competition Committee 2017). p. $^{\rm Q}$

²⁰⁰ Dnro KKV/601/14.00.00/2017 (n 192) p 3.

²⁰¹ *ibid.* p. 3.

²⁰² *ibid.* p. 3.

²⁰³ Bundeskartellamt, Fine imposed on SodaStream for abusive practices, (Bundeskartellamt Press Release 2015).

relation to coffee capsules. The French Competition Authority considered that Nespresso had engaged in technical and contractual tying. The modifications made by Nespresso on its machines had the effect that other producers' capsules were incompatible. Additionally, the warranty was also conditional on the use of Nespresso's own capsules. As in Germany, Nespresso agreed on remedies delinking the warranty and the use of Nespresso's capsules. Additionally, it had to notify its competitors about modifications regarding its Nespresso machine.²⁰⁴

In all of the cases, NCAs have noted the relationship between IP law and competition law. The exercise of an IPR could constitute a competition law infringement if it causes unjustified restrictions of competition. Specifically, post-sale restrictions can have a restrictive effect on competition on the aftermarket and ultimately constitute abusive tying under Article 102 TFEU. However, as established in *SodaStream*, parallel proceedings can lead to the situation, in which the competition assessment is conducted after the proceedings relating to the IPR have been terminated. It follows that depending on the outcome of the IPR matter, the competitive assessment may vary.

3.3 Assessing compliance with competition law

As pointed out in the previous sections, significant harm could arise from post-sale restrictions in the downstream market. Thus, IP law considerations must be taken into account during the competitive assessment. In the following section, such assessment is made considering intellectual property

²⁰⁴ Gunnar Niels, Helen Jenkins, James Kavanagh, *Economics for Competition Lawyers* (2nd Edition Oxford University Press 2016) p. 211. République Française - Autorité de la Concurrence, Single-portion Espresso Coffee Machines (Press Release Autorité de la Concurrence 2014).

rights in the competition law context, in connection to the developed theory of harm.

3.3.1 The presumption of compliance with competition law if post-sale restrictions are valid under patent or trademark law?

As the *Hoffmann-La Roche* and *SodaStream* cases emphasize, the validity of post-sale restrictions under patent or trademark law will have an effect on the competition law assessment. It follows that when IP rights are exhausted, all further contractual clauses in license agreements restricting the use of the licensed IP are subject to EU competition law rules. ²⁰⁵ If the IPRs are not exhausted and post-sale restrictions are with the scope of the IPR, such restrictions are valid under patent and trademark laws. On the other hand, it is questionable whether such validity can entail a presumption of compliance with competition law.

The concept of presumption may be too robust an argument for several reasons. The Commission and NCAs may still examine the scope of IP in order to assess competition law compliance regardless of post-sale restrictions and their validity. Additionally, the European Commission has stated as a matter of competition policy citing CJEU's judgment in AstraZeneca that abuse of dominance generally involves behavior, which could be lawful under areas of law other than competition law. In AstraZeneca, the CJEU stated that the illegality of abusive conduct under Article 102 TFEU does not relate to its compliance or non-compliance with

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²⁰⁵ Jeff Dodd and Raymond Nimmer (n 2) p. 1

²⁰⁶ Case 193/83 Windsurfing International Inc. (n 28) para 1. Case T-460/13 Sun Pharmaceuticals Industries Ltd (n 140) para 141.

²⁰⁷ Case C-457/10 P AstraZeneca (n 143) para 132. Case T-321/05 AstraZeneca AB and AstraZeneca plc v European Commission (AstraZeneca) [2010] ECR II-02805, para 677. European Commission, Report from the Commission - Report on Competition Policy 2012 [2013] COM(2013) 257 final p. 15. See also, Josef Drexl, Nari Lee, Pharmaceutical Innovation, Competition and Patent Law (Edward Elgar Publishing 2013) p. 229.

other legal rules.²⁰⁸ According to the European Commission, "EU competition policy is complementary, and not subordinate, to other branches of EU law, including Single Market rules".²⁰⁹ In the IPR context, this ultimately means that regardless of the validity of post-sale restrictions in licensing agreements, such conduct could constitute an abuse of dominant position. Even though a dominant company has a legal right to exploit its IPRs under patent or trademark law, such exploitation must not be excessive resulting in anti-competitive disclosure of neither the primary nor the aftermarket.

However, prerequisites for the competition law compliance may lay in the IP validity. The scope of IP protection as an element of validity must be respected when the IPRs are exploited. In other words, misuse of IP is not allowed. When IP validity does not presume compliance with competition law, it may still be questioned whether the post-sale restrictions can be considered going beyond the scope of IP in the meaning of competition law and constitute abusive tying? This question is discussed in the following section.

3.3.2 Post-sale restrictions as abusive tying – misuse of IP?

Seen in the light of the theory of harm, when the main product and the spare part is tied together with post-sale restrictions, foreclosure effects arise affecting competition in the downstream market. Such behavior has anti-competitive effects, which can be seen in the *SodaStream* case where competition on the refilling market was distorted by SodaStream's consumer license. If the monopoly created by the IPRs regarding the post-

²⁰⁸ Case C-457/10 P *AstraZeneca* (n 143) para 132. Case T-321/05 *AstraZeneca* (n 207) para 677.

²⁰⁹ European Commission (n 207) p. 15.

²¹⁰ On the misuse of IP, Thorsten Käseberg (n 12) p. 24. Case COMP/A. 37.507/F3 – *AstraZeneca* (n 12). Kevin Coates, Lars Kjøbye and Luc Peeperkorn (n 12) p. 1509. Case 193/83 *Windsurfing International Inc.* (n 28).

sale restrictions and possibly confirmed by an infringement claim, barriers to entry to the market are high and in certain cases, entry may not even be possible. Thus, it is evident that post-sale restrictions have an effect of foreclosing the aftermarket.

Another consideration is whether post-sale restrictions go beyond the scope of the IP for purposes of competition law. As discussed in the validity section, in a situation without a license, there is no legal right to enforce the tying arrangement by post-sale restrictions. However, the legal sphere of post-sale restriction licensing is ambiguous. On the other hand, the criteria for the exhaustion doctrine are not fulfilled (lack of elements of sale) although there is no explicit case from the CJEU on the matter. Taking a prudent approach, one should shift to an effect-based assessment of the issue in light of the theory of harm. For instance, one should consider whether consumers are able to switch supplier at the primary market. For a dominant undertaking in the primary market, enforcing post-sale restrictions via a licensing agreement can be problematic from a competition law perspective.

However, justifications may be available for the tying arrangement, such as reduced customer transaction and searching costs or quality or safety considerations. Quality and safety considerations stem also from EU trademark law when alterations bearing the mark could be objected.²¹¹ In this context, it can be questioned whether competitive harm caused by post-sale restrictions in licensing agreements could be outweighed at all by these considerations. Quality and safety of products could be considered as such outweighing justification for tying the spare part to the main product as seen in the CJEU's case-law on luxury products.²¹² On the other hand, if the activity on the spare part market is only ancillary to the main product, and by the retaining of such conduct itself, a dominant company could eliminate

²¹¹ See (n 69).

²¹² See, for instance, Case C-59/08 *Copad* (n 69) para 37.

all competition from the spare part market.²¹³ Such conduct could not be justified, and therefore, it would clearly constitute an abuse.

Post-sale restrictions beyond the scope of the IP and without justification could constitute a misuse of IP as an abuse of procedure, when enforcing the IP right in question.²¹⁴ This applies even if a dominant undertaking has a legal right to enforce its right.²¹⁵ However, a problematic situation arises when there are parallel IP and competition law proceedings involving the same parties. Additionally, from the perspective of legal certainty, enforcement of IPR confirmed by courts should not constitute a competition law infringement. In this context, it can be questioned whether courts should take competition law aspects into account if pleaded by parties in the IPR infringement actions. On the other hand, it is questionable to what extent competition authorities would be bound by the statements of courts. This dilemma also applies the way around: if competition authorities are extensively scrutinizing IPRs, particularly if IPRs are simultaneously scrutinized by a court. However, as stated in Hoffmann-La Roche, competition authorities must take into account decisions of other authorities affecting the matter under review. For the sake of legal clarity, this would be beneficial from a company perspective. Thus, in practice, competition law could be exceptionally subordinate to IP laws when the competition law assessment may be dependent on the outcome of the IP procedure.

²¹³ Case COMP/C-3/39.391 *EFIM* (n 158).

²¹⁴ Thorsten Käseberg (n 12) p. 24. Case COMP/A. 37.507/F3 – *AstraZeneca* (n 12). Kevin Coates, Lars Kjøbye and Luc Peeperkorn (n 12) p. 1509. Case 193/83 *Windsurfing International Inc.* (n 28).

²¹⁵ European Commission (n 207) p. 15.

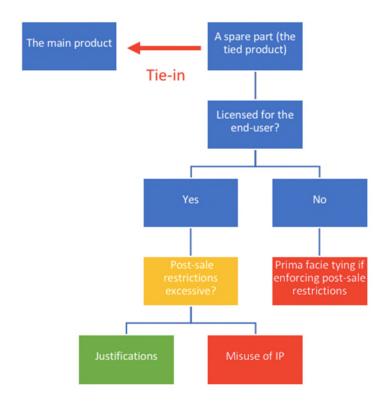


Table 2. The assessment of post-sale restrictions in the context of tying.

As illustrated in Table 2, the legal position of post-sale restrictions in the context of tying is not simple. The debate on the validity of post-sale restrictions and the scope of those restrictions has an effect on the competition law assessment. On the other hand, the emphasis should be put more on the effect of the restrictions and their enforcement, rather than the validity itself. With regard to the question as to whether the post-sale restrictions are in compliance with competition law, the assessment varies depending on the circumstances. The outcome depends on the functioning of both the main product and spare part markets and the company's position on both markets. Companies should conduct self-assessment when considering enforcing their IP through post-sale restrictions in licensing agreements in the EU. This could also include strategic aspects of their licensing practices.

As a point of comparison to the European approach, the U.S. approach on post-sale restrictions has been more admissible prior to the *Lexmark* case, decided in June 2017. In this case, the U.S. Supreme Court took an explicit

stance on the position of post-sale restrictions and the exhaustion doctrine stating that such restrictions exhaust patent rights. The following section provides a comparative perspective on the issues of validity and compliance with competition law where the U.S. approach is presented and considered.

4 Comparative perspective on post-sale restrictions – the U.S. approach

In the following section, the two core parameters for the IP validity and competition law compliance analysis are considered from the U.S. perspective – the exhaustion doctrine and the tying assessment.

4.1 Approach in the U.S. on the exhaustion doctrine

In relation to the patent exhaustion doctrine, a similar approach applies in the U.S. as to that in the EU. The patent owner's right to limit²¹⁶ use is not applicable once patented products are lawfully made and sold directly or indirectly²¹⁷ within the U.S.²¹⁸ Generally, the patent exhaustion doctrine does not apply to rights, which are outside the scope of the patent.²¹⁹ Practices, such as field-use restrictions, are within the scope of protection of the patent and in compliance with the U.S. patent laws.²²⁰

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²¹⁶ Under U.S. law, a patent owner has an exclusive right to exclude others from producing, using, selling and importing the patented invention for the duration of the patent, which is 20 years from filing the patent application. Title 35 of the Code of Laws of the United States of America (Patent Act) § 271(a), 154(a) (2).

²¹⁷ In other words, the patent holder's direct sales are not required. However, it must be noted also that there were no use restrictions in Quanta. LG's patent rights were exhausted, when Intel sold microprocessors to Quanta based on the unrestricted licensing agreement between LG & Intel. *Quanta Computer, Inc., et al., Petitioners, v. LG Electronics, Inc.* 553 U.S. 617 [2008]. Also, on licensing, *Helferich Patent Licensing LLC v New York Times Co* 778 F.3d 1293 [Fed Cir 2015]

²¹⁸ The exhaustion doctrine has been established in *Adams v. Burke*. However, the patented product sold outside the U.S does not exhaust the patent owner's right to limit imports. *Adams v. Burke* (n 7). *Jazz Photo Corp. v. United States International Trade Commission*, 264 F. 3d 1094 [Fed. Cir. 2001].

²¹⁹ For instance, in *Monsanto Co. v. McFarling* 363 F.3d 1336 [Fed. Cir. 2004] at. 1342-43, the rights to self-replicate technology's fruits are not exhausted, when such technology rights do not fall within the patent grant.

Under U.S. patent law, the patent owner has a right to exclude others from making, using, or selling a patented invention. In *General Talking Pictures Corp. v. Western Electric Co.* 304 U.S. 175 [1938], the Supreme Court held that "patent owners may grant"

On the other hand, under U.S. trademark law, the exhaustion doctrine is established by the case-law rather than by the Lanham Act. The exhaustion is derived from the function of the protected trademark, i.e., the identification, distinctiveness and quality of the trademarked product.²²¹ The trademark rights are exhausted when the first authorized sale has occurred. A condition for the authorized sale is that the product sold is genuine and unchanged.²²² However, the authorization for *reselling* the product is not required if "the sale of genuine goods bearing a true mark" has occurred.²²³ Similar to the patent exhaustion doctrine, it follows from trademark exhaustion that the trademark holder is not able to impose limitations to the use of its trademark when certain requirements are fulfilled.²²⁴

Another criterion has been considered in relation to bundling practices relating to a trademark. The exhaustion does not apply if the trademarked goods sold are "materially different than those sold by the trademark owner". The concept of "material difference" resembles the European concept of "alteration" as a limitation to the exhaustion doctrine. The material difference has been traditionally defined as referring to any kind of difference between an authorized and unauthorized good, which "would cause consumer confusion, dissatisfaction, and irreparable harm to the goodwill of the United States' trademark holder". But unbundling of software products, which were sold as bundled by the trademark holder, is not considered as a material difference in the context of limiting to the exhaustion doctrine. In this situation, however, at issue was a sale, not a

licenses extending to all uses or limited to use in a defined field", at 181. Title 35 of the Code of Laws of the United States of America (Patent Act) § 154(a) (1).

²²¹ Qualitex Co. v. Jacobson Prod. Co., Inc., 514 U.S. 159, 163-64 [1995].

²²² Polymer Technology Corp. v. Mimran, 975 F.2d 58, 61-62 [2d Cir. 1992]. Tiffany (NJ) Inc. v. eBay, Inc., 600 F.3d 93, 103 [2d Cir. 2010]. ²²³ ibid.

²²⁴ *ibid*. (n 222).

²²⁵ Softman Prod. Co., LLC v. Adobe Systems, Inc., 171 F. Supp. 2d 1075, 1092 [C.D. Cal. 2001].

²²⁶ Societe Des Produits Nestle, S.A. v. Casa Helvetia, Inc. 982 F.2d 633, 641 [1st Cir.1992].

²²⁷ Softman Prod. Co., LLC v. Adobe Systems, Inc., 171 F. Supp. 2d 1075, 1092 [C.D. Cal. 2001].

license. Material difference could occur even by minor differences. For instance, removing the batch codes or tags or other packaging changes could constitute a material difference.²²⁸ Additionally, the Tenth Circuit Court has considered the resale of products in the trademark exhaustion context in the case of *Beltronics v. Midwest Inventory Distribution (Beltronics)*. The case is discussed in the following section.

4.1.1 Beltronics case – The concept of material difference in the context of post-sale restrictions

The case was an appeal to a preliminary injunction by Midwest Inventory Distribution LLC (Midwest) against Beltronics USA Inc. (Beltronics). Midwest is a consumer electronics company and Beltronics is a provider of aftermarket vehicle electronics such as radar detectors. Beltronics had sold electronic equipment under its trademark to at least two authorized distributors. These distributors sold Beltronics radar detectors to Midwest in violation of their distribution agreements. Further, Midwest resold these radar detectors as a new product on Ebay. The original label was removed, altered and replaced by Midwest and the distributors. According to Beltronics policy, only Beltronics radar detectors with an original serial number label were provided with products and services' warranties or software updates. When Midwest had altered the Beltronics products, the consumer could no longer receive a warranty from Beltronics. The consumers were also confused by the alterations causing harm to the reputation of Beltronics and its goodwill.

²²⁸ Davidoff & CIE, S.A. v. PLD Int'l Corp. (Davidoff & CIE, S.A), 263 F.3d 1297, 1302 [11th Cir. 2001]. Zino Davidoff S.A. v. CVS Corp., 571 F.3d 238 [2d Cir. 2009].

²²⁹ Beltronics USA Inc. v. Midwest Inventory Distribution LLC (Beltronics USA Inc.), 562 F.3d 1067 [10th Circuit 2009] p. 2.

²³⁰ *ibid.* p. 2.

²³¹ Beltronics USA Inc. (n 229) p. 3.

The issue was whether Midwest could sell Beltronics equipment without an original Beltronics serial number label. The Tenth Circuit Court noted that the exhaustion doctrine is not applicable "when an alleged infringer sells trademarked goods that are materially different than those sold by the trademark owner". 232 A materially different good has been defined as a nongenuine good, which may generate consumer confusion about the source of the good and the quality of the trademarked product.²³³ The Court held that trademark infringement can be effected by an unauthorized resale of a materially different trademarked product.²³⁴ The materiality assessment should be conducted on a case-by-case basis by examining products and markets at issue as well as whether the difference confuses consumers and impedes the trademark holder's goodwill.²³⁵ The Court also noted that the threshold should be kept low.²³⁶ Material differences should not be limited only to physical differences but could also be other differences such as "warranty protection or service commitments". 237 In that case, the alterations of Beltronics products done by Midwest were considered as material since they had influenced the consumer's decision whether to purchase the product.²³⁸

The concept of material difference is interesting from the perspective of post-sale restrictions. For the restrictions in the post-sale era to be valid and enforceable, such restrictions are not required to be solely physical. Non-physical alterations could also constitute material difference. Consumer

²³² Beltronics USA Inc. (n 229) p. 8. Davidoff & CIE, S.A. (n 228) at 1302.

²³³ Beltronics USA Inc. (n 229) p. 8. Gamut Trading Co. v. U.S. International Trade Commission, 200 F. 3d 775, 779 [Federal Circuit 1999]. Iberia Foods Corp. v. Romeo, 150 F.3d 298, 303 [3rd Circuit 1998].

Beltronics USA Inc. (n 229) p. 8. Brilliance Audio, Inc. v. Haights Cross Communications, Inc., 474 F.3d 365, 370 [6th Cir. 2007]. Davidoff & CIE, S.A. (n 228) at 1302. Iberia Foods Corp. v. Romeo (n 233) at 302-303. Martin's Herend Imports, Inc. v. Diamond & Gem Trading USA, Co., 112 F.3d 1296, 1302 [5th Cir.1997]. Societe Des Produits Nestle, S.A. v. Casa Helvetia, Inc. (Societe Des Produits Nestle, S.A.) 982 F.2d 633, 638-639 [1st Cir.1992]. Original Appalachian Artworks, Inc. v. Granada Elecs. Inc., 816 F.2d 68, 73 [2d Cir.1987].

²³⁵ Beltronics USA Inc. (n 229) p. 10. Societe Des Produits Nestle, S.A. (n 234) at 638-641. Brilliance Audio, Inc. v. Haights Cross Communication LLC, 474 F.3d 365 [6th Circuit 2007] at 371.

²³⁶ Beltronics USA Inc. (n 229) p. 10. Davidoff & CIE, S.A. (n 228) at 1302.

²³⁷ Societe Des Produits Nestle, S.A. (n 234) at 639.

²³⁸ Beltronics USA Inc. (n 229) p. 18.

confusion is still required but for instance, the trademark holder's policy on warranties could prevent the application of the exhaustion doctrine. The Beltronics case did not consider a license. Thus, in certain circumstances, licensing might not be required in order to validly enforce post-sale restrictions. This is a consequence of the broader protection provided by trademark legislation compared to patent legislation.

In contrast, the U.S. Supreme Court has taken an explicit stance on the post-sale restrictions and the exhaustion doctrine in the patent context in its judgment *Impression Products*, *Inc. v. Lexmark International*, *Inc.* ("Lexmark") on 30 May 2017.

4.1.2 Lexmark case – End of post-sale restrictions in patent licensing?

The *Lexmark* case considers post-sale restrictions in printer and spare part markets, particularly both single-use and prohibition to use another supplier's products. Lexmark International, Inc. ("Lexmark") is a designer, manufacturer and seller of toner cartridges to consumers within the U.S. and also abroad.²³⁹ Lexmark holds several patents for components of the cartridges and also process patents as to how the components are used.²⁴⁰ Lexmark sells toner cartridges in two ways: a consumer can buy cartridges with a full price and no use restrictions or buy discount cartridges through the Return Program agreeing not to re-use the cartridge or transferring it only to Lexmark.²⁴¹ Remanufacturers, such as Impression Products, Inc. ("Impression Products"), obtain both types of Lexmark's cartridges from consumers and after that refill and resell them. This is done within the U.S. and abroad, after which time products are imported back to the U.S.²⁴² Lexmark has sued, inter alia, Impression Products for patent infringement

²⁴¹*ibid*. Syllabus p. 1.

²³⁹ Impression Products, Inc. v. Lexmark International, Inc., 581 U.S. 1523 [2017] Syllabus p. 1.

²⁴⁰ *ibid*. Syllabus p. 1.

²⁴² Lexmark International, Inc. (n 239) Syllabus p. 1.

regarding the cartridges reused in the U.S. and also regarding imported cartridges from outside the U.S. ²⁴³

The main issue was whether Lexmark retained itself a right to limit use by an express prohibition of reuse and re-sale on consumer sales, when the sales occurred within or outside the U.S. The Supreme Court held that Lexmark exhausted its patent rights in the U.S. When the patent holder decides to sell a product, it exhausts all of its patent rights regardless of any use restrictions.²⁴⁴ Even if clauses in consumer contracts were enforceable under contract law, clauses do not entitle Lexmark to retain patent rights on items it has sold.²⁴⁵ In other words, rights under patent law are exhausted following the first-sale and thus, the patent holder no longer has a right to bring infringement claims.²⁴⁶ The exhaustion doctrine applies not only to national sales but also to sales outside the U.S. territory.²⁴⁷ The Court concluded that the exhaustion doctrine is not any kind of presumption that authorization to use accompanies the sale of a product.²⁴⁸ Rather the doctrine is a limitation to the scope of patent holder's rights.²⁴⁹ The purchaser of a product does not have the rights included due to the fact that the patent holder has granted its permission to use but those rights come along with ownership.²⁵⁰ Thus, in the U.S., categorical exhaustion is not possible anymore.

Lexmark can be considered as an end point for the line of case-law starting from Bauer and continuing with Mallinckrodt and Quanta. In Bauer, the vendor could not impose post-sale restrictions with regard to price by a notice.²⁵¹ However, Mallinckrodt was an overruling of Bauer, where the restriction on reuse was considered being enforceable under patent law

²⁴³ Lexmark International, Inc. (n 239) Syllabus p. 1-2.

²⁴⁴ *ibid*. Syllabus p. 2.

²⁴⁵ *ibid*.

²⁴⁶ *ibid.* p. 3.

²⁴⁷ *ibid.* p. 4.

²⁴⁸ *ibid*. p. 3.

²⁴⁹ *ibid*.

²⁵⁰ *ibid*. p. 3-4.

²⁵¹ Bauer & Cie. and the Bauer Chemical Company v. James O'Donnell 229 U.S. 1 [1913].

when within the scope of the patent. In *Mallinckrodt*, the single-use restriction of the licensed product (post-sales restriction) and the patent infringement caused by the reuse had been considered directly.²⁵² In *Lexmark*, the Federal Circuit relied on this doctrine that when the patent holder has sold its product through clearly communicated use restrictions, it retains a right to enforce its patent rights through patent infringement claims.²⁵³ However, the Supreme Court did not agree with the Federal Circuit as discussed above.²⁵⁴ On the other hand, in *Quanta*, LG's patent rights were exhausted, when Intel sold microprocessors to Quanta based on an unrestricted licensing agreement between LG & Intel.²⁵⁵ However, in *Quanta*, there were no use restrictions in the licensing agreement.²⁵⁶ Prior to *Lexmark*, patent holders have been able to obtain royalty-revenue from suppliers in the downstream market by appropriate use of post-sale restrictions in the U.S.

Importantly, however, the factual background in these U.S. cases has been different. *Lexmark* and *Bauer* consider purely purchase agreements and post-sale restrictions imposed on sales. *Quanta* considered an indirect licensing relationship, which did not include any use restrictions in the licensing agreement. Mallinckrodt, on the other hand, considered post-sale restrictions in licensing agreements. It can be argued that all of these situations differ from each other.

A purchase agreement is direct indication that the sale has occurred, and post-sale restrictions are not effective in this regard. But if the question is about a licensing agreement, the situation can be different. Categorical grant of rights is common in licensing agreements, which would also mean

²⁵² Mallinckrodt, Inc. v. Medipart, Inc., 976 F.2d 700 [Fed. Cir. 1992] at. 708-709.

²⁵³ Lexmark International, Inc. v Impression Products, Inc. 816 F. 3d 721 [Fed. Cir. 2016]. Practical Law Intellectual Property & Technology, "No Patent Exhaustion from Resale Restriction, Sale Abroad: Fed. Cir" (Westlaw Practical, Thomson Reuters 16 February 2016). Willian C. Rowland, "U.S. Patent Rights Are Not Exhausted by Restricted U.S. Sales or by Any Foreign Sales" (Intellectual Property & Technology Law Journal, 2016, Issue 28 Vol.6) p.10-14).

²⁵⁴ *Lexmark International, Inc.* (n 239).

²⁵⁵ Quanta Computer, Inc., et al., Petitioners, v. LG Electronics, Inc. 553 U.S. 617 [2008]. ²⁵⁶ ibid.

categorical exhaustion of rights. The Supreme Court also recognized this situation in *Lexmark*, when discussing the *General Talking Pictures* precedent. *General Talking Pictures* implies that "if a patentee has not given authority for a licensee to make a sale, that sale cannot exhaust the patentee's rights."²⁵⁷ In this case, the licensee "knowingly made sales [...] outside the scope of its license".²⁵⁸ In General Talking Pictures, the patent holder could have sued the licensee (placing the product into the market contrary to its license) and the purchaser was aware of the breach of the license.²⁵⁹ In *Lexmark*, the Supreme Court stated that "the patent exhaustion is uniform and automatic" and once the patent holder decides to sell the product covered by the patent, the sale exhausts its rights regardless of post-sale restrictions imposed "either directly or through a license".²⁶⁰

General Talking Pictures covered a license between the patent holder and another party placing the product on the market. It is not necessary that the patent holder itself places the product into circulation – the purchase has still occurred. However, Lexmark does not take into account the situation, in which the patent holder directly licenses the product to the consumer. In this situation, no sale has occurred, which is in line with the Mallinckrodt doctrine. In Mallinckrodt, a licensing agreement imposed post-sale restrictions, which were confirmed being valid and enforceable under patent law. Thus, it can be argued that Lexmark is not an overruling of Mallinckrodt due to the fundamental factual differences in the two cases. However, post-sale restrictions could still cause competitive concerns as in the case of tying, which are considered in the following section.

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²⁵⁷ Lexmark International, Inc. (n 239) Opinion of the Court, p. 12. General Talking Pictures Corp. v Western Elec. Co. (General Talking Pictures Corp), 305 U. S. 124, 127 [1938].

²⁵⁸ Lexmark International, Inc. (n 239) Opinion of the Court p. 12.

²⁵⁹ General Talking Pictures Corp. (n 257).

²⁶⁰ Lexmark International, Inc. (n 239) Opinion of the Court p. 12.

²⁶¹ See on the matter, Richard H. Stern, "Once more unto the breach - US Supreme Court again addresses exhaustion doctrine", (European Intellectual Property Review 2017 Issue 39 Vol 4) p. 197–201.

4.2 The U.S. approach on tying – the doctrine of IP misuse

The U.S. Sherman Act Section 2 provides more flexible approach on assessing monopolization where not only the act of monopolization itself but also its attempt is prohibited, compared to Article 102 TFEU.²⁶². In relation to the Sherman Act Section 2, the case law has defined the meaning of tying as "an agreement by a party to sell one product but only on the condition that the buyer also purchases a different (or tied) product, or at least agrees he will not purchase the product from any other supplier."²⁶³ The prohibition of tying is also explicitly stated in Clayton Act Section 15. According to the latter, imposing condition, agreement or understanding on the sale of goods for use or resale that the purchaser shall not use another competitor's products is unlawful. The effect of such arrangement "may be to substantially lessen competition or tend to create a monopoly in any line of commerce".²⁶⁴

In addition to the aforementioned antitrust statutes, the wording of the U.S. patent legislation takes into consideration also competition law aspects of tying by providing an exception to the patent holder's right to compensation in case of patent infringements. The phrase "the patent owner has market power in the relevant market for the patent or patented product on which the license or sale is conditioned" suggests that a company with market power in the tying product market does not have a right to exclude the use of IPR and thus a right to compensation. Interestingly, the U.S. antitrust guidelines on IP licensing regarding, interestingly, they is used to cover

²⁶² "Every person who shall monopolize, or attempt to monopolize, or combine or conspire with any other person or persons, to monopolize any part of the trade or commerce among the several States, or with foreign nations, shall be deemed guilty of a felony" Sherman Act 15 U.S. Code § 2.

²⁶³ Northern Pacific Railway Co. et al v. United States, 356 U.S. 1, 5-6 [1958].

²⁶⁴ Clayton Act 15 U.S. Code § 14.

²⁶⁵ 35 U.S. Code § 271(d) (5).

trademark licensing, although the same antitrust principles apply as regarding other trademark antitrust issues.²⁶⁶

In the U.S., tying has to fulfill similar criteria to the ones established in the EU in the *Microsoft* case, in order to be considered an antitrust violation. The seller needs to have market power in the tying product market,²⁶⁷ the arrangement has an adverse effect on competition in the relevant market for the tying product or the tied product, and efficiency justifications for the arrangement do not outweigh the anticompetitive effects.²⁶⁸

The leading U.S. case combining tying and IPR elements is the U.S. Supreme Court's case *International Salt*. The Supreme Court has held that the Sherman Act prohibits, as a *per se* violation, all arrangements tying the raw material and its use by the company, which is the largest producer for the raw material and also has a legal monopoly granted by a patent for utilization of the raw material.²⁶⁹ The case considered the lease of the patent protected machine, which could be assimilated to licensing in terms of retention of ownership.²⁷⁰ The Supreme Court stated that "the patents confer no right to restrain use of, or trade in, unpatented salt" and that closing the market by contracting, the company has restrained trade since "its patents afford no immunity from the antitrust laws".²⁷¹ If only the machine enjoys the IP protection but not the spare part itself, the arrangement of tying these together constitutes an infringement of the Sherman Act. However, post-sale restrictions could be effective if the spare part itself enjoys IP protection.

²⁶⁶ U.S. Department of Justice and the Federal Trade Commission, Antitrust Guidelines for the Licensing of Intellectual Property [2017] fn 1.

²⁶⁷ Compare with "appreciable market power". Eastman Kodak v Image Technical Services Inc. 504 US 451, 462 [1992]. U.S. Department of Justice and the Federal Trade Commission, (n 266) p. 28-29.

²⁶⁸ The application of a *per se* rule was rejected in the context of "*platform software*". *United States v. Microsoft Corp.*, 253 F.3d 34 [D.C. Cir. 2001] U.S. Department of Justice and the Federal Trade Commission (n 266) p. 28-29.

²⁶⁹ International Salt Co., Inc. v. United States, 332 U.S. 392 [1947]

²⁷¹ Ibid. Morton Salt Co. v. G.S. Suppiger Co., 314 U. S. 488 [1942]. Mercoid Corporation v. Mid-Continent Investment Co., 320 U. S. 661 [1944]. Mercoid Corporation v. Minneapolis-Honeywell Regulator Co., 320 U. S. 680 [1943].

The monopolization prohibition might be infringed if the IP holder misuses its IP by engaging in conduct outside the scope of protection provided by IP laws.²⁷² Misuse refers to the proprietors' acts having "impermissibly broadened the physical or temporal scope of the IP grant with anticompetitive effect"²⁷³, which extends the "grant beyond its statutory limits".²⁷⁴ Thus, similar to the EU position, the scope of the IP affects the competition law assessment but the anti-competitive effects must also be assessed.²⁷⁵

Concluding this part of the discussion, the U.S. approach can be considered coming closer to the EU one. The exhaustion doctrine has been recognized both in the EU and the U.S.²⁷⁶. In the U.S., *Lexmark* has certainly been a turning point for the use of post-sale restrictions in the patent context. The Supreme Court's case-law in this regard is not consistent. However, trademarks may have more leeway for continued IP protection, as in the EU, with the doctrine of *material difference*.

The antitrust scrutiny in relation to tying can be considered as being more extensive in the U.S. than in the EU. In the EU, tying refers to the acceptance of supplementary obligations whereas in the U.S., it refers either to the purchase of the tied product or imposing condition, agreement or understanding. The EU's and the U.S. Clayton Act's definitions are broad,

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²⁷² However, IP misuse might occur even if there is no antitrust violation due to the broader scope of IP misuse. Herbert Hovenkamp, "Innovation and Competition Policy: Cases and Materials - Intellectual Property Misuse" (2nd edition. 2012) Received from https://ssrn.com/abstract=1943154, p. 21, 33.

²⁷³ Princo Corp. v. International Trade Commission 616 F.3d 1318 [Fed. Cir. 2010] at 1327-28. Windsurfing International, Inc. v. AMF, Inc., 782 F.2d 995 [Fed. Cir. 1986]. Hovenkamp (n 272) p. 33.

²⁷⁴ *USM Corp. v. SPS Techs., Inc.*, 694 F.2d 505 [7th Cir. 1982]. Hovenkamp (n 272) p. 33. ²⁷⁵ In *Monsanto*, the Court declined to hold that Monsanto's raw exercise of its right to exclude from the patented invention is in itself a "*tying*" arrangement that exceeds the scope of the patent grant. *Monsanto Co. Monsanto Co v McFarling* 363 F. 3d 1336, 1342 [Fed. Cir. 2004].

²⁷⁶ Notably, the World Trade Organization Agreement on Trade Related Aspects of Intellectual Property Rights (TRIPS) leaves the discretion for the Contracting States regarding the exhaustion of intellectual property rights. TRIPS Annex 1 c, Art 4. For instance, in the EU, Joined Cases 51/75, 86/75 and 96/75 *EMI Records Limited* (n 30) para 26-27. In the U.S., the doctrine was established by the case *Adams v. Burke* 84 U.S. (17 Wall.) 453 (1873).

meaning they could also catch licensing. But in relation to the Sherman Act, the wording "purchase of tied product" suggests that a licensing agreement would not be within the scope of such provision. However, similar to the EU, the U.S. Supreme Court has explicitly stated that patents do not afford immunity from antitrust laws. This is applicable also to other types of IP.

In the U.S., the legal position of post-sale restrictions is clearer compared to the EU. The Supreme Court's case-law is more sophisticated in this sense and it has explicitly taken stance on the matter, although being restrictive. However, there has been no case, in which a *direct* licensing relationship has been considered. Although post-sale restriction licensing would survive under IP laws, competition law scrutiny regarding potential misuse of the IP may be a serious risk under the Clayton or the Sherman Act.

5 Implications of post-sale restrictions in practice

In light of the previous discussion on the validity of post-sale restrictions and their compliance with competition law in the patent and trademark licensing, the implications of such observations are considered in practice. Particularly, from a licensing strategy perspective, a hybrid model for enforcing post-sale restrictions is introduced. Additionally, policy considerations on the relationship between competition and IP law are discussed in detail.

5.1 Hybrid model as a licensing strategy

An IP licensing strategy requires establishing the goal of the strategy and the type of licensing aimed to be achieved.²⁷⁷ It is also essential to understand the desired outcome of a license – what is licensed, why it licensed and what is sought via the licensing process.²⁷⁸ For a hybrid license with post-sale restrictions, such matters are essential to consider.

²⁷⁷ Korenberg and Robertson (n 1) p. 137. Pafrey, (n 1) p. 87-109.

²⁷⁸ *ibid.* p. 138.

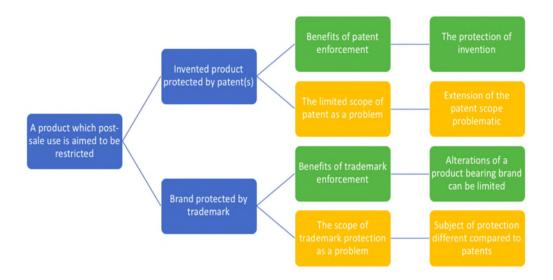


Table 3. The benefits and problems of patent and trademark protection in the context of post-sale restrictions.

As Table 3 illustrates, both patent and trademark protection provide factors beneficial for the enforcement of post-sale restrictions under a licensing agreement. The scope of patent protection covers the subject-matter of the invention, different use of which may be licensed separately by field-of-use restrictions. Post-sale restrictions in a licensing agreement broaden the scope of patent protection by aiming at circumventing the exhaustion doctrine (possibly unjustifiably). This may be problematic from a competition law perspective. On the other hand, trademarks protect brand as such, which, however, covers also the product where the brand has been attached onto it. Alterations of such product may be limited by the trademark holder regardless of the existence or not of a license. Thus, a hybrid model should be employed. Even if patent enforcement of post-sale restrictions would not succeed, the proprietor would have still an option to enforce its trademark in relation to alternations. This can be beneficial in cases, for instance, where the aim is to prohibit reuse of a product with alterations.

Considering the benefits of a hybrid license with post-sale restrictions from a competition law perspective, the emphasis should be put on the market position of the licensor and the effect of the license on the aftermarket. A

company in a dominant position must refrain from enforcing its IP rights, particularly under a patent license with post-sale restrictions, due to the problems associated with extending the scope of patent. Trademark enforcement is still an option, however, the exclusionary effects on the aftermarket must be considered. Smaller players will have more flexibility in terms of enforcing both types of their IP, when Article 102 TFEU is not applicable. The effects on the aftermarket with a hybrid license are similar to those previously discussed in the section on competition law. In other words, disclose effects are possible particularly when the aim is to prohibit reuse of a product with alterations, which may be considered as an anticompetitive aim.

In a basic scenario with a hybrid license, the application of patent or trademark law could be extended but liability under competition law may not be avoided. Considering whether licensing is necessary or even desirable in view of its purported aims and effects, the benefits and risks of post-sale restrictions must be assessed. Post-sale restrictions are beneficial in markets where the revenue is stemmed from the aftermarket, such as ink for printers, gas bottles for machines or other types of spare parts. Post-sale restrictions might not even be required if the spare part is not standardized or easily being copied. However, it can be questioned whether a company should even attempt to retain this spare part activity itself with a post-sale restriction license. On the other hand, the protection of a trademark or luxury image can be considered as a reason when this would be beneficial. Particularly, if competitors' business is to alter the original producer's goods and resell them. However, in this situation, should the consumers still have a choice between the original supplier and the competitor in the spare part market? From a competition law perspective, the answer is yes unless there are justifications. Ultimately, the question on post-sale restrictions is about allocation of risks by the original supplier, i.e. whether and to what extent the company is willing to bear the risk of competition law scrutiny.

However, considering the *SodaStream* scenario, when there are parallel IP and competition law proceedings involving the same parties, the situation might be problematic in case of a license (hybrid or not). In other words, which legal assessment should prevail. Policy considerations are discussed in the following section.

5.2 Policy considerations

The intersection between competition law and IP law has been highly debated among legal scholars for competition law being static.²⁷⁹ The preferred dynamic and effect-based competition and its incorporation with the IPRs and innovation has raised different opinions, how the incorporation should be executed.²⁸⁰ Whether traditional competition law instruments are sufficient or whether new ones should be introduced.²⁸¹

From a policy perspective, IP law is generally subordinate to competition law, even if use restrictions are in compliance with IP law and valid clauses in contractual sense. A problematic situation arises if the court decision regarding the IP infringement has become final (res judicata) confirming the IP infringement. In these kind of situations, competition law may be exceptionally in subordination with IP laws. As stated in CJEU's case Hoffmann-La Roche, the NCA should take into account other authorities' decisions on the matter. In national cases concerning SodaStream, parallel IP infringement proceedings with competition law scrutiny have been problematic. In such situations, the outcome of IP infringement proceedings will influence the competition law assessment, and the NCAs are bound by the decision. Depending on the outcome of such proceedings, the competition law assessment may differ as far as the scope of IP is

²⁷⁹ Ioannis Lianos, Competition Law and Intellectual Property Rights: Promoting Innovation in Ioannis Lianos and Valentine Korah, Competition Law: Analysis, Cases and Materials (Hart Publishing 2017) p. 22–27.

²⁸⁰ Ioannis Lianos (n 279).

²⁸¹ *ibid.* p. 25. See also, Marcus Glader, "Innovation Markets and Competition Analysis: EU Competition Law and US Antitrust Law" (Edward Elgar 2006).

concerned. For this reason, courts should take into consideration also competition law aspects if a party has pleaded such arguments in IP infringement proceedings. Particularly, this should be the case if the same court scrutinizes also competition law matters.

In aftermarket cases, successful infringement actions by the IP holder will affect competition by reducing or sometimes even eliminating competition entirely. From the viewpoint of legal certainty, the NCA intervention, for instance, regarding tying is problematic if such behavior has been confirmed by the court with regard to the IP relation.²⁸² However, the NCAs may still consider such behavior as abuse of procedure from a competition law perspective. The flexibility under Article 102 TFEU would render possible for the NCAs to scrutinize any exclusionary abuses, if necessary. However, it can be questioned whether that would be a rather rare occasion, when an abuse of procedure claim is actually successful. The burden of proof might be too high for proving the abuse of procedure.

Consequently, the question remains: what is the ideal balance between such conflicting interests and which one should prevail? As the Commission has stated, competition law scrutiny is complementary and not subordinate to other areas of laws, such as IP law. Considering the "order" of these two assessments in case of parallel proceedings, as the FCCA stated in SodaStream, it is not expedient for the NCA to investigate competition law matters simultaneously with IP proceedings, the outcome of which may affect the scope of IP in question.

I agree with the statement of the FCCA. At a policy level, it may not be expedient to scrutinize competition law aspects simultaneously with IP matters since this may cause differentiating opinions regarding the subject-matter of IP. When courts are authorized to assess the subject-matter of IP,

²⁸² On the problematic on the parallel application of IP and Antitrust scrutiny. Ariel Katz, The economic rationale for exhaustion: distribution and post-sale restraints in Irene Calboli and Edward Lee, *Research Handbook on Intellectual Property Exhaustion and Parallel Imports* (Edward Elgar Publishing 2016).

it would be beneficial for the NCAs to rely on such assessment, rather than conducting it on their own. Of course, the NCAs have their own internal priorities on case management²⁸³ and in certain cases the effect on competition requires immediate action. Reliance may be impossible, particularly, if it is expected that IP proceedings would be sought in several instances. Competition law scrutiny should not be avoided just by initiating parallel proceedings. However, if there is a final decision on the IP matter or such decision is expected to be adopted in the foreseeable future, relying on the court's assessment on the scope of IP would be beneficial for the NCAs. This would also facilitate legal certainty among different public instances²⁸⁴ where the interpretation of IP would be uniform in both the IPR and competition assessments. New instruments may not be required for assessing IPRs in the competition law context, but emphasis should be put on the IPR protected and, on the other hand, on the harmful effects on competition. Thus, a more flexible, balanced and effects-based approach should be employed.

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²⁸³ Finnish Competition Act (948/2011) Section 32.

²⁸⁴ At EU level, achieving legal certainty would mean that the European Commission should consider national or EU-wide IP decisions in its competition assessment.

6 Conclusion

Post-sale restrictions in patent and trademark licensing agreements and their validity and compliance with competition law emphasize the problematic to what extent the IP holder may enforce its IP rights. On the other hand, concepts such as misuse of IP or abuse of procedure are closely related to this discussion. Above all, the discussion on post-sale restrictions raises questions on the relationship between IP and competition law.

From the perspective of validity under patent and trademark laws, the application of the exhaustion doctrine is an essential parameter to be considered due to the nature of post-sale restrictions. The exhaustion doctrine may be limited by justifications under patent law or alterations limitations under trademark law. Licensing could be also considered as a limitation for the exhaustion doctrine with reservations since its legal sphere in this context is ambiguous. In the EU, there has been no explicit case on post-sale restrictions in relation to licensing. However, due to the lack of transfer of ownership or the consented all use (a lack of elements of a sale), a license should not be equated to a sale.

Post-sale restrictions in licensing agreements under patent or trademark law can be said being generally valid, when within the scope of patent or trademark protection. The scope of IP varies in any given case. The consent of the IP holder is the key element in order to determine validity. If the IP holder has not given its consent to use the product in a certain way and retained the right for that specific use for itself, ownership does not transfer entirely. However, post-sale restrictions may not interfere with other areas of law, such as competition law or internal market freedoms.

Shift from patent licensing to trademark licensing may be considered as a possible solution, when the outcome with post-sale restrictions may be uncertain due to the broadened scope of a patent leaving room for

interpretation. Trademark licensing may provide a more predictable legal environment for post-sale restrictions due to the broader scope of trademark protection. The U.S. *Lexmark* case supports also this finding: the U.S. Supreme Court has taken a stricter approach on the patent exhaustion doctrine. The settled *alteration* or *material difference* limitation to the trademark exhaustion could suggest that licensing in the trademark context might not even be needed. However, due to the different subject of protection between patents and trademarks, it might not be sufficient to rely only on one type of protection. Rather, a hybrid model should be employed benefiting from both types of protection. Even with a hybrid license, however, competition law scrutiny may not be avoided.

From the perspective of competition law, the validity of post-sale restrictions under patent or trademark laws cannot be considered as a presumption of compliance with competition law. Regardless the validity, such conduct could constitute an abuse of dominant position in the form of tying or abuse of procedure. Even though a dominant company has a legal right to exploit its IPRs under patent or trademark law, such exploitation must not be excessive resulting to anti-competitive disclosure of neither the primary nor the aftermarket by misusing its IP as tying. Neither any abuse of procedure is accepted.

In light of the theory of harm, when the main product and the spare part are tied together with post-sale restrictions, foreclosure effects arise affecting the downstream market's competition. If the monopoly is created by the IPRs enforced through post-sale restrictions and such monopoly is possibly confirmed by an infringement claim, barriers to entry to the market are high and in certain cases, entry may not even be possible. When assessing whether post-sale restrictions go beyond the scope of the IP for the purposes of competition law, the emphasis should be mostly placed to the competitive effects in accordance with the theory of harm rather than considering purely the scope of IPRs *prima facie*. The use of post-sale restrictions in licensing agreements could be justified, mostly under trademark law. However, if

competition in the aftermarket is eliminated entirely or otherwise distorted, such conduct may not be justified.

By enforcing post-sale restrictions, the dominant company could also engage in abuse of procedure. However, a problematic situation arises when there are parallel IP and competition law proceedings between the same parties as seen in *SodaStream*. From a policy perspective, competition law is not generally subordinate to IP laws, even in the case of valid restrictions under IP laws. In the case of parallel proceedings, competition law may be *exceptionally* subordinate to IP laws, when the competition law assessment may be dependent on the outcome of the IP procedure as far as the scope of IP is concerned. Such procedure will influence the competition law assessment, and the NCAs are bound by that decision. For this reason, courts should put more emphasis also on the competition law aspects if a party has pleaded such arguments in IP infringement proceedings, particularly, when the same court scrutinizes also competition law matters.

In the ideal balance between competition and IP law assessment, such assessments should be complementary with each other. However, due to the interrelations between these fields of law, it may not always be expedient for the NCAs to conduct simultaneous investigation with parallel proceedings, which may affect the NCA's investigation. In terms of legal certainty and cost-efficiency, the reliance on the outcome of IP proceedings would be beneficial for the NCAs and companies when a uniform interpretation of IP is utilized. However, competition law scrutiny should not be avoided just by initiating parallel proceedings. Thus, competition law as an interactive field of law provides a flexible approach on assessing the exercise of IPRs, such as post-sale restrictions in a licensing agreement, as a "last instance" post-IP proceedings. In other words, in case after the IP proceedings, there is still a need of intervention, competition law scrutiny

may be conducted due to its backwards looking nature²⁸⁵ in Article 102 TFEU cases.

As emphasized, the legal assessment of post-sale restrictions in patent and trademark licensing is multilayered with interactions between different substantive laws, such as trademark, patent, contract and competition laws. Due to the complex and partially ambiguous legal sphere, in the end, the question remains: should post-sale restrictions be even utilized in licensing? In order to benefit the use of post-sale restrictions by receiving aftermarket revenues, the companies should self-assess of their position on the markets, while also considering any strategical aspects.

Ultimately, the question is about the allocation of risks by the holder of the IPR, i.e. whether the company is willing to bear the risk of competition law scrutiny. However, such prediction and allocation of risks may be complicated due to the lack of case-law on the matter. In the future, hopefully, the CJEU will have an opportunity to explicitly take a stance on post-sale restrictions in a licensing context. This would be desirable for the sake of legal clarity, coherence and uniformity within the EU.

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²⁸⁵ Damien Geradin, Anne Layne-Farrar and Nicolas Petit, *EU Competition Law and Economics* (Oxford University Press 2012) Section 4.125. Josef Drexl and Fabiana Di Porto, *Competition Law as Regulation* (Edward Elgar Publishing 2015) p. 15–16.

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