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**Revisiting the Regulation of the Legal
Profession in the European Union in Light
of Legal Technology**

Irene Ng (Huang Ying)

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Abstract

Legal technology, or also known as legal tech, has been under the spotlight in recent years: ranging from litigation to transactional work, legal tech has received significant media coverage and has been described as a disruptive technology that is poised to impact the legal industry. Despite the media coverage on how legal technology will take over lawyers, or “uberize” lawyers, little has been discussed or debated on how legal technology should be regulated in the legal industry. This is interesting as lawyers, on the other hand, have always been heavily regulated and subject to strict ethical rules to ensure consumer protection and also achieve more altruistic goals, such as to safeguard the basic human right of access to counsel and access to justice. In this case, if legal technology is competing with lawyers in the legal market to provide legal services directly to client-users, should they then be regulated in a similar way to lawyers? If yes, how should they be regulated to ensure that these noble policy aims are achieved? Furthermore, how should they be regulated in the EU, where there are multiple member states with vastly different national rules on the regulation of the legal profession?

The aim of this working paper is to therefore determine whether a new framework to regulate legal service providers – which includes both lawyers and legal technology companies – should be enacted considering the developments in technology. However, finding an approach begets asking fundamental questions, such as: What is the relationship between legal tech and the legal industry? How has legal tech affected the legal industry and to what degree? Why do we regulate lawyers, and how should we regulate them in light of legal technology? Should legal technology be regulated? With these questions in mind, this thesis hopes to analyze the challenges faced by the legal industry and to address these issues that all of us as lawyers and participants in the legal industry are currently facing or will eventually come head on with.

This working paper is the doctoral thesis that was submitted by the author to the University of Vienna’s Faculty of Law in part fulfilment for the requirements for the doctoral programme in law on 10 September 2019. Since its submission, several developments have occurred in this field in the EU. An update to reflect these new changes may be considered at a later point in time.

This thesis has been cited in the style of the Oxford University Standard for the Citation of Legal Authority, Fourth Edition.

Foreword

My first encounter with legal technology was during the research and writing of my LLM thesis, where I wrote on contract drafting and artificial intelligence (“AI”). As I wrote my LLM thesis, I came across several different contract drafting software or applications that either helped lawyers in their work or sought to provide contract drafting or templating services to the ordinary layman. This sparked my interest in the business of law and how lawyers have not considered the potential of legal technology in affecting our practice of the law and provision of legal services. With the Internet and rapidly advancing technologies or tools such as big data, AI and smart contracts, the possibilities are now much greater than before. My LLM thesis on AI was a precursor to this thesis – as I wrote about the impact of AI on contract drafting and how it should be regulated, I pondered about the impact of legal tech and whether legal tech should be regulated in light of legal ethics and even to some extent, AI ethics. By spring 2016, I concretized my idea on a thesis concerning the regulation of legal tech and prepared a framework for this thesis, which was subsequently accepted in the summer of 2017.

In a matter of three years since 2016, legal technology became the talk of the town and almost every international law firm has discussed or embraced it (although at varying degrees). In 2017, Bucerius Law School started a summer program on legal technology, Austria held its very first legal technology conference called Future-Law, while grassroots organizations that focused on legal technology such as the Legal Hackers organization made its way from the US and began springing up across the European continent. By 2019, several big international and regional law firms have issued statements about their perspective, stance or commitment to adopt legal technology. Even if it were seen as a hype by some in the media, the fact is that the feathers have been ruffled – lawyers know that their monopoly on the provision of legal services is currently being challenged or affected by Legal Tech services and they know that they have to do something to address it.

During my journey as a doctoral candidate, my home country, Singapore, began advocating for legal tech and started off by launching several events and marketing

tools to promote itself as a legal technology hub and to increase awareness of legal technology amongst lawyers. Singapore hosted a large legal technology event called TechLaw.Fest in 2018, which featured multiple panelists from law firms to technology companies speaking about legal technology. Legal technology startup incubation programs such as the Future Law Innovation Program were also developed by the Singapore Academy of Law. Grants were further provided to law firms to help them to subsidize their taking up of legal technology tools. Interest groups such as LawTech.Asia, Singapore Legal Hackers, alt+law and Singapore Management University's LIT bolstered further interest in this field. Being a Singaporean and through my involvement with the LawTech.Asia team and the Singapore Legal Hackers, I had the privilege to experience first-hand and meet people working in this scene. From where I first began in 2015, the dynamics and perception of how legal technology should be dealt with, i.e. feared or embraced, has been a constant topic for debate in the legal industry and is likely to remain. In this thesis, I thus hope to discuss some of the pressing issues relating to the impact of legal technology on the regulation of the legal profession and debate how best to resolve these issues.

From having first conceptualized this thesis in the spring of 2016 to its final completion in 2019, this thesis has been a long time coming. I would like to thank my supervisor, ao. Univ-Prof. Siegfried Fina, for his patience, kindness and encouragement throughout my entire doctorate program; Dr. Roland Vogl of Stanford Law School for his advice and counsel; the Stanford-Vienna Transatlantic Technology Law Forum for its continued support in my projects on legal technology; Assistant Prof. Riikka Koulu of the University of Helsinki Legal Tech Lab for graciously supporting my research visit and allowing me to attend the Legal Tech Lab's conferences in the summer of 2018; my colleagues at CMS Reich-Rohrwig Hainz for their encouragement and support during the writing of this thesis; LawTech.Asia, Legal Hackers Singapore and Legal Hackers Slovenia for inspiring me and keeping me attuned to legal technology developments; my academic colleagues Martin Miernicki and Jia Schulz-Cao for their useful tips and advice during the doctorate process; Prof. Goh Yi Han and his team from the Singapore Management University's Centre for AI and Data Governance for their constant support in my academic endeavors; my former colleagues at UNCITRAL and in particular Ms. Lucia Scheidl-Kornis of the UNCITRAL library for graciously arranging for my library visits and allowing me to use their library resources; Jurij

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This thesis is dedicated to my husband and family for their unwavering confidence and support in me. I am ever grateful for what they have done for me.

Vienna, 9 September 2019

List of Abbreviations

ABA	-	American Bar Association
ABS	-	Alternative Business Structure
ADR	-	Alternative Dispute Resolution
AI	-	Artificial Intelligence
AML	-	Anti-money laundering
B2B	-	Business-to-Business
B2C	-	Business-to-Consumer
BCG	-	Boston Consulting Group
CAPA	-	<i>Certificat d'aptitude à la profession d'avocat</i>
CCBE	-	Council of Bars and Law Societies of Europe
CEO	-	Chief Executive Officer
CLE	-	Continuing Legal Education
COO	-	Chief Operating Officer
CPD	-	Continuing Professional Development
CRFPA	-	<i>Centre régional de formation professionnelle d'avocat</i>
DIY	-	Do-It-Yourself
ECTS	-	European Credit Transfer and Accumulation System
EDI	-	Electronic Data Interchange
EEA	-	European Economic Area
EU	-	European Union
EULA	-	End User License Agreement
GAN	-	Generative Adversarial Network
GDPR	-	General Data Protection Regulation
IRIS	-	<i>Internationales Rechtsinformatik Symposium</i>
IT	-	Information technology
JD	-	Juris Doctor
KYC	-	Know-Your-Client
LLB	-	Bachelor of Laws
LLM	-	Master of Laws
LSAT	-	Law School Admission Test
LSP	-	Legal service providers

LTIA	-	Legal Tech Initiative Austria
MBE	-	Multistate Bar Examination
MPRE	-	Multistate Professional Responsibility Examination
NYLC	-	New York Law Course
NYLE	-	New York Law Examination
ODR	-	Online Dispute Resolution
PDF	-	Portable Document Format
TFEU	-	Treaty of the Functioning of the European Union
TOS	-	Terms of Services
UBE	-	Uniform Bar Examination
UK	-	United Kingdom
UN	-	United Nations
UNCITRAL	-	United Nations Commission on International Trade Law
US	-	United States of America
UX	-	User Interface

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Chapter 1: Introduction

I. INTRODUCTION

“At that time, hard though it is to believe today, barely a lawyer in the UK had even heard the term ‘Intranet’, only a few could claim to have seen the World Wide Web, and the government of the day was more or less silent on the question of IT and its impact on society.” – Richard Susskind, *The Future of Law*, 1996.¹

Fast forward twenty-three years later to 2019, the world is a very different place from what Susskind described back in 1996. The current generation of legal professionals are constantly connected to the Internet, have an e-mail address and a smartphone with social networking applications² that enable clients to contact them any day and any time, are expected to be able to operate with word processing and presentation software and are most certainly expected to know how to search for information on the Internet and on legal search engines. The practice of law has been swept along with the technology tide and law firms, since the typewriting days, have admittedly been in the past few decades trying to keep up with essential technology practices.

In the past few years, there has been much more talk than before about how technology is impacting the legal industry in ways that could affect the legal industry as a whole, and especially, the business of law. Susskind, in his book *Tomorrow’s Lawyers*,³ written more than two decades later since the publication of *The Future of Law*, painted a worrying situation for the legal profession in the first chapter of *Tomorrow’s Lawyers*:

¹ Richard Susskind, *The Future of Law* (OUP 1996) viii.

² Popular social networking applications on mobile phones include but are not limited to WhatsApp, Facebook Messenger, Viber and Telegram.

³ Richard Susskind, *Tomorrow’s Lawyers* (2nd edn, OUP 2017) 15.

“The legal market is in a remarkable state of flux. In less than two decades, the way in which lawyers work will change radically. Entirely new ways of delivering legal services will emerge, new providers will be firmly established in the market, and the workings of our courts will be transformed. Unless they adapt, many traditional legal businesses will fail. On the other hand, a whole set of fresh opportunities will present themselves to entrepreneurial and creative young lawyers.”⁴

What Susskind has described reflects the legal technology wave that the legal profession is currently experiencing in the 21st century. In a nutshell, legal technology refers to technological solutions that enable lawyers to practice more efficiently or provide the average layperson with greater access to cheaper or faster legal solutions. The former can be seen as threatening existing business models in law firms that primarily use an hourly rate billing structure as a more efficient practice conversely means less billable hours, while the latter is also seen as a threat to lawyers as clients that would otherwise seek legal advice from a law firm now have alternative avenues to solve their legal woes. This phase that the legal industry is experiencing has also been described as the “uberization of law”, which should come as no surprise to lawyers who have been reading about the developments in legal technology in the past few years. This phrase, which has been used in academic articles⁵ and in news articles,⁶ is used to indicate how expensive services normally provided by law firms will be replaced by legal technology companies, similar to how Uber has changed the transportation industry in different parts of the world.⁷

The mounting interest in legal technology has slowly woken the legal profession, who has traditionally had the monopoly in the provision of at least certain forms of legal services in several EU member states. By 2019, several international law firms have

⁴ *ibid* 3.

⁵ Patrick A Wright, ‘The Uberization of Law’ (2015) 41 *Law Practice* 49.

⁶ Michael Skapinker, ‘Technology: Breaking the law’ (Financial Times 11 April 2016) <www.ft.com/content/c3a9347e-fdb4-11e5-b5f5-070dca6d0a0d> accessed 13 March 2019.

⁷ See Adi Gaskell, ‘Study Explores The Impact of Uber on the Taxi Industry’ (Forbes 26 January 2017) <www.forbes.com/sites/adigaskell/2017/01/26/study-explores-the-impact-of-uber-on-the-taxi-industry/#49f3ac8d16b0> accessed 17 July 2019.

issued statements on how they have jumped onto the legal technology bandwagon and have adopted legal technology in their practice. Some law firms have even produced their own legal technology solutions, such as Baker McKenzie's and CMS' antitrust dawn raid applications,⁸ and launched incubators to attract innovators to develop solutions for law firms.⁹

Despite much talk about the adoption of legal technology, one thing remains relatively undiscussed – the topic of the regulation of legal technology. While there has always been discussion on the regulation of the legal industry, legal technology has affected the legal industry in ways where it could raise valid discussions on how legal technology has affected the core principles behind the regulation of the legal profession. For instance, technology is not completely unbiased, and in some technologies such as artificial intelligence (“AI”), the result provided by the AI application may be unexplainable.¹⁰ These are complex questions that remain unresolved¹¹ and the issue of technology biases in legal technology are worthy of a thesis in itself. However, these questions point towards an important issue – if legal technology is not unbiased and potentially unfair, how then should such technologies be regulated if they were to provide legal services to client-users, similar to a lawyer? Should they be regulated to prevent client-users from potentially suffering from negligent and biased legal advice due to relying on the use of such legal technology solutions? Considering that the legal industry and the legal profession is otherwise tightly regulated with not just legislation but also ethical codes, should legal technology not then be similarly regulated? The existing regulations of the legal profession are thus called into question in light of technological advancements that threaten to

⁸ Baker McKenzie, ‘Baker McKenzie Launches ‘First of its Kind’ Global Antitrust Dawn Raid App’ <www.bakermckenzie.com/en/newsroom/2017/04/global-antitrust-dawn-raid-app> accessed 13 March 2019; CMS, ‘CMS Dawn Raid App’ <<https://cms.law/en/INT/Online-Services/CMS-Client-Services/CMS-Dawn-Raid-App>> accessed 17 July 2019.

⁹ Allen & Overy, ‘Advanced Delivery: Fuse by Allen & Overy’ <www.allenoverly.com/advanceddelivery/fuse/Pages/default.aspx> accessed 17 July 2019.

¹⁰ Irene Ng (Huang Ying), ‘The Move Towards Explainable Artificial Intelligence and its Potential Impact on Judicial Reasoning’ (2018) 2-2 TTLF Newsletter on Transatlantic Antitrust and IPR Developments 40, 40 <<https://www-cdn.law.stanford.edu/wp-content/uploads/2015/04/2018-2-2.pdf>> accessed 20 July 2019.

¹¹ See Riikka Koulu, ‘Why We Need Legal Technology’ in Riikka Koulu and Jenni Hakkarainen (eds), *Law and Digitalisation: Rethinking Legal Services* (University of Helsinki Legal Tech Lab publications 2018).

change how existing legal services are provided to client-users or affect how law firms may have to operate their practices.

II. THE RESEARCH QUESTION

The underlying research question of this thesis is whether existing regulations of the legal profession at the EU or national level should be reformed in light of technological developments that have either permitted legal technology companies from providing legal services directly to consumers or that have allowed law firms to operate more efficiently (the “Research Question”). Answering the Research Question first requires an understanding of the fundamentals of legal technology and why and how the legal profession is currently regulated at both the EU and national levels.

Upon providing the basis and background of legal technology and the regulation of the legal profession, this thesis will discuss and analyze the impact of legal technology and how it affects – positively or negatively – the legal profession. This analysis will comprise evaluating the advantages and disadvantages of legal technology and how legal technology has impacted the legal and policy concerns behind the regulation of the legal profession. The thesis will then discuss how legal technology has disrupted the legal profession such as that of fair competition and legal ethics. To conclude this section on the impact of legal technology, an analysis on how legal technology will shape the future of the legal profession will also be put forth.

After having discussed and analyzed the impact of legal technology on the legal profession, this thesis will propose a framework on how to address the issues and challenges arising from such impact. This will start off with a discussion on the extent of regulation and the proposal of key principles that a regulator must consider when designing and enacting a framework. The next part then delves into the proposed framework of regulating the legal profession in light of technological developments, which also includes a discussion on the potential challenges that such proposed framework will face should it be implemented in practice. Finally, this thesis will have a concluding chapter to reflect on the Research Question and the ideas presented herein.

The hypothesis of this thesis is thus as such: whether existing regulations of the legal profession at the EU or national level should be reformed in light of technological developments, and that there should be a new framework to regulate the legal profession and legal technology, but the method and degree of regulation, which this thesis will discuss and analyze, has to be developed and determined carefully by the EU and the member states. As much as this thesis strives to provide an approach to the regulation of legal technology and the legal profession, it also hopes to provide an insight on the nascent industry of legal technology as it matures to become a part and parcel of a lawyer's life. Furthermore, it hopes to inspire lawyers to look at legal technology and the business of law in a different light and with forethought – as much as lawyers find some form of enjoyment debating over substantial law, negotiating difficult contracts, advancing fresh arguments and furthering legal jurisprudence, the truth is that business of law is important in keeping their firms alive and any prudent lawyer will not only have to be in touch with law, but with the practice of law with legal technology.

III. EXISTING LITERATURE

Existing literature on the topic of this thesis can be generally classified into two main areas: (1) regulation of the legal profession; (2) legal technology; (3) legal ethics and legal technology. Regulation of the legal profession can be subdivided into two other areas, i.e. legal ethics and regulation concerning the practice of law at the national and EU level.

A. Regulation of the Legal Profession

Literature on the regulation of the legal profession is extensive and can be further categorized into two broad areas: (1) literature on legal ethics; and (2) literature on the regulation concerning the practice of law. Legal ethics is a topic that has been explored in detail by legal academics and yields a bountiful of publications.¹² As for literature on

¹² Numerous books and articles on the topic of legal ethics have been published by academics. Throughout this thesis, reference will be made to several publications when discussing general

the regulation concerning the practice of law, academics and practitioners in several EU member states have released publications that help guide lawyers in complying with their professional obligations under the applicable legal profession acts and professional conduct rules as prescribed by law or by the bar associations that they are a member of.¹³

While conducting research on this subject, it should be noted that several academics have also provided specific commentary on the basis of the regulation of the legal profession, such as from an economic perspective. These include Barton's article entitled *Why Do We Regulate Lawyers: An Economic Analysis for the Justifications for Entry and Conduct Regulation*¹⁴ and Ribstein's article entitled *Lawyers as Lawmakers: A Theory of Lawyer Licensing*;¹⁵ they discuss the economic regulation of the legal profession vis-à-vis the supposed public policy goals that the legal profession seeks to achieve.

Furthermore, some academics have conducted research on the regulation of the legal profession that are specific to the EU; in particular, Nascimbene's work was useful in the understanding of how the legal profession can be so differently regulated across the EU. In his book entitled *The Legal Profession in the European Union*,¹⁶ Nascimbene conducted a study of the legal profession of each EU member state by discussing common elements across EU member states, for instance, these discussions include the "access to the profession",¹⁷ "practicing",¹⁸ "conduct and professional secrecy",¹⁹ "advertising"²⁰ and "professional liability and insurance".²¹

principles and specific ethical rules in legal ethics. For an overview of legal ethics, see also Jonathan Herring, *Legal Ethics* (2nd ed, OUP 2017).

¹³ For Germany, see Martin Henssler and Hanns Prütting, *BRAO* (5th edn, CH Beck 2019). For Austria, see Karl F Engelhart and others, *RAO Rechtsanwaltsordnung* (10th edn, Manz 2018).

¹⁴ Benjamin Hoorn Barton, 'Why Do We Regulate Lawyers?: An Economic Analysis for the Justifications for Entry and Conduct Regulation' (2001) *Arizona State Law Journal* 429.

¹⁵ Larry E Ribstein, 'Lawyers as Lawmakers: A Theory of Lawyer Licensing' (2004) 69(2) *Missouri Law Review* 299.

¹⁶ Bruno Nascimbene, *The Legal Profession in the European Union* (Wolters Kluwer 2009).

¹⁷ *ibid*, 62. The reference is for practicing in Austria. Nascimbene has also explored practicing as a lawyer in other EU member states, such as Belgium, Bulgaria, Cyprus, etc.

¹⁸ *ibid* 63. See explanation in (n 17).

¹⁹ *ibid* 64. See explanation in (n 17).

²⁰ *ibid* 64. See explanation in (n 17).

²¹ *ibid* 64. See explanation in (n 17).

B. Legal Technology

With regard to legal technology, there has been much literature in recent years discussing aspects of technology impacting the practice of law. The classic set of publications that discuss the importance of legal technology and its impact on the legal profession is authored by Richard Susskind. Susskind has written numerous books over the course of two decades describing how lawyers should – in each generation – adopt legal technology.²² Besides Susskind’s publications, there is other literature available discussing the digitalization of law,²³ reports published by institutions or companies that paint the legal technology landscape to readers,²⁴ articles written by think-tanks that give an overview of legal technology²⁵ and publications that describe how legal technology will impact the legal industry;²⁶ in the spirit of embracing collaborative knowledge using digital means, Wikipedia has a succinct article on legal technology as well.²⁷ Bar associations such as the American Bar Association (“ABA”) have also made publications that discuss specific technologies to purchase²⁸ and also provide further information so that one can “gain insight on legal technology”²⁹ and “stay on top of the latest legal technology news”.³⁰

²² A list of publications by Richard Susskind can be found on his website. See Richard Susskind <www.susskind.com/> accessed 17 July 2019.

²³ See Koulu (n 11).

²⁴ See Jerrold Soh (ed), *2019 State of Legal Innovation Report Asia Pacific* (Singapore Academy of Law and Singapore Management University 2019) <www.dropbox.com/s/hwsdvwe0ms3t3or/%28Final%29%20State%20of%20Legal%20Innovation%20in%20APAC%20Report%20%2813%20April%202019%29.pdf?dl=0> accessed 17 July 2019; Christian Veith and others, *Technology Will Change the Business of Law* (Boston Consulting Group and Bucerius Law School 2016) <www.bucerius-education.de/fileadmin/content/pdf/studies_publications/Legal_Tech_Report_2016.pdf> accessed 17 July 2019; Charlotte Formont, Alice Do Concetto and Alexandre Chéronnet, *L’innovation dans la profession d’avocat* (Sciences Po École de Droit and L’Incubateur 2015) <www.sciencespo.fr/ecole-de-droit/sites/sciencespo.fr.ecole-de-droit/files/IBP%20Rapport%20Innovation_decembre2015.pdf> accessed 28 May 2019.

²⁵ See Amelia Chew and others, ‘Legal Technology in Singapore’ (LawTech.Asia 21 October 2018) <<https://lawtech.asia/legal-technology-in-singapore/>> accessed 17 July 2019.

²⁶ Caroline Calomme, ‘Technology and its impact on legal practice’ (The UK Law Societies’ Joint Brussels Office 4 July 2019) <www.lawsocieties.eu/news/in-focus/technology-and-law/technology-and-its-impact-on-legal-practice/5062190.fullarticle> accessed 17 July 2019.

²⁷ Wikipedia, ‘Legal Technology’ (Wikipedia 2019) <https://en.wikipedia.org/wiki/Legal_technology> accessed 26 July 2019.

²⁸ American Bar Association, ‘Legal Technology Buyer’s Guide’ <<https://buyersguide.americanbar.org/>> accessed 17 July 2019.

²⁹ American Bar Association, ‘Legal Technology Resource Center’ <www.americanbar.org/groups/departments_offices/legal_technology_resources/> accessed 17 July 2019.

³⁰ *ibid.*

Papers have also been written on legal technology and how it can impact or has affected the legal profession. These includes articles such as “The Move Towards Explainable Artificial Intelligence and its Potential Impact on Judicial Reasoning”,³¹ “When the Tribunal is an Algorithm: Complexities of Enforcing Orders Determined by a Software Under the New York Convention”³² and “Designing and Building Chatbots for Pro Bono Legal Clinics”.³³ Besides formal peer-reviewed articles, there exist many websites and news outlets that publish information or opinions on legal technology. Some of these news websites that explore issues in legal technology include Artificial Lawyer,³⁴ Jusletter IT,³⁵ LawTech.Asia,³⁶ amongst others. Considering the pace at which legal technology is developing, it is unsurprising if there were a preference for publications on the Internet through such legal technology news websites rather than via peer reviewed journals. Therefore, reading what these websites have to offer is an important aspect during the research of materials for this thesis.

C. Legal Ethics and Legal Technology

However, with regard to the specific area of legal technology and the regulation of the legal profession that the Research Question is focused on, there is generally a lack of publications that deal with the intersection of legal technology, legal ethics and legal regulation. In the field of legal ethics and legal technology, there are a few articles that have dealt with this issue in different contexts. An older article in this field would be Fina and Ng’s article entitled *Big Data & Litigation: Analyzing the Expectations of*

³¹ Ng, ‘The Move Towards Explainable Artificial Intelligence and its Potential Impact on Judicial Reasoning’ (n 10) 40.

³² Irene Ng (Huang Ying) and Valeria Benedetti del Rio, ‘When the Tribunal is an Algorithm: Complexities of Enforcing Orders Determined by a Software Under the New York Convention’ in Katia Fach Gomez and Ana Mercedes Lopez Rodriguez (eds), *60 Years of the New York Convention: Key Issues and Future Challenges* (Wolters Kluwer 2019).

³³ Irene Ng (Huang Ying), ‘Designing and Building Chatbots for Pro Bono Legal Clinics’ in Erich Schweighofer and others (eds), *Data Protection / LegalTech: Proceedings of the 21st International Legal Informatics Symposium IRIS 2018* (Editions Weblaw 2018).

³⁴ Artificial Lawyer <www.artificiallawyer.com/> accessed 17 July 2019.

³⁵ Jusletter IT, ‘22. Februar 2018’ <<https://jusletter-it.weblaw.ch/issues/2018/IRIS.html>> accessed 17 July 2019.

³⁶ LawTech.Asia <<https://lawtech.asia/>>.

Lawyers to Provide Big Data Predictions When Advising Clients,³⁷ which discusses legal ethics rules when lawyers use legal technology that provide predictions. Of relevance to the doctoral thesis is the issue of how, when and why lawyers will become liable for the use or failure to use legal technology in their legal practice when advising clients.

Subsequently in late 2018, Fina, Vogl and Ng's article entitled "Perspectives on the Growth of DIY Legal Services in the European Union",³⁸ discusses the growth of legal service providers that provide Do-It-Yourself legal solutions to client-users, whereby such legal service providers are normally not practicing companies and are legal technology companies. The majority of the article is of high relevance to this thesis as this thesis discusses how this breed of legal service providers has impacted the legal profession in such a way that existing regulations on the regulation of the legal profession may be inadequate in safeguarding public policy concerns such as consumer protection. More recently in 2019, Tremoloda has written on legal ethics concerning the legal ethics of metadata.³⁹ It is thus believed that in the years to come, there will likely be more publications in this intersection of legal ethics and legal technology.

IV. STRUCTURE OF THE THESIS

The structure of this thesis can therefore be presented in five main parts, which are namely: (1) Introduction; (2) Background of the Regulation of the Profession and Legal Technology; (3) Analysis of the Impact of Legal Technology on the Legal Profession; (4) Proposing a New Framework for the Regulation of the Legal Industry; and (5) Thoughts and Conclusion.

³⁷ Siegfried Fina and Irene Ng (Huang Ying), 'Big Data & Litigation: Analyzing the Expectation of Lawyers to Provide Big Data Predictions when Advising Clients' (2017) 13 *Indian Journal of Law and Technology* 1.

³⁸ Siegfried Fina, Irene Ng and Roland Vogl, 'Perspectives on the Growth of DIY Legal Services in the European Union' (2018) 7-6 *Journal of European Consumer and Market Law* 241.

³⁹ Riccardo Tremolada, 'The Legal Ethics of Metadata: Accidental Discovery of Inadvertently Sent Metadata and the Ethics of Taking Advantage of Others' Mistakes' (2019) 25:4 *Richmond Journal of Law and Technology* 1.

Part 1: Introduction comprises the Introduction chapter solely. This chapter, which sets out the research question of the thesis, existing literature on the issue at hand and also provides details on the structure of the thesis.

Part 2: Background of the Regulation of the Profession and Legal Technology comprises Chapters 2 and Chapters 3. Chapter 2, entitled “Legal Technology: Background, Definitions and Current Developments”, provides a background on the current developments in legal technology. Furthermore, it defines key terms that are commonly used in the legal technology scene and the legal profession to allow for a smoother and more precise discussion in subsequent chapters. Chapter 3, entitled “The Theory of Regulation and the Basis for Regulating Legal Service Providers in the EU”, provides a background on the regulation of the legal profession and how the legal profession in the EU is regulated. These chapters serve as the fundamentals for an in-depth discussion on how legal technology has impacted the legal profession in the EU.

Part 3: Analysis of the Impact of Legal Technology on the Legal Profession comprises chapters 4, 5 and 6. Chapter 4, entitled “Exploring the Legal and Policy Concerns Surrounding the Legal Industry and its Application to Legal Technology”, sets out the key legal and policy concerns that shape the legal industry and how these policies interact with legal technology. Chapter 5, entitled “The Impact of Legal Technology on Existing Regulations on the Legal Profession”, discusses how legal technology has affected current EU regulations or national legislation on the legal profession. Chapter 6, entitled “The Future of the Legal Profession in Light of Legal Technology and Current Regulations”, discusses how the future may become if existing regulations on the legal profession or the lack of regulation of the legal profession.

Part 4: Proposing a New Framework for the Regulation of the Legal Industry comprises chapters 7 and 8. Chapter 7, entitled “Setting out the Parameters and Principles for a New Framework in the Regulation of the Legal Profession in Light of Legal Technology” is the first step towards proposing a framework to resolve the issues highlighted in the earlier sections as it sets out the key concepts and principles that have to be considered when re-evaluating existing regulations of the legal profession in light of legal technology. Chapter 8, entitled “A New Framework on the Regulation of the Legal

Profession – The Legal Services Provider Regulation”, then proposes a new framework for the regulation of the legal profession.

Part 5: Thoughts and Conclusion comprises chapters 9 and 10. Chapter 9, entitled “Rethinking the Legal Profession in the Era of Robot Lawyers” provides thoughts on how current and future technologies can affect the legal profession – such as through the complete substitution of lawyers in the provision of legal services, even in court hearings. Chapter 10, entitled “Conclusion”, reflects on the discussions in the entire thesis and aims to answer the research question that was posited in Chapter 1, Introduction.

The following chapters will launch into the key discussions of the thesis – this discussion will commence with Chapter 2, “Legal Technology: Background, Definitions and Current Developments”.

Chapter 2: Legal Technology: Background, Definitions and Current Developments

I. INTRODUCTION

Before engaging in any discussion on the Research Question, it is first important to understand what legal technology is and how it currently co-exists within the existing regulatory framework of the legal profession. This chapter sets out the definition and scope of legal technology and explains how legal technology has permeated into the legal industry. As part of the definition process, this chapter also explores the meaning of a legal service provider, the legal profession and the legal industry for subsequent reference in this thesis. Crucially, it establishes the different stakeholders participating in the legal industry. After these definitions, the chapter proceeds to highlight initiatives currently undertaken by the various stakeholders in the legal industry. With this, the chapter thus sets the foundation for future discussions on stakeholders in the legal industry and legal technology.

II. WHAT IS LEGAL TECHNOLOGY?

A. An Overview of Legal Technology or Legal Tech

1. Broad definition

Legal technology refers to technologies that impact the legal industry, where such impact can either help law firms to be more productive and efficient in their work (e.g. contract reviewing software powered by machine learning), compete against law firms by disrupting their market share in the legal industry (e.g. automatic contract generators or will generators) or fill in a gap in the legal services industry that lawyers will unlikely fill due to the remedy received being less than the legal fees payable (e.g. repealing a parking fine). A broad definition of legal technology, which encapsulates

the aforementioned scenarios where legal technology may exist, can be found on Wikipedia:

“Legal technology, also known as Legal Tech, refers to the use of technology and software to provide legal services.”⁴⁰

This definition has been discussed in publications and in a 2018 German publication entitled *Legal Tech: Die Digitalisierung des Rechtsmarkts* (English: Legal Tech: The Digitalization of the Legal Industry);⁴¹ Hartung, who wrote a chapter in the publication, notes that the Wikipedia definition encompasses a very wide spectrum of technologies with different applications.⁴² Besides Wikipedia’s definition, Hartung does provide other definitions of legal technology in his article, one of which is as follows:

“Legal Tech describes the use of modern, computerized, digital technologies in order to – hopefully – simplify and improve administration to justice, application of law, access to legal rights and legal case management through innovation and automatization.”⁴³

Regardless of either definition, it is clear that the elements of technology and the provision of legal services remain present and interact with each other. It is with these definitions that one can appreciate how online small claims courts,⁴⁴ contract reviewing software powered by machine learning,⁴⁵ do-it-yourself compensation claims for flight delays⁴⁶ and pro bono legal advice chatbots⁴⁷ would all fall under the

⁴⁰ Wikipedia, ‘Legal Technology’ (n 27).

⁴¹ The translation is provided by the author of this thesis.

⁴² Markus Hartung, ‘Gedanken zu Legal Tech und Digitalisierung’ in Markus Hartung, Micha-Manuel Bues and Gernot Halblieb (eds), *Die Digitalisierung des Rechtsmarkts* (CH Beck 2018) 7.

⁴³ Original sentence: Legal Tech beschreibt den Einsatz von modernen, computergestützten, digitalen Technologien, um Rechtsfindung, -anwendung, -zugang und -verwaltung durch Innovation zu automatisieren, zu vereinfachen und – so die Hoffnung – zu verbessern.” Hartung, Bues and Halblieb, *ibid* 7. This translation was retrieved from another article: see Fina, Ng and Vogl (n 38) 241.

⁴⁴ HM Courts & Tribunals Service, ‘Welcome to Money Claim Online’ <www.moneyclaim.gov.uk/web/mcol/welcome> accessed 17 July 2019.

⁴⁵ Luminance <www.luminance.com/> accessed 17 July 2019.

⁴⁶ Flightright <www.flightright.com/> accessed 17 July 2019.

⁴⁷ Katie King, ‘Robot lawyer’ created by Cambridge students will now answer your legal problems via Facebook Messenger’ (Legal Cheek 19 June 2017) <www.legalcheek.com/2017/06/robot-lawyer-

umbrella term of legal technology. The aforementioned examples are not exhaustive, and it should not be a surprise if new types of legal technology, which might not otherwise fall under legal technology, challenge the current understanding of legal technology.

2. Narrow definitions

Depending on the institution, legal technology may also be defined more narrowly as compared to the definitions found in the previous section. There are several possible narrow definitions of legal technology, some of which can be as follows:

- Legal technology as a tool to increase productivity and efficiency in law firms;
- Legal technology as a means of improving client-side benefits, e.g. user-friendly;
- Legal technology as a disrupter of the legal industry, e.g. do-it-yourself services;
- Legal technology as a means to provide (mass) education on the law;
- Legal technology as a tool to revamp practices in the judiciary; or
- Legal technology as a tool to increase access to justice.

There are legal technology companies that provide legal services which fall into either of these narrower definitions – some of these technologies have been mentioned in the previous section as well. As the Research Question is on the impact of legal technology on the regulation of the legal profession, legal technology in the context of how it intends to revamp practices in the judiciary and how it replaces the role of an arbiter (e.g. an arbitrator or adjudicator who is replaced by a software) will not be the focus for discussion in this thesis.

3. On technology trends: clarification on technology versus legal technology trends

Certain technologies such as AI and blockchain have gained popularity and traction amongst conference organizers in the last few years well. In 2018, several legal

created-by-cambridge-students-will-now-answer-your-legal-problems-via-facebook-messenger/>
accessed 17 July 2019.

technology conferences often included a panel, talk, discussion or presentation on one of the following technologies: blockchain, smart contracts or artificial intelligence. The Legal Tech Konferenz 2018,⁴⁸ Legal Revolution Expo & Congress 2018,⁴⁹ CodeX FutureLaw Conference⁵⁰ and ILTA Con,⁵¹ all of which are fairly recent Legal Tech conferences held in the US or various EU member states, have a slot dedicated to topics touching on either blockchain or AI. While legal technology may contain elements of artificial intelligence or blockchain, the reverse is not true, i.e. it does not mean that a technology must have artificial intelligence or blockchain aspects before they are considered to fall under the definition of legal technology.

The constant association with legal technology and these technologies in particular is arguably due to the simultaneous popularity and interest in these technologies alongside legal technology. Despite this constant association, one should not be confused with what legal technology encompasses. Any definition or debate about legal technology, at its core, should not be technology specific and should adopt a technology neutral perspective. This allows other types of technologies in their nascent or even waning stage to be, at the very least, given the same acknowledgment as their artificial intelligence or blockchain powered relatives even if such technologies do not receive the same publicity. Law firms will thus have a selection of legal technologies to choose from that will best benefit their practice, as they objectively choose a legal technology solution for their purposes.

4. The definition for this thesis

As this thesis aims to consider the regulation of legal technology vis-à-vis the legal profession, legal technology is defined in this thesis as technology that provides the

⁴⁸ Internet Archive Wayback Machine, 'Legal Tech Konferenz 2018' <<https://web.archive.org/web/20181215095814/https://legaltech.future-law.at/>> accessed 26 July 2019.

⁴⁹ Legal Revolution 2018, 'Agenda' <www.legal-revolution.com/en/agenda> accessed 10 March 2019.

⁵⁰ Stanford Law School, 'Sixth Annual CodeX FutureLaw' <<https://www-cdn.law.stanford.edu/wp-content/uploads/2017/08/CodeX-FutureLaw-2018-Agenda-1.pdf>> accessed 17 July 2019.

⁵¹ ILTACON, '2018 Download' <www.iltacon.org/downloadmaterials?_ga=2.78859796.1809332239.1543259026-246431947.1543259026&ssopc=1> accessed 17 July 2019.

same legal services as lawyers or technology that replaces the functions of lawyers within the law firm, i.e. any technology that competes with the function and role of a lawyer. This definition would include technologies that aid lawyers in their work (as they would compete with the function of a lawyer within a law firm) and technologies that directly provide legal services to a client-user (as they would compete with the role of a lawyer in society). This definition, however, does not include legal technology solutions that intend to provide online dispute resolution services such as an online court or an online arbitrator, although a platform that has legal representation integrated with an online court in the same interface would partially fall under this definition, i.e. the part of legal representation will be considered as legal technology for the purposes of the thesis but the online court will not be. The term “Legal Tech” will therefore be used to refer to this definition of legal technology for the subsequent chapters.

B. The History of Legal Technology

Legal technology has been around for several decades and has been, at different periods of time, a focus and a topic of discussion. Topics pertaining to legal technology have surfaced since the 1980s in other jurisdictions such as the US, where the ABA has published an article entitled *Bringing Technology to the Legal Profession*.⁵² The article speaks of the ABA’s “efforts to help the legal profession in the US transform itself during the coming years into a full-fledged participant in the technology revolution”;⁵³ adoption of legal technology then referred to “computerization”, whereby lawyers were encouraged to use computers with the hope that the “computer becomes more accepted – and ‘user friendly’”,⁵⁴ thereby making “the practice of law more efficient and more accessible to a larger percentage of [the] client population”.⁵⁵

⁵² American Bar Association, ‘ABA: Bringing Technology to the Legal Profession’ (1984) 70 American Bar Association 69.

⁵³ *ibid* 3.

⁵⁴ *ibid* 6.

⁵⁵ *ibid* 6.

Fast forward to three decades later and it would be impossible to envisage lawyers that do not use computers, e-mail or computer-based research databases in their daily work. Lawyers are also normally equipped with a company smartphone; a report published in 2017 indicated that 94% of lawyers surveyed by the ABA reported that “they regularly or occasionally us(e) a mobile device for law-related tasks at home”,⁵⁶ and these lawyers have downloaded numerous software applications (or more commonly known as apps) with research apps being one of the most popular apps for lawyers;⁵⁷ listed apps in the ABA article include the Fastcase app, Goodreader and PDF Expert.⁵⁸ Legal Tech in the 21st century has moved beyond the adoption of devices such as computers or smartphones and even beyond the acceptance of the Internet as a tool for the practice of law.

The modern understanding of Legal Tech refers to the disruption that technology is bringing to the legal sector, including but not limited to the use of technology in certain business areas such as practice management, case management, legal research and even the creation of legal tech startups to either create better ways to practice law for lawyers or to create cheaper and more efficient methods to deliver legal services for client-users.⁵⁹ The current focus on topics discussing Legal Tech appears to have shifted from the efficient practice of law in a familiar or traditional pyramid firm structure, which was the impetus for adoption of Legal Tech in the 1980s, to using technology to find novel or better ways or structures to provide legal services, with the prime example being that of the growth of Legal Tech startups that provide DIY legal services.⁶⁰

⁵⁶ Nicole Black, ‘Mobile Lawyer Trends (And Tips) in 2017’ (Above the Law 23 February 2017 <<https://abovethelaw.com/2017/02/mobile-lawyer-trends-and-tips-in-2017/>> accessed 17 July 2019.

⁵⁷ *ibid.*

⁵⁸ *ibid.*

⁵⁹ A good idea on what Legal Tech appears to be in modern day circumstances can be found on Coursera, where institutions are providing online courses on Legal Tech & startups. The course description provides an idea of what people are expecting to hear when Legal Tech is mentioned. See Coursera, ‘Legal Tech & Startups’ <www.coursera.org/learn/legal-tech-startups> accessed 17 July 2019.

⁶⁰ The issues surrounding Legal Tech startups and DIY legal services have been elaborated in Fina, Ng and Vogl’s article. See Fina, Ng and Vogl (n 38).

III. THE LEGAL INDUSTRY AND ITS PLAYERS

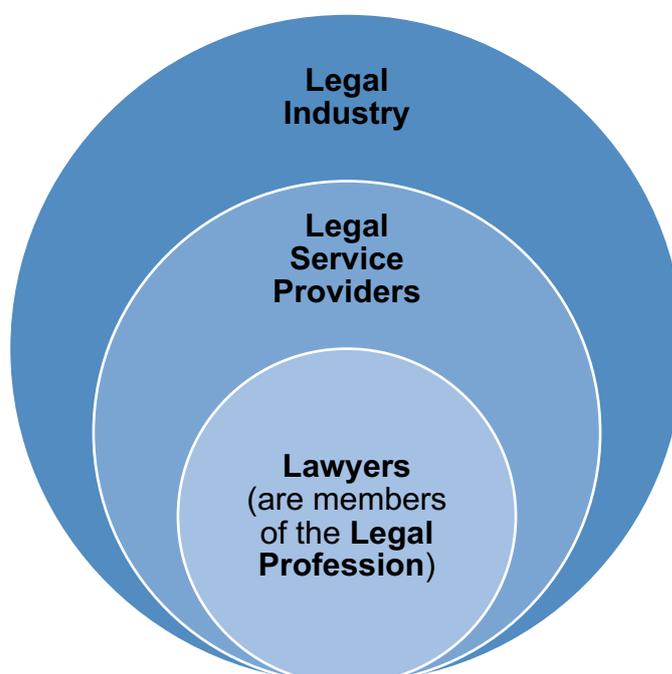
In order to better understand the impact of Legal Tech in the legal industry, it is first important to establish the different players and their roles vis-à-vis their clients and society. There are many terms in the practice of law and the business of law that have been used interchangeably, with the most common being: (1) legal service providers; (2) lawyers; (3) legal profession; and (4) legal industry. The term “legal industry” has been sometimes used as a synonym with “legal profession”; similarly, the phrase “legal service providers” has been used interchangeably with “lawyers”. This thesis, for clarity purposes, will seek to define them. While they may have overlapping characteristics, the terms have fundamentally different functions and definitions. The following definitions will be used for the subsequent chapters and sections of this thesis:

Table 1: Definitions of Fundamental Terms

Term	Definition
Legal service providers	Any person or entity that is providing legal services regardless of whether they are qualified or authorized to provide legal services.
Lawyers	A person who is qualified and authorized to provide legal services and engages in the practice of law.
Legal profession	The profession of lawyers, which also includes their regulatory and compliance bodies, regardless of whether such bodies are independent or self-regulatory.
Legal industry	Any person or entity that is involved in the market for the provision of legal services.

The relationship between the four terms above can be illustrated with the following diagram:

Illustration 1: Relationship Between Legal Service Providers, Lawyers, the Legal Profession and the Legal Industry



There are several players in the legal industry, each of which has a different role – examples include judges, arbitrators, mediators, lawyers, notaries, legal academics and scholars, paralegals – and of course, legal technology solution providers. Although these different roles appear to be clear and comprehensible, the truth is that the legal industry has distinct functions for each role and the definition of such role becomes more complicated when taken across jurisdictions as it is not harmonized in meaning across EU member states. The translation in German for the English word lawyer is *Rechtsanwalt*. The word ‘lawyer’ is generally understood by most people and is defined in the dictionary as a “person who practices or studies law.”⁶¹ However, a ‘lawyer’ in the UK and Ireland can refer to either a solicitor or barrister, both of which provide different legal services to their clients and have different limitations on their ability to represent clients in court.⁶² Whereas in Austria, a lawyer can mean a

⁶¹ Oxford Dictionaries, ‘Lawyer’ <<https://en.oxforddictionaries.com/definition/lawyer>> accessed 10 March 2019.

⁶² The UK and Ireland have a bifurcated legal profession. For more information, see QLTSchool, ‘The Solicitor and Barrister Profession in the UK – What is the Difference’ (QLTS 30 October 2011) <www.qlts.com/blog/the-solicitor-and-barrister-profession-in-the-uk-what-is-the-difference> accessed

Rechtsanwalt, who is allowed to represent clients in court regardless of the claim amount, or a *Rechtsanwaltsanwärter*, who can give legal advice but with more restrictions compared to a *Rechtsanwalt*.⁶³ However, in the eyes of the average layperson, the distinctions may not be outright clear as law firms advertise their lawyers as Partners, Attorney-at-Laws, Counsels, Senior Associates or Associates.⁶⁴

Considering the terminology differences arising from translation and function, it becomes a challenge to provide an appropriate categorization of the different players in the legal industry. The first step then is to list down the stakeholders in the legal industry, of which there are many. There are several stakeholders in the legal industry, with the most obvious being clients of the law firm, practicing lawyers, in-house counsels, the judiciary, arbitration chambers, Legal Tech solution providers, amongst many others. Stakeholder, here, is defined in the non-legal meaning as “a person with an interest or concern in something, especially a business.”⁶⁵ The following is a table of stakeholders that are present in the legal industry:

20 July 2019 (QLTSchool); The Competition Authority, ‘solicitors & barristers’ <www.ccpic.ie/business/wp-content/uploads/sites/3/2017/03/Solicitors-and-barristers-full-report.pdf> accessed 17 July 2019 (Ireland solicitors & barristers). At the point of this submission, the situation of the UK leaving the EU (famously known as Brexit) is unsettled. It is also uncertain whether the UK will indeed leave the EU, stay in the EU or be Brexiting for the next few months or years. Therefore, for the purposes of this thesis, the UK will still be treated as EU member state and will not contemplate events where the UK would leave the EU.

⁶³ Law firms such as fwp in Austria distinguish between *Rechtsanwalt* and *Rechtsanwaltsanwärter* in German, which when translated means “Lawyer” and “Trainee Lawyer”. However, their English website lists the latter as an “Associate”, which to the average layperson, is a lawyer. fwp, ‘Das Team’ <www.fwp.at/juristen/> accessed 11 March 2019.

⁶⁴ For example, on Austrian firm CMS Reich-Rohrwig Hainz Rechtsanwälte GmbH’s list of lawyers, the firm segregates lawyers into five categories: Managing Partner, Partner, Counsel, Of Counsel and Associate. See CMS, ‘People: 78 Search Results (with filter Austria)’ <https://cms.law/en/AUT/search/dp_eng?cx=people&id=web&sb=alpha&p=103&filter%5B%5D=sc_related_office_ids%3A1082> accessed 10 March 2019. On Slovenian firm Rojs Peljhan Prelesnik & Partners’ list of lawyers, lawyers are divided into categories such as Managing Partner, Senior Partner, Partner, Senior Associate, Senior Counsel, Associate and Junior Associate – each of these lawyers listed are able to provide legal services albeit to varying degrees. See Rojs, Peljhan, Prelesnik & Partners, ‘Experts’ <www.rppp.si/experts/> accessed 10 March 2019.

⁶⁵ Oxford Dictionaries, ‘Stakeholder’ <<https://en.oxforddictionaries.com/definition/stakeholder>> accessed 10 March 2019.

Table 2: Stakeholders in the Legal Industry

Practicing lawyers	Clients of law firms	Judiciary
Paralegals / Secretaries	Consumers of DIY Legal Tech solutions	Arbitration Chambers
Law firms	Pro bono recipients	Public Notaries
Bar Associations	Legal academics	Pro Bono Associations
Legal Tech solution providers	Law students	Ministry of Law

Each stakeholder or player has its own role and function in the legal industry. From the perspective of the legal industry as a whole, this thesis will categorize the stakeholders into five key categories, which are: (1) legal service providers; (2) clients and users; (3) regulatory bodies of legal service providers; (4) administrators of justice; and (5) academia and education.

A. Legal Service Providers

Legal service providers (“LSPs”) refer to persons or legal entities that provide legal services – be it legal solutions or advice – regardless of whether they are qualified or authorized to practice law to client-users.⁶⁶ Traditionally, legal service providers refer to lawyers and their corresponding law firms. Lawyers would provide legal services to their clients and prior to accepting their client, they will be required to conduct a Know-Your-Client (“KYC”) check to ensure that there is no conflict of interests between the lawyer⁶⁷ and the potential client; furthermore, law firms have to comply with anti-money laundering (“AML”) rules and anti-terrorism threats rules as well.⁶⁸ Lawyers and

⁶⁶ A definition of LSPs has been provided in Chapter 2.III.A.2.

⁶⁷ Paul Charmatz, ‘AML and KYC regulations: tech it seriously’ (Thomson Reuters Practical Law 28 June 2018) <[https://uk.practicallaw.thomsonreuters.com/w-015-4159?transitionType=Default&contextData=\(sc.Default\)&firstPage=true&comp=pluk&bhpc=1](https://uk.practicallaw.thomsonreuters.com/w-015-4159?transitionType=Default&contextData=(sc.Default)&firstPage=true&comp=pluk&bhpc=1)> accessed 1 June 2019.

⁶⁸ Law firms form part of the obliged entities to carry out customer due diligence when there is a transaction; in cases where the customer comes from high-risk third countries or other risky cases as determined by the EU Commission, an enhanced customer due diligence has to be carried out. An infographic on the AML measures can be found on the EU Commission’s website: see European Commission, ‘Preventing money laundering and terrorist financing across the EU: How does it work in

law firms can also be termed as “regulated legal service providers”, where the provision of their legal services are regulated by either national legislation, provincial/state legislation, individual bar association codes, rules and regulations, or all of the above. Under this term of “regulated legal service providers”, legal trainees (e.g. a trainee solicitor in the UK or a *Rechtsanwaltsanwärter* in Austria) that are under the charge of a supervising lawyer are also regulated LSPs as their practice of the law is subject to national legislation prescribing so.⁶⁹

In recent years, the legal technology boom has led to the growth of new forms of LSPs; these LSPs provide a service that allows client-users to solve their own legal problems without reference to a lawyer. Fina, Ng and Vogl’s article⁷⁰ has termed these services as “Do-It-Yourself legal services” (“DIY legal services”).⁷¹ DIY legal services that are operated by entities which are neither lawyers nor law firms may or may not be regulated under the law, and as a consequence, may or may not be providing these legal services legally. In the US, the ABA has defined these LSPs that provide legal services but are otherwise unregulated as “unregulated legal service providers” and has in March 2016 issued a call for comments pertaining to these unregulated LSPs.⁷² The EU does not have a specific definition for such DIY LSPs or unregulated LSPs, although some of these companies have erred on the side of caution and have

practice?’ <https://ec.europa.eu/info/sites/info/files/diagram_aml_2018.07_ok.pdf> accessed 10 March 2019. The relevant EU laws on AML are: European Parliament and Council Directive 2015/849 of 20 May 2015, Prevention of the use of the financial system for the purposes of money laundering or terrorist financing, amending Regulation (EU) No. 648/2012 of the European Parliament and of the Council, and repealing Directive 2005/60/EC of the European Parliament and of the Council and Commission Directive 2006/70/EC [2015] OJ L141/73; and European Parliament and Council, Regulation 2015/847, Information accompanying transfers of funds and repealing Regulation (EC) No. 1781/2006 [2015] OJ L141/1. See European Commission, ‘*Anti-money laundering and counter terrorist financing*’ <https://ec.europa.eu/info/policies/justice-and-fundamental-rights/criminal-justice/anti-money-laundering-and-counter-terrorist-financing_en#eulegalframeworkonamlctf> accessed 10 March 2019.

⁶⁹ Rechtsanwaltsordnung, RGBI Nr 96/1868, §21b.

⁷⁰ Fina, Ng and Vogl (n 38).

⁷¹ *ibid* 241.

⁷² American Bar Association, ‘For Comment: Issues Paper Concerning Unregulated LSP Entities’ (American Bar Association 31 March 2016)

<www.americanbar.org/content/dam/aba/images/office_president/final_unregulated_lsp_entities_issues_paper.pdf> accessed 1 June 2019. The issues paper was also mentioned in the ABA’s Report on the Future of Legal Services in the United States by the Commission on the Future of Legal Services; see American Bar Association, *Report on the Future of Legal Services (2016)* <<http://abafuturesreport.com/2016-fls-report-web.pdf>> accessed 10 March 2019.

registered themselves in the legal services register⁷³ so that they do not fall foul in the provision of illegal legal services. These unregulated LSPs, in particular those that compete against lawyers for the same clientele, have been termed as “disruptive legal tech” as well.⁷⁴

In summary, LSPs comprise: (1) practicing lawyers; (2) trainee lawyers who are permitted by law to provide legal services; and (3) Legal Tech solution providers who may or may not be permitted by law to provide legal services. The subsequent sections will proceed to clarify the definitions of lawyers and Legal Tech solution providers.

1. Lawyers

As previously mentioned in Section 2.III, the definition of a lawyer and the scope of services that a lawyer can provide is largely dependent on individual EU member states. In most EU member states with a civil law tradition, a lawyer can refer to a jurist or an attorney-at-law. A jurist generally refers to a person who has obtained a tertiary legal education and is either providing legal services in a law firm as a trainee lawyer or working as an in-house lawyer for a company; however, unlike an attorney-at-law, a jurist does not have full rights of representation before the court and is not necessarily admitted to the state bar.⁷⁵ An attorney-at-law, on the other hand, can be a jurist who has satisfied the conditions for admission to the bar and has formally been accepted to the bar association.⁷⁶ In EU member states that have a common law tradition such as the UK and Ireland,⁷⁷ a lawyer is one that is admitted to the bar and a trainee lawyer is not admitted to the bar. The latter may assist the lawyer in preparing a legal advice or legal product but does not generally provide legal advice directly to

⁷³ Claim Flights, ‘Claim Flights GmbH Impressum | Bonn, Germany’ <www.claimflights.com/impressums> accessed 10 March 2019.

⁷⁴ The word disruptive technology in the legal industry was most famously coined in Richard Susskind’s *Tomorrow’s Lawyers*. In his book, Susskind stated that such innovative technologies “do not sit happily alongside traditional ways of working. Instead, they fundamentally challenge and change conventional habits.” Susskind (n 3) 15.

⁷⁵ In Finland, a law graduate is allowed to join the Association of Lawyers but is not allowed to join the Association of Attorneys-at-law until he or she has fulfilled the conditions for admission to the latter. This will be further discussed later at Chapter 3.IV.B.

⁷⁶ *ibid.*

⁷⁷ *ibid.*

clients.⁷⁸ This is unlike the case of a trainee lawyer in civil law countries such as Austria where a trainee lawyer can provide legal advice.⁷⁹ This is also seen in the job titles of lawyers – in the UK, a trainee lawyer will not have the job title of an associate; however, in Austria, a trainee lawyer's (*Rechtsanwaltsanwärter*) job title in English is that of an associate. Therefore, the average layperson may not know the distinction between the term “lawyer” in the different EU member states.

For this thesis, the legal definition of “lawyer” will be used, i.e. one who is admitted or qualified as a lawyer in their corresponding jurisdiction. Under this definition, a trainee lawyer – in either a state with the common law tradition or civil law tradition – is not a lawyer, although a trainee lawyer can be an LSP because he or she may be legally providing legal services.

2. Legal Tech solution providers

Legal Tech solution providers can be LSPs themselves or can provide services to law firms to help law firms boost their productivity. The former branch of Legal Tech includes DIY legal services such as VisaBot,⁸⁰ Claim Flights⁸¹ and DoNotPay.⁸² The

⁷⁸ Chambers | Student, ‘Being a trainee: 8 realities of the job’ (Chambers | Student January 2016) <www.chambersstudent.co.uk/where-to-start/newsletter/being-a-trainee-8-realities-of-the-job> accessed 1 June 2019.

⁷⁹ Die Österreichischen Rechtsanwälte, ‘Rechtsanwaltsanwärter Info Guide’ <www.rechtsanwaelte.at/fileadmin/user_upload/PDF/01_Buergerservice/Broschuere_RAA/oerak_raa_infoguide_210x210_screen.pdf> accessed 17 March 2019, 6.

⁸⁰ Visabot was a chatbot that helped immigrants apply for a green card in the US. Their services were featured on several online websites; see Khari Johnson, ‘Visabot helps you cut green-card red tape’ (Venture Beat 11 July 2017) <<https://venturebeat.com/2017/07/11/visabot-helps-you-cut-green-card-red-tape/>> accessed 10 March 2019; it was also reported that Visabot was one of five Legal Tech startups joining legal knowledge giant LexisNexis’ start-up accelerator: Ondrej, ‘LexisNexis announced that 5 legal tech startups are joining its LexMachina accelerator’ (Legal Geek 4 April 2017) <www.legalgeek.co/news/lexisnexis-announced-5-legal-tech-startups-joining-lexmachina-accelerator/> accessed 10 March 2019. Despite the media spotlight in earlier years, Visabot has since closed its services as of 10 March 2019 and has stated that while it “no longer help(s) immigrants make America Great Again”, their “technology is being used by DoNotPay”. See Visabot <<https://visabot.co/>> accessed 10 March 2019.

⁸¹ Claim Flights <www.claimflights.co.uk/> accessed 10 March 2019.

⁸² DoNotPay had its origins in repealing parking fines; see Elena Cresci, ‘Chatbot that overturned 160,000 parking fines now helping refugees claim asylum’ (The Guardian 6 March 2017) <www.theguardian.com/technology/2017/mar/06/chatbot-donotpay-refugees-claim-asylum-legal-aid> accessed 10 March 2019; DoNotPay, ‘Parking’ <www.donotpay.com/parking/> accessed 10 March 2019. Since repealing parking fines, DoNotPay has expanded into other legal services such as to permit consumers to “sue anyone”, has the motto of “fight corporations, beat bureaucracy and sue

latter branch includes legal services that help improve efficiency within law firms such as Luminance,⁸³ Kira Systems,⁸⁴ ROSS Intelligence,⁸⁵ amongst many other Legal Tech companies. There are other Legal Tech solution providers that provide online dispute resolution services, e.g. FairClaims, and these services arguably provide consumers an alternative route to justice being served.⁸⁶ This thesis would not be discussing LSPs that are dispute resolution services, as per Chapter 2.II.A.4.

3. The thin fine line between legal solutions providers and legal information providers

In the famous *Nolo* case, the Unauthorized Practice of Law Committee in Texas claimed that Nolo publishers, through the publication of self-help legal books, was engaging in the unauthorized practice of law.⁸⁷ Texan legislation was eventually amended to clarify that publishers intending to publish self-help legal books were not flouting the laws concerning the unauthorized practice of law if the product states clearly and conspicuously that it is not a substitute for the advice of an attorney⁸⁸

This distinction between providing legal advice and providing legal information is a thin one, although attempts to distinguish the both have been undertaken by different organizations. This distinction is important for certain organizations such as those offering pro bono services as an administrative clerk at the pro bono office or court staff who are not qualified to practice may accidentally commit an offence under the law if he or she provides legal advice instead of legal information and under the law, only lawyers are permitted to provide legal advice. For instance, the difference between legal advice and legal information has been provided by the Centre for Public Legal Education Alberta:

anyone at the press of a button". Apple App Store Preview, 'DoNotPay' <<https://itunes.apple.com/app/id1427999657>> accessed 10 March 2019.

⁸³ Luminance (n 45).

⁸⁴ Kira Systems <<https://kirasystems.com/>> accessed 10 March 2019.

⁸⁵ Ross Intelligence <<http://rossintelligence.com/>> accessed 10 March 2019.

⁸⁶ FairClaims <www.fairclaims.com/> accessed 10 March 2019.

⁸⁷ IN RE: NOLO PRESS/FOLK LAW, Inc. Realtor, No. 98-0724, I.B (1999).

⁸⁸ Texas Government Code, State Bar, Chapter 81, 81.101.(c).

“Legal information explains the law and the legal system in general terms. The information is not tailored to a specific case.

Legal advice applies the law, including statute and case law and legal principles to a particular situation. It provides recommendations about what course of action would best suit the facts of the case and what the person wants to achieve.”⁸⁹

In the case of the US state of Utah, the Education Subcommittee of the Utah Judicial Council has provided a guideline for court staff who work with self-represented litigants on what constitutes legal advice and legal information:

“What is Legal Advice?

Court customers are asking for legal advice when they ask whether or not they should proceed in a certain fashion. Telling a court customer “what to do” rather than “how to do it” may constitute giving legal advice.

Legal advice is a written or oral statement that:

- Interprets some aspect of the law, court rules, or court procedures, or recommends a specific course of conduct a person should take in an actual or potential legal proceeding,
- Applies the law to the individual person’s specific factual circumstances, or
- Requires the person giving advice to have knowledge of the law and legal principles beyond familiarity with court requirements and procedures.

⁸⁹ Centre for Public Legal Education Alberta, ‘Legal Information vs. Legal Advice: What is the difference?’ <www.cplea.ca/wp-content/uploads/LegalInfovsLegalAdvice.pdf> accessed 18 March 2019.

What is Legal Information?

Court staff may:

- Provide public information contained in dockets, calendars, case files, indexes, and other reports as long as they are public.
- Recite common, routinely employed court rules, court procedures, administrative practices, and local rules, and explain generally how the court and judges function.
- Refer self-represented litigants to a law library or the court's website for statutes and court rules.
- Explain the meaning of terms and documents used in the court process.
- Answer questions concerning deadlines or due dates (without calculating due dates).
- Identify and refer self-represented litigants to court forms. Note: the Supreme Court recently amended Rule 14-802 (c)(3) of the Supreme Court Rules of Professional Practice to allow court staff and others to provide clerical assistance to fill out court forms.”⁹⁰

From the excerpts above, it appears that the distinction between legal information and legal advice appears to lie in the application and interpretation of the law as compared to the explanation of law. It should be noted that the definition between what is legal information and legal advice can differ from state to state, country to country. This is also intrinsically tied to the definition of legal services and who is permitted to provide such legal services. Within the EU, the definition of legal services or activities differs in each member state and who is permitted to provide such legal services differs as well.⁹¹ For the purposes of this thesis, it should be noted that an LSP is therefore an

⁹⁰ Education Committee of the Utah Judicial Council Standing Committee on Resources for Self-Represented Parties, *Legal Information vs. Legal Advice* (April 2010) <www.co.washington.or.us/lawlibrary/upload/tf_utah_legal_info-v-advise.pdf> accessed 18 March 2019.

⁹¹ For example, in the UK, who is entitled to provide legal services is regulated by the Legal Services Act. Whereas in Austria, the provision of legal services is regulated by the *Rechtsanwaltsordnung* and the *Winkelschreibereiverordnung*. See Legal Services Act 2007; *Rechtsanwaltsordnung* (n 69); and *Winkelschreibereiverordnung*, RGBI Nr 115/1857.

entity that provides legal services in the form of providing legal advice or representation in court. An entity or publisher or Legal Tech solution provider that provides legal information may call themselves a legal technology company but would not fall under the definition of LSP used in this thesis.

B. Clients and Users

One of the largest group of stakeholders in the legal industry are clients and users of legal services. These are people or entities that either pay for a lawyer's legal services as a client, pay for the use of a platform or legal services provided by a company to solve their legal issues or receive legal aid as a pro bono recipient. Clients and users are the customers of DIY LSPs and regulated LSPs. Accordingly, the availability of a variety of LSPs – regardless of regulated, unregulated or DIY – provides them with a large amount of options to choose in order to resolve their legal problems. Whether these choices are legally permitted or of a good quality is a separate matter. A client is usually used in the context of a law firm, while user is used in the context of a Legal Tech solution provider. In this thesis, the term “client-user” will be used to refer to persons or entities that pay for or benefit from legal services either from a lawyer or a Legal Tech solution provider.

C. Regulatory Bodies of Legal Service Providers

Regulatory bodies refer to those authorized under law to regulate the provision of legal services and LSPs. These bodies include the Ministry of Law (or Ministry of Justice in some countries) and the bar associations of the respective member states. The Ministry of Law or Justice can be in charge of drafting or promoting legislation to regulate lawyers⁹² or administering the bar examinations to ensure that prospect lawyers fulfill the requirements before they are admitted as regulated LSPs;⁹³ bar

⁹² This in the case of the Slovenian Ministry of Justice. See Republic of Slovenia Ministry of Justice, 'Areas of Work' <www.mp.gov.si/en/areas_of_work/> accessed 10 March 2019.

⁹³ *ibid.* Also, see Republika Slovenija Ministrstvo za Pravosodje, 'Pravniški državni izpit' <www.mp.gov.si/si/izobrazevanje_v_pravosodju_cip/pravniški_državni_izpit/> accessed 10 March 2019.

associations are, in the cases of some member states, the regulatory bodies in charge of carrying out the functions and responsibilities such as disciplinary matters stated in the said legislation.⁹⁴ Depending on the member state, there may be one bar association that governs the entire member state, or there may be multiple bar associations in charge of different areas or provinces in each member state.⁹⁵

D. Adjudicators of the Administration of Justice

Adjudicators of the administration of justice in this thesis refer to people who make a decision or facilitate as a neutral through the national court dispute resolution mechanism such as litigation, mediation, arbitration or online dispute resolution. Groups that fall under this stakeholder category include justices or judges, tribunals, arbitrators, mediators and online dispute resolution solution providers. While Legal Tech is per se not a specific issue that the EU Commission is looking at, the *effective* administration of justice has always been of concern in the EU.

Since 2013, the EU Commission releases an annual EU justice scoreboard⁹⁶ that provides “comparable data on the independence, quality, and efficiency of national justice systems”.⁹⁷ An efficient administration of justice is arguably co-related to the development of Legal Tech – good and effective administration of justice may employ the use of court technology such as digitization of court submissions and evidence, while poor administration of justice may compel people or entities to seek alternative forms of adjudicating their disputes using online dispute resolution tools or arbitration. However, as this thesis seeks to discuss Legal Tech in the context of its competition vis-à-vis lawyers, it will not discuss legal technology solutions that intend to serve to compete with the functions of a court or an arbitration tribunal.

⁹⁴ This is in the case of the Slovenian Bar Association. See Zakon o odvetništvu 1993, arts 59-65.

⁹⁵ EU member states such as Spain and Belgium have multiple bar associations. Also see European Law Institute, ‘Abogacía Española Consejo General’ <www.europeanlawinstitute.eu/membership/institutional-observers/general-council-of-spanish-lawyers/> accessed 10 March 2019; Barreau de Bruxelles Ordre Français, ‘The Bar’ <www.barreaudebruxelles.info/index.php/en/our-bar/the-bar> accessed 10 March 2019.

⁹⁶ European Commission, ‘EU justice scoreboard’ <https://ec.europa.eu/info/policies/justice-and-fundamental-rights/effective-justice/eu-justice-scoreboard_en> accessed 10 March 2019.

⁹⁷ *ibid.*

E. Academia and Legal Education

Academics and universities are also important stakeholders of the legal industry as they nurture future generations of lawyers and also shape the way jurisprudence will be developed. In the context of Legal Tech, universities and lecturers of legal education are important in determining the curriculum for their students in light of Legal Tech developments, where there is now pressure on law students to not just be able to find, reason and apply legal knowledge while handling clients, but also to learn skills such as computer programming.⁹⁸

Private companies or organizations that also provide legal education or law books to lawyers or non-legally trained persons also fall under this category. There are several legal publishers in the market that publish books, journals, monographs, and textbooks for lawyers. These publishers, such as LexisNexis,⁹⁹ Wolters Kluwer,¹⁰⁰ Oxford University Press,¹⁰¹ CH Beck¹⁰² amongst others, publish books that are intended for lawyers or law students. There is however nothing stopping a well-educated non-legally trained person from buying legal books from such publishers and reading them to solve his own legal woes. In this case, whether this falls under provision of legal advice can be quite tenuous and ultimately depends on the laws of each jurisdiction, although it is unlikely that this will be the case.

IV. CATEGORIZATION OF LEGAL TECHNOLOGY

Having elaborated upon the different stakeholders in the legal industry, the categorization of Legal Tech is the next fundamental topic that should be discussed.

⁹⁸ Ondrej, 'Should law students learn to code?' (Legal Geek 5 May 2017)

<www.legalgeek.co/read/should-law-students-learn-to-code/> accessed 18 March 2019.

⁹⁹ LexisNexis sells legal books in EU member states such as Austria: see LexisNexis, 'Recht' <<https://shop.lexisnexis.at/recht.html>> accessed 10 March 2019.

¹⁰⁰ Kluwer Law Online, 'Kluwer Law Online Journals'

<www.kluwerlawonline.com/index.php?area=Journals> accessed 10 March 2019.

¹⁰¹ Oxford University Press: Academic, 'Law'

<<https://global.oup.com/academic/category/law/?cc=si&lang=en&>> accessed 10 March 2019.

¹⁰² Beck-shop.de: Die Fachbuchhandlung, 'Recht' <www.beck-shop.de/recht/bereichsseite.aspx?toc=4393> accessed 10 March 2019.

The Stanford CodeX Techindex¹⁰³ is one of the most comprehensive Legal Tech catalogues within the US. This index which comprises of 1,136 companies¹⁰⁴ categorizes Legal Tech solution providers into nine main categories, which are: (1) marketplace; (2) document automation; (3) practice management; (4) legal research; (5) legal education; (6) online dispute resolution; (7) e-discovery; (8) analytics; and (9) compliance.¹⁰⁵ This list should not however be treated as exhaustive.

On the other side of the Atlantic, unlike the US, there is presently no fixed method of categorizing legal technology by the EU for the EU member states. The Stanford CodeX Techindex does however include Legal Tech solution providers that serve the EU market, such as Claim Flights, which allows users to claim flight delay compensations in the EU pursuant to EC Regulation 261/2004¹⁰⁶ easily through their portal. In that sense, the Stanford CodeX Techindex can serve as a structure in which Legal Tech solution providers in the EU can be categorized. While there is no collective action taken at the EU level to categorize Legal Tech, several organizations have taken the initiative at the national level to map out the Legal Tech landscape.

In Austria, the Legal Tech Initiative Austria¹⁰⁷ (“LTIA”) released a document entitled “Legal Tech Landscape Austria 2018”¹⁰⁸ with the intention to map out players in Legal Tech in Austria. The LTIA reports that it has found 62 of such companies or organizations, and further “chose to arrange the different players into groups or categories, based on their mutual interest and/or the ultimate shared goal of their products, as perceived.”¹⁰⁹ The LTIA categorizes the Legal Tech solution providers into ten key categories, which are: (1) office support; (2) document suppliers; (3) student tools; (4) consumer centered services; (5) organizations & science; (6)

¹⁰³ Stanford Law School, ‘CodeX Techindex’ <<https://techindex.law.stanford.edu/>> accessed 10 March 2019.

¹⁰⁴ *ibid.* The number of companies is as of 10 March 2019.

¹⁰⁵ *ibid.*

¹⁰⁶ Claim Flights (n 81).

¹⁰⁷ Legal Tech Initiative Austria <www.legaltechaustria.at/> accessed 26 July 2019.

¹⁰⁸ Legal Tech Initiative Austria, *Legal Tech Landscape Austria 2018* <https://docs.wixstatic.com/ugd/f4276b_98cea5ce90974862bbad2a1ffc40ca3d.pdf> accessed 10 March 2019 (Legal Tech Landscape Austria 2018).

¹⁰⁹ *ibid.* 4.

General Data Protection Regulation (“GDPR”) support;¹¹⁰ (7) L2C tools; (8) eDiscovery/AI; (9) smart research; and (10) eDatabases.¹¹¹ Some of these categories are similar to Stanford CodeX Techindex, although other categories are either EU law specific (e.g. GDPR support) or technology specific (e.g. eDiscovery/AI).

Besides Austria, the Dutch Legal Tech platform¹¹² made an attempt to list Legal Tech solution providers in the Netherlands.¹¹³ The list is segregated by “Products”, “Startups” and “Institutes”.¹¹⁴ The list, however, was created in early 2015 and appears to not have been updated since. Considering the growth in interest and development of Legal Tech, the list of Legal Tech solution providers – in particular startups in this field – should have grown. LegalTech Belgium, similarly, also mapped out the LegalTech landscape in Belgium, where categories in the map include: (1) legal education & HR; (2) legal research; (3) practice management; (4) publishing; (5) online legal services; consultancy law firms; and (6) automation.¹¹⁵

A. Other Proposed Categorizations of Legal Tech

In Praduroux, de Paiva and di Caro’s article entitled “Legal Tech Start-ups: State of the Art and Trends”,¹¹⁶ the authors attempted to survey the landscape of legal tech with a focus on startups in Silicon Valley. The study categorized legal tech start-ups in the following categories: (1) lawyer-marketplace – lawyer-to-lawyer outsourcing – social and referral networks; (2) document automation and assembly – DIY legal forms and contracts; (3) practice management – case management for specific practice

¹¹⁰ The General Data Protection Regulation is the EU’s latest regulation on the protection of a data subject’s rights. See European Parliament and Council, Regulation 2016/679 of 27 April 2016, On the protection of natural persons with regard to the processing of personal data and on the free movement of such data, and repealing Directive 95/46/EC [2016] OJ L119 (General Data Protection Regulation).

¹¹¹ Legal Tech Landscape Austria 2018 (n 108) 2-3.

¹¹² Dutch Legal Tech <www.dutchlegaltech.nl/> accessed 1 June 2019.

¹¹³ Jelle van Veenen, ‘Dutch Legal Tech List’ (Dutch Legal Tech 20 February 2015) <www.dutchlegaltech.nl/2015/02/20/dutch-legal-tech-list/> accessed 2 June 2019.

¹¹⁴ *ibid.*

¹¹⁵ Legaltech, ‘The Rise of LegalTech – The Belgian Market Overview (map)’ <<https://legaltech.be/the-rise-of-legaltech-the-belgian-market-overview-map/>> accessed 1 June 2019.

¹¹⁶ Sabrina Praduroux, Valeria de Paiva and Luigi di Caro, ‘Legal Tech Start-ups: State of the Art and Trends’ <<https://vcvpaiva.github.io/includes/pubs/2016-legal.pdf>> accessed 20 July 2019.

areas – legal billing; (4) legal research; (5) predictive analytics and litigation data mining; (6) electronic discovery; (7) online dispute resolution; and (8) data security technologies. The authors have also acknowledged that their classification is not fool proof, as several technologies that are classified in one category can also be classified in another.¹¹⁷ Furthermore, for the category on “data security technologies”, the authors note that such is “not strictly ‘legal’ technology, as computer security experts would claim it as their territory”.¹¹⁸

The above categorization is somewhat similar to the Stanford CodeX Techindex and the LTIA’s categorizations of the types of Legal Tech. Similar features not just include the header of the categorization (all three have “legal research” or synonyms thereof as a main category), but also the number of categories (approximately 8-10). The categorization also appears to be primarily focused on the Legal Tech service provided by the Legal Tech startup or company, e.g. automated documentation or smart legal research, rather than the impact on stakeholders in the legal industry, such as practicing lawyers, consumers or the judiciary, for instance.

B. Proposed Definition and Categorization of Legal Tech

As evident in the earlier sections, each country or institution has adopted its own method and evaluation criteria in categorizing Legal Tech. As this thesis is a study on the regulation of Legal Tech vis-à-vis the regulation of the legal profession, what is crucial in understanding how a technology, company or even industry should be regulated is not what function it is intended to have but rather its impact on the stakeholders in that industry. In this case, the stakeholders in the legal industry have been covered in Chapter 2.III, which include the following: practicing lawyers and in-house counsels which also includes law firms; client-users; and the organs of the state that enable (or in some cases disable) access to justice such as the judiciary and the government. Legal technology can then be broadly categorized based on how they impact stakeholders, which is illustrated in the following diagram:

¹¹⁷ *ibid* 4-5.

¹¹⁸ *ibid* 5.

Illustration 2: Categories of Legal Technology

As this thesis is focused on Legal Tech solution providers that provide the same legal services as lawyers or technology that replaces the functions of lawyers within the law firm, i.e. any technology that competes with the function and role of a lawyer, it will mainly consider legal technology solutions that fall into the top right and bottom right zones above, i.e. legal technology solutions that provide legal services to consumers and legal technology solutions for lawyers in their practice. Issues concerning such Legal Tech solutions will be further explored in the subsequent chapters and sections.

V. THE CURRENT STATE OF LEGAL TECHNOLOGY

In the EU, the idea of law firms adopting Legal Tech or having to compete with DIY legal services¹¹⁹ has only recently started to gain traction and attention. Regardless of the media reports surrounding what law firms have done or not done, and what they

¹¹⁹ For a good explanation and better understanding on DIY legal services, see Fina, Ng and Vogl (n 38).

should do and not do, it is important to evaluate the current state of Legal Tech in each jurisdiction as this will serve as a backbone and comparator for subsequent chapters in this thesis.

A. Awareness and Promotion of Legal Tech at the EU Level

The EU is presently not involved in the promotion or review of the current state of Legal Tech amongst its member states. There however exists EU-wide Legal Tech interest groups, most notably the European Legal Technology Association, which states that it is an “association of law firms, companies, legal technology providers, start-ups and individuals in Europe”.¹²⁰ The Legal Hackers organization also has several chapters within EU member states, although not all EU member states are represented within the Legal Hackers organization. Notwithstanding this, the Legal Hackers organization recently held an EU Legal Hackers Summit in May 2018.¹²¹

B. Awareness and Promotion of Legal Tech at the National Level

At the national level, each EU member state has its own initiatives taken by either law firms, legal technology thinktanks or bar associations to promote or at the very least discuss the impact of legal tech. Several countries such as Austria,¹²² Czechia,¹²³ Denmark,¹²⁴ Finland,¹²⁵ Germany¹²⁶ and the UK¹²⁷ have organized conferences on legal technology. Besides national conferences, the Legal Hackers organization also has several chapters operating in various EU member states. These chapters are organized by cities instead of countries and these are the following EU member states that have Legal Hackers’ chapters:

¹²⁰ European Legal Tech Association <<http://legal-tech-association.eu/>> accessed 1 June 2019.

¹²¹ EU Legal Hackers Summit Open Day <<http://legalthackers.eu/>> accessed 1 June 2019.

¹²² Legal Tech Konferenz 2019, ‘Future-Law’ <<https://legaltech.future-law.at/>> accessed 26 July 2019.

¹²³ Innovative Legal Services Forum 2019 <www.ilsf2019.com/> accessed 17 July 2019.

¹²⁴ Relevent, ‘Legal Tech’ <www.relevent.dk/event_legal_tech> accessed 2 June 2019.

¹²⁵ University of Helsinki, ‘Legal Tech Con’ <www.helsinki.fi/en/networks/legal-tech-lab/events/legal-tech-con-2018> accessed 2 June 2019.

¹²⁶ Anwaltszukunfts-kongress <www.anwaltszukunfts-kongress.de/> accessed 26 July 2019.

¹²⁷ London Law Expo 2019 <<https://londonlawexpo.com/>> accessed 26 July 2019.

Table 3: List of Legal Hackers Chapters in the EU¹²⁸

EU Member State	Legal Hackers Chapters
Austria	Vienna Legal Hackers
Belgium	Brussels Legal Hackers
Bulgaria	Sofia Legal Hackers
Croatia	Rijeka Legal Hackers, Zagreb Legal Hackers
Cyprus	Limassol Legal Hackers
Czechia	Brno Legal Hackers
Denmark	Copenhagen Legal Hackers
Estonia	Estonia Legal Hackers
Finland	Helsinki Legal Hackers
France	Paris Legal Hackers, Toulouse Legal Hackers
Germany	Berlin Legal Hackers, Frankfurt Legal Hackers, Legal Hackers Hamburg, Munich Legal Hackers, Nürnberg Legal Hackers
Greece	Athens Legal Hackers
Hungary	-
Ireland	Dublin legal Hackers
Italy	Bari Legal Hackers, Legal Hackers Genova, Legal Hackers Milan, Legal Hackers Napoli, Legal Hackers Pescara, Legal Hackers Roma, Torino Legal Hackers, Legal Hackers Trieste, Legal Hackers Verona
Latvia	-
Lithuania	-
Luxembourg	Luxembourg Legal Hackers
Malta	-
Netherlands	Legal Hackers The Hague
Poland	Warsaw Legal Hackers
Portugal	Legal Hackers Lisbon, Porto Legal Hackers
Romania	Bucharest Legal Hackers

¹²⁸ Legal Hackers, 'Global Chapters' <https://legalhackers.org/people/>> accessed 25 July 2019.

Slovakia	-
Slovenia	Ljubljana Legal Hackers
Spain	Legal Hackers Asturias, Barcelona Legal Hackers, Bilbao Legal Hackers, Madrid Legal Hackers Legal Hackers Malaga, Valencia Legal Hackers
Sweden	Stockholm Legal Hackers
United Kingdom	Belfast Legal Hackers, London Legal Hackers, Scotland Legal Hackers, Sheffield Legal Hackers

As evident from the above table, some EU member states have more than one Legal Hackers Chapter, whereas some have none. The Legal Hackers chapters in Europe have also organized an EU Legal Hackers Summit that has a “full day summit conference with workshops, keynote speakers, panel discussions and huge networking”.¹²⁹ Some chapter organizers have even managed to collaborate with international public institutions such as the United Nations Commission on International Trade Law (“UNCITRAL”) and invited legal officers to speak at their events, such as in the case of Ljubljana Legal Hackers.¹³⁰

There are also other local legal hackathons in the EU, which has been held in countries such as the UK and Finland. A hackathon is “an event, typically lasting several days, in which large number of people meet to engage in collaborative computer programming”,¹³¹ in the case of a legal hackathon, the general idea and aim is for participants to collaborate to come up with a legal solution to a legal problem during the specified period of time. The Legal Geek’s Law Tech Hackathon “Law for Good” was hosted in the UK in 2016, where over 50 coders came together to participate in the hackathon.¹³² In Finland, the University of Helsinki’s Legal Tech Lab has also organized an annual hackathon since 2017, where in 2018 competitors in the hackathon have to either create tools and technology for legal professionals that can

¹²⁹ EU Legal Hackers Summit (n 121).

¹³⁰ Ljubljana Legal Hackers <www.facebook.com/lju.legal.hackers/> accessed 2 June 2019.

¹³¹ Oxford Dictionaries, ‘Hackathon’ <<https://en.oxforddictionaries.com/definition/hackathon>> accessed 18 March 2019.

¹³² Legal Geek, ‘Legal Geek: Law Tech Hackathon “Law for Good”’ <www.legalgeek.co/event/legal-geek-law-tech-hackathon-law-good/> accessed 10 March 2019.

help them solve a problem more efficiently, or create assistive legal technology for people with disabilities.¹³³ The Global Legal Hackathon in 2018 also saw several participants from EU member states, such as from Germany, Hungary, Italy, Poland, Romania, Spain, Sweden and the UK;¹³⁴ it was organized again in 2019.¹³⁵

C. Institutional Support and Research on Legal Tech

In the past few years, several universities in EU member states have taken the initiative to spearhead the development of legal tech by either doing one or a combination of the following activities:

- Creation of a dedicated department or research center for the research and development of Legal Tech;
- Creation of LLM studies or seminars focused on Legal Tech;
- Organizing conferences related to Legal Tech; or
- Publication of reports on the state of Legal Tech or the future of law.

1. Creation of a dedicated department or research center for the research and development of legal technology

The University of Helsinki's Legal Tech Lab is one of such research centers set up that "examines and experiments on legal tech and digitalization of legal practices".¹³⁶ The research center organizes events on the use of AI and also organizes legal hackathons. It also has a research component that focuses on five different areas of law and digitalization: "(1) foundations of legal digitalization, (2) algorithmic fairness and justice by design, (3) legal approaches to information, (4) societal change in institutions and profession, and (5) digital access to justice and governance".¹³⁷ In

¹³³ University of Helsinki Legal Tech Lab, 'Hack the Law!' <www.helsinki.fi/en/networks/legal-tech-lab/hack-the-law-2018-0> accessed 26 July 2019.

¹³⁴ Global Legal Hackathon, '#GLH2018 Round One Winning Teams' <<https://globallegalthackathon.com/round-one-winners/>> accessed 26 July 2019.

¹³⁵ Global Legal Hackathon <<https://globallegalthackathon.com/>> accessed 25 July 2019.

¹³⁶ Legal Tech Lab, 'About' <www.helsinki.fi/en/networks/legal-tech-lab/about> accessed 10 March.

¹³⁷ Legal Tech Lab, 'Research' <www.helsinki.fi/en/networks/legal-tech-lab/research> accessed 1 June 2019.

Germany, the Legal Tech Lab at Frankfurt am Main¹³⁸ is a student-led initiative at the Goethe-Universität Frankfurt am Main although it has different activities as compared to the University of Helsinki's Legal Tech Lab. The Legal Tech Lab in Frankfurt organizes coding lessons, events and roundtable discussions, but does not undertake research activities unlike the University of Helsinki's Helsinki Legal Tech Lab.

In Germany, Bucerius Law School, one of the earlier universities to research on modern day Legal Tech, does research on Legal Tech & innovation through the Bucerius Center on the Legal Profession, where its research and work “revolves around the management and leadership of commercial law firms and legal departments”.¹³⁹ This can be seen as an ancillary department within a larger organization (i.e. the Bucerius Center on the Legal Profession and Bucerius Executive Education).

2. Creation of LLM studies or seminars focused on Legal Tech

Legal education on Legal Tech is also quickly becoming a mainstay in academic curricula, particularly in the form of either a masters' program or as professional development courses. Swansea University's School of Law, a UK university, announced in 2018 that it will be offering an “LLM in LegalTech”¹⁴⁰ which intends to provide its students courses on “how Artificial Intelligence can be applied to the law and how the law is applied to Artificial Intelligence”.¹⁴¹ The IE Law School in Spain has also likewise introduced a Masters in Legal Tech (LLM) that candidates can enroll on a part-time basis.¹⁴² Otherwise, for students seeking a shorter and more affordable course or rather industry update on Legal Tech, there are also alternative avenues to seek further formal knowledge on Legal Tech. Bucerius Law School has offered a

¹³⁸ Legal Tech Lab Frankfurt am Main studentische Initiative an der Goethe-Universität <<https://legaltechlab.de/>> accessed 1 June 2019.

¹³⁹ Bucerius Center on the Legal Profession, ‘Legal Tech & Innovation’ <www.bucerius-education.de/en/bucerius-clp/legaltech/> accessed 1 June 2019.

¹⁴⁰ Swansea University, ‘Swansea University Launches Brand New LLM in LegalTech’ <www.swansea.ac.uk/law/news/swanseauniversitylaunchesbrandnewllminlegaltech.php> accessed 1 June 2019.

¹⁴¹ *ibid.*

¹⁴² IE Law School, ‘Master in Legal Tech’ <www.ie.edu/law-school/programs/masters/master-legal-tech/> accessed 1 June 2019.

Summer Program on Legal Technology and Operations in 2018¹⁴³ and will be repeating this course in 2019.¹⁴⁴ The Bucerius Summer Program offers participants modules on “Legal Analytics and Artificial Intelligence” and “Innovation Diffusion in the Legal Industry”, amongst other modules.¹⁴⁵

There are several established conferences on legal informatics in the EU that have also recently moved into the topic of Legal Tech. The Foundation for Legal Knowledge Systems, Jurix,¹⁴⁶ has been holding conferences in the field of legal knowledge and information systems since 1988.¹⁴⁷ In 2017, Jurix’s program schedule included invited speakers to talk about “Practicing AI in the Legal Space: Lessons Learned & Challenges Ahead”¹⁴⁸ and also accepted papers that would fall into the sphere of Legal Tech.¹⁴⁹ In 2018, one of the German speaking world’s oldest legal informatics symposium, *Internationales Rechtsinformatik Symposium* (“IRIS”), held its annual conference in Salzburg from 22 to 24 February with leading topics on data protection and legal technology.¹⁵⁰ To put it in the words of the organizers of IRIS 2018, the “scientific monitoring of this “hype” is essential, in order to use the full potential [of Legal Tech] but also dampen the exceeded expectations.”¹⁵¹

Some universities in the EU have also taken steps to organize conferences or workshops in Legal Tech. Humboldt University of Berlin recently organized a two-day workshop on “The Future of Law: Technology, Innovation and Access to Justice”.¹⁵²

¹⁴³ Investcee, ‘Summer school in legal technology & operations >> July 2018, Hamburg (Germany)’ <https://investcee.hu/legaltech_summer_school-2018/> accessed 26 July 2019.

¹⁴⁴ Bucerius Law School, ‘Understand the future of law and legal services’ <www.law-school.de/summer-programs/legal-technology-and-operations/overview/> accessed 26 July 2019.

¹⁴⁵ Bucerius Law School, ‘Topics & Schedule: Apply legal technology to your career path’ <www.law-school.de/summer-programs/legal-technology-and-operations/topics-schedule/#c21521> accessed 10 March 2019.

¹⁴⁶ Jurix, ‘About’ <<http://jurix.nl/about/>> accessed 26 July 2019.

¹⁴⁷ *ibid.*

¹⁴⁸ Jurix 2017, ‘Schedule’ <<https://jurix2017.gforge.uni.lu/schedule.html>> accessed 26 July 2019.

¹⁴⁹ *ibid.*

¹⁵⁰ IRIS 2018, ‘Information in ENGLISH’ <www.univie.ac.at/RI/IRIS2018/information-in-english/> accessed 26 July 2019.

¹⁵¹ *ibid.*

¹⁵² Humboldt Universität zu Berlin, ‘The Future of Law: Technology, Innovation and Access to Justice’ <https://dann.rewi.hu-berlin.de/doc/programme_future-of-law-berlin.pdf> accessed 26 July 2019.

D. Regulation of Legal Technology at the EU or National Level

Legal technology is presently unregulated at the EU level, although there are several ancillary regulations and directives that impact the provision and use of Legal Tech solutions. In the case of LSPs such as lawyers and trainee lawyers, they are regulated at the EU level (through directives) and at the national level. Each EU member state has its own set of regulations that apply to the legal industry, and in some countries, lawyers may be subjected to more than one set of regulations, such as regulations by legislation and regulations set by the bar associations that lawyers have to be a member of. Unlike lawyers who have these bar regulations, legal technology solution providers are subject to generic national or EU laws that apply to their businesses, such as e-commerce laws if the legal technology solution provider is conducting e-commerce activities. For example, most Legal Tech solution providers collecting or processing personal data will be expected to comply with the General Data Protection Regulation,¹⁵³ or if these legal technology solution providers provide services directly to consumers, the EU Consumer Rights Directive¹⁵⁴ will also apply depending on the context. At the national level, LSPs may not be allowed to operate depending on the definition of legal advice and who is permitted to provide such legal advice. These rules will be further explored in the subsequent chapter of this thesis which discusses the regulation of the legal profession.

VI. CHAPTER SUMMARY

This chapter sets out the definition of legal technology, the stakeholders involved in Legal Tech, the current state of Legal Tech in the EU and the existing regulation of Legal Tech at the EU and national level. This chapter has also provided an overview of Legal Tech in the EU and is intended to serve as a foundation for subsequent chapters of this thesis.

¹⁵³ General Data Protection Regulation (n 110).

¹⁵⁴ European Parliament and Council, Directive 2011/83/EU of 25 October 2011, On consumer rights, amending Council Directive 93/13/EEC and Directive 1999/44/EC of the European Parliament and of the Council and repealing Council Directive 85/577/EEC and Directive 97/7/EC of the European Parliament and of the Council [2011] OJ L304 (Consumer Protection Directive).

Chapter 3: The Theory of Regulation and the Basis for Regulating Legal Service Providers in the European Union

I. INTRODUCTION

Regulation has always been a tricky and difficult affair, regardless of the industry or the profession involved. In the last chapter, this thesis set out the definition of Legal Tech and described the stakeholders in the legal industry. It is, however, pertinent to note that while the legal industry is highly regulated in almost every EU member state, although the extent of regulation differs from member state to member state. In this regard, it is important to understand the rationale behind regulation of the legal industry. This chapter will explore the theories behind the regulation of lawyers and the regulation of technology; furthermore, it will also set out the practice of regulating LSPs in the EU, such as determining who, what, why, when and how lawyers are regulated.

II. OVERVIEW ON THE THEORY OF REGULATION

States have always regulated the society and the economy since written history – in the modern world, such regulations usually come in a myriad of forms. These include laws, penalties or incentives. These regulations are usually implemented to influence society or the economy to reach certain desirable goals. The following sections will explore the theories of regulation and the theory and practice of regulating lawyers, technology and legal technology.

A. The Theory of Regulating Lawyers

The principles behind the regulation of lawyers have been discussed and expounded in numerous academic articles, enshrined in the charter of numerous bar associations in the EU and have also been enacted into legislation. In the Legal Services Act of the

UK, the very first part, section and sub-section states the regulatory objectives of the act:

“Protecting and promoting the public interest;
Supporting the constitutional principle of the rule of law;
Improving access to justice;
Protecting and promoting the interests of consumers
Promoting competition in the provision of services within subsection (2);
and
Encouraging an independent, strong, diverse and effective legal profession.”¹⁵⁵

This sentiment is very much echoed in the profile of the Slovak Bar Association as well:

"The legal profession helps to exercise the individual's constitutional right to defence and to protect any other individual's and legal entity's rights and interests in accordance with the Slovak Constitution and the laws. The duties and obligations of the legal profession are fulfilled by lawyers, particularly by representing clients before courts of law, governmental authorities and other entities, acting for and defending individuals in criminal proceedings, legal consultancy, writing instruments about legal acts, making legal analyses and administration of clients' property.”¹⁵⁶

The theory behind the regulation of lawyers appears to be very much premised on the concept of access to justice. While authors such as Semple have argued that “we do not regulate lawyers in order to make justice more accessible, we regulate lawyers in order to protect vulnerable clients and third parties while promoting public goods such

¹⁵⁵ Legal Services Act 2007 (n 91), 1(1).

¹⁵⁶ Slovenská advokátska komora, 'Profile' <www.sak.sk/blox/cms/en> accessed 11 March 2019.

as the rule of law”,¹⁵⁷ the fact is that those in the position of regulation believe that access to justice is one of the basis for the regulation of the provision of legal services.¹⁵⁸ The driving force behind the regulation of the legal industry is thus heavily premised on the public interest, as regulation is sought to ensure that the public interest, such as ensuring access to justice, protecting of a person’s rights and promoting the rule of law, are achieved.

In order to meet these public interests, numerous methods are employed in the regulation of lawyers, such as: (1) creating artificially high barriers to entry of the profession;¹⁵⁹ (2) restrictions on advertising and self-promotion;¹⁶⁰ (3) fee regulations;¹⁶¹ (4) ownership and structure of law firms;¹⁶² and (5) compliance to ethical code of conduct or face sanctions from the bar association.¹⁶³ In almost all EU member states, the self-regulatory method is used, i.e. lawyers are largely responsible for the regulation of the profession. In some EU member states the regulation of the profession is split between the Ministry of Justice or Law and the bar association; one such example is Slovenia, where the Ministry of Justice sets down the laws concerning the practice of lawyers and the rules governing the admission of lawyers, but the Slovenian Bar Association is in charge of the disciplinary procedures and charges if a Slovenian lawyer has failed to meet legal ethic rules.¹⁶⁴

¹⁵⁷ Noel Semple, ‘Access to justice: is legal services regulation blocking the path’ (2013) *International Journal of the Legal Profession* 20:3 267, 278.

¹⁵⁸ *Legal Services Act 2007* (n 91), 1(1).

¹⁵⁹ Frank H Stephen, ‘The European Single Market and the Regulation of the Legal Profession: An Economic Analysis’ (2002) 23 *Managerial and Decision Economics* 115, 116.

¹⁶⁰ *ibid.*

¹⁶¹ *ibid.*

¹⁶² *ibid.*

¹⁶³ This is in the case of UK solicitors, where solicitors are required to adhere to the Code of Conduct of the Solicitors Regulation Authority, also known as the SRA Handbook. The SRA Handbook lists down ten key principles that all solicitors must adhere to and these principles override any other legal obligation. Solicitors must: (1) uphold the rule of law and the proper administration of justice; (2) act with integrity; (3) not allow your independence to be compromised; (4) act in the best interests of each client; (5) provide a proper standard of service to your clients; (6) behave in a way that maintains the trust the public places in you and in the provision of legal services; (7) comply with your legal and regulatory obligations and deal with your regulators and ombudsmen in an open, timely and co-operative manner; (8) run your business or carry out your role in the business effectively and in accordance with proper governance and sound financial and risk management principles; (9) run your business or carry out your role in the business in a way that encourages equality of opportunity and respect for diversity; and (10) protect client money and assets. These echo the principles of regulation enshrined in the *Legal Services Act 2007*. See Solicitors Regulation Authority, *SRA Handbook*.

¹⁶⁴ Republika Slovenija Ministrstvo za Pravosodje (n 93); *Zakon o odvetništvu* (n 94).

Whether these regulations meet the purported societal goals is an interesting question. Improving the access to justice means affordable legal fees for the public – however, with artificially high barriers to entry such as long education, compliance costs and professional liability insurance premiums, this means that the cost of legal advice has to be priced to cover these costs accordingly. Herring, in his book *Legal Ethics*, has highlighted that “to maintain the high charges applied to their work, [lawyers] fiercely protect the monopoly of solicitors and barristers over legal work, and control entry into these professions. This means that there is a restricted number of lawyers and hence that there is a limited market. That helps to keep fees high.”¹⁶⁵ Arguably, the self-regulatory mechanism may then be self-defeating as lawyers who regulate themselves will ensure that legal fees will not be too low. In other parts of the world such as Singapore where the profession is self-regulated, the suggestion by the Ministry of Law in Singapore to fix litigation fees for lawyers¹⁶⁶ was reported to be put on hold less than a month after the media reported on the proposal due to feedback from lawyers.¹⁶⁷

The search for more affordable legal services has continued to elude clients and bar associations, as the former seeks out alternate methods to not use the services of a lawyer and the latter tries to encourage lawyers to take up pro bono cases that provide free legal aid to vulnerable people. One result is the growth of Legal Tech to plug the existing gap of providing legal services that protect rights that would otherwise be too costly to defend, e.g. the repealing of a parking fine or small claims. This has led to the development of Legal Tech such as DoNotPay¹⁶⁸ and the creation of online small claims courts,¹⁶⁹ where users do not need to hire a lawyer to protect their rights, thereby allowing for affordable justice.

¹⁶⁵ Herring (n 12) 204.

¹⁶⁶ Selina Lum, ‘Fixed legal costs proposed for civil cases’ (The Straits Times 27 October 2018) <www.straitstimes.com/singapore/courts-crime/fixed-legal-costs-proposed-for-civil-cases> accessed 11 March 2019.

¹⁶⁷ KC Vijayan, ‘MinLaw removing proposal for fixed legal fees’ (The Straits Times 24 November 2018) <www.straitstimes.com/singapore/minlaw-removing-proposal-for-fixed-legal-fees> accessed 11 March 2019.

¹⁶⁸ DoNotPay (n 82).

¹⁶⁹ HM Courts & Tribunals Service (n 44).

The regulation of the legal profession has another layer in the EU – where the regulation of the profession also involves the mobility of lawyers within the EU, as one of the key pillars of the EU's internal market is that of the freedom of establishment and to provide services in any part of the EU; this is provided for in the Treaty of the Functioning of the European Union (“TFEU”) at Article 49.¹⁷⁰ TFEU Article 49 states that “restrictions on the freedom of establishment of nationals of a Member State in the territory of another Member State shall be prohibited”.¹⁷¹ Each EU member state however has different regulations where the authorized practice of law is concerned and thus Directive 98/5/EC to facilitate practice of the profession of lawyer on a permanent basis in a Member State other than that in which the qualification was obtained¹⁷² (“Establishment Directive”) was adopted specifically for the legal profession to reduce the barriers to practice in another EU member state,¹⁷³ although the Establishment Directive only applies to qualified lawyers and not trainee-lawyers.¹⁷⁴

Besides the Establishment Directive, the EU has also adopted Directive 2005/36/EC on the recognition of professional qualifications (“Mutual Recognition Directive”),¹⁷⁵ which seeks to enable mutual recognition of professional qualifications. While this is an applauded move, this has given rise to cases of purported circumvention of laws governing the admission of lawyers in certain EU member states. One such instance is the *Koller* case – Koller was an Austrian who obtained a *Magister der Rechtswissenschaften*, which was recognized by the Spanish Ministry of Education of Science as equivalent to *Licenciado en Derecho*. Koller subsequently fulfilled the requirements under domestic Spanish law and eventually received authorization to use the title of *abogada*. He then applied to take the bar examination in Austria, but was rejected from taking the examination on the basis that “in Spain, by contrast with

¹⁷⁰ Treaty of the Functioning of the European Union [2007] OJ C326, art 49 (TFEU).

¹⁷¹ *ibid.*

¹⁷² European Parliament and Council, Directive 98/5/EC of 16 February 1998, To facilitate practice of the profession of lawyer on a permanent basis in a Member State other than that in which the qualification was obtained [1998] OJ L077 (Establishment Directive).

¹⁷³ Matthias Schelkens, ‘The Freedom of Establishment of Lawyers in the European Union’ <www.law.kuleuven.be/apps/jura/public/art/51n2/schelkens.pdf> accessed 20 July 2019, 233.

¹⁷⁴ *ibid.*

¹⁷⁵ European Parliament & Council, Directive 2005/36/EC of 7 September 2005, On the recognition of professional qualifications [2005] OJ L255/22 (Mutual Recognition Directive).

the rules applicable in Austria, practical experience is not required in order to pursue the profession of a lawyer”¹⁷⁶ and this application was “designed to circumvent the requirement for five years’ practical experience required by the Austrian rules”.¹⁷⁷ Ultimately, the court decided according to the Mutual Recognition Directive, he should not be precluded from taking the bar examination in Austria even though he did not complete the practical requirements.¹⁷⁸ The judgment of this case has raised concerns on inducing “(law) graduates to move to another [Member State], pass the necessary examinations there, rapidly return to their [Member State] of origin and so avoid the national compulsory training period”.¹⁷⁹

It can thus be concluded that generally, the regulation of the legal profession at the national level is to meet the public interest as discussed in the aforementioned paragraphs. The regulation of the legal profession at the EU level, however, is to ensure the freedom of movement of lawyers and the right of establishment in the EU. Therefore, the regulatory principles behind EU and national rules are different. However, despite the difference in regulatory principles, both EU and national rules ultimately intersect and affect each other – for example, the case of *Koller* showcases how national rules and EU laws converge to result in the bypassing of certain national rules, which may or may not be to the benefit of those seeking advice.¹⁸⁰ The distinction between the regulation of lawyers at the EU level and the national level will be further elaborated in subsequent sections in this thesis.

¹⁷⁶ C-118/09 *Koller*.

¹⁷⁷ *ibid*, para 17.

¹⁷⁸ *ibid*, para 35.

¹⁷⁹ Schelkens (n 173) 233.

¹⁸⁰ The *Koller* case shows that one can bypass the practice requirements to take the bar examination by going to another member state with laxer rules on bar examination procedures. If the case had different facts where Koller had practiced three years as a Spanish *abogado* and sought to be admitted as a foreign lawyer in Austria as a *Rechtsanwalt* under the Establishment Directive, this would in theory be permitted as well pursuant to the rules of the Establishment Directive. The end result still lies in that the five years of practice under Austrian law is circumvented; this practice requirement is arguably essential in ensuring that lawyers providing legal services are able to provide qualified legal services.

B. The Economic Theory of Regulating Lawyers

From the perspective of economic theory, academics – though American academics – have argued that the provision of legal services is a credence good,¹⁸¹ i.e. a good where it is difficult for the purchaser to ascertain the true value of the good¹⁸² and where the seller benefits from this asymmetric information.¹⁸³ Due to this characteristic present in legal services, commentators have suggested that the need for licensing of lawyers as part of the regulatory measure is due to “information asymmetry between lawyers and clients. A client can most reliably judge a lawyer based on experience with the lawyer and the results the lawyer produces”.¹⁸⁴ Through this licensing mechanism, it serves as a “screening mechanism”¹⁸⁵ for clients who experience “high costs of acquiring information about the quality of professional services”.¹⁸⁶ Furthermore, such a licensing mechanism arguably provides “quality assurances (...) rather than (...) self-representation”,¹⁸⁷ “reducing costs of signaling quality”,¹⁸⁸ “protects third parties who would be injured by unregulated legal advisers who enable others to break the law”¹⁸⁹ and “increase social welfare by backing lawyer regulation that improves the administration of justice”.¹⁹⁰ The licensing mechanism also has the intention of “guaranteeing that all licensed practitioners are minimally competent, [thereby] the regulations arguably address both the information asymmetry (...) and the problem of grave harms”.¹⁹¹

Commentators have however also observed that the argument that regulation is needed on the grounds of information asymmetry is faulty; rather, such regulation should be seen from the perspective of a “sliding scale”¹⁹² because not every

¹⁸¹ Ribstein (n 15) 304.

¹⁸² For further information on credence goods, see Men-Adri Benz, *Strategies in Markets for Experience and Credence Goods* (Deutsche Universitäts-Verlag 2007).

¹⁸³ *ibid* 2; Ribstein (n 15) 304.

¹⁸⁴ Ribstein (n 15) 304.

¹⁸⁵ *ibid* 305

¹⁸⁶ *ibid*.

¹⁸⁷ *ibid* 307.

¹⁸⁸ *ibid*.

¹⁸⁹ *ibid* 308.

¹⁹⁰ *ibid*.

¹⁹¹ Barton (n 14), 440.

¹⁹² *ibid*.

consumer suffers from information asymmetry or serious harms arising from the lack of regulation of lawyers.¹⁹³ In certain cases such as where the client has committed a serious offence or are vulnerable, e.g. poorly educated, mentally handicapped or immigrants who do not speak the language of administration, i.e. “the more serious and irreversible the potential harm, the greater the justification for regulation to counteract information asymmetry”.¹⁹⁴

It should be noted that the above arguments were made by American academics, wherein the regulation of the legal profession in the American legal system is somewhat different from many continental European legal systems. In the US, a law graduate is not permitted to practice law or provide legal services unless he or she has passed the bar examination.¹⁹⁵ This is similar to the UK and Irish legal systems, but in other EU member states such as Austria, a law graduate who is working as a trainee lawyer is permitted to provide legal services after having graduated from law although with restrictions on submissions to the court, depending on whether the trainee lawyer has passed the bar examination or not.¹⁹⁶ Even then, there remains a licensing system for law graduates who want to be licensed lawyers (or attorneys-at-law) which has even higher barriers to entry than American licensing systems.¹⁹⁷ The benefit of an attorney-at-law is the ability to practice law independently (i.e. starting his or her own law firm) and to be able to exercise full rights of audience before the

¹⁹³ *ibid.*

¹⁹⁴ *ibid.*

¹⁹⁵ This has been noted for the State of New York. See New York State Bar Association, *The Practice of Law in New York State* (September 2015) 18.

¹⁹⁶ Rechtsanwaltsordnung (n 69), §15.

¹⁹⁷ For example, in Austria, law graduates are required to have practice for a minimum number of years before they are entitled to take the bar examination. See Chapter 3.IV.A. However, in the case of a US law graduate, a US law graduate can normally take the state bar examination without practice requirements. See The New York State Board of Law Examiners, ‘Bar Exam Eligibility’ <www.nybarexam.org/Eligible/Eligibility.htm> accessed 2 June 2019. Despite being able to take the bar examination immediately after law school, the catch in the US is that a law graduate requires a Juris Doctor degree – which is normally a post-graduate degree – and therefore the number of years a law graduate must spend *studying* before he or she is eligible to take the bar examination could be six to seven years (i.e. three years for the undergraduate degree and another three years for the post-graduate degree). Therefore, the result is that the amount of years one takes in Austria or the US to be able to qualify for the bar examination is lengthy. It can also be argued that the Austrians, despite having a lengthy practice requirement, are better off as they would at least be earning income and clocking experience during their legal training, unlike the US law students, who would only be studying and are unable to commit to work full time save for summer apprenticeships.

courts.¹⁹⁸ The issue however remains the same – whether the extremely high barriers to entry, thereby increasing economic costs for the person seeking admission, means that there will be a minimum standard of quality for clients.

In the EU, an economic analysis of the regulation of lawyers was undertaken by Frank H. Stephen in 2012, where he studied the “effect of removing barriers between two autarkic legal markets with different technologies”.¹⁹⁹ Stephen notes that “from an economic perspective the more inefficient the arrangements of the profession in one state the greater, *ceteris paribus*, the incentive for law firms from other states to move into the efficient state”, and concludes that the Establishment Directive will likely to result in “mergers between firms from efficient jurisdictions and those in the inefficient jurisdictions which the former seek to enter”,²⁰⁰ thereby leading to “reduced resource costs in the product of legal services.”²⁰¹ In this case, the mergers allow for pooling of resources such as IT infrastructure which may indeed result in reduced resource costs in the production of legal services; hopefully, these reduced costs will be savings passed down to the clients and thus allow for greater access to justice.

Notwithstanding the above, other studies on the regulation of the legal industry conducted from an economic point of view have concluded that while the degree of regulation of the legal profession is wide ranging, access to justice was safeguarded based on the sample data that they have received and used for their research.²⁰²

¹⁹⁸ Rechtsanwaltsordnung (n 69), §23(2).

¹⁹⁹ Stephen (n 159) 115.

²⁰⁰ *ibid* 124.

²⁰¹ *ibid*.

²⁰² Barbara Baarsma, Flóra Felsö and Kieja Janssen with Simon Bremer, ‘Regulation of the legal profession and access to law’ (May 2008) IV.

C. The Theory of Regulating Technology

Debates on the regulation of technology²⁰³ and discussion on its potential impact on humankind in the future²⁰⁴ have always been present, although in the past two years, there has been much media coverage on the regulation of specific technologies such as blockchain (including its derivatives such as smart contracts,²⁰⁵ cryptocurrencies and initial coin offerings²⁰⁶) and AI.²⁰⁷ In particular, notable scientists such as Stephen Hawking²⁰⁸ and technologists such as Bill Gates and Elon Musk have been reported to have warned about the dangers surrounding the use and abuse of AI.²⁰⁹ The potential impact and consequences of the use and abuse such technologies have not slipped the sight of the EU Commission. The EU Commission has been active in

²⁰³ The regulation of technology and the former's impact on the latter's growth has been discussed by academics, see Jonathan B Wiener, 'The regulation of technology, and the technology of regulation' (2004) 26 *Technology in Society* 483, 494.

²⁰⁴ In Asimov's collection of essays, *I, Robot*, the three laws of robotics were set out by Asimov:

1. A robot may not injure a human being or, through inaction, allow a human being to come to harm.
2. A robot must obey the orders given it by human beings except where such orders would conflict with the First Law.
3. A robot must protect its own existence as long as such protection does not conflict with the First or Second Laws.

These laws which were published in 1942 have been a subject for discussion in the several decades to come. In recent years where AI ethics has become a topic for academic and media debate, these laws have returned to the spotlight. Discussions on Asimov's laws have well continued in the 21st century; see Ulrike Barthelmess and Ulrich Furbach, 'Do we need Asimov's Laws?' (arXiv.org) <<https://arxiv.org/ftp/arxiv/papers/1405/1405.0961.pdf>> accessed 20 July 2019.

²⁰⁵ Yogita Khatri, 'Blockchain Smart Contracts Subject to Financial Laws, Says CFTC Primer' (Coindesk 28 November 2018) <www.coindesk.com/blockchain-smart-contracts-subject-to-financial-laws-says-cftc-primer> accessed 11 March 2019; U.S. Commodity Futures Trading Commission, *A Primer on Smart Contracts* (27 November 2018) <www.cftc.gov/sites/default/files/2018-11/LabCFTC_PrimerSmartContracts112718_0.pdf> accessed 11 March 2019. Note that a search on popular search engines such as Google and Yahoo will reveal many more results on the topic.

²⁰⁶ Ana Alexandre, 'German Financial Regulator Issues Paper on Blockchain Securities Regulation' (Cointelegraph 9 March 2019) <<https://cointelegraph.com/news/german-financial-regulator-issues-paper-on-blockchain-securities-regulation>> accessed 11 March 2019. Note that a search on popular search engines such as Google and Yahoo will reveal many more results on the topic.

²⁰⁷ Michael Spencer, 'Artificial Intelligence Regulation May Be Impossible' (Forbes 2 March 2019) <www.forbes.com/sites/cognitiveworld/2019/03/02/artificial-intelligence-regulation-will-be-impossible/#4a1c59e11ed0> accessed 11 March 2019. Note that a search on popular search engines such as Google and Yahoo will reveal many more results on the topic.

²⁰⁸ Rory Cellan-Jones, 'Stephen Hawking warns artificial intelligence could end mankind' (BBC 2 December 2014) <www.bbc.com/news/technology-30290540> accessed 11 March 2019.

²⁰⁹ Kevin Rawlinson, 'Microsoft's Bill Gates insists AI is a threat' (BBC 29 January 2015) <www.bbc.com/news/31047780> accessed 11 March 2019; Matt McFarland, 'Elon Musk: 'With artificial intelligence, we are summoning the demon.' (The Washington Post 24 October 2014) <www.washingtonpost.com/news/innovations/wp/2014/10/24/elon-musk-with-artificial-intelligence-we-are-summoning-the-demon/?noredirect=on&utm_term=.0bdb8c028d82> accessed 11 March 2019.

developing hubs to discuss policies and conduct studies on blockchain,²¹⁰ such as through the creation of the European Blockchain Partnership²¹¹ to “cooperate in the establishment of an European Blockchain Services Infrastructure (“EBSI”) that will support the delivery of cross-border digital public services, with the highest standards of security and privacy”²¹² and the EU Blockchain Observatory and Forum,²¹³ which aims to “map key initiatives, monitor developments and inspire common actions”.²¹⁴ There are also private initiatives taken in the EU, such as the European Blockchain Hub,²¹⁵ which aims to facilitate “high-level advocacy and development of Blockchain and emerging technologies”.²¹⁶

Similarly, for AI, the EU Commission is intending to put forward “a European approach to Artificial Intelligence”²¹⁷ through the introduction of three pillars: “(1) being ahead of technology developments and encouraging uptake [of AI] by the public and private sectors; (2) prepare for socio-economic changes brought about by AI; and (3) ensure an appropriate ethical and legal framework”.²¹⁸ The EU Commission has also set about to create a draft “Ethics Guidelines for Trustworthy AI”,²¹⁹ which proposes that AI should be “human-centric” and to “rely on fundamental rights, ethical principles and values to prospectively evaluate possible effects of AI on human beings and the common good”.²²⁰ Whether such framework will be placed in a regulation, directive or amended to be included in the EU Charter remains to be seen, although the key takeaway is that there is work being done in this field of AI regulation and there will be more developments to come.

²¹⁰ See European Commission, ‘Blockchain Technologies’ <<https://ec.europa.eu/digital-single-market/en/blockchain-technologies>> accessed 11 March 2019.

²¹¹ Digibyte, ‘European countries join Blockchain Partnership’ (European Commission 10 April 2018) <<https://ec.europa.eu/digital-single-market/en/news/european-countries-join-blockchain-partnership>> accessed 11 March 2019.

²¹² European Commission, ‘Blockchain Technologies’ (n 210).

²¹³ EU Blockchain Observatory and Forum <www.eublockchainforum.eu/> accessed 11 March 2019.

²¹⁴ European Commission, ‘Blockchain Technologies’ (n 210).

²¹⁵ European Blockchain Hub <www.eubchub.eu/> accessed 11 March 2019.

²¹⁶ *ibid.*

²¹⁷ European Commission, ‘Artificial Intelligence’ <<https://ec.europa.eu/digital-single-market/en/artificial-intelligence>> accessed 11 March 2019.

²¹⁸ *ibid.*

²¹⁹ European Commission, *The European Commission’s High-Level Expert Group on Artificial Intelligence Draft* (December 18 2018) <www.euractiv.com/wp-content/uploads/sites/2/2018/12/AIHLEGDraftAIEthicsGuidelinespdf.pdf> accessed 11 March 2019.

²²⁰ *ibid.* ii.

It is also noteworthy that the EU Commission intends to release information on “AI ethics guidelines”²²¹ and “guidance on the interpretation of the Product Liability directive”²²² in 2019 – from the plain reading of the Product Liability directive,²²³ it appears that it does not apply to software as it only applies to products that are movable and to electricity.²²⁴ If the new EU guideline on Product Liability intends to extend the application of the Product Liability directive to AI-based software as well, this would have multiple consequences for consumers as it would be an interesting academic and practical debate on when a software would be considered defective and what are the ascertainable damages for the suffering of such a defect.²²⁵ However, as this thesis is not focusing on the discussion of such initiatives or policies by the EU Commission or the regulation of such specific technologies, it would suffice to note that while the current policies on blockchain or AI by the EU Commission do not make specific reference to Legal Tech, such policies will nevertheless impact Legal Tech solution providers that intend to provide legal services premised on such new technologies.

III. THE PRACTICE OF REGULATING LEGAL SERVICE PROVIDERS IN THE EU

A. Questions on the Regulation of Lawyers

The legal industry and legal service providers have always been regulated, although the extent and method of regulation differs from member state to member state. The regulation of the legal industry – which also, consequently, means the regulation of the legal profession and the regulation of lawyers in most EU member states is largely premised on public policy concerns.²²⁶ To understand these concerns better when

²²¹ *ibid.*

²²² *ibid.*

²²³ Council, Directive 85/374/EEC of 25 July 1985, On the approximation of the laws, regulations and administrative provisions of the Member States concerning liability for defective products [1985] OJ L210 (Product Liability Directive).

²²⁴ *ibid.*, art 2.

²²⁵ This issue has been discussed in Ng’s article. See Irene Ng (Huang Ying), ‘The Art of Contract Drafting in the Age of Artificial Intelligence: A Comparative Study Based on US, UK and Austrian law’ (2017) Stanford-Vienna Transatlantic Technology Law Forum TTLF Working Papers No. 26, 71-73.

²²⁶ See Chapter 3.IIA.

evaluating the regulation of the legal profession, this thesis will answer the following questions on a general level before evaluating each country individually, so as to provide a framework on the subsequent analysis:

- **Who** is subjected to regulation, and by extension, who can practice law?
- **What** are those who are subject to regulation permitted to practice?
- **Why** are those who are subject to regulation subject to such regulation?
- **When** are those who are subject to regulation permitted to practice?
- **Where** does the regulation apply?
- **How** are those who are subject to regulation permitted to practice?

1. Who is subject to regulation?

This question is a fundamental question of this thesis: determining who is subject to regulation will provide clarity on whether Legal Tech are regulated or unregulated in the legal industry, and therefore by extension, whether they should be regulated after the subsequent questions of what, why, when, and how are considered. Generally, anyone who is providing a regulated legal service is subject to regulation, although there are exceptions to this case, such as in the case of Finland, where there is technically no regulation of who can provide legal services,²²⁷ although for those who are admitted to the bar association, such “attorneys-at-law are subject to much more extensive supervision than other providers of legal services”.²²⁸ Flowing from this, persons or legal entities that are normally regulated include: lawyers (both jurists and attorney-at-laws under EU member states that adopt the civil law tradition), trainee lawyers and law firms.

²²⁷ Suomen Asianajajaliitto, ‘Legal Services’ <www.asianajajaliitto.fi/en/legal_services> accessed 11 March 2019. Note: since the submission of this thesis, the Finnish Bar Association has revamped its website and the link is no longer active. The archived version of this web page can be found in the following link: Internet Archive Wayback Machine, ‘Suomen Asianajajaliitto: Legal Services’ <https://web.archive.org/web/20170109095124/http://asianajajaliitto.fi/en/legal_services> accessed 21 July 2019.

²²⁸ Finnish Bar Association, ‘We supervise attorneys-at-law’ <<https://asianajajaliitto.fi/en/finnish-bar-association/what-we-do/we-supervise-attorneys-at-law/>> accessed 2 June 2019.

2. What are those who are subjected to regulation permitted to practice?

What then constitutes as a regulated legal service is likewise dependent on each industry. In several EU member states, appearance in court or at specific levels is a regulated legal activity whereby only lawyers who have attained certain privileges are entitled to perform²²⁹ but other services, such as the provision of non-litigious commercial legal advice, e.g. contract drafting or merger and acquisitions deals, may be provided by jurists who are not admitted to the bar such as the *Rechtsanwaltsanwärter* in Austria. In the UK, the provision of legal services is restricted by the UK Legal Services Act;²³⁰ furthermore, within the legal profession in the UK, there is a distinction in the type of legal services that both solicitors and barristers are permitted to provide.²³¹ Whereas in Finland, there is no restriction in the practice of law – anyone is generally permitted to do so,²³² i.e. generally everyone is permitted to provide legal services except for appearing before the court, where a licensed legal counsel is required.²³³ The lack of a common baseline or harmonization on the type of legal services enables Legal Tech companies to exploit this loophole and provide cross-border legal services.²³⁴

3. Why are those who are subjected to regulation subject to such regulation?

The reasons for regulation are normally founded on public policy reasons, as seen in Chapter 3.II.A. This issue has been discussed in the previous few sections. Furthermore, in the executive summary conducted by the SEO Economic Research on the topic of “Regulation of the legal profession and access to law”,²³⁵ the researchers stated that “governments want to safeguard legal security for all those

²²⁹ This is especially prevalent in the UK, which has a bifurcated legal system that comprises solicitors and barristers. For more information on what a barrister can do, see Bar Standards Board, ‘When might I need a barrister?’ <www.barstandardsboard.org.uk/using-a-barrister/when-might-i-need-a-barrister/> accessed 2 June 2019. Also, see Stephen (n 159) 116.

²³⁰ Legal Services Act 2007 (n 91), art 12.

²³¹ Bar Standards Board (n 229).

²³² Suomen Asianajajalitto (n 227).

²³³ Licensed Legal Counsel Act (715/2011).

²³⁴ Fina, Ng and Vogl (n 38) 249.

²³⁵ Baarsma, Felsö and Janssen (n 202) I.

seeking justice”,²³⁶ and thus “in order to guarantee this public interest most European governments have given certain exclusive privileges to lawyers, among which is the monopoly on the conduct of a case”.²³⁷ The research also goes on to list “preserving professional quality”²³⁸ as a ground for regulation.

With the EU Charter and the UN’s Basic Principles on the Role of Lawyers emphasizing that citizens and persons respectively have the right to counsel, fair trial, and legal aid,²³⁹ this public policy aspect of access to justice becomes even more prevalent and a stronger justification for the regulation of lawyers. This public need of access to lawyers that provide quality legal solutions is thus fulfilled through regulation – and in some member states, extensive regulation – of the legal industry and the legal profession. At present, many of the regulations set in place ensure that there is a high barrier of entry to practice law;²⁴⁰ upon admission, regulations on legal fees chargeable, advertising or solicitation rules, and requirement to attend continuing legal education (“CLE”) or continuing professional development (“CPD”) are likewise common.²⁴¹ Where the public interest of providing quality legal advice is not fulfilled, the protection of those seeking legal advice from lawyers are further protected through regulations requiring lawyers to undertake professional indemnity insurance.

The legal profession and lawyers are also seen as a bastion of justice, which has been discussed in Chapter 3.II.A. The impression that justice is accessible, and that justice is done, is also translated into other ethical duties that a lawyer owes to the court (and the judicial system as a whole), to his or her clients, to his or her peers, as well as to society. Therefore, the code of ethics that dictate the need for lawyers to be courteous and proper in conduct at all times.²⁴²

²³⁶ *ibid* I.

²³⁷ *ibid*.

²³⁸ *ibid*.

²³⁹ UN, Basic Principles on the Role of Lawyers (1990); Charter of Fundamental Rights of the European Union [2012] OJ C326 (Charter of Fundamental Rights of the European Union).

²⁴⁰ High barriers of entry include having academic requirements, bar examination(s) and seminars.

²⁴¹ Herring (n 12) 106.

²⁴² *ibid* 391.

This thesis does not doubt that it is important to ensure that society has adequate and quality access to this right and that lawyers are well-behaved as officers of the court; however, such reasons for regulation must also be balanced with other important concerns such as ensuring that there is fair competition amongst those intending to provide similar legal solutions, i.e. between legal professionals and Legal Tech solution providers. The fair competition goes both ways: as legal professionals, whether the high barrier to entry to practice as a lawyer is reasonable considering that Legal Tech solution providers can penetrate the legal industry and provide the same services with relatively much less time needed, and as a Legal Tech company, whether not requiring to be bound to additional regulation by the bar associations and not requiring to spend additional resources and time to purchase professional indemnity insurance or attend CLE courses suggest that they are competing with an unfair advantage vis-à-vis lawyers.

Finally, in light of technology being able to provide legal solutions, it is questionable whether the monopolization of certain legal services is still justified using the public policy reason of ensuring access to justice. If access to justice is the main reason in regulating lawyers, then the monopolization of lawyers is arguably unjustified as this hinders growth and development of alternative legal solutions that may just as well provide. However, if the access to justice with *adequate quality legal advice* as a whole is the reason for regulation, then the high barriers to entry of the legal profession is perhaps still justifiable although the monopolization of lawyers remains unjustified.

This argument is premised on the fact that the high barriers to entry ensures that legal service providers are providing quality legal advice – whether this is indeed the case in all member states is debatable. The monopolization of legal services remains unjustified in either scenarios because it does not serve the public interest of ensuring access to justice, nor does it ensure that qualified lawyers provide quality legal services. It can even be a counterproductive regulation as the monopolization of legal services means that lawyers can set artificially high fees for legal services, there is a disincentive to innovate to provide better solutions to clients since there is no competition, and thus client-users have limited methods of securing their legal rights. In light of Legal Tech solution providers entering the legal industry and technology enabling the provision of legal services in cheaper and alternative ways, the argument

for the monopolization of legal services on the basis of the public interest of access to justice and quality legal services is then severely diminished as long as there is a way to ensure such legal services are of a satisfactory quality.

4. When are those who are subject to regulation permitted to practice?

Generally, a person is permitted to practice when he or she fulfills the necessary conditions as stipulated by legislation or by the bar associations, if the latter is authorized by law to regulate lawyers. The regulations differ widely from member state to member state. In some member states, law graduates are permitted to practice law to a certain degree, whereas in other member states, law graduates are not permitted to practice law at all until they are admitted to the bar as a qualified lawyer.²⁴³

5. Where does the regulation apply?

Where the regulation of lawyers is concerned, most of such laws only apply nationally or to lawyers that have sought admission to the bar in that country through the regular admission route. If they intend to work as a foreign lawyer in another EU member state, the Establishment Directive is relevant. Legal ethics rules only apply to lawyers who are admitted to the bar of the specific EU member state, although trainee lawyers may be required to adhere to specific rules or regulations as well.²⁴⁴

6. How are those who are subject to regulation permitted to practice?

This question spans a lengthy discussion that will reveal the following sub-issues: (1) the amount of hurdles a person must go through to become admitted as a practicing lawyer; (2) the great difference in regulations when each member state's regulations are compared with each other; and (3) the inadequateness of present EU laws in

²⁴³ See Chapter 3.IV.

²⁴⁴ This is the case of trainee solicitors in the UK, where they are expected to comply to SRA Training Regulations 2014 – Qualification and Provider Regulations. Part of these regulations include compliance by those seeking to be admitted as trainee solicitors to the Principles listed in the SRA Handbook. Solicitors Regulatory Authority, *SRA Handbook* (n 163), ch SRA Training Regulations (2014) – Qualification and Provider Regulations.

allowing the freedom of movement of lawyers, while not forgetting that the freedom of movement of employment is an integral aspect and right of EU citizens.

The following discussion will provide a framework on understanding the extent of the regulation of lawyers. How regulations concerning practicing lawyers are implemented can be broadly categorized as follows: (1) prior to admission; (2) post admission; and (3) practicing law in another EU member state.

(i) *Admission to the bar association*

Almost all member states require a person to be admitted to a bar association before they are afforded the right to represent a client in almost all types of legal services and all levels of court. One exception to note is the UK and Ireland, where there is a bifurcated legal profession, i.e. solicitors and barristers, and each type of lawyer is permitted to only practice in the area of law and represent at a level of court that they are qualified to do so.²⁴⁵ The admission to the bar usually constitutes a combination of the following: (1) successful completion of the satisfactory legal education; (2) passing the state bar examination and other ancillary examinations; (3) completion of stipulated seminars; (4) completion of stipulated pro bono hours; (5) completion of a stipulated practice duration at either a law firm, public notary, court or as an in-house counsel; or (6) citizenship.

a. *Successful completion of the satisfactory legal education*

Most EU member states require one seeking to be admitted as a lawyer to successfully complete the satisfactory legal education as prescribed by legislation. The EU undertook educational reforms at the higher education level in order to streamline and harmonize the education systems across its EU member states; this process is also known as the Bologna Process.²⁴⁶ The Bologna Process is intended to “create a

²⁴⁵ QLTSchool (n 62); Ireland solicitors and barristers (n 62).

²⁴⁶ See European Commission/EACEA/Eurydice, *The European Higher Education Area in 2018: Bologna Process Implementation Report (2018)* <https://eacea.ec.europa.eu/national-policies/eurydice/sites/eurydice/files/bologna_internet_0.pdf> accessed 11 March 2019, 17.

system of academic degrees that are easily recognizable and comparable; promote the mobility of students, teachers and researchers; and ensure high-quality learning and teaching”.²⁴⁷ To enable this, member states introduced the “three cycle system” at universities and also adopted the European Credit Transfer and Accumulation System (“ECTS”).

Table 4: Three cycle system according to the Bologna Process²⁴⁸

First cycle	Bachelor studies	180-240 ECTS
Second cycle	Master studies	60-120 ECTS
Third cycle	Doctoral studies	-

Law faculties in member states have been adopting the three-cycle system and the change is apparent in several member states. While there is at least one university in every member state that has adopted the ECTS,²⁴⁹ this does not cure the root of the problem. Despite the Bologna Process having streamlined the *structure* of the higher education system, the truth is that the *content* of what is being taught remains generally at the disposal of the state and the university. This is unsurprising in the field of law as the study and practice of law is strongly intertwined with language and national legal traditions and customs. Thus, it would not be logical to streamline the content of what is being taught at universities across all member states.

National legislation specifies when a person would be deemed to have completed the sufficient legal education for the purposes of admission of law. What is deemed to be sufficient, especially in terms of modules required and graduate level, are however not harmonized across member states. For example, in the UK, attaining a Bachelor’s

²⁴⁷ The Bologna process: setting up the European higher education area [1999] <<https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=LEGISSUM%3Ac11088>> accessed 2 June 2019.

²⁴⁸ European Higher Education Area, ‘Three-cycle System’ <www.ehea.info/page-three-cycle-system> accessed 2 June 2019.

²⁴⁹ Ng I, ‘Evaluating the Bologna Process and the Freedom of Movement for Lawyers (Directive 98/5/EC) with the Rise of Legal Technology: Challenges and Approaches’ (Seminar paper completed in part fulfillment of the Doctoral Program in Law, University of Vienna 2017) 7.

degree in law (“LLB”) is sufficient for purposes of the bar admission,²⁵⁰ whereas in civil law countries such as Slovenia, bar candidates are required to graduate with a Master’s degree in law (“LLM”) should they choose to seek admission.²⁵¹ Besides the attainment of the degree, national legislation may prescribe that bar candidates must complete specific modules in university before they are deemed to have fulfilled the requisite education. This is seen in the case of Austria, where the Austrian Bar Act²⁵² spells out the exact subject areas and the number of ECTS in a given area that a candidate must fulfill while at university.²⁵³

The result of this situation can be explained using the analogy of a jigsaw: legal education of a member state is akin to a jigsaw puzzle. While each jigsaw puzzle has an identical set of pieces, the final picture that the jigsaw puzzle shows when the puzzle is completed is different in each member state. The bottom line is that while universities are required to follow a specific structure similar across the EU, the vastly different content due to the inherent nature of the country’s legal system, jurisprudence, and language, means that a person who has completed an LLB in one member state has very different skills and knowledge as compared to another who has completed an LLB in a different member state. While the Mutual Recognition Directive has sought to fix this, and it has been interpreted to allow for the mutual recognition of degrees, this has led to some concerns of circumventing admission rules such as in that of the *Koller* case, which also leads to the question on whether such mutual recognition is beneficial to the public seeking legal advice.

b. Passing the state bar examination

Most member states require a candidate seeking admission to the bar to pass a national examination, which is also commonly known as the bar examination. Neither the format nor the content of the bar examination is regulated by the EU, and as a

²⁵⁰ Solicitors Regulation Authority, ‘Qualifying law degree providers’ <www.sra.org.uk/students/courses/qualifying-law-degree-providers.page> accessed 11 March 2019.

²⁵¹ Zakon o odvetništvu (n 94), art 25.

²⁵² Rechtsanwaltsordnung (n 69).

²⁵³ *ibid*, §3.

result, each member state has a different approach on the method of testing and content tested for the bar examination. Bar examination formats can be in the form of multiple-choice questions (“MCQs”),²⁵⁴ writing a judgment,²⁵⁵ a mock interview,²⁵⁶ an oral examination²⁵⁷ or a combination of the above. In some member states, the bar examination is segregated into two stages, where completion of the first stage is required to reach the second stage, although failure at the second stage necessitates a restart from the beginning.²⁵⁸ The difficulty of the bar examination and passing rates are not regulated at the EU level; these issues are left to the discretion of each member state. Candidates are also required to pay for the examination fee and will also normally fork out a sum of money to pay for bar preparation courses and materials. The bar examination fees and additional expenses may or may not be borne by the law firm, depending on the arrangement between the parties. Candidates may also take time off to prepare themselves for the bar examination.

²⁵⁴ This is seen in the case of bar exams in the US, such as the Multistate Bar Examination and the Multistate Professional Responsibility Exam, which are components that are necessary for admission in some states such as New York and California. The former is a 6-hour, 200-question multiple choice examination, while the latter is a two-hour, 60-question multiple-choice examination. See National Conference of Bar Examiners, ‘Multistate Bar Examination’ <www.ncbex.org/exams/mbe/> accessed 11 March 2019; National Conference of Bar Examiners, ‘Multistate Professional Responsibility Examination’ <www.ncbex.org/exams/mpre/> accessed 11 March 2019. Those intending to qualify as barristers in the UK will also have to take a Bar Course Aptitude Test, which is a 55-minute 60-question multiple choice examination. See Bar Standards Board, ‘Becoming a barrister’ <www.barstandardsboard.org.uk/qualifying-as-a-barrister/becoming-a-barrister/> accessed 11 March 2019.

²⁵⁵ This is present in the Slovenian bar examination. *Zakon o pravniškem državnem izpitu 1994*, arts 23 and 25.

²⁵⁶ The QLTS examination in the UK requires candidates to undergo a mock client interview. QLTS is the examination for recognized foreign lawyers to seek admission to the bar in the UK. See Kaplan QLTS, ‘OSCE Objective Structured Clinical Examination’ <<https://qlts.kaplan.co.uk/the-assessment/osce>> accessed 11 March 2019.

²⁵⁷ This is present in the Belgian bar examination, where a candidate must undertake a written and oral examination. *Belgian Judicial Code*, art 428quater §1.

²⁵⁸ This is in the case of the Slovenian bar examination, where a candidate must pass the first stage of the examination – writing two judgments across two days – before they are entitled to take the second stage of the examination, which is an oral examination comprising a panel of five experts. If one fails the oral examination, he or she would be required to start from the beginning, i.e. the written examination. *Zakon o pravniškem državnem izpitu 1994* (n 255), art 26.

c. Completion of stipulated seminars

National legislation may require candidates to complete a set of seminars prior to applying for the bar exam or seeking admission.²⁵⁹ The number and duration of seminars are not regulated nor harmonized at the EU level.

d. Completion of stipulated pro bono hours

National legislation may require candidates to complete a stipulated amount of pro bono hours. What is considered as pro bono work and the duration required depends on each member state.

e. Completion of a stipulated practice duration at either a law firm, public notary, court or as an in-house counsel

Most member states require the candidate to complete a specified practice period before he or she is entitled to take the bar examination. This can range from zero to five years, depending on the member state and the nature of the practice.²⁶⁰

f. Citizenship

In several member states, EU or EEA citizenship is required before one can be admitted to the bar. The rule however is not harmonized across the EU as admission as a solicitor in the UK is not premised on EU/EEA citizenship²⁶¹ while EU/EEA citizenship is required for admission to the Austrian bar.²⁶² However, to be afforded protection under the Establishment Directive, one must be an EU/EEA national.²⁶³

²⁵⁹ Republika Slovenija Ministrstvo za Pravosodje, 'Pristop na podlagi 19A. člena ZPDI' <www.mp.gov.si/si/izobrazevanje_v_pravosodju_cip/pravnicki_drzavni_izpit/pristop_na_podlagi_19a_clena_zpdi/> accessed 11 March 2019.

²⁶⁰ The need to satisfy practice training requirements has been highlighted in Koller's case. See *Koller* (n 176).

²⁶¹ Solicitors Regulatory Authority, *SRA Handbook* (n 163), ch SRA Training Regulations (2014) – Qualification and Provider Regulations.

²⁶² Rechtsanwaltsordnung (n 69), §1.(3).

²⁶³ Establishment Directive (n 172), art 2(a).

g. Good moral and character standing

Most, if not all EU member states, require persons seeking admission to be of good moral and character standing. This normally means that a person should be “honest and is not manifestly unsuitable for the work of an attorney and legal counsel”²⁶⁴ or be deemed as “reliable for practicing the profession”.²⁶⁵ In majority of cases, a lawyer should not have committed a criminal offense “for which he has been morally undeserving to practice the legal profession”.²⁶⁶

h. Bankruptcy

Also tangentially related to good moral and character standing is that of bankruptcy, i.e. certain bar associations of EU member states require that a person seeking admission is not a bankrupt and has full legal capacity.²⁶⁷

(ii) Post-admission Regulations

Upon successful admission to the bar, lawyers are bound to adhere to legal ethics, or also known as the “code of ethics” or “code of conduct” in certain jurisdictions. An admitted lawyer may choose to work in different capacities, e.g. a judicial clerk, in-house lawyer or practicing lawyer; the focus of this discussion is however on lawyers who intend to continue practicing law. Practicing lawyers, as defined in Chapter 2, are subject to regulation by national legislation and bar regulations. These regulations normally require practicing lawyers to adhere to the bar’s code of conduct, pay bar association fees or practicing certificate fees, purchase professional indemnity insurance and undertake a specific amount of CLE hours.

Of the above, adherence to the code of conduct is the key regulatory means for practicing lawyers. The code of conduct provides practicing lawyers with numerous

²⁶⁴ Licensed Legal Counsel Act (715/2011) (n 233), section 2(3).

²⁶⁵ Zakon o odvetništvu 1993 (n 94), art 25.

²⁶⁶ *ibid*, art 27.

²⁶⁷ Rechtsanwaltsordnung (n 69), §34.(1)4.

obligations on how to conduct themselves towards their clients, their peers, to the court and to the public. Vis-à-vis their clients, practicing lawyers owe their clients several duties such as the duty of confidentiality,²⁶⁸ the duty to prevent conflicts of interests,²⁶⁹ and the duty to act in the best interests of the client.²⁷⁰ Practicing lawyers are also subject to numerous other obligations when participating as a legal service provider in the legal industry as in some jurisdictions, they are subject to fee restrictions,²⁷¹ and furthermore, are required to keep proper client accounts and firm accounts without mixing of client and firm assets²⁷² as practicing lawyers and law firms may hold money on escrow for their clients. Practicing lawyers in several EU member states are also required to maintain a professional indemnity insurance in the event of any negligence suit against them²⁷³ and are subject to investigation and disciplinary proceedings by the bar association for any breach of the code of conduct.²⁷⁴ Egregious breaches may result in the disbarment of the practicing lawyer.²⁷⁵

Adherence to the ethical code of conduct is required by all lawyers, and compliance unsurprisingly adds expenses and costs to the practice of law. Compliance may require lawyers to spend more on IT security in order to ensure that confidential client information is not stolen and obtaining a professional indemnity insurance is likewise an additional cost for lawyers. However, as lawyers spend more to comply with the ethical code of conduct, these expenses are passed down to clients and this arguably raises the barrier of access to justice as legal services become more expensive. The purpose of regulation is to ensure public interest and security of access to justice – the big question, then, is to achieve a fine balance between adequate safeguards, reasonable expenditure to meet minimum standards of care as a lawyer pursuant to the ethical code of conduct and the cost of legal services to clients. With Legal Tech,

²⁶⁸ Herring (n 12) 150.

²⁶⁹ *ibid* 176.

²⁷⁰ *ibid* 119.

²⁷¹ *ibid* 204.

²⁷² *ibid* 225.

²⁷³ A comparative study on the need to purchase professional indemnity or liability insurance was conducted by Kritzer, who noted that EU member states such as Belgium, the UK (England), Germany and the Netherlands require lawyers to take up professional liability insurance. Herbert M Kritzer, 'Lawyers' professional liability: comparative perspectives' (2017) 24(2) *International Journal of the Legal Profession* 73, 83.

²⁷⁴ *Zakon o odvetništvu 1993* (n 94), arts 59-65.

²⁷⁵ *Rechtsanwaltsordnung* (n 69), §34.(1)5.

there is a need to further investigate whether such additional compliance costs are fair considering that there exists potentially unfair competition as a Legal Tech solution provider are not required to comply to the ethical code of conduct.

(iii) Practicing law in another EU Member State

The freedom of movement of services and freedom of establishment is an important right of all EU citizens and EEA member states participating in the EU internal market.²⁷⁶ However, due to the specific nature of the legal industry – each member state has different laws and regulations, different national language and different legal traditions – lawyers are therefore unable to practice in another member state easily, even after he or she has sought qualification in one EU member state. Through the Establishment Directive, the EU attempted to solve this problem by allowing lawyers – as defined in the Establishment Directive – to practice in other member states as the corresponding title of a lawyer upon completion of specific requirements. The Establishment Directive permits lawyers “to pursue on a permanent basis, in any other Member State under his home-country professional title”²⁷⁷ the “same activities as a lawyer practicing under the relevant professional title used in the host Member State”.²⁷⁸

Integration of lawyers in the host member state is delineated in Article 10, where in essence, a lawyer seeking admission in a host member state must practice at least three years in the host member state in the law of that host member state and must do so “without any interruption other than that resulting from the events of everyday life”.²⁷⁹ However, the lack of harmonization in the procedures to be admitted to the bar and stark difference in each tradition’s definition of a lawyer results in a system where there are many loopholes to seek admission as quickly as possible to a specific EU member state’s bar.

²⁷⁶ TFEU (n 170), art 45; TFEU (n 170), art 49.

²⁷⁷ Establishment Directive (n 172), art 2.

²⁷⁸ *ibid*, art 5.

²⁷⁹ *ibid*, art 10.

Creative bar candidates have sought alternative methods to qualify to the bar quickly, either by seeking admission in jurisdictions that require a shorter practice duration before being entitled to seek admission or take the bar exam.²⁸⁰ This loophole on duration and difficulty of the bar examination has been exploited from time to time as seen in the *Koller* case; however, Legal Tech changes this playing field as a Legal Tech solution provider operating out from a company need not seek qualification and thus become operational much faster than one seeking admission as a lawyer. Furthermore, the Legal Tech company may operate cross-border with relatively much greater ease as it is not restricted by the three-year requirement unlike other lawyers. The allegedly unfair competition between traditional lawyers and Legal Tech then becomes very apparent after one understands the relative amount of time each LSP needs before he or she can provide legal advice.

B. The Two-Tiered Regulation Framework

From the preceding paragraphs, the regulation of the legal profession is multi-faceted and there are several rules and considerations before one can become admitted as a lawyer and for one to maintain a good standing as a practicing lawyer. In practice, these regulations are implemented at two broad levels: the national level and the EU level. The first level, i.e. the national level, includes regulations that focus on who can become a lawyer, when can such a person become a lawyer and how does such person remain being a lawyer after admission to the bar. Furthermore, at the national level, depending on the EU member state concerned, the right to practice law may be linked to admission to the state bar association.²⁸¹

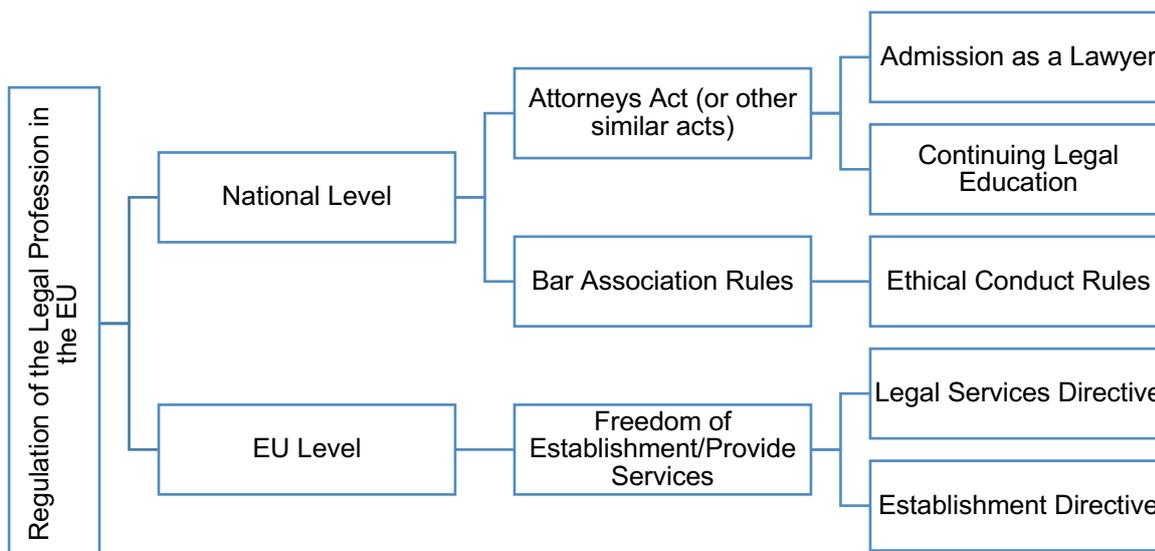
The second level, i.e. the EU level, includes regulations that focus on how lawyers can freely establish and work as a lawyer in other EU member states. As previously mentioned in the earlier sections, several EU directives enable the freedom of establishment of lawyers in different EU member states although with certain

²⁸⁰ *Koller* (n 176).

²⁸¹ Zakon o odvetništvu 1993 (n 94), art 1.

limitations and restrictions.²⁸² From the above discussions, the two-tiered regulation framework can therefore be illustrated as follows:

Illustration 3: Two-Tiered Framework of the Regulation of the Legal Profession in the EU



1. Regulation at the national level

Regulation at the national level emanates from the Attorneys Act, which regulates who is subject to regulation, what are those subjected to regulation permitted to practice, when are those who are subject to regulation permitted to practice and certain elements of how those who are subject to regulation permitted to practice. For the latter, these certain elements include admission to the bar (i.e. successful completion of the satisfactory legal education, passing the state bar examination, completion of stipulated seminars, completion of stipulated pro bono hours, completion of stipulated practice duration at either a law firm, notary, court or as an in-house counsel, or citizenship) and post-admission regulations. These issues have been earlier discussed in this chapter at Chapter 3.III.A.6.(i).

²⁸² See Chapter 3.III.B.2 .

Bar associations, on the other hand, are normally tasked with regulating the conduct of the members of the legal profession and national laws may state that it is compulsory for lawyers to become part of the country's bar association in order to practice law;²⁸³ this is largely dependent on each individual member state's national laws. As the ethical conduct rules are normally approved²⁸⁴ and administered by the bar associations,²⁸⁵ disciplinary tribunals on ethical breaches are likewise logically convened by the bar associations,²⁸⁶ although bar associations may allow for appeals to the decisions of the disciplinary tribunal to be heard before a court of judges in the High Court.²⁸⁷ A brief discussion of ethical conduct rules has been earlier discussed at Section III.A.6.(ii) in this chapter and a further elaboration of specific ethical conduct rules and how they have been affected by legal technology will be made at Chapter 5.II.B. For now, it should be noted that regulations at the national level comprise the Attorneys Act²⁸⁸ (or Legal Services Act ²⁸⁹or other acts that may be worded in a similar fashion but with similar intentions on regulating the legal profession),

2. Regulation at the EU level

Regulation at the EU level is generally concerned about the freedom of movement and establishment of lawyers in different EU member states. While this has been discussed earlier at Section 3.III.B.2, for the purposes of completeness, this section will elaborate upon the key EU principles and directives on the regulation of the legal profession. Pertaining to the legal industry itself, there are two key directives that apply – the Right of Establishment Directive for Lawyers 98/5/EC ²⁹⁰ (“Establishment Directive”) and the Lawyers’ Services Directive 77/249 ²⁹¹ (“Lawyers’ Services

²⁸³ Slovenia Business Point, ‘Compulsory membership of the Slovenian Bar Association’ <<http://eugo.gov.si/en/other-conditions/otherCondition/14192/showOtherCondition/>> accessed 2 June 2019.

²⁸⁴ Odvetniška poklicna etika (2001).

²⁸⁵ Zakon o odvetništvu 1993 (n 94), arts 59-60.

²⁸⁶ *ibid.*

²⁸⁷ *ibid.*, art 61.

²⁸⁸ This is the English translation of the Slovenian act on legal services. See Zakon o odvetništvu 1993 (n 94).

²⁸⁹ Legal Services Act 2007 (n 91).

²⁹⁰ Establishment Directive (n 172).

²⁹¹ Council, Directive 77/249/EEC of 22 March 1977, To facilitate the effective exercise by lawyers of freedom to provide services [1977] OJ L078 (Lawyers’ Services Directive).

Directive”). These directives help to enable lawyers admitted in one EU member state to practice in another EU member state that they are not admitted in without discrimination, although there still remain several limitations in the freedom of movement of lawyers.

(i) *Lawyers’ Services Directive (1977)*

The Lawyers’ Services Directive of 22 March 1977²⁹² is the first EU directive to touch on the regulation of the legal profession in the EU. The prohibition on “any restriction on the provision of services which is based on nationality or on conditions of residence”²⁹³ was established through the Treaty establishing the European Economic Committee; while the Lawyers’ Services Directive permits a lawyer from one member state to provide legal services in another member state if he “adopt[s] the professional title used in the Member State from which he comes, expressed in the language or one of the languages, of that State, with an indication of the professional organization by which he is authorized to practice or the court of law before which he is entitled to practice pursuant to the laws of that State”.²⁹⁴

However, the Lawyers’ Services Directive does have limitations – a lawyer that intends to represent a client “in legal proceedings or before public authorities shall be pursued in each host Member State under the conditions laid down for lawyers established in that State, with the exception of any conditions requiring residence, or registration with a professional organization, in that State”.²⁹⁵ Therefore, a lawyer who is admitted as a lawyer in one EU member state may still be restricted from full rights of audience before another court.

The Lawyers’ Services Directive also mainly serves to remove the nationality requirement for admission to the bar,²⁹⁶ and it has been noted in Italian law that it has

²⁹² *ibid.*

²⁹³ *ibid.*, Preamble.

²⁹⁴ *Ibid.*, art 3.

²⁹⁵ *ibid.*, art 4.

²⁹⁶ *ibid.*

“expressly excluded from its scope any aspect relating to the right of establishment by specifying that admission to the practice of the profession of lawyer is limited to an activity carried out on a temporary basis”.²⁹⁷ While these directives only apply to lawyers per se, they are thrown into debate when lawyers have to compete with cross-border DIY legal technology solution providers in the EU.²⁹⁸ Furthermore, while the Lawyers’ Services Directive requires member states to recognize a “lawyer”, it does not necessarily mean that such a lawyer may be able to provide all forms of legal services as they are still subject to the host member state’s laws for the representation of a client in court.²⁹⁹

(ii) *Establishment Directive (1998)*

The Establishment Directive of 16 February 1998³⁰⁰ essentially allows a lawyer from one EU or EEA member state to be admitted as a lawyer in a host EU member state so long as certain criteria is fulfilled by the lawyer seeking admission in the host EU member state. This aims to further permit the freedom of establishment of lawyers within the EU as compared to the Lawyers’ Services Directive which, while permitting a lawyer to practice under the title he or she received from his or her home member state in a host EU member state, did not allow a lawyer to take up the title of a lawyer in the host EU member state unless the said lawyer undergoes the regular process of becoming admitted to the bar in the host EU member state.

As earlier discussed in Chapter 3.III.B.2.(ii), with the Establishment Directive, a lawyer who has been admitted in his home EU member state can seek admission as a lawyer in the host EU member state once certain conditions has been achieved under the Establishment Directive.³⁰¹ There therefore still remains a limitation in the complete freedom of establishing oneself as a lawyer in a different EU member state despite the Establishment Directive, and this limitation or restrictions become an issue lawyers

²⁹⁷ Nascimbene (n 16) 22.

²⁹⁸ See Fina, Ng and Vogl (n 38) 244.

²⁹⁹ Lawyers’ Services Directive (n 291), art 4.

³⁰⁰ Establishment Directive (n 172).

³⁰¹ *ibid*, art 10.

have to compete against Legal Tech in cross-border scenarios. A deeper analysis of how these regulations are affected by Legal Tech will be discussed in the following chapters.

IV. LACK OF UNIFORMITY IN THE REGULATION OF THE LEGAL PROFESSION IN THE EU

As seen from the two-tiered framework, the regulation of legal services is currently not completely harmonized, i.e. each member state has the power to decide how one becomes a lawyer and the scope of legal services they are permitted to practice. To show how disharmonized the regulation of the legal profession is, four different EU member states' rules on admission to practice law will be presented below. These EU member states represent the different legal traditions present within the EU, i.e. the UK with a common law tradition and the other three EU member states – Austria, Finland and France which on a broad level have a civil law tradition but have distinct French, German and Scandinavian legal traditions respectively.³⁰²

A. Legal Profession in Austria

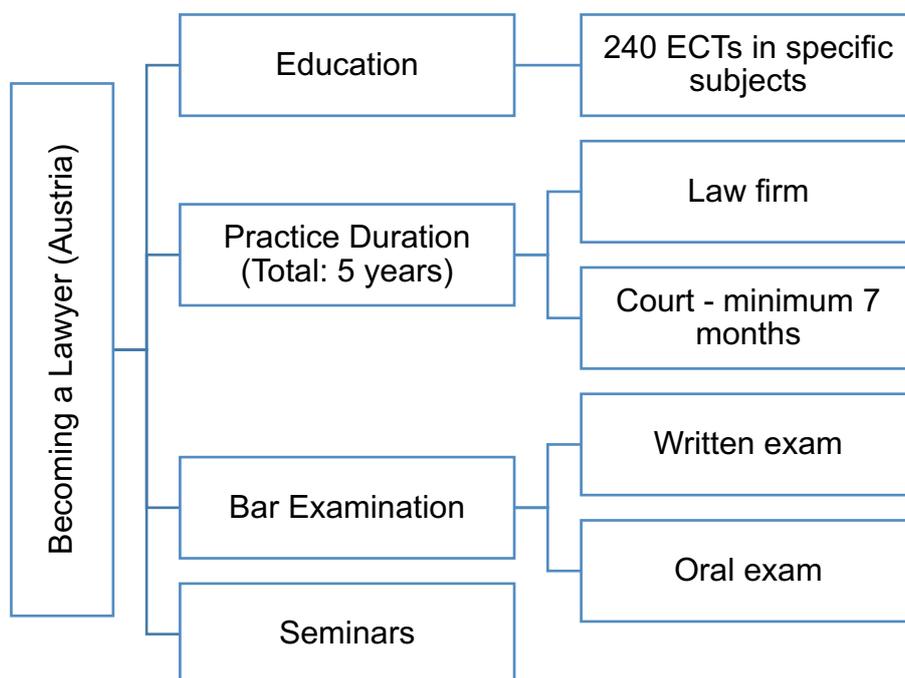
The Austrian legal system is part of the Germanic legal tradition and falls under the civil law tradition.³⁰³ Below is a summary of how one seeks admission to the legal profession in Austria according to the Austrian Attorneys Act.³⁰⁴

³⁰² This choice is premised on Konrad Zweigert and Heinz Kötz's *Einführung in die Rechtsvergleichung*, which categorizes legal traditions in six main categories. Of application and relevance to the EU are four of them, which are "*der romanische Rechtskreis*" (translation: the roman legal tradition), "*der deutsche Rechtskreis*" (translation: the German legal tradition), "*der anglo-amerikanische Rechtskreis*" (translation: the Anglo-American legal tradition), "*der nordische Rechtskreis*" (translation: the Nordic legal tradition). See Konrad Zweigert and Heinz Kötz, *Einführung in die Rechtsvergleichung* (3rd edn, Mohr Siebeck 1996).

³⁰³ *ibid* 137.

³⁰⁴ Rechtsanwaltsordnung (n 69).

Illustration 4: Admission to the Legal Profession in Austria



It should be noted that for the Austrian legal profession, a candidate is only permitted to take the written examination twice, failing which, he or she is barred from taking the bar examination for life³⁰⁵ and therefore effectively and practically prevented from becoming a lawyer for the rest for his or her life. The minimum number of years that one needs to become admitted as an attorney in Austria is then at least nine years,³⁰⁶ excluding any time off for preparing the bar examination.³⁰⁷ One other interesting aspect for Austrian attorneys is that attorney candidates (*Rechtsanwaltsanwärter*) and attorneys pay towards a separate pension fund for lawyers.³⁰⁸

³⁰⁵ In Austria, the bar examination is split into two sections, namely the written examination and the oral examination before a bench of lawyers (German: *Kreis der Rechtsanwälte*). A candidate is only permitted to repeat the written examination once and the oral examination twice, i.e. two attempts for the written examination and three attempts for the oral examination. *Rechtsanwaltsprüfungsgesetz [RAPG] [Act on Examinations for Lawyers] Bundesgesetzblatt [BGBl] No. 556/1985, art 25(2).*

³⁰⁶ Four years of legal education and five years of relevant training, when added together, makes nine years.

³⁰⁷ In practice, it would be reasonable to assume that many candidates would take leave to study for the bar examination, especially if a candidate only has two attempts at the bar examination.

³⁰⁸ Ursula Koch and Elisabeth Schusterbauer, 'Soziale Absicherung für RechtsanwältInnen und RechtsanwaltsanwärterInnen' (Die Österreichischen Rechtsanwälte 22 January 2019).

B. Legal Profession in Finland

The Finnish legal system falls under the Scandinavian legal tradition and has been classified as being part of the civil law tradition.³⁰⁹ Until recently, under the Finnish legal system, there is no monopoly over the practice of law.³¹⁰ This situation has however changed – in 2013, Finland enacted the Licensed Legal Counsel Act, which restricts representation of clients in court to those who have obtained the license under the said act.³¹¹ Under the Finnish legal system there is thus four distinct categories of legal professionals – a non-legally educated person practicing law, a legally educated person practicing law (or also known as a lawyer in Finland), a licensed legal counsel and an attorney-at-law.

1. Non-legally educated person practicing law

A non-legally trained practicing law is a person who does not have any formal education in law and may (or may not) have any legal training but otherwise practices law. Since 2013, such persons are not permitted to represent clients in court unless they have a license as per the Licensed Legal Counsel Act.³¹²

2. Legally educated person practicing law

A legally educated and trained person practicing law is a person who has obtained the Finnish LLB and LLM. Such person may or may not have legal training experience. Translated into English, this person is also called “lawyer” and is entitled to join the Association of Finnish Lawyers, i.e. the *Lakimiesliitto*, which represents all lawyers in Finland.³¹³ For the purposes of this thesis and to avoid confusion, this group of individuals will be referred to as jurists.

³⁰⁹ Zweigert and Kötz (n 302) 271.

³¹⁰ See Suomen Asianajajaliitto (n 227).

³¹¹ Licensed Legal Counsel Act (715/2011) (n 233).

³¹² *ibid.*

³¹³ Lakimiesliitto <www.lakimiesliitto.fi/> accessed 3 June 2019.

3. Licensed legal counsel

A licensed legal counsel is a person licensed under the Licensed Legal Counsel Act and is permitted to represent clients before court. A licensed legal counsel must obtain the Finnish LLB and LLM and completed a traineeship of one year;³¹⁴ upon successful completion of these requirements, he or she may then become a licensed legal counsel. However, a licensed legal counsel is not an attorney-at-law but is a lawyer as he or she has completed his or her formal legal education.

4. Attorney-at-law

An attorney-at-law is a person who has been admitted to the Finnish Bar Association, i.e. the *Asianajaliitto*, and has received the title of *Asianajaja*, which is only awarded to those who successfully fulfill the requirements of the bar. The Finnish Bar Association is the only body that awards this title.³¹⁵ It distinguishes lawyers and attorneys-at-law by stating that “an attorney-at-law is a lawyer specializing in defending the rights of his or her client”.³¹⁶ To qualify as an attorney-at-law, one must however complete much more stringent requires compared to a licensed legal counsel as a person seeking admission under the Finnish Bar Association must complete “at least four years of work experience in law, two of them in advocacy”³¹⁷ and a three-part bar examination which consists of a written exam, an ethical exam and a trial part.³¹⁸ An attorney-at-law may be a licensed legal counsel and a lawyer at the same time, although a lawyer may not necessarily be a licensed legal counsel, nor is a licensed legal counsel necessarily an attorney-at-law. This distinction between the three is perhaps better illustrated below:

³¹⁴ Licensed Legal Counsel Act (715/2011) (n 233), section 2(1)(1).

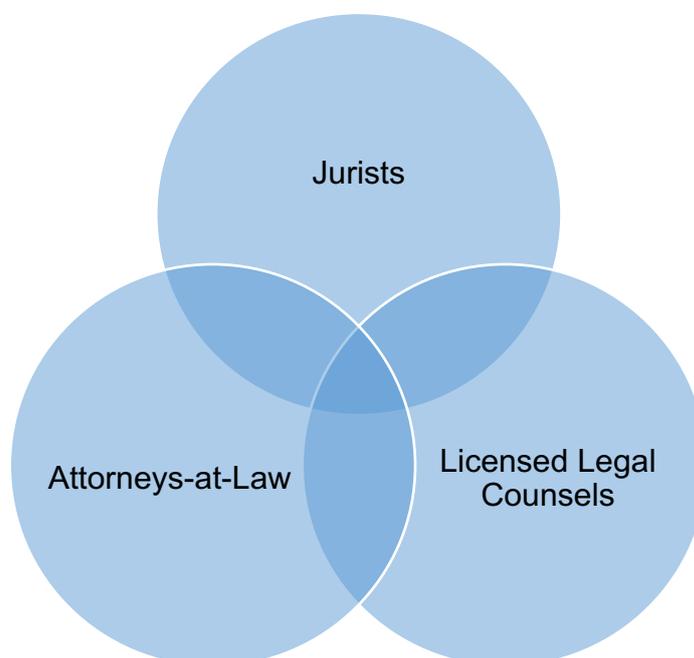
³¹⁵ Advocates Act (12 December 1958/496), 1§.

³¹⁶ Finnish Bar Association, ‘Who we are’ <<https://asianajaliitto.fi/en/finnish-bar-association/who-we-are/>> accessed 21 May 2019.

³¹⁷ Finnish Bar Association, ‘Who can become a member?’ <<https://asianajaliitto.fi/en/become-an-attorney-at-law/why-join-the-bar/joining-the-bar/>> accessed 3 June 2019.

³¹⁸ Finnish Bar Association, ‘The bar examination’ <<https://asianajaliitto.fi/en/become-an-attorney-at-law/the-bar-examination/>> accessed 3 June 2019.

Illustration 5: Distinction between Jurists, Licensed Legal Counsels and Attorneys-at-Law in Finland



As previously mentioned in Chapter 2.III.A.1, for the purposes of this thesis, a lawyer will be defined as someone who is qualified to practice law in his or her member state and is admitted to the national or state bar association; in this case, the term lawyer would refer to an attorney-at-law and not a jurist or licensed legal counsel. It should be noted that should one decide to seek admission to become a lawyer and be afforded the right to practice law in another EU member state under the Establishment Directive, then he or she would have to become a member of the Finnish Bar Association as only those who are registered in the Roll of Advocates in the Finnish Bar Association are entitled to use the title advocate or *Asianajaja*,³¹⁹ and this is the only title from Finland that is afforded the protection under the Establishment Directive.³²⁰ Therefore, should one seek to practice as a lawyer outside of Finland, he or she must fulfill the conditions to be a lawyer in Finland and be admitted to the Finnish Bar Association.

³¹⁹ Advocates Act (12 December 1958/496), 1§.

³²⁰ Establishment Directive (n 172), art(1)(2)(a).

C. Legal Profession in France

The French legal system falls under the French legal tradition and is part of the civil law tradition.³²¹ Admission to the bar in France is mainly governed by the *certificat d'aptitude à la profession d'avocat* ("CAPA") which is essentially a national examination administered by the *centre régional de formation professionnelle d'avocat* ("CRFPA")³²² that can only be taken after certain requirements are fulfilled, such as that of nationality, moral and character, educational requirements and practice requirements.³²³ A person seeking admission must have completed the *Master 1 en droit* or an equivalent examination as recognized by the CRFPA.³²⁴ After satisfying the educational requirements, one can then proceed to the next stage of the CAPA, i.e. the practice requirements, which includes a three part process over the course of 18 months. This includes 6 months of practical lessons to acquire the foundations, 6 months of internship that is devoted to the candidate's individual pedagogical project (*projet pédagogique individuel*) and another 6 months of internship at a law firm.³²⁵

Upon completion of the CAPA, the successful candidate can seek admission at a bar association of his or her choice and exercise his or her rights to practice in the profession. As France does not have a national bar association but regional bar associations, the successful CAPA candidate would have to seek out the relevant bar association that he or she wants to be admitted in and will then be subject to the bar's relevant ethical rules, or *code de déontologie*.³²⁶

D. Legal Profession in the UK (England and Wales)

The legal profession in the UK is a bifurcated profession and therefore a person seeking to become a lawyer can either become a solicitor or barrister. Both have

³²¹ Zweigert and Kötz (n 302) 118.

³²² Conseil National des Barreaux, 'L'accès à la profession par la voie normale : le CAPA' <<https://www.cnb.avocat.fr/fr/laccess-la-profession-par-la-voie-normale-le-cap>> accessed 3 June 2019.

³²³ *ibid.*

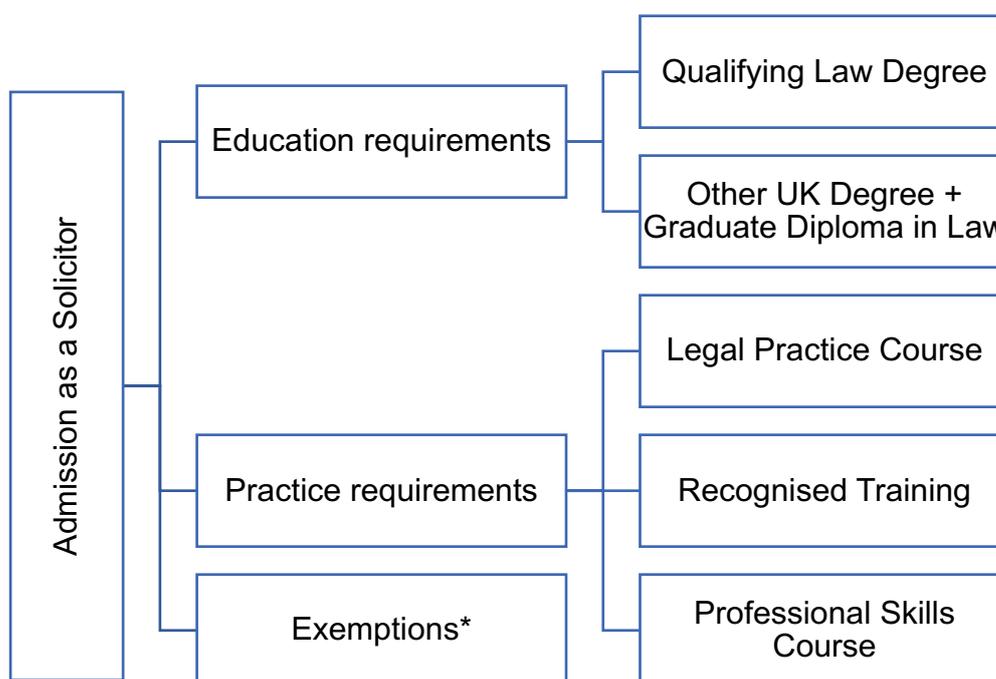
³²⁴ *ibid.*

³²⁵ *ibid.*

³²⁶ Avocats Barreau Paris, *Le code de déontologie*.

different functions in the legal industry, and both have different rights of audience before the courts. As a result, it is not surprising that the path to becoming a solicitor is different to that of a barrister. Due to the completely different ways in which one can seek qualification as a solicitor or a barrister, the following paragraphs will show the difference in admissions process.

Illustration 6: Admission as a Solicitor



*Exemptions can be granted to candidates who have demonstrated that they have “acquired the same knowledge and skills”.³²⁷

Admission of solicitors is governed by the Solicitors Regulation Authority and there are many routes to admission as a solicitor. Besides the above illustrated path, a person may also seek admission as a solicitor through the apprenticeship route, whereby the criteria for qualification is “set out in the assessment plan for the Apprenticeship Standard for a Solicitor (England) or the Apprenticeship Framework for the Level 7

³²⁷ Solicitors Regulation Authority, ‘Admission as a solicitor’ <www.sra.org.uk/sra/decision-making/guidance/admission-solicitor.page> accessed 3 June 2019.

Higher Apprenticeship in Legal Practice (Wales).”³²⁸ Furthermore, as admission to the UK bar is not premised on nationality, non-UK citizens and non-EU citizens are allowed to be admitted as a lawyer in the UK. For foreign lawyers that are already admitted in another jurisdiction that is recognized by the Solicitors Regulation Authority, such foreign lawyers need not undergo the entire procedure of admission again and may seek admission as a solicitor through the Qualified Lawyers Transfer Scheme (“QLTS”).³²⁹ Under the QLTS, only a two-part examination which includes a Multiple-Choice Test and an Objective Structure Clinical Examination is administered,³³⁰ and foreign lawyers do not need to undertake additional training in the UK to be admitted as a solicitor.³³¹

As for qualifying to become a barrister, the governing authority overseeing the admissions process is the Bar Standards Board, which is independent from the Solicitors Regulation Authority. The following illustration has been reproduced from the Bar Standards Board,³³² which summarizes the admissions process as a barrister in the UK:³³³

³²⁸ *ibid.*

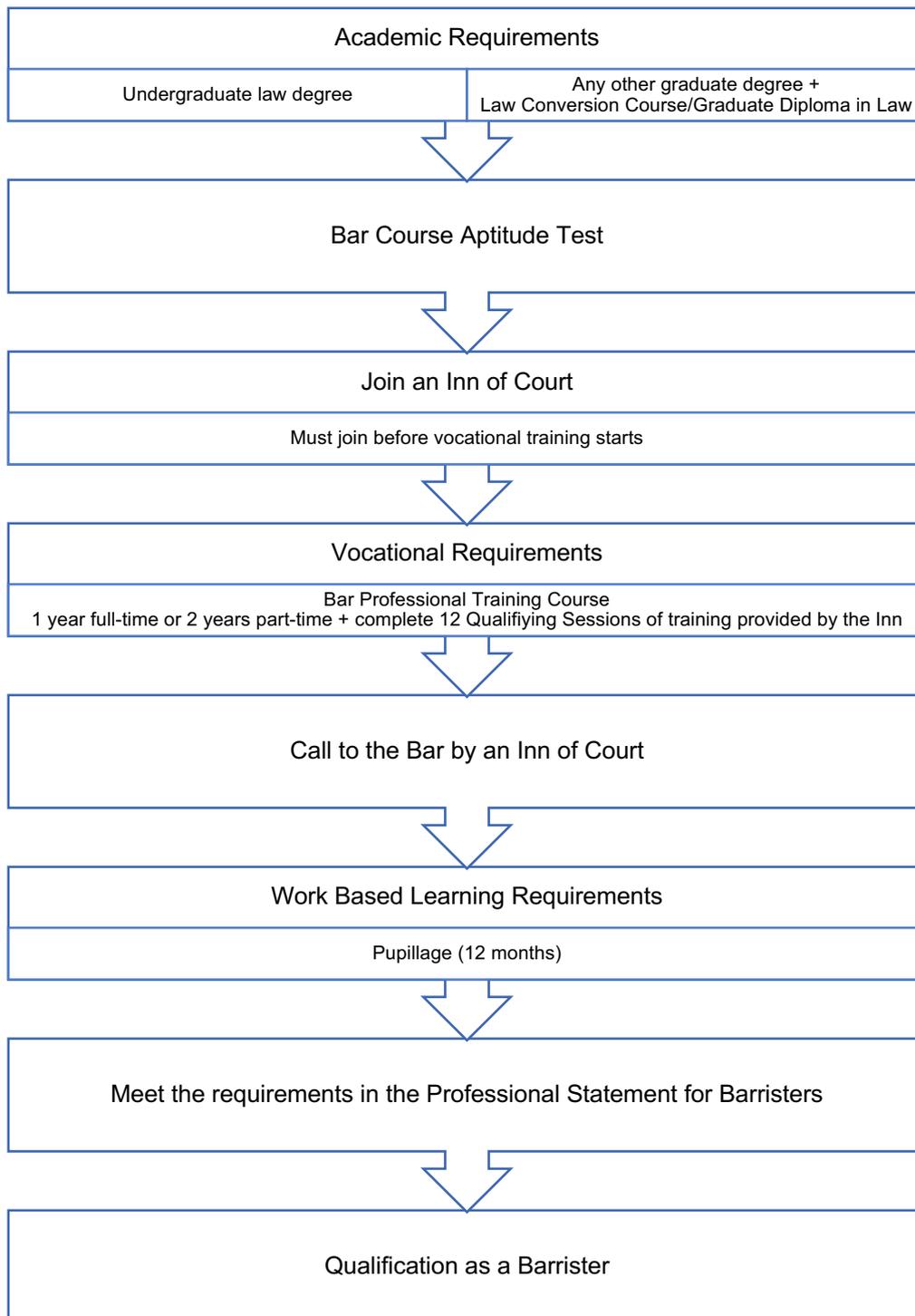
³²⁹ Solicitors Regulation Authority, ‘Qualified Lawyers Transfer Scheme’ <www.sra.org.uk/solicitors/qlts.page> accessed 26 July 2019.

³³⁰ Solicitors Regulation Authority, ‘Key features of the Qualified Lawyers Transfer Scheme’ <www.sra.org.uk/solicitors/qlts/key-features.page> accessed 3 June 2019.

³³¹ Under the QLTS, a foreign lawyer who is admitted in a recognized jurisdiction only needs to successfully complete the QLTS Examination in order to seek admission as a solicitor in the UK. *ibid.*

³³² Bar Standards Board <www.barstandardsboard.org.uk/> accessed 3 June 2019.

³³³ Bar Standards Board, ‘Becoming a barrister’ (n 254).

Illustration 7: Admission as a Barrister

(Illustration above based on graphic from the Bar Standards Board)³³⁴

³³⁴ *ibid.*

It should be noted though that both titles – solicitor and barrister – are recognized under the Establishment Directive.³³⁵ Therefore, a person who is admitted as either a solicitor or barrister may exercise his or her rights under the Establishment Directive.

V. CHAPTER SUMMARY

It is clear that lawyers face a host of regulations, such as when qualifying to become a lawyer, when practicing as a lawyer and when attempting to practice in another state. Each EU member state has its own separate system and rules when regulating the admission of lawyers as well. However, the rapid growth of legal tech leads one to question the impact of legal tech on these regulations, which will be later explored in Chapter 5.

³³⁵ Establishment Directive (n 172), art(1)(2)(a).

Chapter 4: Exploring the Legal and Policy Concerns Surrounding the Legal Industry and its Application to Legal Technology

I. INTRODUCTION

Legal service providers are, in most EU member states, highly regulated. They are usually regulated in several ways, e.g. accredited education, training, and in certain jurisdictions, citizenship. After having set this out earlier in Chapter 3 and having also defined Legal Tech and introducing the legal industry in Chapter 2, the next step is to explore the legal and policy concerns surrounding the legal industry and its application to Legal Tech. The difference between this chapter and the previous chapter on the regulation of the legal industry is that this chapter will focus on specific policy concerns that are important considering the growth of Legal Tech. In light of this focus, it is thus pertinent to first understand the pros and cons of Legal Tech and subsequently distill the legal and policy concerns concerning LSPs and Legal Tech. This will in turn serve as a basis for discussion and as a comparator for the next chapter on the impact of Legal Tech on existing regulations on the legal profession and current approaches in regulating Legal Tech in the EU.

II. THE VIRTUES AND VICIES OF LEGAL TECH

Similar to other technologies changing the way businesses and consumers operate, Legal Tech has its advantages and disadvantages. This section will provide insights on the pros and cons of Legal Tech to serve as a basis for future discussions in this thesis; these include insights on the role of Legal Tech in the legal industry and how Legal Tech can be regulated to maximize its advantages but minimize its disadvantages. As most of these issues will be further elaborated in subsequent chapters and sections, the following points and summary of the issue at hand are

intended to serve as a precursor to the upcoming discussions surrounding the regulation of Legal Tech and the legal industry.

A. The Benefits of Legal Tech

1. Choice of legal services

The most obvious benefit that Legal Tech has is that it provides users and consumers with more avenues to find their legal solutions. Instead of having to seek a lawyer, client-users can find alternative solutions for their legal problems. These solutions are mainly provided online and are thus readily accessible to clients using a computer or a smartphone. In the earlier Chapter 2, the different types of Legal Tech solution providers were described. Therefore, client-users can seek multiple different avenues for the same services and this diversity in choice is beneficial for consumers in the EU as they are no longer subject to being forced to pay for legal solutions that are delivered by one type of LSP, i.e. a lawyer.

2. Efficient provision of legal services

Legal Tech has changed the way legal services are delivered and this change has permitted faster delivery of legal services. Instead of working with a human to resolve legal problems, client-users of Legal Tech solution providers work with a software or application which will provide the client-user with the relevant legal advice that they seek, or allow client-users access to a database with an interface that permits them to search and modify the information in the database to get the solution that the client-user needs or wants. For example, Norton Rose Fulbright's Parker is a chatbot that assists users in determining whether a business which operates out of the EU is GDPR compliant.³³⁶ Users then "chat" digitally with a non-human AI interface where legal

³³⁶ Norton Rose Fulbright, 'Norton Rose Fulbright launches AI-powered chatbot on EU GDPR, Norton Rose Fulbright' (Norton Rose Fulbright 14 May 2018) <www.nortonrosefulbright.com/en/news/06a02cee/norton-rose-fulbright-launches-ai-powered-chatbot-on-eu-gdpr> 18 March 2019.

advice is provided by the chatbot.³³⁷ Other Legal Tech solution providers include contract(), which is a website that generates contracts for game developers for free.³³⁸ Users simply fill in the blanks, select the right options that apply to him or her and can quickly generate the agreement by printing it or saving it as a Portable Document Format (“PDF”) document.³³⁹ The PDF document can then be digitally signed by parties for convenience.³⁴⁰ In a similar vein, JotForm has a database of contract templates where users can search for the right contract that they need.³⁴¹ These contracts are editable as well³⁴² and users can thus quickly modify the contract to serve their purposes.

In all of the aforementioned examples, users of these Legal Tech solution providers are able to get the solutions to their legal problems immediately and on their own accord. They need not wait for a human to respond to their requests and can solve their own legal problems anywhere as long as they have an Internet connection. This speed in delivery of legal services allows users to have a more efficient resolution of their legal problems.

3. Use of Legal Tech in pro bono offices

One potential use of Legal Tech could be for pro bono purposes, where Legal Tech can be used in several ways such as responding to common legal problems that are asked by people or directing people to the right guidebook or organization that are able to assist with their situation better. The use of Legal Tech such as chatbots for pro bono purposes has been discussed in Ng’s article, *Designing and Building Chatbots for Pro Bono Legal Clinics*.³⁴³ Ng suggested that these chatbots can be used to “[increase] administrative efficiency (e.g. appointment scheduling), FAQ assistance

³³⁷ Norton Rose Fulbright, ‘Does the GDPR apply to your non-EU business?’ (Norton Rose Fulbright May 2018) <www.nortonrosefulbright.com/en/knowledge/publications/dfff365a/does-the-gdpr-apply-to-your-non-eu-business> accessed 17 March 2019.

³³⁸ Contract () <<https://docontract.com/>> accessed 17 March 2019.

³³⁹ *ibid.*

³⁴⁰ *ibid.*

³⁴¹ JotForm, ‘50+ Free Contract Templates’ <www.jotform.com/pdf-templates/contract> accessed 17 March 2019.

³⁴² *ibid.*

³⁴³ Ng, ‘Designing and Building Chatbots for Pro Bono Legal Clinics’ (n 33).

(e.g. resolving simple queries, or directing applicants to the right agencies), means testing agent, or providing legal advice.”³⁴⁴ The solution of simple tasks such as scheduling has been suggested as a possibility to increase a clinic’s “efficiency as it can do more with the same resources by automating simple tasks wherever possible”.³⁴⁵

In other countries such as Canada in the province of British Columbia, the Legal Services Society which provides legal aid in British Columbia does not have a chatbot but a web platform that allows user to “find solutions to [his or her] legal problem”.³⁴⁶ The web platform covers four main topics such as separation, divorce and family matters, abuse and family violence, missed mortgage payments and wills and personal planning.³⁴⁷ In this platform, users can also readily access publications of the Legal Services Society, which cover multiple subjects on the law and are freely accessible by anyone.³⁴⁸ Furthermore, if clients are unable to find for what they need in the publications, the website has a link to Clicklaw,³⁴⁹ which contains more extensive legal information available for users.

From the user interface (“UX”) design perspective, Stanford Law School’s Legal Design Lab has a project in which Legal Tech solutions can help reduce the administrative workload of pro bono lawyers³⁵⁰ through outsourcing of several tasks or creating a platform to help with clients seeking legal aid,³⁵¹ thereby freeing more time for pro bono lawyers to take up more pro bono cases or focus on their existing workload. The Legal Design Lab has found participants for their pilot and will provide more information once the “details have been confirmed”.³⁵² Legal Tech can therefore benefit users directly or it can help lawyers which indirectly helps those receiving legal

³⁴⁴ *ibid* 205.

³⁴⁵ *ibid* 210.

³⁴⁶ My Law BC <<https://mylawbc.com/>> accessed 17 March 2019.

³⁴⁷ *ibid*.

³⁴⁸ My Law BC, ‘Our publications’ <<https://mylawbc.com/pubs/>> accessed 17 March 2019.

³⁴⁹ Clicklaw <www.clicklaw.bc.ca/> accessed 17 March 2019.

³⁵⁰ Legal Design Lab, ‘New Modes of Pro Bono’ <www.legaltechdesign.com/pro-bono/> accessed 17 March 2019.

³⁵¹ Legal Design Lab, ‘Ideabook’ <www.legaltechdesign.com/pro-bono/design-work/> accessed 17 March 2019.

³⁵² Legal Design Lab, ‘Pilot, Scaling vision, and Next Steps’ <<http://www.legaltechdesign.com/pro-bono/pilot-for-new-modes-of-pro-bono/>> accessed 18 March 2019.

aid. The creation of a proper UX will also enable easier use and access of such legal services by users.

4. Filling the legal services gap

Legal Tech can fill the legal services gap, i.e. the sweet spot where users would not pay a lawyer to enforce their legal rights or claims because the remedy received from a successful case is less than the legal fees payable. Therefore, Legal Tech can move in to fill these legal services gaps. Examples of such legal technology solutions include repealing of parking fines and³⁵³ compensation for flight delays.³⁵⁴

B. The Disadvantages of Legal Tech

1. Lack of consumer protection

One disadvantage is the relatively weaker consumer protection for client-users of Legal Tech solution providers as they have less remedies available against a Legal Tech solution provider as compared to if they hired a lawyer. For instance, a client-user can complain against the lawyer's practices at the bar association, but in the case of a Legal Tech solution provider, a client-user of such services cannot complain to the bar association and may only have redress through civil litigation procedures. Furthermore, if a consumer sues a lawyer, the lawyer is covered by professional indemnity insurance and the consumer will thus be able to receive compensation from the insurance company. However, in the case of a Legal Tech company, consumers may not receive much in terms of compensation if the Legal Tech company does not have any assets or capital. Furthermore, the client-user of the Legal Tech solution provider may also be precluded from claiming against the Legal Tech company if the End User License Agreement ("EULA") contracts the parties out from a suit.

In Fina, Ng and Vogl's article entitled *Perspectives on the Growth of DIY Legal Services in the European Union*, the authors suggested that consumer protection is

³⁵³ DoNotPay (n 82).

³⁵⁴ Claim Flights (n 81).

different for DIY legal services that are provided by a lawyer or non-lawyer, insofar where DIY legal services are concerned.³⁵⁵ Crucially, consumer protection from providers of DIY legal services are much weaker as compared to law firms or lawyers as providers of legal services. General EU and national consumer protection laws will apply, and consumers of such DIY legal services have one less recourse against the DIY legal services provider as, unlike the case of a law firm, a client-user can try to establish a lawyer-client relationship and claim against the lawyer for professional negligence;³⁵⁶ the client-user can make a complaint at the bar association as well.

2. Unfair competition

While consumers may tolerate their relative weaker position in consumer protection, especially if DIY legal services offer lower fees and faster results, from the perspective of ensuring access to justice, this can be a potential problem. A consumer may use a DIY legal service application because he or she may not be able to afford legal advice otherwise. As DIY legal services applications enable consumers that would not otherwise be able to hire lawyers resolve their legal problems thereby enabling access to justice, should these DIY legal services be regulated to ensure that they – similar to lawyers – will not misadvise their consumers through negligence in the provision of their services and thus obstruct proper access to justice? This then runs to the root of this thesis, i.e. whether such DIY legal services or Legal Tech should be regulated, and why the legal industry should or should not be regulated to begin with.

This issue of unfair competition will be a key element in the discussion on whether Legal Tech should be regulated to solve this issue and will be extensively discussed in the subsequent chapters. The notion of the disruption of the legal industry by Legal Tech already signals towards a debate on the competition between Legal Tech solution providers and lawyers. Unfair competition can be seen from two perspectives – (1) lawyers having the monopoly in the provision of specific legal services; or (2) Legal Tech solution providers have much less sunk costs and compliance costs

³⁵⁵ Fina, Ng and Vogl (n 38) 242-243.

³⁵⁶ *ibid* 245.

(thereby having more liquidity and are able to price lower) and are much more flexible and mobile in the provision of legal services as compared to lawyers and law firms. The use of Legal Tech directly by client-users or consumers, rather than through the law firms, poses significant challenges for lawyers.

3. The inherent problems in Legal Tech

The use of technology does not come without any problems. In Koulu's article *Why We Need Legal Technology*, the author highlights "the growing awareness of technologies inherent biases and questions about algorithmic fairness are unsolved issues in the way of adopting more technology to crucial legal processes".³⁵⁷ Furthermore, as the data of legal subjects are normally highly sensitive commercial and personal data that can affect the commercial interests and rights of a company and person accordingly, the treatment and protection of such data is an issue as well. In this sense, how should one regulate Legal Tech to ensure that such problems are addressed? The issue of inherent bias, algorithmic fairness and treatment and protection of data will be further discussed in Chapter 7.IV.B.1.

III. ANALYZING LEGAL AND POLICY CONCERNS BEHIND LEGAL SERVICE PROVIDERS

The provision of legal services is a regulated industry in all EU member states and the extent to which they are regulated depends on each member state. LSPs are either authorized or unauthorized to practice a specific set of legal services as stated under the law. Generally, LSPs are regulated through (1) the establishment of a specific set of conditions that one must fulfill before they are qualified to practice law; and (2) the requirement that LSPs who are qualified to practice law can continue do so. This was previously discussed in greater detail in Chapter 3.

LSPs, before they are entitled and qualified to practice law, must usually fulfill a specific set of conditions. These set of conditions can include a combination of the

³⁵⁷ Koulu (n 11) 31.

following: (1) successful completion of the national bar examination;³⁵⁸ (2) successful completion of required seminars for purposes of admission to the bar;³⁵⁹ (3) successful completion of the required education as prescribed by national legislation;³⁶⁰ (4) practice as a legal trainee or equivalent at a law firm or approved institution;³⁶¹ (5) completion of a stipulated amount of pro bono hours;³⁶² and other requirements as may be stipulated by law. Upon fulfilling these requirements, an attorney-candidate or legal trainee can then apply for admission as a lawyer, i.e. admission to the bar. T

After a lawyer has been admitted to the bar and should the lawyer choose to remain in practice (i.e. working at a law firm and providing legal services to the general public rather than as an in-house legal counsel), the lawyer may be required to fulfill a combination of the following: (1) seminars or courses which are also known as “continuing legal education”;³⁶³ (2) purchase of approved professional indemnity insurance;³⁶⁴ (3) or providing a minimum of pro bono services for clients in need.³⁶⁵ These aforementioned conditions were previously elaborated in Chapter 3.III.A.6.(ii).

Each member state has a combination of these requirements and also sets its own minimum standards concerning each requirement. However, the legal and policy concerns behind these requirements are more often than not the same – ensuring that the legal profession maintains integrity in the eyes of the public, and lawyers, as officers of the court, ensure proper access to justice through the provision of good legal advice to their clients.

³⁵⁸ For a general understanding, see Nascimbene (n 16).

³⁵⁹ *ibid.*

³⁶⁰ *ibid.*

³⁶¹ *ibid.*

³⁶² *ibid.*

³⁶³ *ibid.*

³⁶⁴ Kritzer (n 273) 83.

³⁶⁵ In Belgium, a legal trainee (or *avocat-stagiaire/advocaat stagiaire*) is required to “follow the cases assigned to him or her by the legal aid office”; Nascimbene (n 16) 68. On the other side of the Atlantic, the State of New York requires all candidates seeking admission after January 2013 to fulfil a mandatory 50-hour pro bono requirement; see The New York State Board of Law Examiners, ‘Mandatory 50-Hour Pro Bono Requirement’ <www.nybarexam.org/MPB.html> accessed 10 March 2019.

A. Consumer Protection

One of the key arguments towards having a stringent qualifying process is to ensure that clients or consumers represented by lawyers receive adequate and sound legal advice, thereby ensuring that is proper access to justice for the public. This was discussed in Chapter 3.II.A. In this sense, the strict regulation of lawyers is a method of ensuring that there is adequate consumer protection for the receipt of legal advice from qualified LSPs. The specific education and training requirements ensure that admitted lawyers are competent enough to provide sound legal advice to the public; it is thus illegal in all member states for persons who are not admitted to the bar and who are not working under the supervision of a lawyer under an approved scheme by legislation to provide specific legal services, e.g. representation in court.

Within the EU, lawyers that are admitted in one EU member state and are now seeking to practice in another EU member state may only do so if they fulfill the requirements as prescribed under the Establishment Directive, which normally requires said lawyer to have at least practiced in his or her member state for three years prior to seeking to practice in another member state. Who is deemed as a lawyer is further defined in the directive, whereby one is an EU national and hold one of the professional titles listed within the directive.³⁶⁶ Otherwise, foreign lawyers are generally not permitted to provide legal advice on laws of the member state that they are not qualified in. The prevention of foreign lawyers to operate and provide legal advice on local laws to clients can be said to be a form of consumer protection as clients will know that the lawyers representing them or providing legal services to them are all qualified to practice and have the requisite knowledge as prescribed by the regulatory authorities of LSPs to provide these legal services.

To further ensure that clients are adequately safeguarded in the event of malpractice by lawyers, several member states require practicing lawyers to have a valid

³⁶⁶ Establishment Directive (n 172), art 10. See also Council of Bars and Law Societies of Europe, *Guidelines for Bar & Law Societies on Free Movement of Lawyers within the European Union* <www.ccbe.eu/fileadmin/speciality_distribution/public/documents/EU_LAWYERS/EUL_Guides___recommendations/EN_FML_2016_Guide.pdf> accessed 10 March 2019.

professional indemnity insurance when they are providing legal advice to their clients.³⁶⁷ Clients, who believe that their representing lawyer has provided negligent advice or have breached their ethical codes of conduct as stipulated by the bar association, can lodge a complaint with the bar association.³⁶⁸ The bar association will then investigate the client's complaint and will sanction the practicing lawyer accordingly; if there is a proper case of malpractice and compensation has to be provided to the client, the lawyer's professional indemnity insurance is then intended to cover such occasions.³⁶⁹ From this perspective, the client should therefore be protected from the lawyer's negligence or intentional wrongdoings, insofar where the client has hired a lawyer or law firm.

However, the issue with consumer protection becomes complex when consumers seek protection from Legal Tech solution providers that provide DIY legal services to consumers. In Fina, Ng and Vogl's article, the authors suggest that it is difficult to "determine what kind of legal services a non-lawyer can provide",³⁷⁰ especially in the situation where a non-lawyer provides unregulated legal services – the so-called "gray area".³⁷¹ The authors further state that each member state has its own definition of what falls under regulated legal services.³⁷² It should be noted that in some member states, one may be required to sieve through multiple pieces of legislation before he or she can exactly determine who or what can provide which legal services.³⁷³ This makes it tricky to determine whether a non-lawyer such as a Legal Tech solution provider is providing a valid legal service, especially if the said Legal Tech solution

³⁶⁷ This is required in Austria, where one of the conditions for the practice of a lawyer is the conclusion of a liability insurance. Rechtsanwaltsordnung (n 69), §1.(2)(g).

³⁶⁸ Solicitors Regulation Authority, 'Reporting an individual or firm' <www.sra.org.uk/consumers/problems/report-solicitor.page#how-complain> accessed 4 June 2019.

³⁶⁹ For example, some insurance companies have even put in place a "claims advocacy" service where they assist law firms with claiming insurance from the law firms' own insurers. Lockton, 'Claims Consultancy' <www.locktonsolicitors.co.uk/insurance-services/claims-consultancy.html> accessed 4 June 2019.

³⁷⁰ Fina, Ng and Vogl (n 38) 244.

³⁷¹ *ibid.* The gray area is the space in which unregulated legal services are provided by non-lawyers.

³⁷² *ibid.*

³⁷³ For instance in Sweden, the laws concerning the provision of legal services are found in the Swedish Code of Judicial Procedure, ch 8, the Charter of the Swedish Bar Association (Swedish Bar Association, *Charter of the Swedish Bar Association*), the Prohibition against Supply of Legal or Financial Services in Certain Cases Act (1985:354) and the Code of Conduct for Members of the Swedish Bar Association.

provider also provides legal services across different member states. One consequence of cross-border provision of legal services by such Legal Tech solution providers is that consumers will likely have to seek consumer protection from the consumer protection association in the member state that the Legal Tech solution provider is operating in. This may be an additional step that can be time-consuming or tricky, considering that there may be obstacles such as language differences involved. While the EU ODR platform is a possible method to reduce such obstacles, it remains to be seen whether it is an effective method in such circumstances.³⁷⁴

Fina, Ng and Vogl also point out that the consumer protection regime is different when a client-user uses a DIY legal service provided by a non-lawyer or Legal Tech solution provider as compared to a lawyer.³⁷⁵ According to them, consumer protection from a non-lawyer or Legal Tech solution provider is normally protected in the form of an EULA, where the said legal service provider can contract out from liability, although subject to EU laws on unfair contract terms.³⁷⁶ Client-users of such legal services are also not afforded the right to complain to the relevant bar associations if these legal service providers are providing legal services under the “gray zone”, as they do not fall under the purview of the bar association. Therefore, these client-users, while they may benefit from having faster and cheaper services from such legal service providers, do not have similar consumer protection standards as compared to if they sought legal advice from lawyers.

The problem of dissimilar consumer protection standards is an important aspect when discussing the regulation of Legal Tech. If current trends suggest that there is growth in the DIY legal services sector combined with widespread Internet connectivity,

³⁷⁴ Irene Ng (Huang Ying) and Valeria Benedetti del Rio, ‘The Use of Online Dispute Resolution in the Realm of Investment Arbitration in the European Union’ (2016) 1 *European Investment Law and Arbitration Review* 131, 143.

³⁷⁵ Fina, Ng and Vogl (n 38) 245.

³⁷⁶ Under the Unfair Contract Terms Directive, Article 6 provides that member states “shall lay down that unfair terms used in a contract concluded with a consumer by a seller or supplier shall, as provided for under their national law, not be binding on the consumer and that the contract shall continue to bind the parties upon those terms if it is capable of continuing in existence without the unfair terms”. Council Directive 93/13/EEC of 5 April 1993 on unfair terms in consumer contracts [1993] OJ L95 (Unfair Contract Terms Directive), art 6.

computer usage and trust in the use of algorithms in resolving issues,³⁷⁷ then it is a plausible argument that more client-users will use such alternative legal services instead of law firms. There are then several issues that must be resolved: (1) should regulations be imposed to ensure that consumer protection is the same regardless of which LSP a consumer chooses; (2) should existing regulations be reformed to allow for fair competition amongst all LSPs that are providing the same legal services; and (3) should such regulations be harmonized across the EU? These issues will be further explored and dealt with in the subsequent chapters.

B. “Right to Counsel” – Human Rights Aspect of Lawyers and Accessibility to Justice

The role of the lawyer is more than being a mere legal service provider. The United Nations’ (“UN”) “Basic Principles on the Role of Lawyers”³⁷⁸ provides that “all persons are entitled to call upon the assistance of a lawyer of their choice to protect and establish their rights and defend them in all stages of criminal proceedings.”³⁷⁹ Insofar where EU law is concerned, Article 47 of the Charter of the Fundamental Rights of the European Union³⁸⁰ (“EU Charter”) protects the right to an effective remedy and to a fair trial, and stipulates the following:

“(…)

Everyone is entitled to a fair and public hearing within a reasonable time by an independent tribunal previously established by law. Everyone shall have the possibility of being advised, defended and represented.

Legal aid shall be made available to those who lack sufficient resources in so far as such aid is necessary to ensure effective access to justice.”³⁸¹

³⁷⁷ Jennifer M Logg, Julia A Minson and Don A Moore, ‘Do People Trust Algorithms More Than Companies Realize?’ (Harvard Business Review 26 October 2018) <<https://hbr.org/2018/10/do-people-trust-algorithms-more-than-companies-realize>> accessed 20 July 2019.

³⁷⁸ UN, Basic Principles on the Role of Lawyers (n 239).

³⁷⁹ *ibid.*

³⁸⁰ Charter of Fundamental Rights of the European Union (n 239).

³⁸¹ *ibid.*, art 47.

Furthermore, Directive 2013/48/EU on the right of access to a lawyer in criminal proceedings and in European arrest warrant proceedings, and on the right to have a third party informed upon deprivation of liberty and to communicate with third persons and with consular authorities while deprived of liberty (“Directive on the Right of Access to a Lawyer”)³⁸² requires suspects and accused persons to “have the right of access to lawyer in such time and in such manner so as to allow the persons concerned to exercise their rights of defense practically and effectively”.³⁸³ Directive on the Right of Access to a Lawyer further requires member states to ensure that “suspects or accused persons shall have access to a lawyer without undue delay”,³⁸⁴ stipulates what entails the right of access to a lawyer³⁸⁵ and requires member states to “endeavor to make general information available (...) to facilitate the obtaining of a lawyer by suspects or accused persons”.³⁸⁶

The right to legal aid is also protected under EU law. Accordingly, under Article 47 of the EU Charter, legal aid must be provided when necessary, and flowing from this, lawyers are thus also essential in the provision of legal aid to those in need. Based on the aforementioned, it is therefore clear that lawyers serve an important function in ensuring that the rights of people enshrined in the EU Charter and under other EU laws are adequately protected. The protection of fundamental human rights is thus explicably tied towards the legal profession, and to this end, tied to the proper, ethical and non-negligent performance of lawyers in their work as well. Therefore, it is unsurprising that policy requires lawyers to be tightly regulated.

However, an interesting hypothetical question would be whether a Legal Tech solution provider can replace a lawyer in the earlier mentioned cases of the right to counsel. Assuming that “lawyer” in Directive 2013/48/EU has been amended to “legal service provider” and Legal Tech solution providers fall under the definition of “legal service

³⁸² European Parliament and Council, Directive 2013/48/EU of 22 October 2013, On the right of access to a lawyer in criminal proceedings and in European arrest warrant proceedings, and on the right to have a third party informed upon deprivation of liberty and to communicate with third persons and with consular authorities while deprived of liberty [2013] OJ L294.

³⁸³ *ibid*, L 294/2.

³⁸⁴ *ibid*, L 294/4.

³⁸⁵ *ibid*, art 3

³⁸⁶ *ibid*, art 4.

provider”, would a suspect or accused’s use of a Legal Tech solution provider meet the requirements of having had the “right of access to a lawyer”, especially if the said suspect or accused used the Legal Tech solution provider’s software prior to questioning by the police or by another law enforcement or judicial authority? This question, while seemingly absurd in this scenario, is important when determining: (1) whether Legal Tech solution providers and lawyers ought to be accorded the same playing field where the provision of legal services are concerned or be regulated differently; and (2) whether Legal Tech solution providers should only be permitted to operate in the provision of certain legal advice, e.g. civil and probate matters but not criminal matters. These questions will be subsequently dealt with in Chapters 7 and 8.

C. Agents of the Administration of Justice

The UN Basic Principles on the Role of Lawyers states that “lawyers shall at all times maintain the honor and dignity of their profession as essential agents of the administration of justice.”³⁸⁷ The underlying principle is that lawyers serve a higher calling than being legal service providers; in some constitutions or legislations, lawyers are “officers of the court”.³⁸⁸ It is with this principle that many member states require lawyers to adhere to a code of ethics, which is usually enforced by the bar association as empowered by legislation. This code of ethics, or sometimes known as the code of conduct, normally (1) stipulates the duties that a lawyer owes to his client;³⁸⁹ (2) duties that a lawyer owes to the court;³⁹⁰ (3) rules that the lawyer must observe when managing their practices;³⁹¹ and (4) other relevant rules concerning how a lawyer must conduct himself in his professional, public and private life.³⁹² In several EU member states, bar associations are empowered to discipline lawyers that have violated the code of ethics, and lawyers that are held to have breached the code can receive a range of penalties, ranging from fines, temporary disbarment, permanent disbarment or a combination of penalties. The code of ethics also serves as a moral compass for

³⁸⁷ UN, Basic Principles on the Role of Lawyers (n 239).

³⁸⁸ See Eugene R Gaetke, ‘Lawyers as Officers of the Court’ (1989) 42 Vanderbilt Law Review 39.

³⁸⁹ Herring (n 12).

³⁹⁰ *ibid* 120.

³⁹¹ *ibid* 401.

³⁹² *ibid* 391.

lawyers when they conduct their affairs. Lawyers who are uncertain whether they might be in breach of their ethical duties are usually encouraged to contact the bar association to seek guidance on how they should react in such circumstances.³⁹³

Therefore, through the code of ethics, lawyers are seen as agents for the effective administration of justice. By ensuring that lawyers behave in a moral and ethical manner vis-à-vis their clients and in the conduct of their personal lives, it is arguable that the public perceives the actions of lawyers as a reflection of how the administration of justice is conducted in the member state.³⁹⁴ The big issue therein lies in whether a Legal Tech solution provider can be an agent of the administration of justice, and what are the policy reasons towards allowing Legal Tech solution providers to perform such a role. Assuming that Legal Tech solution providers can be an agent of the administration of justice, should they be subject to the same code of ethics as lawyers, or are certain ethical rules required to be rewritten? These questions can only be answered after a proper evaluation of the impact of the regulation of the legal profession is conducted in the subsequent sections.

IV. THE IMPACT OF LEGAL TECH ON STAKEHOLDERS

The impact of Legal Tech on stakeholders will, naturally, depend on the stakeholder involved. As seen in Chapter 2.III, there are numerous stakeholders in the legal industry. To evaluate the impact Legal Tech has on stakeholders, this thesis will take the approach in Chapter 2.II.4 in the categorization of legal technology and will discuss the areas that are relevant to this thesis, i.e. that of lawyers and consumers.

³⁹³ For example, the UK Law Society provides an ethical scenario guide and also has a solicitors' professional ethics helpline available for lawyers seeking help on ethical rules. See The Law Society, 'Ethics' <www.lawsociety.org.uk/support-services/ethics/> accessed 11 March 2019.

³⁹⁴ The lawyer plays a role in the administration of justice. Therefore, their actions will be scrutinized by the public insofar where the public feels that justice has not been administered properly. See Herring (n 12) 402.

A. Impact on Lawyers

The biggest impact that Legal Tech has is on lawyers, and not just in one aspect but several. In 2016, the Boston Consulting Group and Bucerius Law School released a joint report (“BCG-Bucerius Report”) on how with new technologies, the structure of a law firm will change towards having a larger information technology (“IT”) department with lesser junior associates than before.³⁹⁵ Besides technology changing the way lawyers practice and affecting structures of law firms and even in-house departments, Legal Tech developed by startups eyeing a share of the legal industry are now competitors of law firms as they deliver lower cost legal services.

The extent of the impact is indeed felt by law firms as many law firms in the US and EU are adopting new Legal Tech solutions and explicitly publishing such take-up of Legal Tech. International law firm CMS has been “researching, piloting and investing in a range of artificial intelligence (AI) technologies”,³⁹⁶ which are implemented in their UK and German offices. Some of these Legal Tech solutions are designed to help lawyers complete their tasks quicker and with more accuracy, especially work that can be automated or uses very standard procedures.³⁹⁷ For instance, law firm Baker McKenzie has also recently reported about how it has “significantly enhanced its bespoke legal technology offering by partnering with ContraxSuite by LexPredict, an open-source contract analytics and legal document platform”.³⁹⁸

³⁹⁵ Veith and others (n 24) 10.

³⁹⁶ CMS, ‘Legal Tech’ <<https://cms.law/en/INT/Annual-Review/Annual-Review-2017/Inside-CMS/LEGAL-TECH>> accessed 26 July 2019.

³⁹⁷ For example, several law firms use Kira systems to help in their daily work. Law firms that use Kira systems include Hogan Lovells, Allen & Overy and Freshfields. See Kira Systems, ‘Hogan Lovells Enhancing Transactional Services with AI-Enabled Contract Review Software, Kira’ (Kira Systems 28 January 2019) <<https://info.kirasystems.com/news/hogan-lovells-enhancing-transactional-services-with-ai-enabled-contract-review-software-kira>> accessed 10 March 2019; Kira Systems, ‘Allen & Overy licenses Kira software as Kira Systems joins Fuse 2 cohort to drive adoption’ (Kira Systems 10 July 2018) <<https://info.kirasystems.com/news/allen-overy-licenses-kira-software-joins-fuse-2-cohort>> accessed 10 March 2019; and Kira Systems, ‘Freshfields renews contract with machine learning software Kira’ (Kira Systems 24 May 2018) <<https://info.kirasystems.com/news/freshfields-renews-contract-machine-learning-software-kira>> accessed 10 March 2019.

³⁹⁸ Baker McKenzie, ‘Baker McKenzie Deploys First of a ‘New Generation’ of Smarter Tools with ContraxSuite’ (Baker McKenzie 1 August 2018) <www.bakermckenzie.com/en/newsroom/2018/07/lexpredict> accessed 26 July 2019.

Unsurprisingly, the advent of such technologies also means that there is lesser demand for junior associates who would otherwise have to do such ‘menial’ or easier tasks, thereby affecting the amount of positions available for junior associates. Law students seeking positions at law firms may then have to pivot elsewhere to seek gainful employment or have skills above their knowledge in substantive law (e.g. being able to use and troubleshoot smart legal research tools or AI due diligence tools).

B. Impact on Consumers and Access to Justice

Numerous Legal Tech solution providers and startups are founded or built with the higher purpose of providing consumers with a more affordable legal solution, thereby increasing access to justice to the layperson. This is a positive trend that should be encouraged, as there are people who cannot otherwise afford legal representation in criminal matters or defend a civil claim made against them. However, if Legal Tech were to become the norm as a go-to legal quick fix, then the question of whether Legal Tech should be regulated to prevent negligent advice and therefore ironically putting up more obstacles to justice than before has to be discussed.

V. LEGAL TECH AND ITS IMPACT ON THE POLICIES BEHIND REGULATING LEGAL SERVICE PROVIDERS

As seen in the previous section, Legal Tech’s impact goes beyond law firms – it trickles down to consumers, pro bono associations and the society at large. Generally, law firms that use Legal Tech to improve their firm’s efficiency do not pose much issues to consumers unless such technologies breach personal data protection law, e.g. by sending personal data of clients (whether directly or indirectly) to third party legal technology solution providers for AI predictive analysis. Most of these ethical considerations arise when Legal Tech solution providers intend to take over the role of a lawyer and provide legal services in a tightly regulated industry.

With the entrance of new Legal Tech startups, particularly those offering DIY Legal Tech solutions, traditional law firms are facing competition to retain their market share of clients. These new Legal Tech solution providers intend to provide legal solutions to consumers at either a faster pace, a lower cost or both. Such startups put pressure

on law firms to either change their revenue model to reduce fees and enable them to be more competitive by providing fee certainty on the matter (i.e. moving away from billable hours to fixed fees) or adopt new technologies within the firm (which inevitably costs money to implement and maintain) to improve efficiency.

A. Impact of Legal Tech on Consumer Protection

The impact of Legal Tech on consumer protection is significant, especially in cases where Legal Tech solution providers provide legal services directly to consumers, e.g. DIY legal services. One of the gravest consequences is that client-users are not afforded the same consumer protection that they would otherwise enjoy if they engaged lawyers to represent them. Unlike seeking advice from a lawyer, where a client-user can complain to the bar association or bar regulatory authority, and if found in breach of their duties towards the client or of the code of ethics, a lawyer may be required to compensate the client, be sanctioned by the bar association, or both.³⁹⁹ A client-user need not fear that the law firm will not be able to compensate them for the lawyer's misadvice as lawyers in most EU member states are obliged to purchase professional indemnity insurance.⁴⁰⁰

However, in the case of Legal Tech solution providers, these Legal Tech solution providers operate as regular companies and are not required to purchase professional indemnity insurance to operate. Therefore, consumers that use such Legal Tech solution providers may not receive any compensation from the company even in a successful litigation suit if the company does not have sufficient assets to compensate to the consumer. Furthermore, a consumer that has been contracted out of suing the Legal Tech solution provider by virtue of the EULA that they have entered into with the Legal Tech solution provider may not even have the legal right to seek compensation from the company. Arguably, the consumer may have a chance of contesting the

³⁹⁹ Penalties are usually provided for in either the act concerning the provision of legal services or the bar association's charter. This depends on each EU member state. For a general idea on the penalties for each EU member state. See *Zakon o odvetništvu* (n 94), VIII.A; Swedish Bar Association, *Charter of the Swedish Bar Association* (n 373), section 45.

⁴⁰⁰ Nascimbene (n 16) 61-233.

EULA if it breaches EU consumer protection laws, e.g. by failing to adhere to Consumer Protection Directive⁴⁰¹ or including unfair terms and falling foul of the Unfair Contract Terms Directive.⁴⁰² However, even if consumers have the right to enforce their claims of misadvice against the company due to breach of EU law, pursuing such a claim can be costly, timely and ultimately yielding nothing if the company is insolvent at the time the judgment debt is enforced against the company.

All these situations become more complicated when such Legal Tech solution providers operate across borders within the EU. This has been discussed in Fina, Ng and Vogl's article, where the authors raise an interesting issue, i.e. consumer protection in situations where the provision of a specific legal service by a DIY legal service provider is legal in Member State A but illegal in Member State B.⁴⁰³ The authors further highlight that such a situation is not uncommon in other industries, and have also stated that this exists in industries such as online gambling and betting services.⁴⁰⁴

In light of the discrepancies in consumer protection, Fina, Ng and Vogl have suggested that DIY legal service providers should have minimum standards of consumer protection for users of such DIY legal services, where for instance, "minimum standards, such as prohibiting such DIY legal services companies from disclaiming negligence of any degree, can be imposed".⁴⁰⁵ The authors have also suggested that considering the ease of operating cross-border, imposing such minimum standards must not only be done on a national level, but on an EU wide level, so as to prevent companies from shifting "its business operations to another member state where there are no applicable minimum standards".⁴⁰⁶

⁴⁰¹ Consumer Protection Directive (n 154).

⁴⁰² Unfair Contract Terms Directive (n 376).

⁴⁰³ Fina, Ng and Vogl (n 38) 249.

⁴⁰⁴ *ibid.*

⁴⁰⁵ *ibid* 250.

⁴⁰⁶ *ibid.*

While Fina, Ng and Vogl have called for the harmonization of laws in the legal industry in order to ensure that minimum standards are the same in the whole of EU,⁴⁰⁷ this thesis proposes that the harmonization efforts go beyond imposing minimum standards on DIY legal services or Legal Tech solution providers. Rather, the harmonization should also encompass the harmonization and standardization of the legal industry as a whole, by ensuring that while consumers are enjoying the same protection regardless of which service they use, the playing field for lawyers and Legal Tech solution providers are the same, i.e. ensuring fair competition of players in the legal industry. Harmonization of laws in this industry thus requires consideration of many other factors, in particular, how the legal industry is presently regulated in each member state.

B. Impact of Legal Tech on the Right to Counsel and Legal Aid

The question, which is currently theoretical, is whether Legal Tech solution providers can replace lawyers in fulfilling the right to counsel or legal aid. Considering the growth and rapid development of AI in the field of law, the use of AI to replace certain legal services that lawyers otherwise provide appears to be more real than fiction at present. Legal Tech solution providers have developed AI-powered chatbots,⁴⁰⁸ AI legal services that replace certain functions of lawyers and have developed self-service contract or will drafting services.⁴⁰⁹ The possibility of an AI lawyer conducting affairs such as advising an accused person or suspect on his or her rights may not be a fictional situation in the future.⁴¹⁰ In this regard, it would be necessary to consider why the use of Legal Tech can or cannot be deemed to satisfy the requirements of the right to counsel or legal aid.

⁴⁰⁷ *ibid* 251.

⁴⁰⁸ Robot Lawyer LISA <<http://robotlawyerlisa.com/>> accessed 10 March 2019. For general information on chatbots in the legal industry, see Jane Croft, 'Chatbots join the legal conversation' (Financial Times 7 June 2018) <www.ft.com/content/0eabcf44-4c83-11e8-97e4-13afc22d86d4> accessed 10 March 2019.

⁴⁰⁹ In Singapore, there are numerous organizations that now offer cheap will drafting services via the Internet: Singapore Legal Advice, 'WillMaker' <<https://willmaker.singaporelegaladvice.com/>> accessed 10 March 2019; and CNA, 'OCBC Bank Rolls out free online will writing services' (Channel NewsAsia 27 December 2018) <www.channelnewsasia.com/news/singapore/ocbc-bank-rolls-out-free-online-will-writing-service-11065948> accessed 10 March 2019.

⁴¹⁰ Chapter 9 discusses such situations, i.e. when a robot lawyer takes over the role of a lawyer.

Assuming that Legal Tech becomes sophisticated enough to adequately advise suspects or accused persons of their rights and are able to conduct pro bono cases, it is suggested that in spite of such advancements, the use of Legal Tech should not be deemed to have satisfied the right to counsel or provision of legal aid. First, unless there are legislative changes to ensure that Legal Tech solution providers meet a minimum standard in the provision of legal services in terms of quality, response and non-negligent legal advice, an accused or suspect using such Legal Tech solution providers may suffer from subpar legal advice which may lead to the improper defense of the suspect or accused of the court, and may thus result in a further detriment of the accused person or suspect's rights.

Next, even if Legal Tech solution providers can provide quality advice, existing technology in building such systems – especially one that is heavily premised on the use of extensive data – may provide accused persons or suspects with biased results, which may affect how an accused person or suspect decides how he should move forward with his case. This can happen in situations where there is insufficient sample size to train the AI, when biased information is fed into the AI or even when unbiased data is given to the AI. For instance, if there is only one case for the crime of burglary in the village of Godešič in Slovenia, and the result is a conviction, this can be interpreted as a 100% conviction for burglary in Godešič if the AI is trained with only this one piece of datum and none of the developers of the AI intervened to prevent this statistics from being used. If an accused person or suspect requests for information on whether he should plead guilty for the charge of burglary in Godešič and open learning that his chances of conviction are 100%, this may influence his decision to plead guilty as he may be deceived into thinking that he has close to zero chance of securing a non-conviction.

Even then, with sufficient and theoretically unbiased data, the use of AI systems can also influence the opinions of accused persons or suspects. If a town's criminal statistics shows that 80% of men charged with the crime of burglary are successfully convicted while only 50% of women charged are successfully convicted for the same crime, a male accused may decide to not contest his charge and plead guilty open learning that he has very slim chances of a successful non-conviction. Arguably, a lawyer could also provide him with the same statistics – however, the lawyer may also

be able to persuade the accused person that his case would fall under the minority and give the accused a semblance of hope in succeeding in his case. The desire to push boundaries, question established law and fighting for perhaps what an AI thinks is a “gone case” can at present be only done by a lawyer – until this has been developed in AI or other forms of technology, and that regulation is in place to ensure that such Legal Tech are as competent as lawyers, it is strongly suggested that the use of Legal Tech should not be seen as having fulfilled the right to counsel or legal aid, although there should theoretically not be an issue if a client-user intends to use a Legal Tech solution provider for representation at court in civil proceedings. This argument will be an important consideration in Chapter 8 of this thesis which discusses and provides a framework for the harmonization of LSPs in the EU.

C. Impact of Legal Tech as Agents of Administration of Justice:

The altruistic nature of the legal profession has been enshrined in several codes of ethics and even in the UN’s Basic Principles on the Role of Lawyers.⁴¹¹ At present, Legal Tech solution providers are not required to serve such altruistic purposes, although there are definitely Legal Tech solution providers that have developed their software for pro bono situations. Legal Tech solution providers can also provide legal services at a cheaper cost, therefore allowing the average person the chance to enforce their rights in cases where it would otherwise be too costly to hire a lawyer, e.g. the appealing of a parking fine. While Legal Tech can increase access to justice by offering cheaper and faster legal solutions, there is difficulty in accepting that Legal Tech solution providers can be agents of administration of justice or an officer of the court. Legal Tech solution providers are not obliged to act properly in their public or private lives, nor are they required to uphold justice unlike lawyers. In this sense, even if they were to provide legal services similar to lawyers, they are still not agents of the administration of justice.

If regulations are amended and Legal Tech solution providers are required to adhere to such standards, there is a problem in recognizing who or what is required to adhere

⁴¹¹ UN, Basic Principles on the Role of Lawyers (n 239).

to such standards and how they can do so – a Legal Tech company, the shareholders or directors of the Legal Tech company or the AI (if it is recognized as a possible legal entity)? Current legislation recognizes companies as a legal entity but companies are not afforded the same rights as humans, e.g. the EU Charter, and arguably in this case, a Legal Tech company should not be afforded the same duties as they are not able to conduct their affairs as a human would, such as in the case of a legal officer of the court. The recognition of AI as an agent of the administration of justice or officer is also problematic, as AI presently does not have a legal personality. Furthermore, one must also be careful in defining when a Legal Tech company would fall under the situation where it becomes an agent of the court and must adhere to higher standards as Legal Tech companies can provide many different kinds of services to lawyers, laypersons or both. Considering existing legislation from a holistic perspective, Legal Tech solution providers are not able to serve as agents of the administration of justice or officers of the court, at least at this moment in time.

This results in another query – are lawyers then at the “losing end” for having multiple duties to the court, i.e. would it be more beneficial if they simply joined a Legal Tech company to provide the same legal services rather than work as a practicing lawyer with multiple duties and the constant threat of their clients suing them for professional negligence? This is an important question that will be further developed in Chapter 7 of this thesis.

D. Unknown Standards for Lawyers and Clients

Legal Tech at present already has the ability to predict which lawyers are most likely to win against which judges and the success of patent cases in specific courts.⁴¹² Does this then suggest that there is a bias in judges, thereby affecting the belief that judges are supposed to be equal in rendering their decisions? The appellate process that is available in courts in the EU member states ensures that in the event of doubt, one can seek the appellate court’s final decision on the matter. However, with more data

⁴¹² Lex Machina, ‘Legal Analytics for Patent Litigation’ <<https://lexmachina.com/patent-litigation/>> accessed 10 March 2019.

being available and processed to determine the win-loss rate of specific lawyers before specific judges and even on certain days and times, this may affect the public's perception of a sound and fair justice system.

The study of the bias of judges is not an unknown research field, and in fact, studies involving judicial bias, such as the famous study of Israeli judges granting parole before or after their scheduled breaks, have been reported in mainstream media.⁴¹³ The use of AI in crunching this data only serves to provide statistics in some areas that, as statisticians would know, may or may not be reliable. More recently, it has been reported that France has banned the “publication of statistical information about judges’ decisions”⁴¹⁴ on grounds “ranging from the general need for anonymity, to the fear among judges that their decisions may reveal too great a variance from expected Civil Law norms”.⁴¹⁵ The fact that there is such a ban reveals how prevalent predictive analytics is in practice. Notwithstanding French law, the key focus in this case is thus not a question of the public's perception of a sound and fair justice system – but rather whether the use of such Legal Tech to do predictive analysis is required under a lawyer's duties in serving the best interests of the client.

Clearly, if the lawyer relies on the statistics and misadvises his client, the lawyer would have provided negligent advice and the client can seek compensation against the lawyer accordingly. However, if the lawyer does not even use such software for his or her clients, would the lawyer be in breach of his duty to act in the best interest of his clients (i.e. by using the best legal software available)? This question is difficult to answer as each member state has its own code of ethics, and what is considered as acting in the best interest of the clients differs from each member state.

⁴¹³ This famous study involved examining rulings by Israeli judges before or after their scheduled break – the paper found that the likelihood of obtaining parole is higher if one is the first three prisoners considered. Ben Bryant, ‘Judges are more lenient after taking a break, study finds’ (The Guardian 11 April 2011) <www.theguardian.com/law/2011/apr/11/judges-lenient-break> accessed 10 March 2019.

⁴¹⁴ Artificial Lawyer, ‘France Bans Judge Analytics, 5 Years in Prison for Rule Breakers’ (Artificial Lawyer 4 June 2019) <www.artificiallawyer.com/2019/06/04/france-bans-judge-analytics-5-years-in-prison-for-rule-breakers/> accessed 6 June 2019.

⁴¹⁵ *ibid.*

VI. CHAPTER SUMMARY

This chapter has discussed the legal and policy reasons behind the regulation of the legal industry and analyzed how these policies are affected with the growth of Legal Tech and the lack of regulation on Legal Tech solution providers. Compared to the previous chapter on the theory of regulation, this chapter thus focused on how Legal Tech has affected specific policy considerations. The next chapter then considers the impact of Legal Tech but from another perspective – instead of considering how Legal Tech has affected public policy, the next chapter focuses on how Legal Tech has affected existing regulations and rules on the legal profession.

Chapter 5: The Impact of Legal Technology on Existing Regulations on the Legal Profession

I. INTRODUCTION

This chapter focuses on how Legal Tech has disrupted the current regulations in the legal industry. Legal Tech has challenged the monopolization of the provision of legal services by lawyers in particular EU member states, and more importantly, has challenged the fundamental principles in the admission and qualification processes of a lawyer.

The first key issue is that of fair competition. With lengthy admission and qualification processes, fair competition between lawyers and Legal Tech solution providers becomes a relevant issue to be discussed. The fair competition can be seen from two different perspectives – (1) where lawyers have to compete with Legal Tech solution providers that will replace them within a law firm; and (2) where lawyers have to compete with Legal Tech solution providers that provide legal services in the legal marketplace, thereby competing with lawyers for client-users.

Furthermore, Legal Tech can also arguably be said to have disrupted the operation of legal ethics, which were enacted to ensure that the legal profession conducts its affairs ethically. Legal Tech solution providers are not subject to such ethical rules and there is arguably a possibility whereby the interests of consumers of Legal Tech solutions are not adequately protected, even though a Legal Tech solution provider may be providing the same legal services as a lawyer. The mobility of the provision of legal services by lawyers vis-à-vis Legal Tech solution providers is also an important issue as the discrepancy in their flexibility to operate cross-border is large. This chapter will thus focus the discussion on the aforementioned issues.

II. LEGAL TECH AND HOW IT HAS DISRUPTED CURRENT REGULATIONS IN THE LEGAL INDUSTRY

A. Extensive Requirements to Become a Lawyer – A Futile Exercise in Light of Legal Tech?

As seen in Chapter 3.III.6.(i), the amount of resources – in terms of time and money – required for a person to become a legally practicing lawyer in most parts of the EU are extensive. Furthermore, as each EU member state has its own set of regulations with regard to bar admission, some lawyers may even choose to “cherry pick” which regime is the easiest to seek admission in the EU, followed by practicing in the target EU member state via the Establishment Directive.⁴¹⁶ Although the end result permits one to work as a lawyer in the target EU member state, the truth is that much time and money is expended accumulating the right qualifications before being able to work as a lawyer.

Vis-à-vis Legal Tech solution providers, in particular those that provide legal services for consumers, it begs to question whether it is worthwhile to seek admission as a lawyer or simply join a Legal Tech company upon graduation. A Legal Tech company that operates in an area of the provision of legal services that is not regulated by the EU or by national regulation can freely do so; in some cases, a Legal Tech company may seek a partnership with a law firm or register their lawyers at a law firm in order to ensure that they do not flout any laws concerning the illegal practice of law.⁴¹⁷ However, persons that are employed in such Legal Tech companies need not be admitted to the bar before they can develop legal services for consumers as this could be seen as a lawyer working in-house and not providing legal services to the public.

The deeper question, however, is the growing competition between law firms and Legal Tech solution providers that was hitherto almost non-existent. The regulation of law firms and lawyers means that the provision of legal services, in particular

⁴¹⁶ Stephen (n 159) 118. See also the *Koller* case, which has been elaborated at Chapter 3.II.A.

⁴¹⁷ Claim Flights (n 73).

appearance in court, is effectively a monopoly that is controlled by the traditional players of the legal industry, i.e. the law firms, the bar association and the Ministry of Law or Justice. However, the technology boom – in particular through the access to the Internet and the growth of machine learning tools – has permitted Legal Tech companies to enter the legal market by providing similar legal services to that of lawyers, although at a cheaper rate and arguably of a higher quality⁴¹⁸ and faster.⁴¹⁹ Instances of such Legal Tech solutions include automated due diligence processes that are boosted with AI capacities,⁴²⁰ automatic contract generators,⁴²¹ or even chatbots that attempt to provide legal advice.⁴²² Legal Tech has thus resulted in two different facets of competition: (1) competition between lawyers and Legal Tech solution providers within a law firm; and (2) competition between lawyers and Legal Tech solution providers for consumers of legal services.

1. Competition between lawyers and Legal Tech solution providers within a law firm

The displacement of lawyers – in particular junior lawyers who are normally tasked with menial, laborious and basic tasks – within the law firm, through the replacement of their work by Legal Tech solution providers, has been reported on by global consulting companies such as the Boston Consulting Group (“BCG”). The BCG-Bucerius Report states that “advances in legal tech will accelerate current trends in the decomposition and outsourcing of legal work”,⁴²³ where “some tech solutions are already targeting increasingly complex work in the legal value chain by breaking it down into standardized, repetitive tasks that can be automated or outsourced.”⁴²⁴

⁴¹⁸ LawGeex published a study entitled “AI v.s. Lawyers: The Ultimate Showdown”, where the study reported that AI had an accuracy level of 94% compared to lawyers’ 85%. LawGeex, ‘AI v.s. Lawyers: The Ultimate Showdown’ <www.lawgeex.com/resources/aivslawyer/> accessed 4 June 2019.

⁴¹⁹ *ibid.* The same LawGeex study “AI v.s. Lawyers: The Ultimate Showdown” also highlighted how AI took 26 seconds while lawyers took 92 minutes to perform the same task.

⁴²⁰ Luminance (n 45).

⁴²¹ The author of this thesis developed an automatic contract generator for internal use by a company. This involved using elements from Microsoft Word and Microsoft Excel to produce a contract ‘generator’. Key terms that have to be inserted into the contract will be inputted into Microsoft Excel. Formulas are present to process these key terms if a processed product based on the key terms are required. The data will then be subsequently merged into the contract which is a Microsoft Word document, and the final copy will be in the form of a Microsoft Word document.

⁴²² DoNotPay (n 82).

⁴²³ Veith and others (n 24) 7.

⁴²⁴ *ibid.*

The impact of legal technology has likewise been elaborated upon in the BCG-Bucerus report, which states that “law firms also need to reconsider their current revenue model”⁴²⁵ and “may have to augment the billable-hour element of their model with fixed prices and fees based on quantifiable success against clearly defined deliverables”.⁴²⁶ Furthermore, the report also suggests how big law firms can adapt or restructure from a “pyramid structure”⁴²⁷ of a traditional law firm to that of a “Rocket structure + nonlawyer”.⁴²⁸ The key distinction between the former and the latter is the reduction of the amount of junior level positions, in particular that of the junior lawyer level; the BCG-Bucerus Report highlights that the “junior lawyer level [is] most impacted by outsourcing and automation.”⁴²⁹

At present, while several big law firms that have their operations in the EU have adopted Legal Tech,⁴³⁰ the shift towards having a “Tech manager” to specialize in the procurement and management of appropriate Legal Tech solutions remains largely to be seen in mid-sized or even smaller law firms.⁴³¹ However, the lower junior lawyer to partner ratio is something that is of concern. The fact that software is more accurate than lawyers in certain aspects such as contract reviewing has already made head waves in the legal circle (and perhaps beyond),⁴³² junior lawyers, who are normally relegated to such roles, now have to face the reality of competing with possibly lesser positions in a law firm than before as their jobs are being computerized and automated.

⁴²⁵ *ibid* 9.

⁴²⁶ *ibid*.

⁴²⁷ *ibid* 10.

⁴²⁸ *ibid*. This new structure involves other nonlawyer staff, tech positions working alongside lawyers.

⁴²⁹ *ibid*.

⁴³⁰ CMS, ‘Legal Tech’ (n 396).

⁴³¹ Some large law firms have hired managers that specialize in “innovation” and/or “knowledge management”, and these managers are normally legally trained personnel that are responsible for the firm’s Legal Tech acquisition and management. However, such positions are normally only present in bigger law firms such as Allen & Overy and Dentons Rodyk. See Dentons Rodyk, ‘Dentons Rodyk enhances document review with Litera Microsystem’s Artificial Document Intelligence™ (ADI)’ (Dentons Rodyk 19 July 2018) <<https://dentons.rodyk.com/en/about-dentons-rodyk/news/2018/july/dentons-rodyk-enhances-document-review-with-litera-microsystem-artificial-document-intelligence>> accessed 11 March 2019.

⁴³² LawGeex, *Comparing the Performance of Artificial Intelligence to Human Lawyers in the Review of Standard Business Contracts* (February 2018) 15.

The trickling effects of such circumstances are twofold. First, junior lawyers who have graduated or are graduating are now caught in a situation where they are legally trained but may not be able to do legal work at a law firm and eventually be unable to seek admission as a lawyer due to the lack of junior associate positions available. In certain EU member states such as the UK and Ireland, admission to the bar is a prerequisite for the provision of legal services at a law firm, and admission requires one to have practiced in a law firm as a junior practice lawyer for a specific amount of time. In countries with a civil law tradition where provision of legal services is still permitted to a certain degree by law graduates, law graduates will likely be forced to take up jobs where their skills are less relevant or completely irrelevant similar to their counterparts in common law jurisdictions. Whether it makes sense for universities – especially public universities that heavily subsidize undergraduate education in certain EU member states – and the society or taxpayers at large to continue producing graduates where there is a trend for reduced demand for such graduates is a worthy debate in itself.

Next, this also signals a wider problem in the legal industry and the market as a whole. The narrower pool of junior lawyers means that law firms are partner or senior lawyer heavy. Senior associates or attorneys are normally expected to be promoted to a junior partner at some point in their careers; failing which, they may choose to leave the firm for better prospects. Law firms are then stuck in this sticky conundrum where they have to balance overheads, career progressions and expectations of their employees while maintaining competitive prices for their clients. With more partners working in the law firm, a law firm correspondingly needs sufficient mandates that can generate enough work to feed their employees; the dearth of junior lawyers also means that partners either have to take on simpler tasks as well or face overworking existing junior lawyers and their subsequent resignation; furthermore having partners or a few partners on a mandate may result in expensive legal fees to a client as the hourly rate of a partner is still higher than a junior associate.

If law firms however do not promote their junior associates or senior associates by a certain point of their careers – because the law firm does not have enough work to support so many partners – these associates may choose to leave the firm to search for alternative careers with greater chances of progression. The law firm then

experiences manpower turnover and also loses skilled labor that it has invested time to train.

The final straw is the future of the legal profession as a whole – if there are lesser junior lawyers being trained, it would be unsurprising to see lesser lawyers in generations to come. Furthermore, if prospects of a lawyer are poor, there may also be less applicants for undergraduate studies of law at universities, resulting in a shrinking talent pool. As a member of the legal profession, this is an alarming consequence that we must address, and quickly. The importance of legal education in relation to the future of the legal profession will be further discussed in Chapter 6.II.C.

2. Competition between lawyers and Legal Tech solution providers for client-users of legal services

A bigger issue is the increased competition between lawyers and Legal Tech solution providers for client-users of legal services. The 21st century has seen an exponential growth in the access to and use of the Internet; at the same time, technologies such as artificial intelligence and the development of tools to harness big data analytics have become commercially available. The increasing use of the Internet and software has also corresponded to the growing comfort of people trusting technologies to make decisions on their behalf⁴³³ and thus rely on such professional advice. This human-computer trust is also important in the growth in particular domains such as online dispute resolution, including e-negotiation, e-arbitration and e-settlement.

The use of Legal Tech solution providers beyond online dispute resolution is now even more prevalent and reported by the media, as software developers create applications that can solve legal problems or provide legal advice in an efficient and cheaper manner. Applications such as DoNotPay, FlightRight, and Claim Flights are a handful of Legal Tech solution providers that provide DIY legal services to client-users that are willing to trust their products and advice. These Legal Tech solution providers are

⁴³³ Logg, Minson and Moore (n 377).

arguably “gap-filling” technology solution providers in which they provide legal services that a client-users would otherwise *not* retain a lawyer to do so. The reason for this is that the financial cost to otherwise hire a lawyer to assert one’s legal rights in such a case would be greater than the damages or restitution received if the case were won by the lawyer. Such legal services include seeking compensation against airlines for flight delays or challenging a parking fine, where compensation or penalty is cheaper than the legal advice rendered by a law firm. In this case, it is suggested that there is marginal competition between such Legal Tech solution providers vis-à-vis law firms, even if media reports have made headlines about how Legal Tech is displacing lawyers from their podiums.⁴³⁴

Things become interesting when Legal Tech solution providers provide legal services that a client would otherwise seek a lawyer for and pay a lawyer for such services. Traditionally, prior to the Legal Tech movement in the 21st century, the key contender to lawyers were publishers that published self-help legal books on a range of frequently asked topics by the common layperson, such as seeking for divorces,⁴³⁵ establishing a company,⁴³⁶ amongst others. As previously described in Chapter 2.III.A.3, in the 1980s, Nolo publishers in the US drew the ire of the State Bar of Texas by publishing a self-help legal book.⁴³⁷ This culminated in the *Nolo* case where the State Bar of Texas contended that the publishers were illegally providing legal advice,

⁴³⁴ Dan Mangan, ‘Lawyers could be the next profession to be replaced by lawyers’ (CNBC 17 February 2017) <www.cnbc.com/2017/02/17/lawyers-could-be-replaced-by-artificial-intelligence.html> accessed 11 March 2019. However, there are also commentaries clarifying the position of lawyers vis-à-vis technology: see Steve Lohr, ‘A.I. is Doing Legal Work, But It Won’t Replace Lawyers, Yet.’ (The New York Times 19 March 2017) <www.nytimes.com/2017/03/19/technology/lawyers-artificial-intelligence.html> accessed 20 July 2019, or having Legal Tech companies writing guests posts about the virtue of AI in law (and how one can harness it by visiting their booth at the Legal Tech show) by having catchy headlines that claim that AI will not replace lawyers, but free them: see Omni Legal, ‘Artificial Intelligence Won’t Replace Lawyers – It Will Free Them’ (Law Technology Today 27 February 2018) <www.nytimes.com/2017/03/19/technology/lawyers-artificial-intelligence.html> accessed 12 March 2019. Regardless of the way articles are written, the underlying sentiment of lawyers having to adopt Legal Tech and also be kept at bay on Legal Tech developments that may compete with them still remains.

⁴³⁵ Such books still remain available in both paperback and digital versions. Some of these DIY divorce books also advertise themselves as being able to help readers “save you money” and are targeted to people who are divorcing without legal assistance – either because they are unwilling or unable to pay a lawyer. John Bolch, *Do Your Own Divorce: A Practical Guide to Divorcing Without a Lawyer* (How To Books 2009).

⁴³⁶ *Nolo* (n 87).

⁴³⁷ *ibid.*

as the provision of legal services was reserved for lawyers.⁴³⁸ Eventually, Texan legislature amended the law to enable such self-help law books to be published without doubt that they are not flouting Texan laws on the provision of legal services.⁴³⁹ Large scale Internet accessibility in the 21st century has changed the medium in which legal services can be provided by both publishers and Legal Tech solution providers, although the principle on whether Legal Tech solution providers are flouting the laws on illegal advice remains largely the same. The increased accessibility that Legal Tech solution providers can offer to client-users via the Internet is much greater compared to hard copy publications, while the technological advancements such as AI allow them to provide quick and accurate solutions to client-users that use their platform. AI-powered chatbots for immigration visas,⁴⁴⁰ contract management software to manage their contract repositories,⁴⁴¹ software that compares and helps in negotiating contracts,⁴⁴² automated contract generators⁴⁴³ and the entire realm of online dispute resolution applications⁴⁴⁴ are all new innovative methods of provide specific legal services that are otherwise traditionally provided by lawyers.

Lawyers face competition from these Legal Tech solution providers in the following manner: the quality of the work (including but not limited to accuracy and quality of thought), the feedback response time, the price of the legal product and the transparency of the price itself. Several Legal Tech solution providers advertise the accuracy, efficiency and price of their legal product openly.⁴⁴⁵ As the EU E-Commerce Directive applies to Legal Tech solution providers who provide legal services or legal products via the Internet⁴⁴⁶ Legal Tech solution providers operating in the market are

⁴³⁸ *ibid.*

⁴³⁹ Texas Government Code (n 88).

⁴⁴⁰ Visabot (n 80).

⁴⁴¹ Contract Works <www.contractworks.com/> accessed 12 March 2019.

⁴⁴² LegalSifter <www.legalsifter.com/> accessed 12 March 2019.

⁴⁴³ PandaDoc <www.pandadoc.com/contract-generator/> accessed 12 March 2019.

⁴⁴⁴ A quick search on popular search engines such as Google reveal a few ODR lists available for the public to review and choose, depending on the nature of their claim, quantum and the jurisdiction where they wish to have the ODR held. See The National Center for Technology & Dispute Resolution, 'Provider List' <<http://odr.info/provider-list/>> accessed 2 June 2019; ODR Europe, 'ODR platforms & apps' <www.odreurope.com/odr-services/odr-platforms-apps> accessed 12 March 2019.

⁴⁴⁵ Singapore Legal Advice, 'WillMaker' (n 409).

⁴⁴⁶ A digital product also qualifies as a product under the EU Directive. European Commission, *DG Justice Guidance Document concerning Directive 2011/83/EU of the European Parliament and of the Council of 25 October 2011 on consumer rights, amending Council Directive 93/13/EEC and Directive*

expected to adhere to consumer protection standards such as price transparency,⁴⁴⁷ and proper and fair advertising of services provided.⁴⁴⁸ This is unlike law firms where it is rare to find law firms that publish their hourly rates on their websites, the actual scope of services they can provide or their response rate. In some EU member states, the advertising of legal services by lawyers in such a manner may run foul against legal ethics rules as well.

Unfair competition also exists in that Legal Tech solution providers need not adhere to legal ethics regulations unlike lawyers. This means less compliance costs as Legal Tech solution providers need not purchase software to ensure strict client confidentiality, build 'Chinese walls' to prevent conflicts of interests if there are two different teams represent clients on opposing ends,⁴⁴⁹ nor are they required to pay bar fees, purchase professional indemnity insurance, nor fulfill continuing legal education requirements. All these additional compliance measures by law firms inevitably increases their costs of operations, while on the other hand, Legal Tech solution providers can operate without having to account for these overheads, thereby enabling themselves to price their services more competitively.

Finally, the truth is as such – if one has a legal problem, does he or she seek a lawyer outright or go onto a search engine on the Internet for help? Even if one uses a search

1999/44/EC of the European Parliament and of the Council and repealing Council Directive 85/577/EEC and Directive 97/7/EC of the European Parliament and of the Council (June 2014)
<https://ec.europa.eu/info/sites/info/files/crd_guidance_en_0.pdf> accessed 12 March 2019.

⁴⁴⁷ The European Commission is well known to put pressure on companies to comply with EU consumer rules. One such case is that of Airbnb, where the European Commission in July 2018 urged Airbnb to comply with pricing transparency rules and to remove other unfair commercial practices. In a matter of two months, the European Commission released a statement stating that Airbnb has agreed to comply and has until the end of 2018 to make the necessary amendments to their e-commerce portal. See European Commission, 'EU Consumer rules: The European Commission and EU consumer authorities push Airbnb to comply' (European Commission 16 July 2018) <http://europa.eu/rapid/press-release_IP-18-4453_en.htm> accessed 2 June 2019; European Commission, 'EU consumer rules: Airbnb commits to complying with European Commission and EU consumer authorities' demands' (European Commission 20 September 2018) <http://europa.eu/rapid/press-release_IP-18-5809_en.htm> accessed 12 March 2019.

⁴⁴⁸ See European Commission, *DG Justice Guidance Document* (n 446).

⁴⁴⁹ A basic understanding of what is a Chinese wall and how it functions within a law firm or accountancy firm can be found here: see Thomson Reuters Practical Law, 'Chinese Walls: Maintaining client confidentiality' (Thomson Reuters Practical Law 1 November 1998) <[https://uk.practicallaw.thomsonreuters.com/Cosi/SignOn?comp=pluk&redirectTo=%2f3-100-8763%3f__lrTS%3d20181218001936411%26transitionType%3dDefault%26contextData%3d\(sc.Default\)%26firstPage%3dtrue](https://uk.practicallaw.thomsonreuters.com/Cosi/SignOn?comp=pluk&redirectTo=%2f3-100-8763%3f__lrTS%3d20181218001936411%26transitionType%3dDefault%26contextData%3d(sc.Default)%26firstPage%3dtrue)> accessed 20 July 2019.

engine such as Google to search for legal help, e.g. with the search terms “help company law Germany”, the reality is that none of the top few hits are a law firm – instead, most are self-help legal articles on the subject.⁴⁵⁰ Indeed, there is the argument that the information provided on such self-help articles is inaccurate, old or difficult to comprehend. Retaining a lawyer to solve such legal problems may, theoretically, be better as they are qualified and experts in that realm. However, over time, if Internet users are continuously primed to accept that self-help legal articles or Legal Tech solution providers that appear are the most relevant hits of popular search engines instead of law firms, there may be a shift in thinking towards first fixing a problem through Legal Tech or self-help methods, then seeking proper legal advice from a lawyer when self-help or Legal Tech does not work out. Lawyers are then on the second level of the service chain and are unlikely to get the first bite of the cherry, unlike before.

Considering the amount of time and money required for one person to become qualified as an attorney and the increased competition, is pursuing this route still of value considering that businesses and consumers have alternatives at a much lower cost? There is this possibility of a frightening reality: lawyers must now compete not only amongst themselves and Legal Tech solution providers to be more efficient in carrying out the same work (as seen in Chapter 5.II.A.1), but must simultaneously compete with Legal Tech solution providers for business in the same industry (as seen in Chapter 5.II.A.2).

B. Disruption on Legal Ethics

Clearly, while Legal Tech solution providers are required to adhere to EU and national laws on e-commerce transactions, data privacy and other related laws that a regular e-commerce business would otherwise have to comply with, the application of legal ethics to them is a separate matter. Apart from increased competition, one of the other impacts of Legal Tech is the disruptive effect it has on legal ethics. This largely stems from the application (or lack thereof) of legal ethics on Legal Tech solution providers.

⁴⁵⁰ Do Google search

The issues surrounding legal ethics and Legal Tech is better analyzed from two perspectives: (1) Legal Tech vis-à-vis lawyers; and (2) Legal Tech vis-à-vis client-users.

1. Legal Tech vis-à-vis lawyers

In general, lawyers are bound to uphold the legal ethics regulations and code of conduct in the member state that they practice in, whereas Legal Tech solution providers are not required to do so (although individual employees of Legal Tech solution providers who are lawyers may be personally required to do so under certain aspects of legal ethics).⁴⁵¹ The lack of application of legal ethics on Legal Tech solution providers raises several issues. One of the easiest issues to identify would no doubt be the reduced costs of operations due to non-requirement to comply with ethical guidelines, therefore resulting in perceived unfair competition vis-à-vis lawyers. However, there are other deep-seated issues that require further elaboration when it comes to legal ethics on Legal Tech solution providers; these are best discussed with specific legal ethics rules.

(i) *Client confidentiality*

A lawyer is required to maintain client confidentiality at all times – regardless of whether the clients are natural persons or legal entities such as companies, partnerships, foundations or trusts. This, however, is not required of Legal Tech solution providers. Legal Tech solution providers do not need to maintain client confidentiality unless they are required by contract to do so or are bound by the GDPR or the Directive 2016/943 on the protection of undisclosed know-how and business information (trade secrets) against their unlawful acquisition, use and disclosure

⁴⁵¹ In some member states, the need to maintain public decorum is part of the code of ethics. This is in the case of the UK Solicitors Handbook, where solicitors would not be acting in the principles of the Solicitors Regulation Authority if they used their “professional status or qualification to take advantage of another *person* in order to advance your personal interests”. Solicitors Regulatory Authority, *SRA Handbook* (n 163), IB(11.9). In other countries such as Singapore, lawyers have been struck off the roll of registers for acting dishonestly or for omitting material information in a personal transaction. See *Law Society of Singapore v Narayanan VKS* [1974] MLJ 146; *Wong Juan Swee v Law Society of Singapore* [1994] 3 SLR 846.

(“Trade Secrets Directive”).⁴⁵² For law firms that utilize Legal Tech solutions in their day-to-day work such as an AI-powered due diligence system or AI contract drafting software that need data in order to refine their learning processes, law firms must ensure that there are sufficient protections in their contract such as a non-disclosure agreement to ensure that the Legal Tech solution provider does not collect the data remotely for their training purposes. Two examples of client confidentiality and technology will be discussed below.

a. Cloud computing solutions

Cloud computing can be seen as a “type of technology that offers dramatic improvements in using shared resources at very low prices”.⁴⁵³ From the perspective of a law firm, such cloud computing services can be used to assist in a myriad of functions, e.g. for practice management, billing and time tracking, digital dictation, e-mail and encrypted messages, virtual law office, online back-up, collaboration and storage and electronic discovery.⁴⁵⁴ There are several commercial providers of cloud computing infrastructure and software, some of which are free for personal use and some of which can be tailored for commercial use. Popular cloud computing service providers include Amazon,⁴⁵⁵ Google,⁴⁵⁶ Dropbox⁴⁵⁷ and Microsoft.⁴⁵⁸ There exists other document management software with additional services such as meeting and calendar scheduling that operate on a cloud computing infrastructure, e.g. Trello.⁴⁵⁹

The use of these cloud computing software by lawyers is largely not a problem, save for the issue of client confidentiality. The terms of services (“TOS”) by these cloud computing software providers, in particular those of software providers that provide free cloud computing services, normally state that the software provider has the

⁴⁵² European Parliament and Council Directive (EU) 2016/943 of 8 June 2016, On the protection of undisclosed know-how and business information (trade secrets) against their unlawful acquisition, use and disclosure [2016] OJ L157 (Trade Secrets Directive).

⁴⁵³ Nicole Black, *Cloud Computing for Lawyers* (American Bar Association 2012) 3.

⁴⁵⁴ *ibid* 124-143.

⁴⁵⁵ Aws <<https://aws.amazon.com/>> accessed 2 June 2019.

⁴⁵⁶ Microsoft, ‘OneDrive’ <<https://onedrive.live.com/>> accessed 2 June 2019.

⁴⁵⁷ Dropbox <www.dropbox.com/> accessed 2 June 2019.

⁴⁵⁸ Google Cloud <<https://cloud.google.com/>> accessed 2 June 2019.

⁴⁵⁹ Trello <<https://trello.com/>> accessed 2 June 2019.

license to use, manage and reproduce the data uploaded by the user. The following are two sample clauses extracted from different cloud computing service providers that have a bearing on client confidentiality issues by a law firm:

Atlassian Cloud Terms of Service,⁴⁶⁰ which is adopted by Trello,⁴⁶¹ a cloud-based collaborative digital workspace:

“5.1. Using Your Data to provide Cloud Products to You. You retain all right, title and interest in and to Your Data in the form submitted to the Cloud Products. Subject to these Terms, and solely to the extent necessary to provide the Cloud Products to you, you grant us a worldwide, limited term license to access, use, process, copy, distribute, perform, export, and display Your Data. Solely to the extent that reformatting Your Data for display in a Cloud Product constitutes a modification or derivative work, the foregoing license also includes the right to make modifications and derivative works. We may also access your accounts, End User Accounts, and your Cloud Products with End User permission in order to respond to your support requests.”⁴⁶²

Dropbox,⁴⁶³ a cloud-based storage system:

“Others working for Dropbox. Dropbox uses certain trusted third parties (for example, providers of customer support and IT services) to help us provide, improve, protect, and promote our Services. These third parties will access your information only to perform tasks on our behalf in compliance with this Privacy Policy, and we'll remain responsible for their handling of your information per our instructions.”⁴⁶⁴

⁴⁶⁰ Atlassian, 'Atlassian Cloud Terms of Service' <www.atlassian.com/legal/cloud-terms-of-service> accessed 2 June 2019.

⁴⁶¹ Also, see Trello Help, 'Clouds Terms of Service – Summary of Changes' <<https://help.trello.com/article/1125-cloud-terms-of-service-summary-of-changes>> accessed 2 June 2019.

⁴⁶² Atlassian (n 460).

⁴⁶³ Dropbox (n 457).

⁴⁶⁴ Dropbox, 'Dropbox Terms of Service' <www.dropbox.com/terms2016> accessed 2 June 2019.

However, for instance in the case of Dropbox, users that subscribe to Dropbox Business may be subject to different terms and conditions from the standard privacy terms and conditions.⁴⁶⁵ This therefore provides lawyers with the chance to negotiate with Dropbox on applicable privacy and data use terms that will ensure that these lawyers will not flout client confidentiality rules. Nonetheless, standard TOS pose a huge challenge to lawyers that need to comply with ethical rules on client confidentiality. If a third-party cloud computing software provider has the license to use and reproduce the data uploaded by a lawyer, this is a prima facie breach of client confidentiality obligations as such client information will no longer remain confidentiality once it is uploaded into the cloud computing software. However, cloud computing is an efficient way of sharing and accessing information across multiple platforms (i.e. desktop computers, laptops, tablets and mobile phones) and across multiple jurisdictions by lawyers that may be traveling and working simultaneously. Not being able to use cloud computing software would be no doubt a huge disadvantage for law firms and their fee earners.

In light of these client confidentiality obligations, certain cloud computing software providers have provided a smart solution for lawyers by obtaining data security certificates, so that lawyers using cloud computing software developed by specific vendors would not be in breach of their ethical obligations to their clients. One such cloud computing software provider is MANZ Verlag. MANZ Verlag is a publisher of law books⁴⁶⁶ and ventured into the cloud computing space by providing cloud computing solutions that are specifically designed for lawyers.⁴⁶⁷ While this product is nothing novel and may or may not be the most popular cloud computing software provider in the market, by specifically catering to the legal market and marketing their data-compliant systems, MANZ Verlag has arguably gained a foothold in the provision of cloud computing services to the legal industry and has tailored such cloud computing services accordingly.

⁴⁶⁵ Dropbox, 'Privacy Policy' <www.dropbox.com/privacy> accessed 6 June 2019.

⁴⁶⁶ MANZ, 'Über MANZ' <www.manz.at/wir_ueber_uns/manz_verlag/verlag.html> accessed 2 June 2019.

⁴⁶⁷ MANZ Cloud <<https://cloud.manz.at/index.html>> accessed 2 June 2019.

As with the adoption of other types of legal technologies by law firms, the adoption of cloud computing software favors economies of scale. A large law firm has greater bargaining power when negotiating with large cloud computing service providers on the TOS and may be able to amend standard TOS in a manner that would allow big firms to use cloud computing software without fear of breaching their ethical obligations. However, in the case of small firms, such bargaining power is much weaker and may therefore feel pressured to use free cloud computing services to keep overheads at a minimum. Law firms may also be unaware when reading the TOS of such software providers – regardless of whether it is (or is not) common practice for a user of software to read through the TOS or terms of use or negotiate the TOS with a software provider especially if the user of the software is a small firm, it would not be very convincing for a lawyer to plead that he or she has not read said contract before a disciplinary tribunal for breach of ethical obligations due to adoption of software that permits third-parties from using, accessing and reproducing the uploaded data.

Lawyers must therefore be wary of their client confidential obligations when adopting cloud computing solutions or legal tech software that permits the use, access and reproduction of data by third parties regardless of the reason for such use, access and reproduction. While bar associations in other non-EU member state jurisdictions may have issued practice notes on such matters,⁴⁶⁸ some of these guidance notes may be of limited use as they only address what are the ethical concerns that a lawyer must look out for when deciding which cloud computing software to use but does not tell lawyers exactly which software lawyers can use if they do not wish to breach their ethical obligations.⁴⁶⁹ This is understandably a neutral position as the bar association would not be recommending any specific software provider; however, for smaller law firms that are technologically inclined, are hoping to make their first foray into

⁴⁶⁸ In Singapore, the Law Society of Singapore has issued a practice guidance note on the use of cloud computing by lawyers. See The Law Society of Singapore, *Guidance Note 3.4.1 Cloud Computing*

<www.lawsociety.org.sg/DesktopModules/Bring2mind/DMX/Download.aspx?Command=Core_Download&EntryId=3255&language=en-SG&PortalId=0&TabId=787> accessed 2 June 2019.

⁴⁶⁹ In the practice guidance note above, it reiterates that the law society “does not endorse or prohibit you from using any particular service or provider”; see *ibid*, para 11. It does have an Annex A which provides an “Overview of Cloud Service and Deployment Models”, although no specific cloud providers are listed; see *ibid*, Annex A.

upgrading their firms' technology infrastructure and need help on which service provider to use, more guidance on such topics may be of assistance to these firms.

b. Co-working spaces

Co-working spaces refers to the use of such spaces or working environments “by people who are self-employed or working for different employers, typically so as to share equipment, ideas, and knowledge”.⁴⁷⁰ Much of these shared facilities include physical infrastructure such as meeting rooms, concierges, secretaries, working stations, and also includes digital infrastructure such as wireless Internet, printers, cleaning services, amongst others.⁴⁷¹ While the concept of co-working spaces is technically not a Legal Tech solution, it would be apt to discuss this in the context of Legal Tech as lawyers gravitate towards reducing operational costs by sharing technological infrastructure in the context of a co-working space.

The beauty and bane of co-working spaces in the context of a law firm is that while it may help to reduce overhead costs in terms of rent and hiring of assistants such as secretaries, unfortunately, many of such co-working spaces are not designed for lawyers who have ethical codes to uphold. Client confidentiality in a co-working space is a huge problem in both physical and digital spaces of a co-working setup. First, with a shared workstation and meeting facilities, lawyers run a risk of privacy and confidentiality obligations being breached if they are negligent and leave their laptops unlocked, thereby allowing third parties to peek at their work, or if they hold meetings at shared facilities and inadvertently allow third-parties to eavesdrop on their meetings.

In the digital space, lawyers may face difficulties when using shared printers as their confidential data may remain in the printer's software even after the document has been printed. Such confidential information or data may be accessible by third parties

⁴⁷⁰ Oxford Dictionaries, 'Co-working' <<https://en.oxforddictionaries.com/definition/co-working>> accessed 2 June 2019.

⁴⁷¹ For instance, WeWork (a co-working space provider) has amenities such as “super-fast internet”, “printing nooks”, “unique common areas”, “stored kitchens”, “onsite staff”, “phone booths” and even “cleaning services” that users of WeWork can benefit from. WeWork, 'Business services and then some' <www.wework.com/benefits> accessed 2 June 2019.

managing the co-working space's IT infrastructure and therefore lawyers will be in breach of client confidentiality obligations. The idea of co-working spaces for lawyers is not novel and has been discussed in non-EU member states such as Singapore.⁴⁷² Yet, if lawyers decide to use a co-working space as their offices, it is important for lawyers to note that they may be in breach of ethical rules by virtue of the use of the facilities of such co-working spaces and should therefore properly consider renting such spaces before doing so.

Ultimately, regardless of whatever legal technology infrastructure or software a law firm chooses to adopt, if there is a breach in the Legal Tech solution providers' systems and confidential information is stolen, the law firm who supplied the information to the Legal Tech solution provider remains liable under legal ethics for the lack of adequate care of such sensitive information. The law firm may also be liable under the GDPR for such a breach, which may result in gross penalties amounting to "up to 20 000 000 EUR, or in the case of an undertaking, up to 4% of the total worldwide annual turnover of the preceding financial year, whichever is higher".⁴⁷³ In the former case, while the law firm can sue the Legal Tech solution provider for breach of contract for failing to keep such information secure and confidential, most of the damage is however inflicted upon and unfortunately absorbed by the law firm: the wrath of clients, the potential (and most likely) complaint to the bar association, investigation by the bar, with subsequent reputational and financial losses and in egregious cases, suspension of the right to practice as a lawyer or disbarment.

(ii) *Conflict of interests*

A bigger problem that surrounds the collection and use of data by clients is the possibility of conflict of interests, which does not apply to a Legal Tech solution provider. Two law firms may represent clients on opposing sides of the same transaction but may also use the same due diligence software when preparing their

⁴⁷² Singapore Academy of Law, 'SAL To Launch First-Of-Its-Kind Co-Working Space' (Medium 12 March 2019) <<https://medium.com/@singaporeacademyoflaw/sal-to-launch-first-of-its-kind-co-working-space-5a8ae1292e8f>> accessed 2 June 2019.

⁴⁷³ General Data Protection Regulation (n 110), art 83(5).

due diligence report to the clients. Legal Tech solution providers are not bound to legal ethics rules and are therefore not required to adhere to potential conflicts of interests. This results in the situation where a Legal Tech solution provider may be privy to all the information on *both* sides of the transaction or litigation suit, especially if their contract permits them to collect data (unspecified or specified) for the purposes of “training” or “improving” their software.

Indeed, there is the possibility of pseudonymizing the data or anonymizing the data before they are given to the Legal Tech solution provider to train the software. In theory, this can work because the moment the clients’ information is anonymized, there is unlikely to be a breach of client confidentiality nor will there be a conflict because the Legal Tech solution provider is unable to ascertain the contracting parties whose data it is using to train. However, anonymizing or pseudonymizing client information is not fool-proof, and law firms may breach their confidentiality rules by accident. For instance, if there are only two New Zealand citizens living in Slovenia at any given point in time, and the New Zealand citizen has sought legal advice on the acquisition of real estate by a foreigner, the chance of a Legal Tech company finding out the actual person who has sought legal advice after receiving anonymized data along the lines of “New Zealand citizen, bought a 5 million EUR property in Ljubljana” is in practice relatively high.

The truth, however, is that there are many other software vendors that continuously collect data in order to improve their products – should there then be a distinction between collection of data by software vendors that provide a generic range of services and software vendors that are Legal Tech solution providers? In both cases, neither are required to adhere to rules on client conflicts nor is there any proof or suggestion that a Legal Tech solution provider is more likely to suffer from client conflicts issues. This is a difficult area to regulate as there are several layers of questions to ask: (1) whether software providers that service law firms or lawyers should adhere to client conflict rules if their software happens to collect data from law firms; and (2) how does one distinguish when does legal ethic rules apply to software vendors? It should be noted that at the present moment, there are hardly any if not no cases where a client had sued a law firm for conflicts issues because a client discovered that the opponent’s law firm had used a similar software and the developer

of that similar software had provided legal reports or opinions for both law firms. Although, if the stakes are high enough, there is nothing stopping an unreasonable client from mounting such a claim against his lawyer.

(iii) *Best interests of the client*

A lawyer owes a duty to act in the best interests of his or her client. However, there is hardly any guidance on which technologies must be used by a lawyer, save for the general legal ethical guideline that a lawyer must act in the best interests of the client and must work diligently in doing so. In Ontario, Canada, a judge wrote that “if artificial intelligence sources were employed, no doubt counsel’s preparation time would have been significantly reduced”⁴⁷⁴ – as a result, the counsel had his fees capped as the judge stated that the fee billed for legal research was “problematic”.⁴⁷⁵ This opens a Pandora’s box in the field of legal ethics as what will be deemed as having acted in the best interest of a client may now be pegged to either specific technologies or specific software. It should be highlighted that academics such as Fina and Ng have noted that for Legal Tech such as big data analytics in litigation suits, this appears to be “more of a complementary perk to the client rather than compulsory obligation”.⁴⁷⁶

In summary, lawyers in the aforementioned situations bear the brunt of the burden if Legal Tech does not follow legal ethics or causes the lawyer to breach legal ethics rules. It is therefore their prerogative to ensure that they are safeguarded via contract in the event of any foreseeable incidents happening.

2. Legal Tech vis-à-vis client-users

The lack of application of legal ethics on Legal Tech solution providers has a greater impact insofar where client-users are concerned. The same issues plaguing the earlier section on Legal Tech solution providers and lawyers are similar to client-users, although the impact is more pronounced and different. Legal Tech solution providers

⁴⁷⁴ *Cass v. 1410088 Ontario Inc.* (2018) Ontario Supreme Court 6959, para 34.

⁴⁷⁵ *ibid*, para 32.

⁴⁷⁶ Fina and Ng (n 37) 12-13.

that provide a direct legal service or product to client-users are not obliged to adhere to client confidentiality rules (save for GDPR and the Trade Secrets Directive), client conflicts, advertising rules, nor any other legal ethics rules that are otherwise required to be adhered to by lawyers.

(i) *Legal professional privilege*

Legal professional privilege refers to the protection granted to certain categories of client documents received or prepared by the lawyer from being disclosed to the court⁴⁷⁷ or in several cases in the EU, to officers from the EU Commission conducting anti-competition raids.⁴⁷⁸ This privilege is said to be a fundamental human right enshrined in the EU charter⁴⁷⁹ and has also been enacted as a procedural rule in certain EU member states, e.g. in the UK, where legal professional privilege consists of legal advice privilege and litigation privilege, and once legal professional privilege is established, disclosure of the documents cannot be ordered.⁴⁸⁰ The scope of the legal professional privilege – in terms of when it applies and to whom does it extend to – is normally a matter of contention. This can be seen in the case of *Akzo Nobel Chemical Ltd and Akcros Chemical Ltd v European Commission*,⁴⁸¹ where the ECJ had to decide whether the legal professional privilege applied to communications between a company and an in-house lawyer. The ECJ held that despite an in-house lawyer being “enrolled with a Bar or Law Society and that he is subject to a certain number of professional ethical obligations, an in-house lawyer does not enjoy a level of professional independence equal to that of external lawyers”⁴⁸² and therefore, in-house lawyers do not enjoy such a privilege.

⁴⁷⁷ For a general idea on legal professional privilege, see Jonathan Auburn, *Legal Professional Privilege: Law and Theory* (Hart Publishing 2000).

⁴⁷⁸ See Eric Gippini-Fournier, ‘Legal Professional Privilege in Competition Proceedings Before the European Commission: Beyond the Cursory Glance’ (2004-2005) 28 *Fordham International Law Journal* 967.

⁴⁷⁹ F Enrique Gonzalez-Diaz and Paul Stuart, ‘Legal professional privilege under EU law: current issues’ 56 <http://awa2018.concurrences.com/IMG/pdf/12._f.e._gonzalez-diaz_and_p._stuart_-_legal_professional_privilege_under_eu_law.pdf> accessed 20 July 2019.

⁴⁸⁰ Herring (n 12) 156-174.

⁴⁸¹ C-550/07 *Akzo Nobel Chemical Ltd and Akcros Chemical Ltd v European Commission*.

⁴⁸² *ibid*, para 56.

Considering the scope of application of the legal professional privilege in the EU, if a client provides his or her confidential information to a Legal Tech solution provider that renders either legal advice or litigation advice, such information provided is unlikely to be protected by any form of legal professional privilege as Legal Tech solution providers do not enjoy such a privilege. It is unlikely that the ECJ will extend this privilege to Legal Tech solution providers as well, considering that they did not extend it to in-house lawyers and would arguably want to only extend this privilege to external lawyers that “enjoy a level of professional independence”.⁴⁸³ In this regard, clients who are unaware of their right to legal professional privilege and subsequently struggle to prevent the court or an authority from compelling the Legal Tech solution provider from providing such information will be at a disadvantage as compared to seeking a lawyer for legal advice. Furthermore, most of such Legal Tech solution providers would have provided in their EULAs or TOS that they will be permitted by contract to disclose user information or data to comply with relevant laws. This then renders client-users using such Legal Tech solution providers at a handicap if they are unable to rely on legal professional privilege when the dire need to do so arises.

(ii) *Conflict of interests*

Where conflicts are concerned, these do not apply to Legal Tech solution providers that provide direct legal services and products to clients, and therefore clients cannot prevent Legal Tech solution providers from helping their opponent unless they are contractually prevented from doing so. The end result is that opposing parties in a transaction can use the same “contract clause checker” application,⁴⁸⁴ where said application is not prohibited on advising both parties whether their contracts adequately protect their rights. The practical effect of this situation is that the Legal Tech solution provider – regardless of their knowledge or not – is doing what would otherwise be barred if parties sought legal representation from lawyers. The purpose of preventing conflicts is to ensure that the lawyer can fully and properly fulfill their duties to their client; if the Legal Tech solution provider is entitled to work for opposing

⁴⁸³ *ibid.*

⁴⁸⁴ Analyze Law, ‘Contract Analysis’ <www.analyzeLaw.com/why-contract-analyzer/> accessed 4 June 2019.

client-users on the same transaction, then it is doubtful whether a client-user's interest is best protected if they use Legal Tech. This however is very much dependent on the type of Legal Tech solution that is used.

(iii) *Client confidentiality*

As for client confidentiality, it is well regarded that client confidentiality is an important duty that lawyers must continuously uphold, even if they move to a competing law firm. This is to ensure proper representation of the client by preventing lawyers from acting against their clients' interests by divulging client secrets, legal strategies or other sensitive information that would otherwise be highly sought after by opposing parties. This is however not required of by Legal Tech solution providers that service client-users, i.e. they need not necessarily keep or maintain your information or keep your litigation strategy under the lid. This also means that they are able to review your information, and if you consented (unknowingly through clicking through one of the lengthy EULAs, sell your information to third parties for processing, unless such information is protected either by the GDPR or the Trade Secrets Directive⁴⁸⁵ which aims to protect against disclosure of commercial information.

With regard to commercial information, the Trade Secrets Directive⁴⁸⁶ guards against breaches in confidentiality of business secrets and business information. The Trade Secrets Directive defines what is a trade secret, i.e. information that is "not (...) readily accessible to persons within the circles that normally deal with the kind of information in question",⁴⁸⁷ "has commercial value because it is secret"⁴⁸⁸ and "has been subject to reasonable steps under the circumstances (...) to keep it secret".⁴⁸⁹ A trade secret has been unlawfully used or disclosed if the person who used or disclosed it "acquired

⁴⁸⁵ European Commission, 'Who does the data protection law apply to?' <https://ec.europa.eu/info/law/law-topic/data-protection/reform/rules-business-and-organisations/application-regulation/who-does-data-protection-law-apply_en> accessed 11 March 2019.

⁴⁸⁶ Trade Secrets Directive (n 452).

⁴⁸⁷ *ibid*, art 2(1)(a).

⁴⁸⁸ *ibid*, art 2(1)(b).

⁴⁸⁹ *ibid*, art 2(1)l.

the trade secret unlawfully”,⁴⁹⁰ was “in breach of a confidentiality agreement or any other duty not to disclose the trade secret”,⁴⁹¹ or is “in breach of a contractual or any other duty to limit the use of the trade secret”.⁴⁹² EU member states are expected to comply with the Trade Secrets Directive by 9 June 2018. Therefore, at the time of this writing, all EU member states are expected to have transposed the Trade Secrets Directive into their national legislation.

Personal information and commercially sensitive information are therefore protected by the GDPR and the Trade Secrets Directive respectively, and law firms are also expected to comply to these regulations. However, this still means that client-users of Legal Tech solution providers are still less protected than law firms because Legal Tech solution providers are not subject to the jurisdiction of the bar association involved in ensuring compliance to client confidentiality rules. Legal Tech solution providers may attempt to contract out of their obligations under law via contract and through an EULA; even if the EULA is illegal, a client-user is required to take up civil procedure (which normally means having to hire a lawyer) that can be a costly process in terms of finances and time. In the case of a lawyer, a client of the law firm only needs to make a complaint to the law society or bar association that the lawyer is part of and the complaint will be investigated. Arguably, because of the ease of being investigated with a complaint – which does not help a lawyer’s reputation – there is then a greater desire to ensure compliance with client confidentiality in all matters. The use of a Legal Tech solution provider may thus leave clients with lesser consumer protection than if they were to engage a law firm.

(iv) *Legal fees*

One other aspect that law firms and not Legal Tech companies are constrained by is the fair charging of legal fees. Legal ethics normally provides for rules governing the charging of fees, including but not limited to how much they are permitted to charge,⁴⁹³

⁴⁹⁰ *ibid*, art 4(3)(a).

⁴⁹¹ *ibid*, art 4(3)(b).

⁴⁹² *ibid*, art 4(3)(c).

⁴⁹³ Herring (n 12) 204.

when are they permitted to charge (e.g. contingency fees, speculative fees, or hourly fees)⁴⁹⁴ and the maintenance of proper accounts to ensure that client funds are not mixed with the firm's funds.⁴⁹⁵ Clients who feel that their lawyers are overcharging can lodge a complaint against the lawyer via the bar association, whereby an investigation against the lawyer may be opened.

However, Legal Tech solution providers are not subject to such scrutiny in the charging of fees, although practically at this point in time, most Legal Tech solution providers are pricing their services below that of law firms.⁴⁹⁶ This is essentially a moot or theoretical topic until Legal Tech solution providers gain traction and have a dominant share of the legal industry – at that stage, Legal Tech solution providers can price their legal products at whichever price they feel best and perhaps even more than lawyers if they have a sufficient user base. Nonetheless, they remain liable to consumer protection laws with regard to gross overcharging; otherwise, they are generally not required to justify nor account to client-users on their charging methodology. In the long run, this may be a detriment to society if Legal Tech solution providers abuse their market power or dominance and there are no overarching legal ethics governing their charging of legal services.⁴⁹⁷ This may then be a potential antitrust or competition case.

(v) *Liability*

Furthermore, as what Fina, Ng and Vogl have pointed out in their article, Legal Tech solution providers such as DIY legal service providers need not purchase professional indemnity insurance, unlike lawyers.⁴⁹⁸ Therefore, if there is any negligent or intentionally wrong advice provided by the Legal Tech solution provider, the only recourse that a client-user has is through civil litigation pursuant to the EULA, which

⁴⁹⁴ *ibid.*

⁴⁹⁵ *ibid* 225.

⁴⁹⁶ WillMaker in Singapore provides wills at a flat fee of SGD \$89, which is approximately EUR 58. Such prices are almost impossible to achieve at law firms that bill at an hourly rate. Singapore Legal Advice, 'WillMaker' (n 409).

⁴⁹⁷ One should bear in mind that one of the main purposes of having regulated legal fees is to ensure proper access to justice. See Chapter 5.II.B.2.(iv).

⁴⁹⁸ Fina, Ng and Vogl (n 38) 248.

can first, be costly in terms of time and money; second, be already otherwise contractually prevented for by virtue of the EULA; and finally, a client-user may not receive any compensation because the Legal Tech company may have insufficient funds to pay out and are limited in liability.

Otherwise, in the case of a lawyer, client-users can make a complaint against the lawyer and sue the lawyer for negligent advice and in a successful suit, the client-user will be paid out through the insurance company as lawyers are protected by professional indemnity insurance. In this case, the protection of a client-user is stronger if they were to hire a lawyer to represent them as compared to a Legal Tech solution provider, although a cost-conscious client-user may just opt for the latter in search of a faster and cheaper solution. The end result is that while there are cheaper legal services available, the public interest in ensuring good quality legal services is unfortunately not necessarily maintained.

Earlier in Chapter 3.II.C, it was noted that the EU Commission is intending to release a guideline on the Product Liability Directive,⁴⁹⁹ where such a guideline may potentially extend the scope of what is covered under the Product Liability Directive to AI-based software or even software. However, at present, the scope of the “updated” Product Liability Directive is unknown and remains debatable at the moment. If this “updated” Product Liability Directive is indeed enacted and enforced by the EU Commission, then in the context of Legal Tech, this also means that there is a likelihood that Legal Tech solution providers that produce AI applications would be subject to one additional avenue of potential liability as compared to law firms or Legal Tech solution providers that produce non-AI based applications.

Presently, under the Product Liability Directive, Article 1 states that “the producer shall be liable for damage caused by a defect in his product”.⁵⁰⁰ Assuming that the “updated” Product Liability Directive will extend the definition of “product” to that of software, from the perspective of the provision of legal services, a defective product can then be

⁴⁹⁹ European Commission, ‘Artificial Intelligence’ (n 217).

⁵⁰⁰ Product Liability Directive (n 223), art 1.

interpreted to mean that the product generates legal advice that is incorrect. As for determining damages, reference can be made to existing legal malpractice and negligence suits, i.e. how much damages will a client receive if he or she sues his lawyer for malpractice on the specific case. However, since the Product Liability Directive does not extend to software or AI at present and it is rather uncertain how the Product Liability Directive will extend to AI applications or software, this debate is rendered moot. When guidelines and further clarification on the Product Liability Directive are released, this topic would be a good subject for further academic debate.

(vi) *Client funds*

Under certain situations, lawyers may be permitted to hold on to client funds as part of the course of their legal advisory work and there are ethical rules and guidelines for lawyers on how such client funds should be held. Herring has also suggested that “a major source of solicitor’s malpractice has been inappropriate dealings with money held by lawyers on behalf of clients,”⁵⁰¹ with the main objective as preventing “solicitors from acting fraudulently or improperly profiting from their clients’ money”.⁵⁰² Therefore, ethical rules on the holding of client funds are normally designed to not just prevent wrongdoing but also ensure transparency in the holding of the funds,⁵⁰³ so as to ensure that “there can be no perception of wrongdoing”.⁵⁰⁴ These rules may, for instance, prescribe that lawyers must prevent the comingling of funds between clients and the firm.⁵⁰⁵

These ethical rules and guidelines with regard to the retention of a client’s, or in this case, a user’s funds, do not apply to Legal Tech solution providers. Therefore, there is no requirement unless expressly provided for in law to prevent the mixing of client funds with the company’s funds. Furthermore, there is no specific need for Legal Tech solution providers to be transparent in their dealings with the client’s money. One case

⁵⁰¹ Herring (n 12) 225.

⁵⁰² *ibid.*

⁵⁰³ *ibid.*

⁵⁰⁴ *ibid.*

⁵⁰⁵ Solicitors Regulatory Authority, *SRA Handbook* (n 163), Rule 50A: Client money.

where a Legal Tech solution provider may be charged with holding a client's money under escrow could be that of a Legal Tech solution provider that represents a purchaser in the acquisition of a property in a smart contract,⁵⁰⁶ i.e. when certain conditions are fulfilled, the contract will automatically execute and title and money to the property will automatically pass. Under the smart contract, payment is tagged to the Legal Tech solution provider's bank account and thus automatic deduction will take place from this bank account. The purchaser may transfer the entire sum to the Legal Tech solution provider who will ensure that the automatic deduction is carried out from its bank account. However, there is no ethical rule preventing the Legal Tech solution provider from comingling the funds or treating the funds in the same care and manner as a lawyer.

C. Regulations on the Mobility of Lawyers

Since Legal Tech can be accessed anywhere and everywhere, lawyers cannot compete with Legal Tech insofar as accessibility is concerned, for example, a New York admitted lawyer may face difficulty practicing in California and may be required to take additional exams before being allowed to practice;⁵⁰⁷ however a legal tech company can easily provide legal advice to both states without having to undergo any specific certification program. This is similar to the EU – while there is greater harmonization on the free movement of lawyers (through the basic pillar of free movement of labor), this process is not seamless – there are still outstanding issues which have been highlighted in the European Commission's Study, "Evaluation of the Legal Framework for the Free Movement of Lawyers",⁵⁰⁸ such as "continuing

⁵⁰⁶ The idea of using smart contracts for real estate transactions is not novel. See CrowdfundUP, 'Smart Contracts for Real Estate Transactions' (CrowdfundUP 22 May 2018) <<https://crowdfundup.com/blog/109/smart-contracts-and-real-estate-transactions>> accessed 4 June 2019.

⁵⁰⁷ A New York lawyer seeking admission in California would be required to take the California Bar Exam. See The State Bar of California, 'Attorney Applicants' <www.calbar.ca.gov/Admissions/Requirements/Attorney-Applicants> accessed 18 March 2019.

⁵⁰⁸ SJFJ Claessens and others, *Evaluation of the Legal Framework for the Free Movement of Lawyers* (28 November 2012).

requirements of the Bar in the home state”⁵⁰⁹ and “professional indemnity insurance”.⁵¹⁰

In Fina, Ng and Vogl’s article, the authors described how the cross-border transcending ability of Legal Tech casts a spotlight on the lack of mobility of lawyers within the EU. Crucially, the authors highlighted the problem surrounding cross-border DIY Legal Tech solution providers by stating that:

“The beauty and bane of legal tech is its ability to cross borders: a UK-based legal tech startup offering DIY legal services, such as an online dispute resolution platform, can be accessed by French or German consumers that trust a UK platform to handle mediation on their behalf. A Finnish contract drafting or proofreading company can also offer its contract drafting services to Swedish or Spanish consumers, who may in turn be concluding a contract under English law. What in one EU member state might be defined as a regulated DIY legal service might be an unregulated DIY legal service in another EU member state; Legal service providers can create and provide DIY legal services in a member state that permits such platforms in another member state that would otherwise ban such platforms due to the Internet’s transcendent properties.”⁵¹¹

This thesis agrees with the observations of the authors, and this aspect is of important consideration when deliberating whether and how Legal Tech should be regulated.

III. CHAPTER SUMMARY

In conclusion, while Legal Tech has certainly affected the legal industry to a degree where there is the possibility of unfair competition between lawyers and Legal Tech solution providers and also the possibility of the lack of adequate consumer protection

⁵⁰⁹ *ibid* 152.

⁵¹⁰ *ibid*.

⁵¹¹ Fina, Ng and Vogl (n 38) 249.

to users of Legal Tech solution providers, there is no regulation on Legal Tech solution providers save for generic laws such as e-commerce or unfair contract terms directives. Legal Tech has disrupted the legal profession in two manners: lawyers are now subject to pressure from being replaced at work and operating in the market of the provision of legal services. It is with these issues that the next chapter will discuss the trajectory of the legal profession considering these multiple issues that are currently not being attended to.

Chapter 6: The Future of the Legal Profession in Light of Legal Technology and Current Regulations

I. INTRODUCTION

Considering recent trends, such as the growth of legal tech, an increasing focus on legal technology by governments, international organizations and businesses (e.g. EU's ODR platform,⁵¹² UK's online small claims court,⁵¹³ the Netherland's Rechtwijzer 2.0⁵¹⁴), client-users will become acquainted with the idea of legal technologies being able to attend to and solve their legal needs and the comfortable use of it sooner than later. Technology and its use thereof have always been essential to man; it is one of the reasons for the progress and growth of civilization. On this same thread, technology should be embraced and not ignored, and it should be harnessed to bring greater benefits to mankind. Yet, at the same time, it should be regulated to prevent abuse or erosion of policy goals.

The issues relating to the regulation of the legal profession and legal technology has already been discussed in the previous sections. The legal industry is one that has existed for many generations and even as Legal Tech is spoken in the media as the replacement for lawyers,⁵¹⁵ the legal industry continues to implement the necessary regulations to ensure fair competition, protection of consumers, meeting the original

⁵¹² European Commission, 'Online Dispute Resolution' <<https://ec.europa.eu/consumers/odr/main/index.cfm?event=main.home2.show&lng=EN>> accessed 11 March 2019.

⁵¹³ HM Courts & Tribunals Service (n 44).

⁵¹⁴ Rechtwijzer was a popular media topic when it first entered the spotlight several years ago, although it was dissolved by 2019 reportedly due to commercial reasons. See Dan Bindman, 'Pioneering ODR platform to rein in ambitions after commercial setback' (Legal Futures 3 April 2017) <www.legalfutures.co.uk/latest-news/pioneering-odr-platform-to-rein-in-ambitions-after-commercial-setback> accessed 11 March 2019.

⁵¹⁵ Mangan (n 434).

social goals that it set out to achieve through traditional regulation of the legal industry, and thereby ensuring its existence in the legal industry.

This chapter does not intend to rehash what has been said in the last few chapters about the regulation of the legal industry; instead, it seeks to point out the current trends that result from the impact of Legal Tech on the legal profession and the possible scenarios that will occur if existing regulations on the legal profession continue to remain without substantial modifications. This chapter then seeks to contemplate what the future of the legal industry will be in the near future and in the longer term. In addition, this chapter seeks to explore what other stakeholders – in particular providers of legal education – can do to allow for a thriving and innovative legal industry that meets social and commercial objectives. By focusing the discussion on current trends, problems and challenges that the legal profession will face due to these trends, this chapter hopes to allow readers to understand the importance and need for reforms in the regulation of the legal profession, which is important as the subsequent chapters discuss how to prevent the potential problems arising from the delineated trends below.

II. THE FUTURE OF LEGAL TECH AND THE LEGAL PROFESSION

In the past three years, even if Legal Tech has not captured the hearts of law firms, it has definitely gained traction as a popular topic for discussion at conferences and as firm updates. Authors such as Richard Susskind have highlighted how “new ways of delivering legal services will emerge”,⁵¹⁶ while CodeX’s legal technology list continues to curate more Legal Tech companies to add to its list.⁵¹⁷ After conducting a study on the legal industry on a whole, this is the future of law as envisioned by the author of this thesis if nothing is done on the part of regulatory authorities or bar associations.

⁵¹⁶ Susskind, *Tomorrow's Lawyers* (n 3) 3.

⁵¹⁷ Stanford Law School, ‘CodeX Techindex’ (n 103).

A. Evolution of the Business of Law

There are many theories and postulations about the future of law firms and the business of law. In a report that has been mentioned several times in this thesis, the BCG-Bucerus Report indicated at Exhibit 5 how big law's business model will shift towards a traditional pyramid structure to a rocket structure + nonlawyer.⁵¹⁸ Other reports and news have also highlighted how the Big Four accounting firms, i.e. PwC, Ernst & Young, KPMG and Deloitte have set up legal consultancy firms where they are permitted by law to operate.⁵¹⁹ This is very much true in some EU member states such as Hungary, where KPMG Legal has been actively providing legal services⁵²⁰ and even promoting legal technology as it was the co-organizer for Hungary's regional rounds for the Global Legal Hackathon.⁵²¹ Meanwhile in Asia, big law firms have branched out to incorporate a legal technology arm that focuses on the research, development and perhaps eventual sale of Legal Tech services.⁵²²

Throughout the research and writing of this thesis, much ground was covered on the regulation of the legal profession and Legal Tech. The BCG-Bucerus Report mainly covers how big law firms operate; however, there is an entire ecosystem of mid-sized to small or sole proprietor law firms in each EU member state. How these law firms will continue to compete and provide legal services in a climate that is being increasingly dominated with by accounting firms, consultancies or Legal Tech solution providers is something that should be discussed as well. Therefore, this thesis will discuss overarching general trends that affects the entire legal industry rather than focusing on only big law firms. These are the following trends that is predicted where the business of law is concerned: (1) de-monopolization of legal services; and (2) specialization of legal services by different legal services providers.

⁵¹⁸ Veith and others (n 24) 10.

⁵¹⁹ Jonathan Derbyshire, 'Big Four circle the legal profession' (Financial Times 15 November 2018) <www.ft.com/content/9b1fdab2-cd3c-11e8-8d0b-a6539b949662> accessed 11 March 2019.

⁵²⁰ KPMG, 'Legal Services' <<https://home.kpmg/hu/en/home/services/tax/legal-services.html>> accessed 11 March 2019.

⁵²¹ Wolters Kluwer, 'Global Legal Hackathon 2019' <<https://hackathon.wolterskluwer.hu/>> accessed 11 March 2019.

⁵²² Rajah & Tann Technologies <www.rttechlaw.com/> accessed 11 March 2019.

1. De-monopolization of legal services

The number of players actively entering the market and the lack of direction on who is permitted to provide legal services also means that there will be a general shift towards the de-monopolization of legal services. This also means that the pricing mechanism of law firms has to change as they no longer hold the monopoly in the determining of legal fees. Many law firms still employ the hourly billing rate pricing system; however, there has been a gradual move towards a fixed fee mandate pricing system as competition of the pricing of legal services becomes more transparent to client-users. Law firms should also expect their clients to have done their market research on the fee that they would pay if they consulted a Legal Tech solution provider and the fee that other competing law firms are willing to charge. Clients will become more discerning and demanding and are more likely to move to other solutions if law firms are unable to price competitively.

As for Legal Tech solution providers and other players in the legal industry, they will most likely grow in activity and market share as client-users become more aware of the value and efficiency that they can provide. If regulation does not regulate their activities, sooner or later, it would be unsurprising to see the market consolidate and have a few large Legal Tech solution providers that will slowly grow from a specialist problem solver (e.g. a Legal Tech solution provider that provides will drafting services) to a full service Legal Tech company, where it provides all forms of legal services in different areas of law. This can be seen in the US where large Legal Tech solution providers such as Rocket Lawyer⁵²³ and LegalZoom.com⁵²⁴ provide not only affordable legal advice through their platforms but also free contract templates that users can access, modify and use. In the former's case, Rocket Lawyer has also adopted a subscription style pricing mechanism where a Premium Member who pays USD \$39.99 per month will have free access to its legal documents and a scope of attorney services, unlike a non-Premium Member, who will have to go on a pay-per-

⁵²³ Rocket Lawyer <www.rocketlawyer.com/> accessed 4 June 2019.

⁵²⁴ LegalZoom.com <www.legalzoom.com/> accessed 4 June 2019.

use basis.⁵²⁵ Nothing is to stop them from moving even further and consolidating the market by providing an additional dispute resolution service for clients as well – being a true full fledged legal services provider where a client-user no longer needs a lawyer nor the court to settle their legal woes.

If anything, the biggest beneficiary would be the client-user, who can expect better value legal services in the years to come. This is in line with society's goal of providing adequate access to justice for all. What remains as an open question is to ensure that the legal services provided by LSPs that are not lawyers are of decent quality and that client-users are adequately protected in the event of the negligence or intentional wrongdoings of a Legal Tech solution provider and the inability to claim against such Legal Tech solution provider for negligence or malpractice, which may happen.⁵²⁶

2. Specialization of legal services by different legal service providers

Another general trend that is likely to happen in the business of law is how different LSPs may move on to specialize in different fields of law. This happens because of how new players in the legal industry are offering legal services in simpler, non-complex areas such as will making, contract reviewing, contract proofreading or non-complicated and low quantum dispute resolution solutions. The Big Four accounting firms will most likely be specialized in providing compliance related legal services that augment their main business arms of accountancy and compliance matters. Lawyers that provide such non-complex legal services will likely be priced out of the market by Legal Tech solution providers, and will thus have to focus on higher value work that are either only restricted for them (e.g. in some EU member states, this would be the right to appear in court) or that Legal Tech solution providers do not have the

⁵²⁵ Rocket Lawyer, 'All the legal help you need. Anytime. Anywhere.' <www.rocketlawyer.com/plans-pricing.r/#/> accessed 4 June 2019.

⁵²⁶ Since the conception of this thesis to its submission, some of the Legal Tech solution providers that were highlighted in this thesis has since ceased operations – examples include the Visabot and Rechtwijzer 2.0. The commercial team heading the project was disbanded due to financial reasons although its platform is still in operation and run by the Dutch Legal Aid Board. In this regard, it would be impossible for a client-user to claim against VisaBot for negligent or wrong advice.

technological capacity to handle at the moment (e.g. more complex contract negotiations and drafting).

The consequence is that different LSPs will become the market leader for specific types of legal services. Lawyers that heavily depend on such low value work for their revenue must now move towards shifting their client base to higher value legal services or legal services where lawyers retain a clear monopoly, such as the appearance of court. Those who fail to innovate their business models may find themselves caught in a situation where they are struggling to compete in terms of prices and speed with Legal Tech solution providers or are unable to eventually compete with law firms that provide higher value legal services. These are the law firms that are likely to be the first to be affected in this increasingly competitive environment and must thus be conscious of their business models if they intend to operate and stay in the market.

3. Shift in firm structure

As suggested in the BCG-Bucerius Report, the structure of the law firm will likely shift from a traditional pyramid structure to one that has more non-lawyer staff members, more tech-focused positions and a low ratio of junior lawyers per partner.⁵²⁷ The truth however is that in some larger law firms in certain EU member states, there is a rectangular structure rather than a pyramid structure as the ratio of junior lawyers per partner is edging closer to 1:1.⁵²⁸ It will thus not be surprising to observe a trend towards a lower partner to junior lawyer ratio, perhaps at one point even reaching a situation where there are more partners to junior lawyers. While Legal Tech is likely to replace the labor traditionally provided by junior lawyers, one must not forget a problem that may surface in the future – the lack of junior lawyers to helm law firms, or to further develop jurisprudence. While we promote efficiency, this is one issue that has to be addressed in the pursuit for more with less.

⁵²⁷ Veith and others (n 24) 10.

⁵²⁸ In Slovenia, several law firms listed in Chambers 500 have close to a 1:1 junior lawyer to partner ratio. These firms are listed on Chambers & Partners, Banking & Finance in Slovenia.

Furthermore, there is a trend of law firms having management related roles or specialized roles in the firm, such as a Chief Operating Officer⁵²⁹ (“COO”) or knowledge management specialists.⁵³⁰ This growing trend of having a COO in a law firm has also been noted by commentators, where it has been stated that “there is no doubt that law firm COO is a recognized and no longer a surprising role to come across”.⁵³¹ In the next few years, one can expect the shift towards a split in career prospects within a law firm, where two separate tracks will be made available: (1) the practice of law; and (2) the practice of the business of law.

The first category would involve lawyers who are pure experts in the field that they are in – they are not expected to bring in clients to maintain their equity partnership status, but will be focused in providing expert legal advice to clients and through their expertise attract clients, although this would not be obligatory. As for the second category, these would involve lawyers or business professionals who are focused in the management of the law firm, bringing in clients and ensuring that the firm remains profitable. There will be a Chief Executive Officer, Chief Operating Officer, Chief Information Officer and other C-Suite executives that would fall under this category. These persons may or may not be lawyers and may do substantive work; however, their main goal would be to manage the firm well. In this sense, the traditional role of Managing Partner would be passed on to a management team, thereby leading to a specialization of roles within a law firm.

4. Shift in business model

If lawyers wish to remain in business, then there must be innovation not just in adopting and implementing new technologies within the law firm, but also innovation in the business of law. While the BCG-Bucerius report states that law firms have to

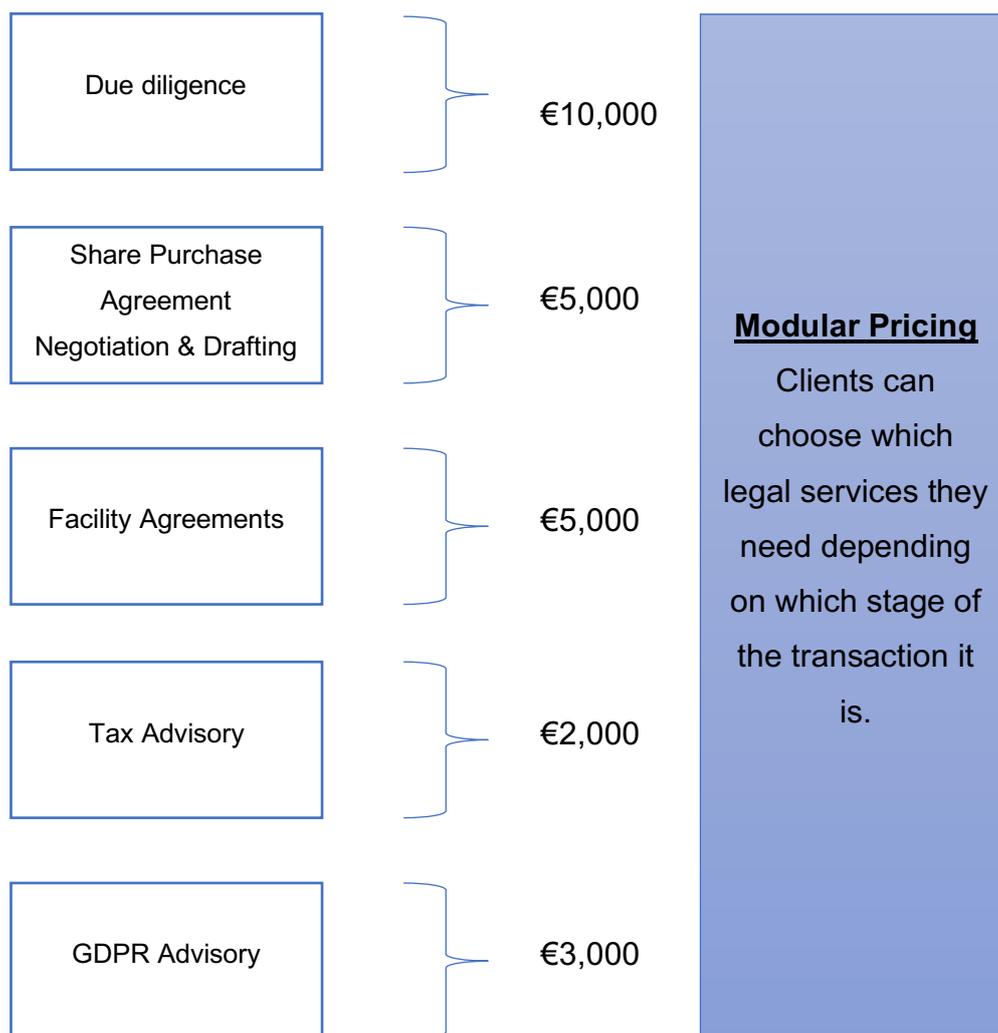
⁵²⁹ See Dentons Rodyk, ‘Kia Meng Loh: Chief Operating Officer and Senior Partner’ <<https://dentons.rodyk.com/en/kiameng-loh>> accessed 17 March 2019.

⁵³⁰ See NetLawMedia, ‘Ruth Ward: Head of Knowledge & Collaboration Technologies’ <<https://londonlawexpo.com/speakers/ruth-ward/>> accessed 17 March 2019.

⁵³¹ Daniel Smallwood, ‘The spectrum of chief operating officer roles in law firms’ (LinkedIn 1 June 2017) <www.linkedin.com/pulse/spectrum-chief-operating-officer-roles-law-firms-daniel-smallwood/> accessed 20 July 2019.

reconsider the hourly billing price structure of law firms, law firms need to brainstorm new pricing mechanisms apart from offering a fixed fee price structure. This can include offering a transparent modular price structure mechanism; some law firms may have already implemented such pricing structures. An illustration of this pricing structure can be found as follows:

Illustration 8: Modular Pricing of a Corporate Transaction



Such a pricing structure is similar to what some Legal Tech solution providers offer – allowing clients to choose what they need and want and pay for what they need and want. This is in the case of Rocket Lawyer, where a person can pay on a per document basis.⁵³² In such a pricing mechanism, clients retain their flexibility in choosing the

⁵³² Rocket Lawyer, ‘All the legal help you need. Anytime. Anywhere.’ (n 525).

legal services that they want, while lawyers also retain their flexibility in pricing as they are not held hostage to one large fixed fee: a prudent lawyer (and businessman) would insert a clause in the contract permitting them to revise their legal fees in the modular pricing structure if one has not yet taken up the service, include numerous assumptions or making sure that the fixed fees are soft fee caps and may be subject to change when certain conditions are fulfilled.

5. Innovation in the medium for delivery of legal services

Apart from different pricing methods, what one could possibly envision is the innovation in the medium of the delivery of legal services. Legal Tech solution providers have sought to push the boundaries on the delivery of legal services from moving away from a human response interface to an automatic response interface.⁵³³

Law firms can capitalize on such new methods of the delivery of legal services. Baker McKenzie and CMS have already launched mobile phone apps that deal with dawn raid situations,⁵³⁴ and more steps can be taken by law firms to explore these mediums of the provision of legal services. For example, mobile phone applications that provide standardized contracts for bread and butter situations for companies or the average layperson can be developed. While there may be no incentive for big law firms to develop such applications because they may feel that the revenue derived from these mini mandates are insignificant, the potential of such applications should not be dismissed right from the outset. First, such applications can provide a different revenue stream for law firms as they reach out to a different set of consumers that they would never otherwise be able to reach out to or whose business would be given to Legal Tech solution providers, such as in the case of DoNotPay.

Next, these applications may result in subsequent client conversion – for instance, a button in the application can be provided to allow clients to “call a lawyer” and convert

⁵³³ DoNotPay (n 82).

⁵³⁴ Apple App Store, ‘Baker McKenzie Dawn Raid’ <<https://itunes.apple.com/de/app/baker-mckenzie-dawn-raid/id1153905937?mt=8>> accessed 4 June 2019; CMS, ‘CMS Dawn Raid App’ <<https://cms.law/de/AUT/News-Information/CMS-Dawn-Raid-App>> accessed 4 June 2019.

these consumers to clients that will require more specialized legal services. Finally, the data derived from the application can be immensely useful for law firms – they would be able to tell which clients from different countries or regions need specific types of legal help, experiment how much would people be able to pay for a specific type of legal services, derive the consumer-to-client conversion rate for different types of legal services and many more. This will help business development or marketing teams in law firms to hone their marketing campaigns to achieve greater consumer-to-client conversion – of course, such marketing teams must ensure that the law firms do not breach legal ethic rules on advertising and marketing.⁵³⁵

If law firms do not explore such mediums, other Legal Tech solution providers or companies most certainly will. Companies such as LegalZoom, Rocket Lawyer (which was mentioned earlier in this chapter) and Asia Law Network⁵³⁶ in Singapore already have similar “call a lawyer” services provided on a web platform. In Slovenia, a similar client-lawyer network platform called IURALL was created by a lawyer as well.⁵³⁷ It remains to be seen whether law firms will continue to innovate in this respect and provide a DIY legal service platform combined with a “call a lawyer” services while publishing in public fixed and transparent fees.

6. Hybrid operations

Hybrid operations in this context refers to law firms acquiring Legal Tech solution providers – or perhaps in the future where regulations on ownership of law firms permit Legal Tech solution providers owning a stake in law firms. The acquisition of Legal Tech solution providers by large legal research companies such as LexisNexis are well known, e.g. the acquisition of Ravel Law by LexisNexis.⁵³⁸ Big Four accounting firms have also been snapping up Legal Tech solution providers, such as in the case

⁵³⁵ Herring (n 12) 140.

⁵³⁶ Asia Law Network <www.asialawnetwork.com/> accessed 17 March 2019.

⁵³⁷ IURALL <<https://iurall.com>> accessed 4 June 2019.

⁵³⁸ InfoPro Community Manager, ‘LexisNexis Acquires Ravel Law – News Coverage’ (LexisNexis 14 June 2017) <www.lexisnexis.com/infopro/keeping-current/b/weblog/archive/2017/06/14/lexisnexis-acquires-ravel-law.aspx> accessed 17 March 2019.

of Ernst & Young, which announced its acquisition of Riverview Law.⁵³⁹ Riverview Law delivers “large document review and remediation projects for corporations”⁵⁴⁰ and develops an “Operations Platform [that] capture quantitative and qualitative data that transform corporate legal departments”.⁵⁴¹ These acquisitions by LexisNexis and EY show that they have an interest in acquiring companies that have the technology to improve existing technologies in the acquiring firm so as to enable consumers of their services to have a wider range of options in the choice of services that they need. In addition, there are Legal Tech companies such as Elevate that have also acquired other Legal Tech companies, so as to “create more sophisticated technology-enabled solutions for law departments and law firms”.⁵⁴²

As for law firms, there are hardly any acquisition of Legal Tech companies although there are other notable developments that are taking place. International law firm Allen & Overy is in their third cohort of their Legal Tech incubation program, which is a “tech innovation space where tech companies, Allen & Overy lawyers, technologists and their clients can collaborate to explore, develop and test legal, regulatory and deal-related solutions”.⁵⁴³ Norton Rose Fulbright launched its own chatbot, Parker, that is powered by AI to assist “clients in non-EU jurisdictions to determine whether the GDPR applies to their business.”⁵⁴⁴ Clifford Chance, another global law firm, has also moved into the legal tech incubator space and launched Create+65 in Singapore, which “will bring together venture capitalists, startups, product owners and developers, universities and private institutions to share knowledge and develop and test new legal

⁵³⁹ Alan Duerden, ‘EY expands global legal managed services offering with acquisition of Riverview Law’ (EY 7 August 2018) <www.ey.com/en_gl/news/2018/08/ey-expands-global-legal-managed-services-offering-with-acquisition-of-riverview-law> accessed 17 March 2019.

⁵⁴⁰ EY Riverview Law, ‘Multi-disciplinary teams delivery your objectives’ <www.riverviewlaw.com/projects/> accessed 17 March 2019.

⁵⁴¹ EY Riverview Law, ‘Using technology and data to transform relationships’ <www.riverviewlaw.com/technology/> accessed 17 March 2019.

⁵⁴² elevate, ‘Elevate Acquires LexPredict, Expanding Capabilities in Artificial Intelligence and Data Science’ (elevate 14 November 2018) <<https://elevateservices.com/elevate-acquires-lexpredict/>> accessed 17 March 2019.

⁵⁴³ Allen & Overy, ‘Advanced Delivery: Fuse by Allen & Overy’ (n 9).

⁵⁴⁴ Norton Rose Fulbright, ‘Norton Rose Fulbright launches AI-powered chatbot on EU GDPR’ (n 336).

services tools and solutions for real-life business challenges”.⁵⁴⁵ Taking place around the same time in Singapore, law firm Rajah & Tann launched Rajah & Tann Technologies,⁵⁴⁶ which offers “tech-enabled legal solutions”⁵⁴⁷ for consumers, although it appears that the delivery of legal services would still be by a team of lawyers rather than a bot or an automated/AI-powered system. The same law firm has also acquired Legal Tech companies such as LegalComet, “in a major step forward in using technology to deliver legal services at unprecedented value and efficiency to clients”.⁵⁴⁸

What we have seen is the possibility of hybrid operations between Legal Tech solution providers and law firms, where the latter acquires the former so as to enhance their ability in providing legal services. This can signal the shift towards law firms becoming more attuned towards looking externally for solutions to improve their existing infrastructure or practices in the delivery of legal services; the search for such external solutions can come in a myriad of forms such as through legal technology incubators set up by these firms or direct vertical acquisition (or perhaps even horizontal acquisition, if the Legal Tech solution provider is providing the same legal services as the law firm). This is a good initiative and move by law firms as it shows that law firms are willing to experiment and think out of the box to innovate their way of providing legal services. Although such actions are currently only being taken by larger local law firms, regional law firms or international law firms, it is hoped that mid-sized or smaller sized law firms may considering having synergies with Legal Tech solution providers to further innovate in this area of the provision of legal services.

⁵⁴⁵ Artificial Lawyer, ‘Clifford Chance Launches Legal Tech Incubator in Singapore’ (Artificial Lawyer 18 December 2018) <www.artificiallawyer.com/2018/12/18/clifford-chance-launches-legal-tech-incubator-in-singapore/> accessed 17 March 2019.

⁵⁴⁶ Rajah & Tann Technologies (n 522).

⁵⁴⁷ *ibid.*

⁵⁴⁸ Rajah & Tann Technologies, ‘Rajah & Tann Technologies acquires LegalComet’ (Rajah & Tann Technologies 7 November 2018) <www.rajahtannasia.com/media/3142/media-release_rajah-tann-technologies-acquires-legalcomet-1.pdf> accessed 17 March 2019.

7. Consolidation of the legal industry

One other evolution in the business of law is the consolidation of the legal industry – where more firms join an international law firm, or a group of firms merge to form a bigger group. In the US, consultancy firms have published on how there is a “record-breaking pace” on the merger of law firms within the country.⁵⁴⁹ This trend is understandable considering that a merger would allow law firms to reduce costs and overheads as they benefit from economies of scale, such as from rental, infrastructure, marketing, branding, business development and non-legal support staff. If law firms intend to adopt Legal Tech in their practices, a larger headcount of lawyers also gives the law firm greater bargaining power when negotiating fees payable to the Legal Tech solution provider that provides IT solutions to the law firm.

Consolidation of law firms may not necessarily occur on the basis of an actual merger, but also in the form of an informal consolidation through shared working spaces or shared resources and infrastructure. The idea of co-working spaces that are popping across the world also give sole-proprietors to run their law firms in a way that they would reduce operational costs. In an innovative step, the Singapore Academy of Law launched a “first-of-its-kind co-working space”,⁵⁵⁰ where this “space will make it easier for firms to adopt technology by providing them with shared amenities and facilities, like meeting rooms and office equipment”.⁵⁵¹ Through this, the Singapore Academy of Law hopes to help reduce “operational costs and inefficiencies, firms can focus on uplifting their legal practice—and in turn, continue to provide accessible and affordable legal services to the man-in-the-street”.⁵⁵²

While these steps will definitely be useful for smaller law firms that cannot benefit from economies of scale unlike larger law firms, such law firms should bear in mind the

⁵⁴⁹ Altman Weil, inc., ‘Law Firm Merger Market on Record-Breaking Pace’ <www.altmanweil.com/index.cfm/fa/r.resource_detail/oid/3C0444FD-79BC-41E5-8BA8-60B2D354BE64/resource/Law_Firm_Merger_Market_on_RecordBreaking_Pace.cfm> accessed 17 March 2019.

⁵⁵⁰ Singapore Academy of Law, ‘SAL to Launch First-of-its-kind Co-working Space’ (n 472).

⁵⁵¹ *ibid.*

⁵⁵² *ibid.*

ethical rules when operating in such co-working spaces. These have been elaborated in great detail in the previous chapter, e.g. issues such as holding a client meeting in an open area in the co-working space with the false belief that this is similar to an office would be a clear breach of the client-confidentiality rules if there are other parties – even worse, where such parties are lawyers representing the other side of the case – working around the co-working space. Lawyers should also take extreme care not to leave their documents or devices around the co-working spaces for fear of data theft or actual physical theft of these items, which would also be another clear breach of ethical rules in securing client’s documents or ensuring non-negligent practice.

B. Growing Comfort in Using Legal Tech

As we grow more and more accustomed to using the computer and having computers make decisions on our behalf, the likelihood of us being used to computers telling us what we should do with our existing legal problems is likely to increase. In the ODR scene, the use of automated dispute resolution settlement systems is already widespread in e-commerce marketplaces that have a high volume of transactions.⁵⁵³ The growing comfort in using Legal Tech also bolsters confidence in Legal Tech solution providers as they know that their services are accepted by the public. This is definitely one key trend to come in the future – when Legal Tech solution providers have sufficient data to create an AI software that can assist in formulating arguments on the spot, the corresponding trust in humans in such software will enable the proliferation of more advanced Legal Tech solution providers to enter into the market. While having a software that can formulate arguments and debate on the spot is something that is not in existence yet, the fact is that AI can already generate fake news,⁵⁵⁴ create profile pictures,⁵⁵⁵ produce coherent text⁵⁵⁶ and even compose

⁵⁵³ Tyler Technologies, ‘Modria’ <<https://www.tylertech.com/products/modria>> accessed 3 June 2019.

⁵⁵⁴ Jeremy Kahn, ‘The AI That Can Write a Fake News Story From a Handful of Words’ (Bloomberg 14 February 2019) <www.bloomberg.com/news/articles/2019-02-14/the-ai-that-can-write-a-fake-news-story-from-a-handful-of-words> accessed 11 March 2019.

⁵⁵⁵ Michael Zhang, ‘These Portraits Were Made by AI: None of These People Exist’ (PetaPixel 17 December 2018) <<https://petapixel.com/2018/12/17/these-portraits-were-made-by-ai-none-of-these-people-exist/>> accessed 3 June 2019.

⁵⁵⁶ Alec Radford and others, ‘Language Models are Unsupervised Multitask Learners’ <https://d4mucfpksyvv.cloudfront.net/better-language-models/language_models_are_unsupervised_multitask_learners.pdf> accessed 20 July 2019.

music.⁵⁵⁷ It would perhaps be a matter of time before AI can create and defend arguments and draft legal opinions. Trust in using technology to solve one's problems – preferably effectively and efficiently – is therefore an important aspect in the adoption of Legal Tech by client-users.

Millennials and the younger generations are growing up with electronic devices that are constantly connected to the Internet. They are also brought up with using electronic methods of communication and the use of digital mediums and electronic devices are even more deeply embedded in their lifestyles than ever before. These generations will likely trust technologies making decisions for them more than their predecessors.⁵⁵⁸ They will be the clients of the future and it is obvious why Legal Tech is more appealing to them more than traditional law firms. As subsequent generations become extremely comfortable with using technology to solve all of their problems, law firms will have to adapt to cater to these clients. Such clients will be used to having quick, cheap and convenient delivery of legal services via Legal Tech solution providers. In such a setting, law firms have to distinguish themselves as being able to provide value added services above cookie-cutter solutions provided by current generations of Legal Tech, although with advancements in technology, Legal Tech will likely evolve to provide specialized and bespoke services. Law firms will then have to continuously innovate to set themselves apart from Legal Tech solution providers – perhaps better legal products, innovative legal structuring or even imparting the human touch in a legal case that people would be willing to pay a premium for.

One negative impact would be the welfare of lawyers working in the industry, especially for those working for law firms who are unable to innovate and instead compete with Legal Tech in trying to provide faster and cheaper legal services rather than better quality legal services. The readily available solutions provided by Legal Tech may also put pressure on lawyers to deliver legal products just as swiftly. It is

⁵⁵⁷ Tirhakah Love, 'Do androids dream of electric beats? How AI is changing music for good' (The Guardian 22 October 2018) <www.theguardian.com/music/2018/oct/22/ai-artificial-intelligence-composing> accessed 11 March 2019.

⁵⁵⁸ Steve West, 'Meeting Millennial Expectations In These Four Areas of Technology' (Forbes Technology Council 28 June 2019) <www.forbes.com/sites/forbestechcouncil/2018/06/28/meeting-millennial-expectations-in-these-four-areas-of-technology/#43c3ebd84ffc> accessed 4 June 2019.

not unknown that some clients expect their lawyers to be available 24/7 for them, especially in a large mandate. Such working hours may result in burnout for legal professionals,⁵⁵⁹ as they are may be on the borderline of being professionally harassed by clients who can reach them through e-mail or other social networking platforms and tools such as WhatsApp and Telegram. Adequate measures must also be put in place to prevent such pressure from client-users. Bar associations can perhaps provide a counseling hotline or provide information for lawyers on how to deal with such clients, situations, prevent potential burnout or recover from a burnout.⁵⁶⁰

C. Change in Legal Education Curriculum for the Generations to Come

Regardless of whether Legal Tech solution providers will be regulated, or whether the legal industry in the EU consolidates towards a more harmonized set of rules on admission, the fact is that the legal industry has already had its feathers ruffled with Legal Tech's popularity. If there is no change on existing EU or national legislation to properly formulate a policy on the regulation of Legal Tech or harmonize the legal industry across EU member states, some work can at least be done now to equip future generations of lawyers to embrace legal work not just in law firms, but also in Legal Tech companies. This will allow subsequent generations of law graduates to have access to different pockets of the market, i.e. if they cannot find work as a junior associate due to the lack of positions available, they are at least able to have the skills to work for a Legal Tech solution provider. This section discusses other approaches that universities, bar associations, and institutions can ruminate over to allow future generations of jurists to operate in the legal industry effectively, assuming there are no changes in legislation concerning the legal profession or legal education.

⁵⁵⁹ A quick search on Google with the keywords "burnout" and "law" will reveal a host of articles that talk about how burnout occurs in the legal profession.

⁵⁶⁰ The Solicitors Regulation Authority has provided a page for their members on how to seek help and guidance for their health and careers. See Solicitors Regulation Authority, 'Your health, your career' <www.sra.org.uk/solicitors/resources/your-health-your-career.page> accessed 4 June 2019.

1. Curriculum innovation in the legal industry and in the law faculty

The next generation of jurists must learn how to operate in an industry where they are expected to not just be able to learn and apply the law, but also work with technology to operate more efficiently. Furthermore, an interdisciplinary legal education with one or two other subjects such as business administration, accounting or computer science enables graduates to not only work within law firms, but also in Legal Tech companies where a combination of skills can be useful. This can include having a joint degree program with other faculties, which is presently offered by prestigious US universities such as Harvard Law School⁵⁶¹ and Stanford Law School.⁵⁶² Some universities such as the Singapore Management University have also sought to include an interdisciplinary computer science and law undergraduate program,⁵⁶³ with the possibility of obtaining a JD degree in two years if the candidate is eligible for the JD program as well.⁵⁶⁴ It is submitted that if universities consider an interdisciplinary program, such an interdisciplinary law program should generally fulfill the legal education requirements for admission to the bar. The rationale is to engage students or to prepare them for what is to be expected at legal practice and also offer them the chance to apply for new job positions not just in law firms, but in Legal Tech companies as well.

This requires universities to redesign their curriculum and be innovative about how they teach law and legal skills to their charges. From a curriculum standpoint, universities can adopt several strategies: including courses and seminars that teach practical skills such as operating certain popular Legal Tech software, or incorporating legal hackathons as selective modules that students can opt to take part in. Several universities have recognized the preparation and participation of the Willem C. Vis

⁵⁶¹ Harvard Law School, 'Special Programs' <<https://hls.harvard.edu/dept/academics/degree-programs/special-programs/>> accessed 4 June 2019.

⁵⁶² Stanford Law School, 'Joint Degree and Cooperative Programs' <<https://law.stanford.edu/education/degrees/joint-degrees-within-stanford-university/#slsnav-established-joint-degrees>> accessed 4 June 2019.

⁵⁶³ Singapore Management University, 'Bachelor of Science (Computing & Law)' <<https://sis.smu.edu.sg/bsc-computing-law>> accessed 4 June 2019.

⁵⁶⁴ *ibid.*

Moot as modules worthy of ECTS;⁵⁶⁵ similarly, awarding credits to the participation of recognized legal hackathons such as the Global Legal Hackathon can incentivize students to at the very least try new types of legal competitions apart from the usual moots and essay writing competitions.

From the standpoint of cultivating interest in Legal Tech, universities can encourage the development of student interest groups in Legal Tech or, if the budget permits, set up research centers that focus on the development of Legal Tech. The University of Helsinki's Legal Tech Lab is focused on researching the digitalization of law, and has played host to several Legal Tech conferences, publications, and also legal hackathons.⁵⁶⁶ To further drive interest in the field, universities could also encourage the creation of student interest groups in Legal Tech. Students are empowered with time and lesser opportunity costs to brainstorm on innovative solutions that can change the legal industry – an interest group that can foster and incubate such ideas and translate them into commercially viable Legal Tech solutions. For EU member states that are seeking to become a startup incubator, such student interest groups help to add an element of diversity in the startup scene.

2. Continuing legal education in Legal Tech

As lawyers have to undergo continuing legal education in almost all EU member states, one way to upgrade lawyers' knowledge and understanding of Legal Tech solutions is through CLE seminars or seminar programs. Universities such as Bucerius Law School have introduced summer programs dedicated to Legal Tech, which is presently in its third run. Other universities can also run short CLE seminars that serve as an update for lawyers who are interested in the topic of Legal Tech and wish to have a greater understanding on the topic and issues surrounding the use of Legal Tech, such as legal ethical concerns.

⁵⁶⁵ At the University of Vienna, the Vis Moot module is worth 16 ECTS (two 8 ECTS seminars in one academic year). Universität Wien, '030043 SE Moot Court aus International Commercial Arbitration (2018S)' <<https://ufind.univie.ac.at/de/course.html?lv=030043&semester=2018S>> 11 March 2019.

⁵⁶⁶ University of Helsinki Legal Tech Lab (n 133).

To further facilitate the adoption and increased awareness of Legal Tech, bar associations can spearhead educational campaigns amongst lawyers by starting projects such as a Legal Tech 101 manual or a technology guidebook targeted for lawyers. In Singapore, the Singapore Academy of Law has launched such a project where authors and experts contribute topics on technology that are often used in the business of law.⁵⁶⁷ A free resource that is available to lawyers helps to bolster the adoption and understanding of Legal Tech, this may prove to have a greater outreach compared to CLE seminars that are normally optional and at a cost.

3. The consequences of a poor outlook on legal education

The legal industry is already notoriously famous for its long working hours, stressful deadlines and the need to deal with highly demanding clients at all hours.⁵⁶⁸ With the advent of Legal Tech, books and the media have exacerbated the feeling that law is an industry facing large scale disruption by portraying lawyers as being potentially replaced by AI,⁵⁶⁹ it would not be surprising if younger practitioners or the younger generation will feel that a career in law is something that is promising. This negative outlook will send ripples not just amongst the industry and current university students, but also to high school students who are applying to study at universities. In other non-EU member states such as Singapore, the number of applicants listing law as their first choice for studies has seen a drop in 17% applicants in 2017, whereas computer science saw an increase in applicants.⁵⁷⁰

While no correlation has been established as to why there is a decrease in the number of applicants for a course that is well-known to be prestigious and popular, the amount

⁵⁶⁷ Singapore Academy of Law, 'Legal Technology Manual for Lawyers' <www.sal.org.sg/Resources-Tools/Legal-Technology-Vision/Legal-Technology-Manual> accessed 11 March 2019.

⁵⁶⁸ Leslie A Gordon, 'How lawyers can avoid burnout and debilitating anxiety' (ABA Journal 1 July 2015) <www.abajournal.com/magazine/article/how_lawyers_can_avoid_burnout_and_debilitating_anxiety> accessed 20 July 2019.

⁵⁶⁹ See Chapter 9; this chapter discusses the advent of robo-lawyers.

⁵⁷⁰ Sandra Davie, 'Fewer university applicants list law as first choice, but more drawn to computing' (The Straits Times 6 July 2017) <www.straitstimes.com/singapore/education/fewer-university-applicants-list-law-as-first-choice-but-more-drawn-to-computing> accessed 11 March 2019.

of negative publicity surrounding the “glut of lawyers”,⁵⁷¹ changes to the bar admissions regime and opinions of how Legal Tech is taking over lawyers does not help in promoting legal studies at the university.⁵⁷² In the EU, while no general exercise to plot the trend of law graduates in the past five years in universities present in EU member states has been undertaken as a whole, law faculties can conduct studies to evaluate whether there is a dipping trend of matriculating law students, and if yes, understand the reasons behind this trend.⁵⁷³

A negative perception of the legal industry can result in a reduction of the talent pool from the undergraduate level and above, as those who would otherwise seek to study law would decide to study what is perceived as a safer ground for their future, for instance popular subjects such as computer science. This has subsequent ramifications – similar to an ageing society; in one or two generations, there may be insufficient junior lawyers to assist with the burgeoning number of partners in the legal industry, unless it is assumed that Legal Tech has become sufficiently advanced that almost all junior lawyer roles can be removed. Then, in this case, senior partners may eventually become extinct in the long run. For countries that have a separate pension scheme for lawyers, this may cause a crisis if the pension fund runs out of money due to lack of younger lawyers contributing to the fund.

More crucially, the development of jurisprudence is hinged on the thoughts, knowledge, and wisdom of those who have studied law and are willing to engage in it – a reduction in the amount of talent pool may mean lesser discussions and debate on legal jurisprudence and a less robust development of the jurisprudence that will affect

⁵⁷¹ Feng Zengkun, ‘Singapore is facing a glut of lawyers: Shanmugam’ (The Straits Times 17 August 2014) <www.straitstimes.com/singapore/singapore-is-facing-a-glut-of-lawyers-shanmugam> accessed 11 March 2019.

⁵⁷² Enoch Chan, ‘The Age of Digital Disruption: The Role of the Future Lawyer’ (Medium 23 October 2018) <<https://medium.com/predict/the-age-of-digital-disruption-the-role-of-the-future-lawyer-e5ea618f1b08>> accessed 20 July 2019.

⁵⁷³ As this thesis is not focused on legal education as a subject, it did not carry out such a survey or study on statistics that are otherwise publicly available on some universities. However, it should be noted that some universities publish the number of available seats but do not publish the final number of matriculating students, while other universities publish the number of students in some faculties but not the law faculty. See Universität Wien, ‘Leistungsbericht & Wissenschaftsbilanz 2017’ <www.univie.ac.at/fileadmin/user_upload/startseite/Dokumente/Leistungsbericht_2017_interaktiv.pdf> accessed 11 March 2019.

society in the future. This is not something that either the legal industry, legal philosophy, nor society should look forward to, and if such a sentiment has already taken root in the mindset of the youth, then we as players and stakeholders in the legal industry should strive to change this. We have to ensure the continued development of jurisprudence – especially in quality of thought. This is something that can be done with a good education, a good atmosphere, and good students who are studying law not because they were rejected from another faculty, but because they chose law as their first choice.

III. LAWYERS: ARE THEY REALLY DISAPPEARING?

*The End of Lawyers*⁵⁷⁴ was the title of Richard Susskind's book published in 2008 on the rethinking of the nature of legal services. Close to a decade later, Susskind has published a new book on the same topic entitled *Tomorrow's Lawyers*⁵⁷⁵ in 2017. In 2019, lawyers are still practicing law, big law firms are still in existence and in some EU member states such as Austria, the number of lawyers in practice continue to show an upward trend in numbers.⁵⁷⁶ Far from being extinct, lawyers are still in existence and present in an average person's daily life.

We are unlikely to see the end of lawyers; however, what we would see is a shift towards the consolidation of law firms across the globe, i.e. joining of big international law firm having multiple offices across different continents. Besides the consolidation of law firms, it would not be surprising to see an increase in law firms either hosting Legal Tech incubation hubs to innovate ways to provide legal services or directly acquiring Legal Tech solution providers. The profession of lawyers will undoubtedly change as they lose their monopoly in the provision of legal services, especially if regulations do not close in on Legal Tech solution providers. The pressure for law firms to innovate will mount; however, if faster and higher quality legal services are the

⁵⁷⁴ Richard Susskind, *The End of Lawyers* (OUP 2008).

⁵⁷⁵ Susskind, *Tomorrow's Lawyers* (n 3).

⁵⁷⁶ As of 2018, there were 6,389 lawyers (*Rechtsanwalt*). In 2017, there were 6,389 lawyers and in 2017 there were 6,238 lawyers. A decade ago in 2009, there were 5,414 lawyers in Austria. See Die Österreichischen Rechtsanwälte, 'Mitgliederzahlen' <www.rechtsanwaelte.at/kammer/kammer-in-zahlen/mitglieder/> accessed 16 March 2019.

outcomes of such competition, this is then a benefit to numerous stakeholders such as the legal industry, client-users and society. Justice will become even more accessible than before.

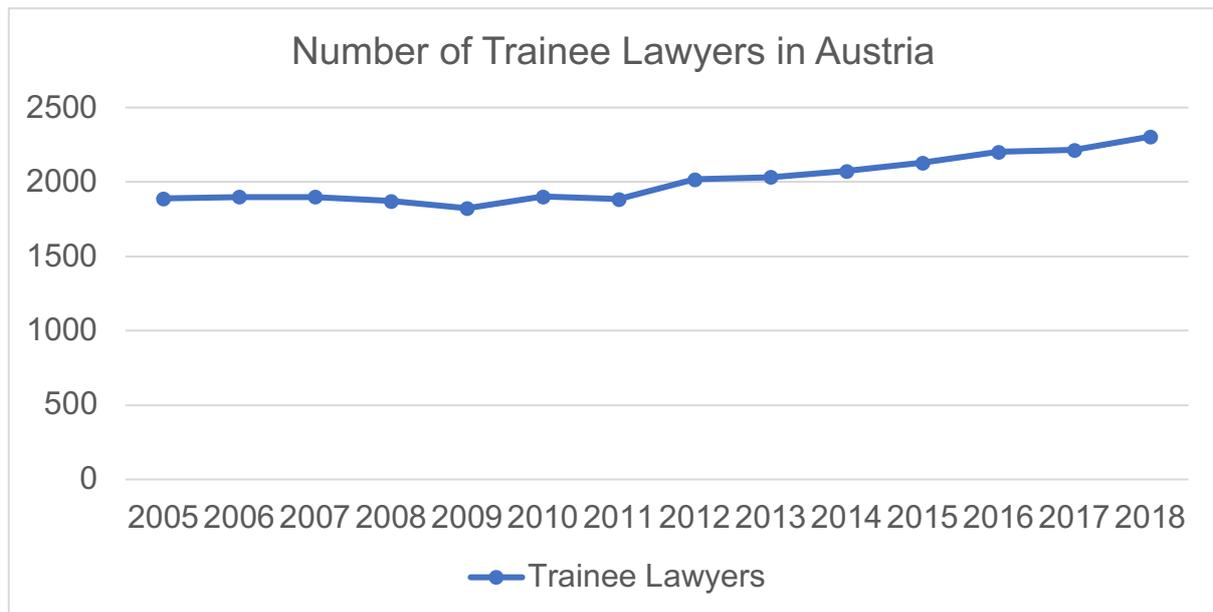
Yet, despite the talk of how Legal Tech will supplant lawyers, or how the legal industry will face an ‘uberization’, data published by the Austrian Bar Association on the number of admitted lawyers per year suggests that the number of admitted attorneys-at-law (i.e. *Rechtsanwältinnen*) is in fact steadily growing.

Illustration 9: Number of Lawyers in Austria



(Data retrieved from the *Rechtsanwaltskammern*)⁵⁷⁷

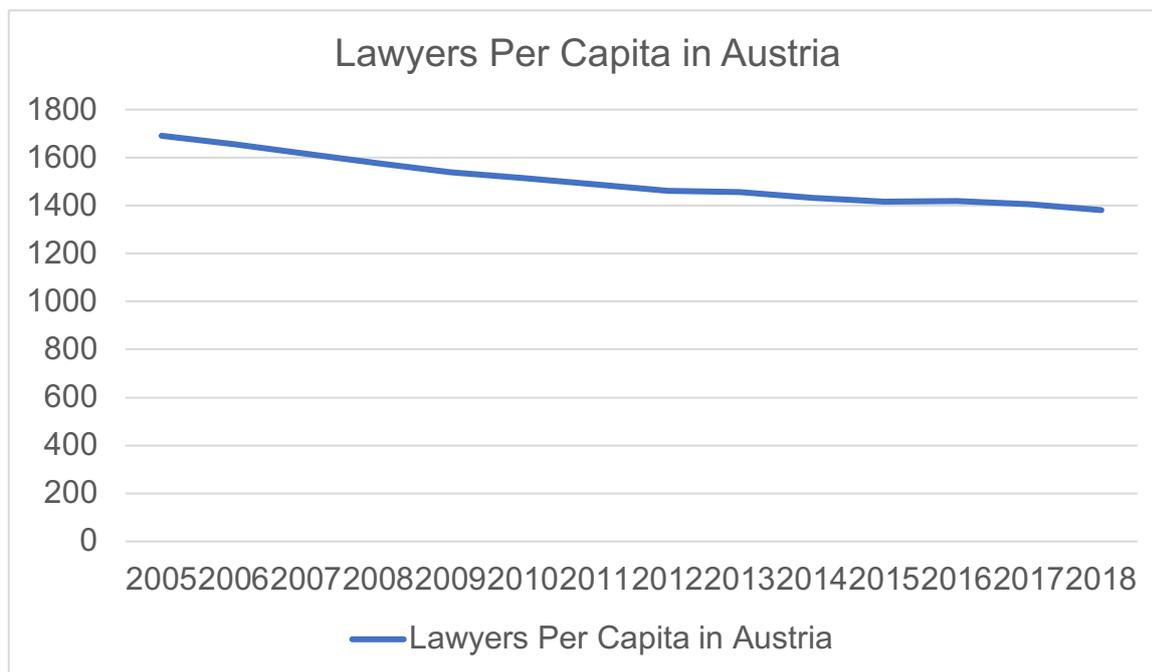
⁵⁷⁷ *ibid.*

Illustration 10: Number of Trainee Lawyers in Austria

(Data retrieved from the *Rechtsanwaltskammern*)⁵⁷⁸

From Illustration 10, it is noteworthy that not only is the number of lawyers in Austria constantly growing, but the number of trainee lawyers has not decreased over the years and the trend shows that it is in fact on the rise. At the present moment, it appears that there is a growing number of lawyers entering the legal industry, despite arguments being made that lawyers, in particular junior lawyers, are becoming redundant by Legal Tech. However, when seen in the context of the population growth in Austria, the data might be interpreted differently:

⁵⁷⁸ *ibid.*

Illustration 12: Lawyers Per Capita in Austria

(Data derived from number of lawyers and population in Austria)

As such, one can see from the above that despite the growth in the real number of lawyers, when one considers the population growth of Austria, the number of lawyers per person is actually on a decreasing trend. While this decreasing trend could be attributable to many reasons and not solely on Legal Tech alone, the numbers however do point towards the fact that the lawyer per capita ratio is becoming ever increasingly lesser. Indeed, lawyers may still be here to stay and might be increasing in numbers, but one must ultimately consider from the bigger picture – that there will be lesser lawyers per person than before.

IV. CHAPTER SUMMARY

This chapter discusses how the legal industry is expected and anticipated to evolve in the near future, assuming that no substantial changes in the regulation of the legal profession in the EU is made. Changes in the legal profession can be expected in both the provision of legal education and the business of law itself. In general, there appears to be a trend towards greater adoption of Legal Tech which affects the business model of law firms, such as through shifts in the firm's structure, acquisition

of Legal Tech companies and consolidation of law firms. This chapter then highlights that despite the talk on the end of lawyers, the fact is that in Austria, the number of lawyers is on the rise although the lawyer per capita ratio is on the decline. It thus appears that the industry is here to stay and is in fact growing one, although this is not necessarily proportional to the growth in population.

One, however, cannot conclude that the rise in lawyers means that there are sufficient jobs for lawyers. With Legal Tech developments allowing law firms to become more efficient, there is a strong likelihood that there will be less jobs available for lawyers but more jobs at Legal Tech companies, although these companies may (or may not) be able to provide certain legal services or may (or may not) provide good quality legal services. The subsequent chapter then studies how to address the existing conflicts between law firms and Legal Tech solution providers, in particular ensuring fair competition will addressing the importance of greater access to justice through the availability of more affordable legal services. These will thus be explored in the next chapter which provides the parameters when developing an approach.

Chapter 7: Setting Out the Parameters and Principles for a New Framework in the Regulation of the Legal Profession in Light of Legal Technology

I. INTRODUCTION

The previous chapters in this thesis have discussed how existing regulations, in particular legal ethics rules, are vague or inadequate in addressing how Legal Tech should or ought to operate. Furthermore, current legal ethics rules are hindering law firms from competing effectively with Legal Tech solution providers, and as more of such DIY legal services enter the market, the problem will only worsen. This chapter and the subsequent chapter is thus devoted in analyzing how a revised or new regulatory framework should be in place to tackle the issues as highlighted in Chapters 4, 5 and 6. For a start, this chapter intends to set out the parameters and principles for a new framework in the regulation of the legal profession in light of Legal Tech. Setting out these parameters includes first analyzing the parties to be regulated (i.e. *who* should be subject to regulation), the reasons for such regulation (*why* Legal Tech or LSPs as a whole should be regulated) and the substance of the regulation (i.e. *what* should be regulated). It also proposes specific principles that are crucial when designing a new regulatory framework for the regulation of the legal profession in the EU.

II. WHO SHOULD BE SUBJECT TO REGULATION?

It is suggested that any regulation should be implemented on anyone or anything that is providing any form of legal services. This therefore includes lawyers, Legal Tech solution providers and persons seeking admission to the bar (who may or may not otherwise be permitted to practice law at that point in time, depending on the member state's bar rules). Excluding a specific stakeholder that provides legal services would

defeat the purpose of having an omnibus legislation that would govern the regulation of the legal industry and not just the legal profession.

III. WHY SHOULD LEGAL TECH BE REGULATED?

A. Ensuring proper access to justice to users

The current regime affords less protection to client-users that use Legal Tech solutions. While Legal Tech solution companies are targeting civil law issues such as probate and administration,⁵⁸⁰ contract drafting and preparation,⁵⁸¹ online dispute resolution⁵⁸² or claiming of damages pursuant to EU law,⁵⁸³ there are also Legal Tech solution providers that target client-users that need help in administrative law such as the challenging of a fine⁵⁸⁴ or the provision of criminal legal advice in a pro bono setting.⁵⁸⁵ The regulation of the legal industry and the monopolization of legal services were originally intended to achieve public policy goals such as access to justice, and this theory has been expounded in the earlier Chapter 3.II.A. While cheaper legal services provided by Legal Tech solution providers are definitely a desirable outcome for client-users as this means that they are able to assert their legal rights with lesser costs, such desirable outcome is defeated if Legal Tech solution providers are not held accountable for the poor quality of legal products or services rendered because they have contracted themselves out of liability and are not penalized under bar regulations for the provision of poor quality legal services or products.

In this regard, the first and foremost objective of the regulation of Legal Tech is to ensure that any client-user has not only better access to justice because of lower

⁵⁸⁰ WillMaker (n 409); Nolo, 'Quicken WillMaker Plus 2019' <<https://store.nolo.com/products/quicken-willmaker-plus-wqp.html>> accessed 11 March 2019.

⁵⁸¹ Wallstreetdocs <www.wallstreetdocs.com/> accessed 11 March 2019; VanillaLaw Docs <<http://vanillalawdocs.com/>> accessed 11 March 2019.

⁵⁸² European Commission, 'Online Dispute Resolution' (n 512).

⁵⁸³ Flightright (n 46).

⁵⁸⁴ DoNotPay (n 82).

⁵⁸⁵ LawBot was developed by Cambridge and Oxford students to help sexual assault victims. However, it appears that the bot has since been shut down. See Alfie Packham, 'Cambridge students build a 'lawbot' to advise sexual assault victims' (The Guardian 9 November 2016) <www.theguardian.com/education/2016/nov/09/cambridge-students-build-a-lawbot-to-advise-sexual-assault-victims> accessed 2 June 2019.

priced and more efficiently delivered legal services and products, but also to ensure that there is *proper* access to justice – i.e. legal services and products that are of good quality because failing which, these Legal Tech solution providers know that they will be penalized by law and are unable to escape liability through EULAs or other forms of contractual arrangements. If we are to pursue a regime of regulation in the practice of law, then blanket regulations must apply to safeguard good quality legal services and products across lawyers and Legal Tech solution providers.

While this means that Legal Tech solution providers may have greater overheads because they may be required to incur costs to comply with legal ethics rules and purchase professional indemnity insurance, the truth is that law firms are already forced to incur such costs in the provision of their legal services – if Legal Tech solution providers are able to compete and provide better, faster and cheaper legal services or products vis-à-vis lawyers notwithstanding such overheads, then client-users are already afforded greater access to better justice. There is a valid argument that a client-user may benefit from even cheaper legal services if Legal Tech solution providers are not required to incur overheads in compliance – however, the trade-off in the difference in prices is ultimately made for the protection and safeguard of client-users from a holistic viewpoint.

B. Clarification on Legal Ethics

Legal Tech should be regulated because of the lack of application of legal ethics on Legal Tech solution providers. Therefore, unlike traditional law firms which are obliged under the code of ethics to ensure client confidentiality, prevent conflicts of interests, act in the best interests of the client, ensure proper accounting measures to prevent mixing of firm and client funds, amongst other ethical rules, Legal Tech solution providers are not subject to these ethical rules. It is suggested that legal ethics should also apply to Legal Tech solution providers, and this would be a blanket application, i.e. all legal ethics rules apply to the extent that they are applicable to the situation of the Legal Tech solution provider. This will be further elaborated upon in Chapter 8, where individual legal ethics rules are being considered and how these legal ethic rules should apply to Legal Tech solutions providers and even their directors.

C. Fair Competition

Fair competition goes both ways – by (1) removing the monopoly held by lawyers to perform certain legal services; (2) equalizing the playing field between all participants in the legal industry by leveling the requirements needed to become admitted as a practicing lawyer; and (3) raising the standards of Legal Tech solution providers by making sure that they at least provide minimum standards of legal services. The latter is done by requiring Legal Tech solution providers to comply to certain rules and regulations, such as compliance to legal ethics and professional indemnity insurance, thereby resulting in their overhead costs to be similar to that of lawyers.

The EU has always stressed the importance of fair competition and has constantly sought to ensure that there is fair competition in the EU market. This is clearly evident through merger control laws such as the EC Merger Regulation,⁵⁸⁶ which is intended to limit oligopolies and monopolies from forming. In line with EU thinking and principles, the monopoly held by law firms and the unfair competitive advantage that the Legal Tech solution providers have should be addressed. The argument that the removal of the monopoly of legal services will result in poorer quality legal services is moot as lawyers who provide poor quality of legal services will be subject to complaint and disciplinary measures regardless of whether they have a monopoly or not on the legal services provided. The same would thus also apply to Legal Tech solution providers.

This then begets the question: why would anyone seek to be admitted to the bar if anyone and everyone can provide legal services? This is a completely valid question and an important one that must be dealt with. The present state of affairs results in the same thought, i.e. it makes more sense joining a Legal Tech solution provider where overheads and liability is less for the employee if he would otherwise practice at the law firm. Any proposal to regulate professional indemnity insurance would involve the coverage of the insurance. A blanket requirement for all LSPs to take on professional indemnity insurance should be enacted, although the coverage for different categories

⁵⁸⁶ Council, Regulation 139/2004 of 20 January 2004, On the control of concentrations between undertakings [2004] OJ L24 (EC Merger Regulation).

differs. The benefit of seeking admission then lies in the professional indemnity insurance – anyone who is admitted to the bar will be able to have preferential professional indemnity insurances where the cost of their insurance plan and corresponding premiums are significantly lower than that of a Legal Tech solution provider or someone who is unable to practice law. Logically, this makes sense as a Legal Tech solution provider is not obliged to employ lawyers or legally trained personnel to build its product and may thus, on a theoretical level, run a higher risk of providing negligent or inaccurate advice.

The rationale is that one who has sought admission to the bar is a competent professional, which means that he or she is less likely to be sued for malpractice and thus need not fork out extensive sums of money for insurance. On the flipside, as anyone and everyone is able to set up a Legal Tech company or provide legal services regardless of their knowledge or competency, their professional indemnity insurances will cost much more to purchase and maintain. One valid argument is that this may stunt legal innovation because Legal Tech solution providers face high barriers to entry may not be able to enter the scene due to high insurance premiums that they are made to pay before they can be operational. One way of resolving this could be by pegging the professional indemnity insurance to the directors or decision makers of the Legal Tech solution provider, i.e. if any of them is admitted to the bar, they are entitled to purchase professional indemnity insurance at a lower price than if none were admitted. This helps to ensure that legal innovation is not artificially hindered by too much, while ensuring that there is an incentive for people to seek qualification as a competent lawyer and ensuring that client-users are still adequately protected.

D. Boosting Client-User Confidence in the Legal Industry

Any proposal for regulation should also alleviate the issue of unknown standards of legal services provided by lawyers and Legal Tech solution providers as previously highlighted in Chapter 4.V.D. A client-user should be aware that legal services provided by either a lawyer or Legal Tech are subject to the same standards in terms of its provision to consumers. Furthermore, a standardized regulation of the legal industry will build the foundations for allowing lawyers to move and work in other EU member states. The client-user confidence stems from the fact that client-users are

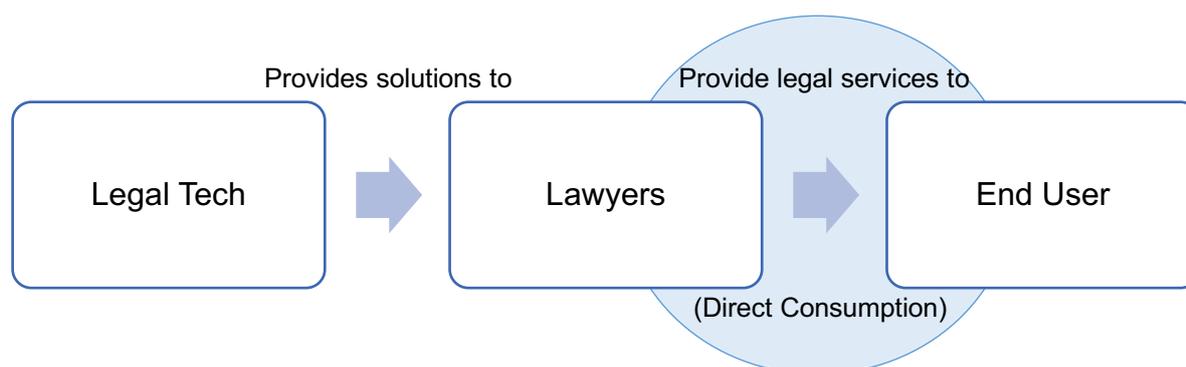
aware that the quality of legal services that they derive from one EU member state will be of comparable quality in other EU member states, as all lawyers have undergone similar admissions requirements, education and continuing legal education. At present, the legal industry is rather opaque in terms of pricing, quality and efficiency of the legal service provided. Failure to reform the legal industry may only push client-users towards seeking alternative legal service providers such as Legal Tech solution providers, where prices, quality and efficiency are more transparent.⁵⁸⁷

IV. WHAT SHOULD BE REGULATED?

A. The Direct Consumption Principle

This is the hardest question to approach and answer and is also unsurprisingly the crux of the thesis. It is submitted that the principle of “Direct Consumption” be used when determining whether a Legal Tech solution provider or lawyer ought to be regulated or not. The Direct Consumption Principle refers to the provision of legal services to the final end user. This is illustrated below:

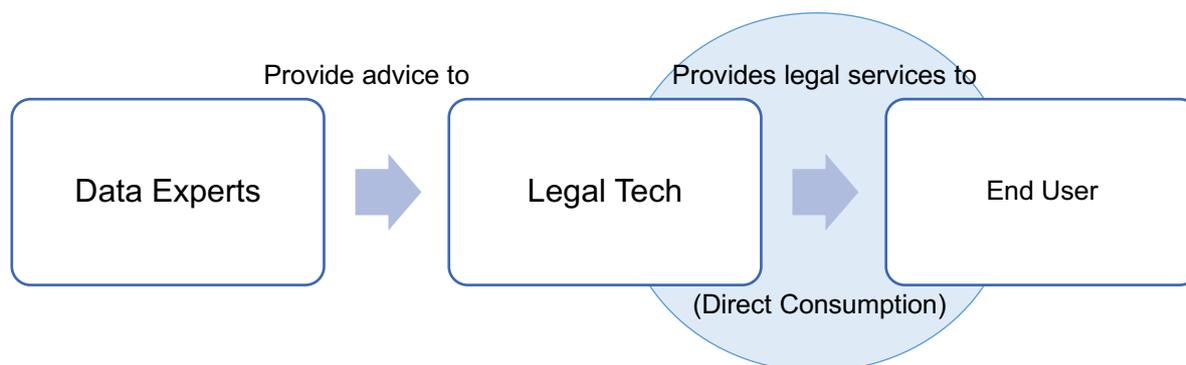
Illustration 13: Direct Consumption Principle



In the case of Legal Tech companies, the Direct Consumption Principle applies as well:

⁵⁸⁷ Legal Tech solution providers such as WillMaker advertises their services in a manner where time and prices are transparent to the public, i.e. costing a flat fee of SGD \$89 and less than 20 minutes to complete. WillMaker (n 409).

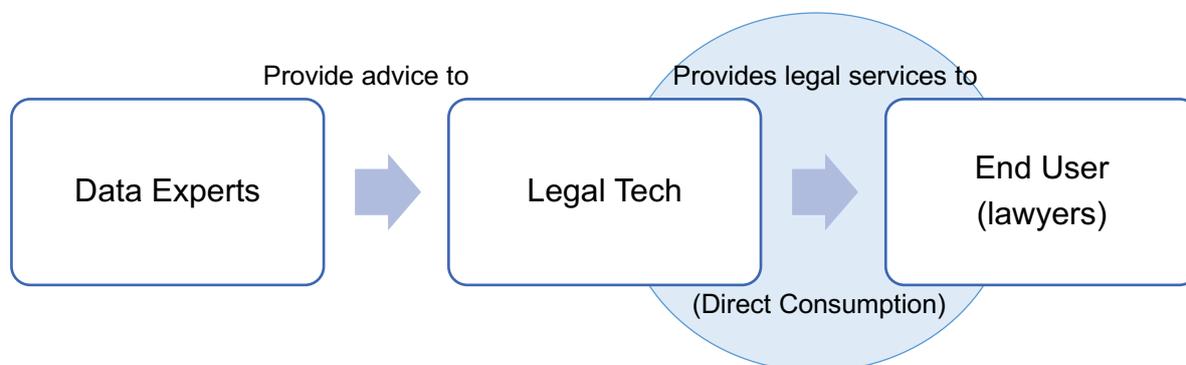
Illustration 14: Direct Consumption Principle for Legal Tech



This Direct Consumption Principle applies regardless of whether it is a Business to Business (“B2B”) or Business to Consumer (“B2C”) transaction. As existing regulations on the provision of legal services are intended to protect consumers, rule of law and access to justice, the regulation on Legal Tech and the legal profession is applied to the entity or person directly supplying legal services to the end user. Therefore, the regulation of Legal Tech applies only to entities that are providing legal services directly to the end user. In this case, such would apply to Legal Tech solution provider that provide DIY legal services.

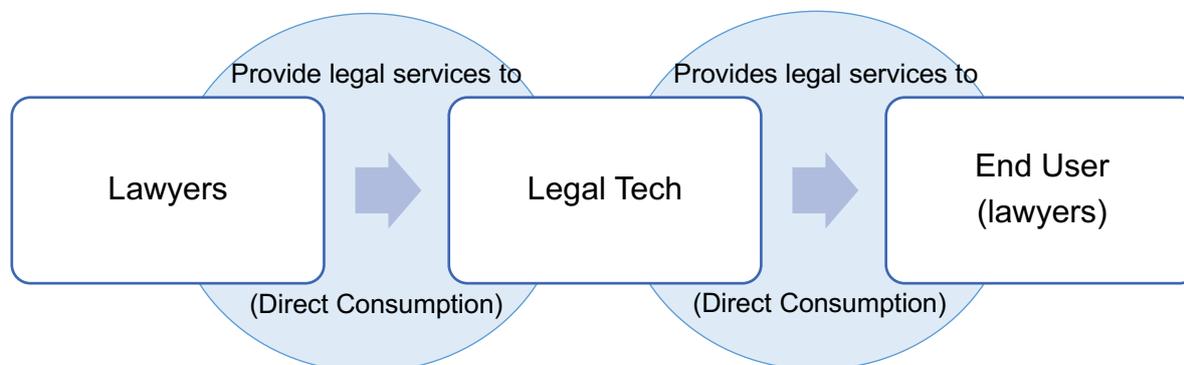
In the case of a lawyer being the End User, the Direct Consumption Principle applies as well:

Illustration 15: Direct Consumption Principle (Lawyer as End User)



To make things more complicated, the following scenario could happen as well:

Illustration 16: Direct Consumption Principle (Two-Tiered Consumption)



In the above scenario, there are in fact two end users – the Legal Tech company and the final end users who are lawyers. The regulation would thus apply on any person or entity that is providing legal services directly to an end user.

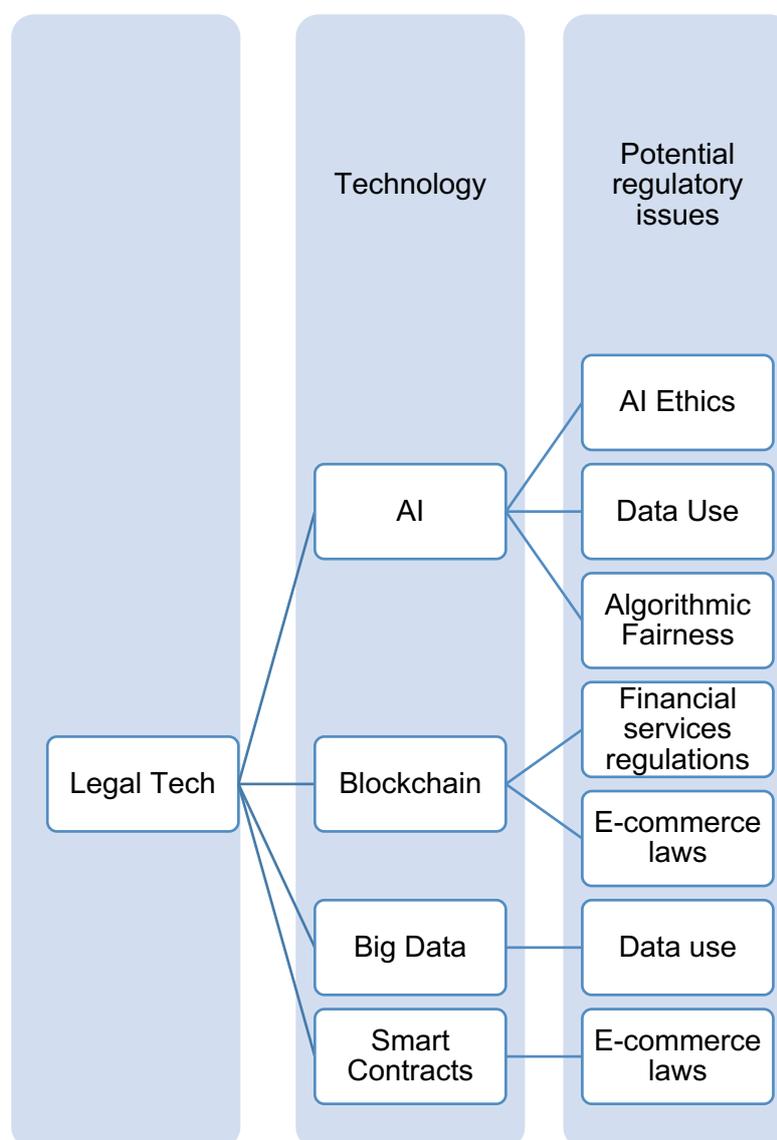
The Direct Consumption Principle identifies the entities that will be subject to regulation. As seen in Chapter 3, the regulation of lawyers is intended to ensure access to justice and consumer protection; this regulation is applied to ensure that the end user has access to justice and has adequate protection when receiving legal services. Therefore, if these principles are to be protected through the regulation of Legal Tech, and bearing in mind that Legal Tech should compete fairly with lawyers, then lawyers should not only be subject to regulation, but Legal Tech should be subject to regulation as well, and in fairness, all of these LSPs should be subject to the same regulation insofar where the provision of legal services are concerned. For ease of reference, this regulation as a concept will be called the *LSP Regulation*. In conclusion, what should thus be regulated is not just Legal Tech or lawyers but any person or entity that is providing legal services to an end user.

The regulation of Legal Tech should be considered in two-tiers: the regulation of the technology itself, and the LSP regulation. With regard to the former, consideration of the regulation of the technology itself will be discussed in the subsequent section. As for the latter, a two-pronged approach can be taken to regulate the participation of Legal Tech solution providers and lawyers in the industry: first, to equalize the playing

field as much as possible for all stakeholders while ensuring that social objectives and public goals are protected and attained; and second, to allow for greater mobility of lawyers amongst EU member states so that they can compete better vis-à-vis Legal Tech solution providers that can provide cross-border services through the harmonization of the legal industry in the EU in several aspects. The regulation of Legal Tech and the regulation of its participation in the legal industry will be further elaborated below.

B. Regulation of the Technology Enabling Legal Tech

Besides the LSP Regulation which in effect regulates how LSPs are able to participate in the legal services market, there is the question of whether the technology itself should be regulated. Despite the numerous technologies that are being used by Legal Tech solution providers, this thesis would put forth the argument that any regulation on LSPs should not encroach or in effect be a regulation on a specific technology. In this regard, it is suggested that only a regulation on LSPs and not legal technology be considered at this juncture. The key reason driving this argument is that the regulation of technology in itself will likely have to be regulated at its fundamental level, which is a regulation that crosses a multitude of industries. The illustration below shows the complexity of regulating the technology in Legal Tech:

Illustration 17: Complexity Surrounding Regulation of Technology

As seen above, each form of technology that powers Legal Tech has its own regulatory issues. For example, in the use of AI, there are numerous concerns on AI ethics that are being debated, with the EU Commission publishing a draft guideline for AI technologies.⁵⁸⁸ Legal Tech encompasses solution providers that rely on either (or perhaps even none) of these technologies to deliver legal services; in the future as technology develops, there may be different and more advanced technologies

⁵⁸⁸ See European Commission, 'The European Commission's High-Level Expert Group on Artificial Intelligence Draft' (n 219).

available for Legal Tech solution providers. Therefore, regulation of such technologies should be done at a more holistic and basic level, rather than the level of Legal Tech. This has been implemented in some jurisdictions, such as the US state of Vermont, where an omnibus legislation was enacted to enable and regulate blockchain related technologies.⁵⁸⁹

Notwithstanding the complexity of the regulation and this thesis' suggestion that the regulation of technology of Legal Tech be considered on a more holistic level, there are some key principles that should be present in any broad regulation that regulates technology powering Legal Tech. These are: (1) preventing inherent biases in technology; and (2) proper treatment of data.

1. Preventing biases in technology

Bias and the prevention thereof are unresolved problems in the field of technology. The topic of bias in technology is in itself sufficient for a doctoral thesis in many different fields such as computer science, law, business, sociology, philosophy, among many others. Nonetheless, it is pertinent to describe (although admittedly in a relatively brief manner) the importance of ensuring that the technology behind the Legal Tech solution is not biased, and the issues surrounding in trying to ensure that the technology is not biased.

Fundamental to the administration of justice is the prevention of bias.⁵⁹⁰ Subjects such as prosecutorial bias and judicial bias have been studied extensively by numerous academics and scholars in their respective jurisdictions. The cost arising from such bias has been said to “undermin[e] the rights of those whom [the] justice system is intended to serve”.⁵⁹¹ Under the EU justice scoreboard, while the word “bias” does not

⁵⁸⁹ State of Vermont, No. 205 2018, An act relating to blockchain business development.

⁵⁹⁰ See generally Alafair S Burke, 'Prosecutorial Passion, Cognitive Bias, and Plea Bargaining' (2007) 91 Marquette Law Review 183; Donald C Nugent, 'Judicial Bias' (1994) 42 Cleveland State Law Review 1.

⁵⁹¹ William A Daniels, 'The Cost of Bias in the Legal Profession' (HG.org) <www.hg.org/legal-articles/the-cost-of-bias-in-the-legal-profession-18421> accessed 20 July 2019.

appear anywhere in its 2018 EU Justice Scoreboard,⁵⁹² judicial independence is a key element in its scoreboard and the guarantee of “fairness, predictability and certainty of the legal system”⁵⁹³ is important for “an attractive investment environment”.⁵⁹⁴ Ensuring fairness is naturally connected to preventing bias – for one to be fair, one should not be biased.

However, the truth is that technology can be biased. The issue of bias has been a key topic for discussion in the realm of AI, where the notion of algorithmic fairness has been debated by scholars. Algorithmic fairness may refer to the prevention of the development of algorithms that “may inadvertently discriminate against certain groups”.⁵⁹⁵ In certain technologies such as AI and big data analytics, large volumes of data are used to train the algorithms needed to predict the results. However, the results that the algorithms produce after being trained such large datasets may be *prima facie* discriminatory – not because it was designed to be so, but because of the data. For instance, scholars have commented on the case of St. George’s Hospital in the UK, where a computer program “systematically [disfavored] racial minorities and women with credentials otherwise equal to other applicants”,⁵⁹⁶ after using data based on past admission decisions. The data used to train datasets can easily result in algorithms making unfair decisions – for instance, take the use of machine learning algorithm to predict bail amounts for a pro bono Legal Tech solution provider that intends to provide such legal advice to the client-user. Past data may show that persons from a specific racial group, age group, gender or religion may have a higher bail amount as compared to others who have committed the same crime.

Resolving this inherent bias in data and machine learning algorithms is a complex challenge. One possible solution is through data mining, where training data is selected from the large volumes of data. However, the data mining process is not in

⁵⁹² European Commission, *The 2018 EU Justice Scoreboard (2018)*
<https://ec.europa.eu/info/sites/info/files/justice_scoreboard_2018_en.pdf> accessed 15 March 2019.

⁵⁹³ *ibid* 41.

⁵⁹⁴ *ibid*.

⁵⁹⁵ Jon Kleinberg and others, ‘Algorithmic Fairness, Advances in Big Data Research in Economics’
<www.cs.cornell.edu/home/kleinber/aer18-fairness.pdf> accessed 20 July 2019.

⁵⁹⁶ Solon Barocas and Andrew D Selbst, ‘Big Data’s Disparate Impact’ (2016) 104 *California Law Review* 641, 682.

itself foolproof in preventing bias,⁵⁹⁷ and may even contribute to further bias if the party involved in selecting the training data is himself or herself inherently biased. There is therefore no concrete method in preventing bias, although there are arguably good faith attempts and reasonable attempts to prevent bias as much as possible. One can thus seek to prevent bias in algorithms, regardless of such bias being unintentional or intentional, although completely eradicating biasedness in such systems is more of a theoretical possibility than practical possibility. One possible way to ensure that Legal Tech solutions providers are committed to removing inherent biasedness as much as possible is to put in an article requiring developers to explain their algorithms and their processes, such as the GDPR, where there is a “right to explanation” on the decisions made by the algorithm.⁵⁹⁸ This however runs into other difficulties as there exists the problem of the ‘black box’ of AI, where developers are unable to explain their own AI algorithms.⁵⁹⁹ The ultimate challenge then lies in removing human bias when humans select data for machine learning and program these algorithms – this is something that even exists in the best of us.⁶⁰⁰

Nonetheless, the importance of algorithmic fairness in the development of Legal Tech cannot be understated. Within the legal framework, research has pointed out the problem of alleged bias – even if it is unintentional.⁶⁰¹ However, even if biasedness cannot be completely removed in either the algorithmic setting, in the legal framework or both, it is still necessary to reiterate the importance of being fair and unbiased in the development of such algorithms. Fairness, or at least the pursuit thereof, remains a core tenet of the legal system. As seen in the EU Justice Scoreboard, the need for “fairness, predictability and certainty” is guaranteed by independence⁶⁰² – therefore, while it is accepted that it is not possible to achieve 100% fairness or lack of biasedness, one should nonetheless be incentivized to strive towards ensuring

⁵⁹⁷ *ibid* 674.

⁵⁹⁸ Andrew Burt, ‘Is there a ‘right to explanation’ for machine learning in the GDPR?’ (IAPP 1 June 2017) <<https://iapp.org/news/a/is-there-a-right-to-explanation-for-machine-learning-in-the-gdpr/>> accessed 20 July 2019.

⁵⁹⁹ Will Knight, ‘The Dark Secret at the Heart of AI’ (MIT Technology Review 11 April 2017) <www.technologyreview.com/s/604087/the-dark-secret-at-the-heart-of-ai/> accessed 20 July 2019.

⁶⁰⁰ See Chapter 4.V.D, which highlights that in one study, judges were also found to be biased.

⁶⁰¹ One such instance of unintentional bias, i.e. the case of Israeli judges granting parole, has been earlier discussed in this thesis. See Bryant (n 413).

⁶⁰² European Commission, *The 2018 EU Justice Scoreboard* (n 592) 41.

fairness and removing biases in their Legal Tech solutions. This principle also applies to other technological applications and is definitely one of the key principles to consider if any state intends to enact legislation on technologies that rely on algorithms to produce a result that will be relied upon. An additional ethical rule may be required to be enacted to require Legal Tech service providers create programs that are unbiased to the best of their ability.

2. Treatment of data

Another important aspect is the treatment of data – in this case, the use and protection of data. The previous section has covered the problem of bias resulting from data and the topic of algorithmic fairness, in this case, the treatment of data is inherently linked to the GDPR. The GDPR has strict rules on the process of personal data; however, considering that other sensitive commercial data is also used in legal services and the client confidentiality in the legal industry, the treatment of data becomes and even more pertinent topic. The use and protection of sensitive data to develop Legal Tech solutions should be addressed as such data, if leaked or stolen, can be severely detrimental to the client-users of the Legal Tech solution providers.

Some ideas on better use and protection of data for certain technologies have been put forth by academics, such as the use of a data trust for AI. A data trust is essentially a structure that contains data that is managed by third-party stewards, who govern the use of such data by other third-parties.⁶⁰³ Data trusts have been suggested as a method to ensure that the “repurposed data can only be used in ways which respect the rights and interests of data subjects”.⁶⁰⁴ Theoretically, a data trust can be set up and administered by the regulatory authority on LSPs, whereby anyone intending to use data to develop their Legal Tech solution providers can draw from this data trust. The regulatory authority would ensure that the data in the data trust has been pseudonymized or removed of identifying information that renders it less commercially

⁶⁰³ Open Data Institute, ‘What is a data trust?’ <<https://theodi.org/article/what-is-a-data-trust/>> accessed 15 March 2019.

⁶⁰⁴ Chris Reed and Irene Ng, ‘Data Trusts as an AI Governance Mechanism’ <<https://ssrn.com/abstract=3334527>> accessed 20 July 2019.

sensitive or will not be a breach of a data subject's rights under the GDPR if the Legal Tech solution provider has a breach in its security and data is stolen.

While this is a possibility to provide more options to harvest useful data to Legal Tech solution providers, this however does not solve the problem of Legal Tech solution providers who are themselves collecting data. At present, Legal Tech solution providers are bound by the provisions of the GDPR, the Trade Secrets Directive and whatever they have agreed contractually with the end user. Ethical rules on client confidentiality do not currently apply to Legal Tech solution providers, nor do Legal Tech solution providers possess the right to attorney-client privilege. It is suggested that considering data processed by such companies can contain not only personally sensitive data but also commercially sensitive data, the data use and protection regimes of such Legal Tech solution providers – regardless of whether they provide legal solutions to law firms or directly to client-users – should be regulated at a higher degree, similar to that of law firms and lawyers.

V. CHAPTER SUMMARY

This chapter discussed the questions concerning whether Legal Tech should be regulated, in particular the questions of *who* should be subject to regulation, *why* should Legal Tech be regulated and *what* should be regulated. Who should be subject to regulation would be LSPs; why Legal Tech should be regulated is to ensure that regulatory goals such as access to justice and fair competition are met when client-users use Legal Tech solutions and when Legal Tech solutions and lawyers operate in the same market for legal services.

As for what should be regulated, the Direct Consumption Principle was put forth as one of the key principles in establishing who should be subject to regulation. The chapter also suggests for an LSP Regulation, which is important in harmonizing and standardizing the present laws in the EU to a more coherent set of laws that equalize the playing field for both LSPs. This can be done in a two-pronged approach that first involves the harmonization of the legal profession and second the harmonization of the provision of legal services. Combined, this is what should be regulated in the legal industry. The framework for regulation will be set out in the next chapter.

Chapter 8: A New Framework on the Regulation of the Legal Profession – The Legal Services Provider Regulation

I. INTRODUCTION

As the previous chapter sets out the parameters for the LSP Regulation, this chapter focuses on the actual mechanics and system behind the LSP Regulation. As for dealing with *how* the regulation of Legal Tech should be implemented, this chapter will divide it into two portions: first, a framework for the regulation of Legal Tech itself, and second, a framework for the regulation of Legal Tech solution providers' ability to provide legal services in the legal industry. This chapter will also discuss about the impact of the framework on existing stakeholders and their roles; furthermore, it will also consolidate the discussions in the earlier chapter and this chapter to propose an approach in the regulation of Legal Tech for the future.

II. A FRAMEWORK FOR REGULATING THE PARTICIPATION OF LEGAL TECH SOLUTION PROVIDERS IN THE LEGAL INDUSTRY

The LSP Regulation is, in essence, a regulation intended to regulate the participation of LSPs in the legal market. This thesis proposes that there should be some regulation of Legal Tech solution providers so as to ensure that key societal goals and secondary objectives are achieved to the maximum possible. There are always calls to implement new rules and regulatory measures; however, the implementation of such rules and regulations is a practical difficulty in the EU and the EU member states. This section will propose a framework for enacting the LSP Regulation, which can be done in two different methods – (1) if political will and bureaucracy permits,⁶⁰⁵ an entire reform of

⁶⁰⁵ The process to start discussions and finally enact an EU regulation or directive may be lengthy, as public consultations may be conducted and the European Parliament and the Council will have to review proposals put forth by the European Commission. European Union, 'How EU decisions are

the rules concerning legal industry that will also apply to Legal Tech solution providers, i.e. a full reform that applies to all LSPs; or (2) if an entire reform is not possible, a standalone set of rules where existing rules are not modified but a legislation that would implement the following suggestions would serve the purpose instead, i.e. a standalone legislation.

A. Fundamental Considerations

These fundamental considerations apply to both frameworks, i.e. an entire reform or standalone legislation. These fundamental considerations include the satisfaction of the right to legal representation, the adherence to technology neutrality, the adherence to key principles of legislation and EU competence issues.

1. Satisfaction of the right to legal representation

The right to be represented by a lawyer in certain situations, such as that in criminal trials that may affect one's liberties and rights, is an important human right that is protected by the EU Charter.⁶⁰⁶ The importance of this right and issues surrounding how Legal Tech has affected it has been earlier discussed in Chapter 5.II.B.2, and it can be concluded that at present, a client-user of a Legal Tech solution provider would not be deemed as having exercised his or her right to legal representation, i.e. he or she is still permitted to seek a lawyer to represent him or her in the proceedings.⁶⁰⁷

The question therefore lies in whether the use of any LSP would be deemed as having satisfied the right for legal representation or should there be a differentiation between an LSP who is a lawyer or an LSP which is a Legal Tech solution provider, i.e. use of a lawyer would be deemed as having satisfied the right for legal representation while use of a Legal Tech solution provider would not be. In this case, the public policy consideration of the right to a fair trial and the right to a lawyer is paramount, especially

made' <https://europa.eu/european-union/eu-law/decision-making/procedures_en> accessed 11 March 2019.

⁶⁰⁶ See Chapter 5.II.B.2.(i).

⁶⁰⁷ See Chapter 5.II.B.2.

if one's liberties are at stake. It is thus suggested that in the case where a party might be deprived of his or her liberty, i.e. a criminal charge with a possible jail sentence, only lawyers are permitted to represent or defend their clients in court. This ensures that the rights of the accused persons are properly protected, while at the same time, persons who have committed minor crimes that do not warrant a jail sentence may seek cheaper alternatives provided by LSPs that are not lawyers, and to prevent repeated claims, using these LSPs would count towards having had legal representation. This would then be a balance between ensuring an accused person who might be deprived of his or her liberty will be adequately protected by a qualified lawyer, while balancing the need for access to justice and preventing repeated claims due to procedural issues, e.g. improper representation by an LSP that is not a lawyer.

There is also a valid argument that such accused persons should be able to benefit from more affordable fees with respect to legal representation from a Legal Tech solution provider. However, for those who truly cannot afford legal fees, they are normally entitled to free legal aid and be represented by a qualified and experienced lawyer for free. This is in the case in Austria, where an applicant who has a "poor financial background may be granted legal aid by the court upon petition and will be offered by the bar fir free representation".⁶⁰⁸ In this case, those who are unable to pay their legal fees are afforded protection regardless of whether there is a Legal Tech solution provider, and the access to justice is still preserved.

While there may be a distinction in who may or may not provide legal services in a situation where an accused person might be deprived of his or her liberty, the LSP regulation should not discriminate against non-lawyer LSPs and should have the same approach in qualifying and registering either lawyers or Legal Tech solution providers. These LSPs should also be allowed to freely operate in any other sphere.

⁶⁰⁸ Die Österreichischen Rechtsanwälte, 'Legal Aid' <www.rechtsanwaelte.at/en/support-and-services/services/legal-aid> accessed 7 June 2019.

2. Technology neutrality

The Legal Tech landscape is constantly changing and with this constant change comes new technologies or updates of existing technologies. The current generation of Legal Tech solutions is using technologies such as blockchain,⁶⁰⁹ smart contracts,⁶¹⁰ AI⁶¹¹ and big data analytics.⁶¹² However, with the development of new prototypes of technologies or commercial developments of specific technologies such as quantum computing, the Legal Tech landscape will definitely continue to experience multiple changes in the years to come. From a legislative standpoint, this means that a technology neutral approach should be taken when preparing a law regulating Legal Tech. Technology neutrality was coined in the mid-90s when the United Nations Commission on International Trade Law (“UNCITRAL”) was preparing the Model Law on Electronic Commerce,⁶¹³ which was the first international model law that would serve as a basis to enable electronic documents to be legally accepted in commercial transactions.⁶¹⁴ The Model Law on Electronic Commerce⁶¹⁵ was designed to be technology neutral,⁶¹⁶ i.e. it did not make reference to specific technologies such as an Electronic Data Interchange (“EDI”) or electronic mail. Rather, it was drafted in a way where the law would continue to apply regardless of which technology was used or chosen.

⁶⁰⁹ Nick Hall, ‘9 Ways the Blockchain Will Change the Legal Profession’ (Crypto Briefing 26 October 2018) <<https://cryptobriefing.com/9-ways-the-blockchain-will-change-the-legal-profession/>> accessed 20 July 2019.

⁶¹⁰ Jurij Lampič, ‘Ricardian contracts: A smarter way to do smart contracts?’ (Schönherr 2019) <www.schoenherr.eu/publications/publication-detail/ricardian-contracts-a-smarter-way-to-do-smart-contracts/> accessed 20 July 2019.

⁶¹¹ Cat Rutter Pooley, ‘Legal tech uses AI to help business to help itself’ (Financial Times 15 November 2018) <www.ft.com/content/7a990f1a-d067-11e8-9a3c-5d5eac8f1ab4> accessed 11 March 2019.

⁶¹² Jeff Pfeifer, ‘The Data-Driven Lawyer and the Future of Legal Technology’ (Law Technology Today 15 January 2018) <www.lawtechnologytoday.org/2018/01/the-data-driven-lawyer/> accessed 20 July 2019.

⁶¹³ UNCITRAL, ‘UNCITRAL Model law on Electronic Commerce (1996)’ <www.uncitral.org/uncitral/en/uncitral_texts/electronic_commerce/1996Model.html> accessed 11 March 2019.

⁶¹⁴ *ibid.*

⁶¹⁵ UNCITRAL Model Law on Electronic Commerce with Guide to Enactment 1996 with additional article 5 bis as adopted in 1998.

⁶¹⁶ *ibid.* 8.

The end result is that the Model Law on Electronic Commerce remains applicable to this day, despite it being enacted in 1996. More than two decades have passed and there are countries in the EU that still have their e-commerce laws premised on the Model Law on Electronic Commerce; one of such countries is Slovenia.⁶¹⁷ When designing and drafting a regulation on Legal Tech, the principle of technology neutrality should be adopted so as to ensure that it remains relevant even as Legal Tech solution providers discover alternative methods using new technologies to deliver legal services. This means that for instance, reference should not be made on AI, smart contracts or any technology. In this regard, there should not be any reference to Legal Tech even. The regulation should simply be drafted to state that the regulation applies to any legal service provider that seeks to provide legal services to legal entities, regardless of the mode of delivery. In this rapidly developing world, everything is subject to change – even what constitutes Legal Tech is not protected from such changes as well.

3. Adherence to the key principles of regulation

As previously discussed in Chapter 3.II.A, the goal of the regulation of the legal industry is to ensure that societal objectives such as access to justice are met. Therefore, regardless of reforming the legal industry in its entirety or enacting a standalone legislation, the key principles of access to justice, consumer protection and fair competition should be met. The key principles of legal ethics should also be borne in mind.

4. EU competence

One of the key considerations is whether the EU has the competence to regulate such matters. This is set out in Articles 3 to 6 of the Treaty of the European Union.⁶¹⁸ Insofar where the regulation of the legal industry is concerned, the EU has shared

⁶¹⁷ Trust Service Authority of Slovenia, 'Legal Explanations Regarding the Regulation of Electronic Signatures' <www.si-ca.si/eng/eng-pravnapojasnila.php> accessed 11 March 2019.

⁶¹⁸ Consolidated version of the Treaty on the Functioning of the European Union [2016] OJ C202, arts 3-6.

competence in the internal market, consumer protection and in the area of freedom, security and justice.⁶¹⁹ Therefore, the regulation of the legal profession should fall under the competence of the EU.

However, the EU has supporting competences in the area of education and education training, where the EU “can only intervene to support, coordinate or complement the action of EU countries” and “legally binding EU acts must not require the harmonization of EU countries’ laws or regulations.”⁶²⁰ It goes without saying that any framework that deals with the harmonization of legal education has to complement the national laws of member states and must not require them to change their laws on education. This is an important aspect to consider and will be raised at appropriate junctures in the sections below.

B. The LSP Regulation: A Two-Pronged Approach

The LSP Regulation governs the participation of LSPs. One key element in the participation of LSPs in the legal industry is the need for fair competition, i.e. the playing field for LSPs has to be equalized. A two-pronged approach can be used to implement the LSP Regulation – the first step is to harmonize the legal profession, i.e. the admissions and regulations on lawyers, so that there will theoretically be less distinctions across EU member states on how lawyers will be admitted, as Legal Tech solution providers can operate cross-border without as much difficulty as lawyers.⁶²¹ Such aspects include: (1) standardizing the admissions process; (2) standardizing who is entitled to retain the title of “lawyer”; (3) standardizing the conditions to retain the title of “lawyer”; (4) standardizing the code of ethics for legal ethics and interpretation of the same code of ethics; (5) standardizing the registration of LSPs; and (6) the definition of legal services and who is permitted to provide said legal services.

⁶¹⁹ *ibid*, art 4.

⁶²⁰ EUR-Lex, ‘Division of Competences within the European Union’ <<https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=LEGISSUM%3Aai0020>> accessed 6 June 2019.

⁶²¹ Fina, Ng and Vogl (n 38) 248.

The next step, after harmonizing the admissions process for lawyers, is to harmonize the rules concerning the provision of legal services by any LSP in the EU. This will further ensure that all LSPs are competing under the same rules and procedures. The following steps should thus be taken: (1) de-monopolization of the provision of legal services; (2) blanket application of legal ethics to all LSPs; (3) the need for professional indemnity insurance and the quantum of the insurance required; (4) standardizing the registration of LSPs in the EU; and shareholding and ownership of LSPs.

Illustration 18: Two-Pronged Approach in a Nutshell

Two-Pronged Approach	
Harmonization of the legal profession <ul style="list-style-type: none"> • Standardizing admissions process • Standardizing who can retain the title of "lawyer" • Standardizing conditions to retain title of "lawyer" • Standardizing code of ethics for legal ethics • Standardizing definition of legal services 	Harmonization of the provision of legal services <ul style="list-style-type: none"> • Demonopolization • Blanket application of legal ethics • Professional indemnity insurance • Standardizing registration of LSPs in the EU • Shareholding and ownership of LSPs

The two-pronged approach will be further elaborated in the subsequent paragraphs.

C. Two-Pronged Approach: Harmonization of the Provision of Legal Services in the EU

The present EU laws such as the Establishment Directive and the Mutual Recognition Directive are mainly enacted to permit the freedom of establishment and the provision of services by lawyers to other EU member states. This is the right step in furthering the goals of the internal market. However, in light of Legal Tech and its potency to provide cross border services, the EU can take the further step of harmonizing the

existing rules surrounding the legal industry. These include: (1) standardizing the admissions process; (2) standardizing who is entitled to retain the title of “lawyer”; (3) standardizing the conditions to retain the title of “lawyer”; (4) standardizing the code of ethics for legal ethics and interpretation of the same code of ethics; (5) standardizing the registration of LSPs; and (5) the definition of legal services and who is permitted to provide said legal services. This harmonization is intended to help lawyers operate cross-border more easily.

1. Standardization of the admissions process

The admission process across all EU member states is currently disharmonized. As seen in Chapter 3.IV, there is no standardization on when one becomes admitted as a lawyer across the EU. In the UK, a non-EU national can seek admission as a solicitor or barrister,⁶²² while in Austria, one must have EU or EEA citizenship before they are allowed to be called to the bar as a *Rechtsanwalt*.⁶²³ The number of years to fulfill the practice requirements for admission to the bar also differs across each EU member state,⁶²⁴ while others have specific conditions that one must fulfill before they are eligible to undertake the bar examination, such as the practice of law for a fixed period amount of years.⁶²⁵ The bar examination which is implemented in almost all EU member states is likewise uncoordinated in terms of the conditions to take the bar examination, the difficulty of the bar examination and the method of the bar examination. As a result, candidates who intend to take the bar examination have to take varying number of months off – unpaid or paid leave – just to prepare for the bar examination.

The widely varying admissions procedure naturally induces younger generations of lawyers to ‘cherry pick’ which is the fastest way to gain admission to the bar.⁶²⁶ Furthermore, in some EU member states, the long and arduous path to gain

⁶²² Solicitors Regulatory Authority, *SRA Handbook* (n 163), ch SRA Admission Regulations 2011.

⁶²³ *Rechtsanwaltsordnung* (n 69), §1.3(3).

⁶²⁴ See generally Nascimbene (n 16). Nascimbene provides a good comparison of the practice requirements in each EU member state, although this information may have changed since 2009.

⁶²⁵ *ibid.*

⁶²⁶ See Chapter 3.II.A.

admissions to the bar is a disincentive to continue on working as a lawyer. In some cases where a bar candidate might take one year off to prepare for the bar examination, younger generations may question why they should follow this difficult path when they can choose to work for Legal Tech solution providers or go in-house instead. In addition, several EU member states such as Austria and Slovenia have imposed a lifetime ban to take the bar examination if a candidate has failed the bar examination after a maximum number of tries⁶²⁷ – thereby invalidating someone of their future career path or potential income, and only serves to augment the mindset that it is not worth it to become a lawyer, especially if the stress from work is insurmountable and salaries are marginally better at a law firm. It would thus not be surprising if there were an exodus of young lawyers or less graduates interested in practicing law as a lawyer.

Besides helping to prevent ‘cherry-picking’, a standardized admission process also helps in setting the path for easier recognition of foreign attorneys that intend to practice in another jurisdiction. This also strengthens the sentiment amongst younger lawyers that there is no comparison on which bar admission procedure is easier or more difficult, and thus builds the general belief that everyone has to go through the same process in order to attain the same qualification regardless of whichever EU member state that one works at and studies in. In some EU member states, where the bar admissions procedure is well-known to be arduous, a standardization procedure may help to practically reduce the number or duration of specific requirements or remove the lifetime ban of sitting for the bar examination. This may thus motivate younger lawyers to decide to practice law as a career; instead of making admissions processes harder, the idea is to simplify and allow for easier admission to the bar. Standardization should involve the following aspects as listed below.

⁶²⁷ Rechtsanwaltsprüfungsgesetz (n 305), art 25(2). In Slovenia, candidates are only permitted to take the examination thrice. Zakon o pravniškem državnem izpitu 1994 (n 255), art 20.

- (i) *Standardization of educational requirements needed before one is entitled to apply to be a qualified person under the law to take the bar examination.*

Standardization of educational requirements refers to the degree one must obtain or the amount of ECTS that one must fulfill before they are considered ready for the bar examination. In the UK and Ireland, obtaining an LLB (normally a three-year course, 180 ECTS) is sufficient for satisfying the educational requirements. However, in most of continental Europe, a candidate must obtain an LLM (normally a four-year course, 240 ECTS) before they have satisfied the educational requirements. Standardization should thus be made to specify the educational duration.

Courses that a law student must take should also be standardized as well. In some EU member states, the type of courses that a law student must take is specified in the legislation governing the regulation of lawyers,⁶²⁸ whereas in other EU member states, this is confined to the degree that one must receive.⁶²⁹ There should be a baseline standardization of courses and correspondingly same amount of ECTS that all law students must undergo, such as EU law, constitutional law of the EU member state that they are studying law at, law of obligations, legal philosophy (Common Law and Civil Law traditions), and other basic legal studies that are useful for local practice and cross-border EU practice. This will provide some comfort to employers or law firms that the students that they hire have at least a basic educational background regardless of which law school in the EU that they study at. This will hopefully pave the way towards greater mobility of future generations of lawyers if they choose to work in a different EU member state from where they received their education from.

Considering that the EU does not have exclusive or shared competence on matters concerning education, trying to convince universities to take up this new curriculum can be tricky. In this regard, the EU can only formulate educational guidelines for these universities as to what topics should universities teach to their students. One possible method of getting universities to adopt this curriculum can involve the bar examination.

⁶²⁸ Rechtsanwaltsordnung (n 69), §3.(2).

⁶²⁹ Zakon o odvetništvu 1993 (n 94), art 25.

If an EU wide bar examination is implemented and administered by an EU bar association, then the candidates are required to have studied all the courses listed in the EU's educational guidelines for law candidates as a condition precedent to registering for the EU bar examination. Therefore, competitive universities that wish to ensure that their students are able to take the EU bar examination will ensure that their curriculum fits the educational guidelines. Further elaboration on an EU bar examination and EU bar association can be found in subsequent sections.

(ii) Standardization of the format of the bar examination

There is presently no standardization on the format of the bar examination or the difficulty of the examination. Therefore, some bar examinations are notoriously known to be much more difficult as compared to others. Besides difficulty, some bar examinations encompass multiple parts such as a two-day written examination where one has to write and submit two judgments for marking and an oral examination before a panel of five examiners,⁶³⁰ where both written and oral examinations may be held several weeks apart, while some bar examinations involve a multiple-choice question and a set of written examinations.⁶³¹ Standardization will help to ensure that every candidate will be taking at least a similar type of examination and this will hopefully pave the way to mutual recognition of bar examinations amongst different EU member states.

(iii) National bar examination

There are no doubt questions – and very legitimate ones – about how lawyers under a standardized scheme will be able to practice local law. While the education provided to them by universities should confer some form of understanding to these students, an approach similar to the US State of New York can be adopted. Insofar where examinations are concerned, admission to the State of New York requires one to complete the UBE and an examination on local laws called the New York Law

⁶³⁰ Zakon o pravniškem državnem izpitu 1994 (n 255), arts 22-26.

⁶³¹ The UK QLTS examination is designed this way. Kaplan QLTS, 'OSCE Objective Structured Clinical Examination' (n 256).

Examination (“NYLE”).⁶³² The NYBE can only be undertaken after candidates have completed the New York Law Course (“NYLC”),⁶³³ which is an online course with practice questions to aid students in their understanding of important subjects such as “Administrative Law, Business Relationships, Civil Practice and Procedure, Conflict of Laws, Contracts, Criminal Law and Procedure, Evidence, Matrimonial and Family Law, Professional Responsibility, Real Property, Torts and Tort Damages, and Trusts, Wills and Estates”.⁶³⁴ The NYLC provides the fundamentals of New York state laws for any person seeking the bar examination – this also ensures that regardless of whichever university one has graduated from, one is deemed to have the knowledge in the NYLC at the very least. The NYLE then tests the concepts taught in the NYLC.

By having the UBE and the NYLE, federal law and state laws of the US are examined. The EU can have a similar bar examination, called the EU Bar Examination, where EU law and key subjects and principles of civil law and common law are examined at the EU Bar Examination. After which, each country may have a national bar examination containing important local laws. The format of the national bar examination should also be harmonized, and it should not be more extensive in scope than the EU bar examination, although the content will naturally differ from each member state. The national bar examination will also be in the national language of the country. The concept of an EU bar examination together with a national bar examination will then ensure that all EU lawyers have the same base knowledge and understanding of laws needed, while at the same time having the requisite knowledge to operate properly in their local jurisdictions.

(iv) Standardization of the administration of the bar examination

The administrators of the bar examination should also be standardized. In some EU member states, the Ministry of Justice is in charge of administering or overseeing the

⁶³² The New York State Board of Law Examiners, ‘NYLC & NYLE Course Materials & Sample Questions’ <www.nybarexam.org/Content/CourseMaterials.htm> accessed 16 March 2019.

⁶³³ The New York State Board of Law Examiners, ‘New York Law Course (NYLC)’ <www.newyorklawcourse.org/> accessed 16 March 2019.

⁶³⁴ *ibid.*

bar examination, whereas in other EU member states,⁶³⁵ the bar associations are involved in the administering of the examination.⁶³⁶ It is suggested that the administrator of the bar examination should be standardized so that the EU bar examination can be administered better.

2. Standardizing who is entitled to retain the title of “lawyer”

While the Establishment Directive lists down the titles that will be afforded the rights under the directive, each EU member state has different conditions on when one is permitted to call himself a lawyer. Some EU member states do not require a person to be practicing as a lawyer to use the title of a lawyer although the title would be that of a non-practicing solicitor,⁶³⁷ whereas some EU member states require a person to be practicing before they are entitled to use the title of a lawyer.⁶³⁸ This itself comes with some problems: a person who is admitted to the bar in an EU member state which does not permit persons to use the title of a lawyer unless he or she is practicing law with a practicing certificate will not be able to use the Establishment Directive to seek admission to the bar in another EU member state, whereas in the case of a person who is admitted to the bar in an EU member state which allows persons to retain their title of lawyer regardless of whether he or she is practicing law is prima facie entitled to seek admission to the bar in another EU member state. This is due to the Establishment Directive basing the right to seek admission to the bar in another EU member state on the attaining of the title of lawyer. Therefore, to allow everyone to properly benefit from the use of the Establishment Directive, standardization on the retention of the title of lawyer should be done.

⁶³⁵ This is in the case of Slovenia, where the Ministry of Justice is in charge of administering the bar examination.

⁶³⁶ This is in the case of the UK, where the Solicitors Regulation Authority is in charge of overseeing the bar examination process.

⁶³⁷ This is in the case of the Spanish bar where lawyers are entitled to use the title of lawyer if they have practiced for 20 years, although they would have to add “non-practicing” in their title. This is the same for the UK, where solicitors who remain registered on the roll are entitled to call themselves solicitors but with the appendix “non-practicing”. See Estatuto General de la Abogacía Española, Real Decreto 658/2001 of 22 June, art 9(3); Solicitors Regulation Authority, ‘FAQs about keeping of the roll’ <www.sra.org.uk/mysra/roll/faqs.page> accessed 17 March 2019.

⁶³⁸ One will be deleted from the bar (and thereafter not be able to call himself as a lawyer) if he or she is not practicing. See Zakon o odvetništvu 1993 (n 94), art 30.

3. Standardizing the conditions to retain the title of “lawyer”

Some EU member states require lawyers to undergo CLE if they intend to remain as a practicing lawyer. The CLE requirements should also be standardized as to allow for greater mobility of lawyers across the EU – this includes standardization in the number of hours lawyers need and recognition of CLE offered by other institutions or organizations in other EU member states. The standardization process can also include a “EU CLE” component and a “National CLE” component.

4. Standardizing the Code of Ethics and its uniform application and interpretation to all lawyers providing legal services in EU member states

Standardization of the code of ethics for all EU member states is the most desirable as lawyers will be held to the same ethical standards regardless of whichever EU member state that they practice in. Standardization need not be in the form of a fixed set of ethical rules, but it could also be in the form of a minimum or baselines set of legal ethics rules that all lawyers in the EU are expected to comply with. Inspiration can be taken from the ABA Model in the US, where most states in the US derive their code of conduct from the ABA Model Rules of Professional Conduct.⁶³⁹ This permits for standardized ethics examinations to be held and recognized, such as the MPRE in the US,⁶⁴⁰ and it also paves the way for uniform interpretation and application of legal ethics rules, thereby allowing for easier mobility for lawyers in the US.

The CCBE has a Code of Conduct for European Lawyers (“CCBE Code of Conduct”), which contains ethical rules such as confidentiality, protection of client’s interest, conflicts of interest, fee regulations, amongst other rules.⁶⁴¹ The Code of Conduct for

⁶³⁹ American Bar Association, *Model Rules of Professional Conduct* <www.americanbar.org/groups/professional_responsibility/publications/model_rules_of_professional_conduct/model_rules_of_professional_conduct_table_of_contents/> accessed 11 March 2019.

⁶⁴⁰ National Conference of Bar Examiners, ‘Multistate Professional Responsibility Examination’ (n 254).

⁶⁴¹ Council of Bars and Law Societies of Europe, *Charter of Core Principles of the European Legal Profession and Code of Conduct for European Lawyers* <www.ccbe.eu/NTCdocument/EN_CCBE_CoCpdf1_1382973057.pdf> accessed 16 March 2019 (CCBE Code of Conduct).

European Lawyers is binding to CCBE members, which membership includes almost all of the EU member states and several EEA member states.⁶⁴² In this regard, the CCBE Code of Conduct can be used as a baseline standard for the enacting of the standardized code of ethics for EU member state, considering that almost every bar association in the EU are theoretically required to adopt the code in their national codes. For the purposes of further discussion, this Code of Conduct for lawyers in the EU will be called the EU Code of Conduct.

In order to ensure the uniform interpretation and application of the EU Code of Conduct, an EU bar association (for the purposes of this thesis, this will be called “EU Bar Association”) should be created to provide guidelines and advice to lawyers that need help on the interpretation and application of the EU Code of Conduct. The function of the EU bar association would be similar to that of national bar associations, such as to provide assistance on the application of the EU Code of Conduct for lawyers caught in a tricky ethical situation. Furthermore, the EU Bar Association will be in charge of researching and providing guidelines for the interpretation of its EU Code of Conduct.

As a standard model code of conduct on ethics, the EU Code of Conduct will set the basis for future harmonization in legal ethics in the EU. The EU Code of Conduct furthermore serves as an important document if subsequent reforms are to be made to not just the standardization of the legal profession, but also to the harmonization of the provision of legal services. The harmonization of the provision of legal services would also implicitly call for the blanket application of legal ethics not just on legal professionals but also to Legal Tech solution providers, i.e. any entity or person that is providing legal services in the EU. Law firms and Legal Tech solution providers are then able to be subjected to the same code of conduct and the same interpretation thereof, thereby levelling the playing field while simultaneously ensuring that client-users are benefitting from the same consumer protection standards that are set in the standardized code of conduct.

⁶⁴² Council of Bars and Law Societies of Europe, ‘Welcome to CCBE | About | Members’ <www.ccbe.eu/about/members/> accessed 3 June 2019.

Note, however, that the CCBE Code of Conduct does not provide for rules concerning disciplinary proceedings. The EU Code of Conduct should contain rules on disciplinary hearings so as to harmonize the disciplinary procedures for breach of ethical codes across EU member states. In principle, the EU Code of Conduct should also set out the following aspects where disciplinary proceedings are concerned: (1) composition of the disciplinary committee; (2) procedural rules of the disciplinary proceedings; and (3) appeal procedure for disciplinary judgments.

5. Standardizing the definition of legal services and who is permitted to provide said legal services

The definition of legal services should also be clarified and harmonized, if one intends to allow for fair competition for all stakeholders in the legal industry. At present, there are EU member states that restrict certain types of legal services for certain categories of lawyers, e.g. the UK where only barristers and not solicitors have full appearance of court,⁶⁴³ and on the other end of the spectrum, there are other EU member states that do not have any restriction on who can provide legal services.⁶⁴⁴

Legal services should be defined in a broad manner to encompass both legal advisory work at the transactional work and also the representation at court. The distinction between the doing of legal work and the provision of legal services should also be noted. Doing legal work involves performing legal tasks and performing legal tasks can be done by an employee for an employer, a lawyer. However, doing legal work does not necessarily mean providing legal services. The provision of legal services occurs when an LSP provides legal services to a third-party client-user or end user. Therefore, an in-house lawyer, legal clerk or legal intern are not LSPs as while they are doing legal work *for* someone, they are not providing legal services *to* someone.

⁶⁴³ See Chapter 3.IV.D.

⁶⁴⁴ Suomen Asianajajalitto (n 227).

D. Two-Pronged Approach: Harmonization on the Provision of Legal Services

1. De-monopolization of the provision of legal services from lawyers

The first step in the harmonization on the provision of legal services is to de-monopolize the provision of legal services, i.e. the practice of law is not restricted to lawyers but to Legal Tech solution providers who are registered. The de-monopolization is however not a full-fledge de-monopolization where anyone and everyone can be an LSP; rather, it is the de-monopolization of LSPs where registered lawyers and LSPs are permitted to provide legal services under the LSP Regulation. A full-fledged de-monopolization of legal services may not be in the best interest of client-users because this may cause an obstruction to justice if anyone and everyone can provide legal services, especially in cases where it involves representation at court.

One legitimate issue that naturally arises from structured de-monopolization to permit only lawyers and LSPs to provide legal services would be that of the right to appear before court – do LSPs have the right to appear before court? While there is definitely no restriction on imagining that there may be robot lawyers representing client-users in trial, it would be difficult at present or perhaps even in the near future to envision LSPs appearing in court to argue on behalf of their clients. Putting exceptions in the LSP Regulation to restrict the right of appearance to admitted lawyers is against the spirit of the de-monopolization of legal services to enable Legal Tech solution providers to operate in equal grounds and the LSP Regulation itself. However, there is an exception made for cases involving the representation of accused persons in criminal charges that may affect the liberty of the accused. This has been previously discussed at Section 8.II.A.1.

2. Standardization of the registration of LSPs

Most if not all national bar associations keep a register of lawyers, which normally states whether a lawyer is practicing, whether he has had any offence under his name and whether he is suspended or disbarred from practice. If LSPs are to provide legal services as well under the LSP Regulation, then it is only fair that LSPs are to register themselves as well. This registration of lawyers and Legal Tech solution providers can

be done at the national level, as most national bar associations should already have the system and information to keep track of the registration status and details of lawyers. The register would then be able to also check whether LSPs have paid their bar fees and whether they have paid the professional indemnity insurance, which would be mandatory for all LSPs.

Registration is simple – any person or entity intending to provide legal services pursuant to the definition provided in the LSP Regulation are required to register with the bar association. As the definition of legal services will be harmonized, it is clear when an LSP has to register himself or herself when operating in the EU. The Direct Consumption Principle also plays an important role in the definition of legal services. A lawyer who is not providing legal services to an end user need not be registered, such as an in-house lawyer as such a lawyer is doing legal work but not providing legal services. Anyone who is providing legal services to an end user pursuant to the Direct Consumption Principle must be registered. Such a scheme is comparable to other industries where registration with the appointed authority under national legislation is required or a license must be obtained from the appointed authority in order to operate in the market.

A fair question would be if a lawyer who is registered at the national bar association subsequently sets up and registers a Legal Tech company, what should the register reflect? Under the EU Code of Conduct, a registered lawyer should not be permitted to be a director of another company due to the principle of the independence of the profession.⁶⁴⁵ Therefore, if the lawyer chooses to set up and register a Legal Tech company, he or she would have to deregister himself as a lawyer and then become a director of the Legal Tech company and operate from there. There is however nothing stopping a lawyer *owning* a Legal Tech company personally. If the same lawyer chooses to work as an employee at a Legal Tech company, he or she would be deemed as working in-house and therefore need not register himself or herself as an LSP under the LSP Regulation.

⁶⁴⁵ CCBE Code of Conduct (n 641) 15.

As the registration process develops, new schemes can be put in place to spur innovation and growth in the legal industry.

3. Protection of fundamental human rights by client-users using LSPs

Under the EU Charter, certain rights under the protection of the EU Charter require the involvement of a lawyer. These rights, which have been previously discussed, include the right for legal representation and the legal professional privilege.

(i) *Right for legal representation*

While the LSP Regulation applies to all who intend to provide legal services, only LSPs that are lawyers will be permitted to provide legal representation to persons who are charged with a crime that will restrict their liberty. Otherwise, all LSPs are permitted to provide legal representation in other areas.

(ii) *Legal professional privilege*

Legal profession privilege is a basic right of clients seeking legal representation. As all LSPs are intended to be treated the same under the LSP Regulation, legal professional privilege will be awarded to all those who are registered as LSPs under the LSP Regulation. Considering that the notion and interpretation of legal professional privilege may be different across the EU member states, some efforts may also be required to harmonize the interpretation and meaning of legal professional privilege, including the procedural methods to resist an order for the revealing of documents or information protected under such a privilege.

4. Blanket application of legal ethics to all legal service providers

All LSPs should be subject to the EU Code of Conduct. This is to ensure uniformity in treatment and expectation and fair competition to those providing legal services under the LSP Regulation. In the case of a Legal Tech solution provider, application of the EU Code of Conduct may be tricky as a Legal Tech solution provider who has their registration revoked may simply create a new company and seek re-registration of the

Legal Tech company. To prevent this, it is suggested that there should be a discretionary process in the registration of Legal Tech solution providers – i.e. the registration officer can choose to deny registration if the directors, partners or sole-proprietors seeking to register the new Legal Tech company was previously involved in a similar decision-making role in a Legal Tech company which had its registration revoked. The unsuccessful applicant can apply for a review of the rejection and an appropriate review and appeal process should be put in place to ensure that such rejections are made properly by the respective registration officer.

Difficulty in application of the EU Code of Conduct to Legal Tech solution providers may be envisioned, such as in cases of conflicts of interests, independence⁶⁴⁶ or incompatible occupations.⁶⁴⁷ In this case, the EU Code of Conduct may have to be amended to clarify how these rules would apply to Legal Tech solution providers and the extension of certain ethical rules to the directors of Legal Tech solution providers. For instance, the principle of conflicts of interest would apply to any lawyer joining a Legal Tech company. Conflicts of interest would also apply to the Legal Tech company itself and also extended to directors of a Legal Tech company as a duty. Therefore, directors of such Legal Tech companies are also bound to ensure that they prevent conflicts of interests if they leave the Legal Tech company and join another company. The principle of independence is also a tricky one when applying it to Legal Tech solution providers and their directors. Ownership of the Legal Tech solution provider would in principle affect the independence of the Legal Tech solution provider as the shareholders can sway the way in which Legal Tech solution providers operate. This issue of ownership and shareholding of lawyers will be discussed in the subsequent sections.

An alternative way of applying the EU Code of Conduct would be to apply the ethical code to the directors, partners or sole proprietors of the Legal Tech solution provider personally, and then extending this to the Legal Tech solution provider as well. Therefore, the director is himself bound to act in an ethical manner, and by extension,

⁶⁴⁶ CCBE Code of Conduct (n 641) 15.

⁶⁴⁷ *ibid* 16.

the Legal Tech company that he is running is also required to act ethically. All directors, regardless of whether they are managing directors, executive directors or independent directors, who are controlling the Legal Tech company or have influence over the Legal Tech company are bound by the same ethical code of conduct. As the existing ethical codes are all worded in a manner that it applies to a person and not an entity, approaching the application of the EU Code of Conduct in this manner may help in reducing efforts during the drafting process.

If the concept of the blanket application of legal ethics is to be adopted, much work must be done to determine how the EU Code of Conduct should be worded to apply to Legal Tech solution providers and which rules are extended to their directors or how the EU Code of Conduct applies to their directors and are extended to the Legal Tech company. Using the CCBE Code of Conduct as a model, the following table provides a suggestion on how the blanket application of legal ethics should be made on (1) lawyers; (2) Legal Tech solution providers; and (3) directors of Legal Tech solution providers. It should however be noted that while the ethical rules apply to directors, parties do not seek redress from them but against the Legal Tech solution provider. Ethical rules apply to directors for the purposes of deciding whether they should remain on the board of a company or are permitted to register a new Legal Tech solution provider. The bar association may also choose to independently investigate these directors if there are alleged breaches of the EU Code of Conduct.

Table 5: Application of CCBE Code of Conduct on Different LSPs

Ethical Rule	Lawyer	Legal Tech	Director	CCBE
General Principles				
Independence	✓	✓	X	2.1.
Trust and Personal Integrity	✓	✓	✓	2.2.
Confidentiality	✓	✓	✓	2.3.
Respect for the Rules of Other Bars and Law Societies	✓	✓	✓	2.4.
Incompatible Occupations	✓	✓	X	2.5.

Personal Publicity	✓	✓	X	2.6.
Client's Interest	✓	✓	X	2.7.
Limitation of Lawyer's Liability towards the Client	✓	✓	✓	2.8.
Relations with Clients				
Acceptance and Termination of Instructions	✓	✓	X	3.1.
Conflict of Interest	✓	✓	✓	3.2.
<i>Pactum de Quota Litis</i>	✓	✓	X	3.3.
Regulation of Fees	✓	✓	X	3.4.
Payment on Account	✓	✓	✓	3.5.
Fee Sharing with Non-Lawyers	✓	✓	X	3.6.
Cost of Litigation and Availability of Legal Aid	✓	✓	X	3.7.
Client Funds	✓	✓	X	3.8.
Professional Indemnity Insurance	✓	✓	X	3.9.
Relations with the Courts				
Rules of Conduct in Court	✓	✓	X	4.1.
Fair Conduct of Proceedings	✓	✓	X	4.2.
Demeanor in Court	✓	✓	X	4.3.
False or Misleading Information	✓	✓	X	4.4.
Extension to Arbitrators etc.	✓	✓	X	4.5.
Relations between Lawyers				
Corporate Spirit of the Profession	✓	✓	X	5.1.
Co-operation among Lawyers of Different Member States	✓	✓	X	5.2.
Correspondence between Lawyers	✓	✓	X	5.3.
Referral Fees	✓	✓	X	5.4.
Communication with Opposing Parties	✓	✓	X	5.5.

Responsibility for Fees	✓	✓	X	5.7.
Continuing Professional Development	✓	✓	X	5.8.
Disputes amongst Lawyers in Different Member States	✓	✓	X	5.9.

*A comprehensive elaboration of each of these ethical rules can be found on the CCBE's website

As seen above, all of the ethical rules will apply to both lawyers and Legal Tech companies so as to ensure uniformity. In the case of directors of Legal Tech companies, they will not be subject to all of the ethical rules as they are not the legal entity that is providing the legal services; rather, their responsibility is to ensure that the Legal Tech company is run in an ethical manner; hence, certain ethical rules such as confidentiality, trust and integrity apply to the directors of Legal Tech companies as well. Fiduciary duties that would otherwise apply to directors of ordinary companies or partnerships will also continue to apply to directors of Legal Tech companies. A Legal Tech director who breaches his or her ethical rules is subject to disciplinary action from the bar association.

5. Professional indemnity or liability insurance

Anyone who is practicing law should be required to undertake professional indemnity insurance. This applies to both lawyers as sole proprietors, law firms and Legal Tech solution providers that fall under the auspices of the LSP Regulation. Professional indemnity insurance goes both ways – to protect the lawyer or the Legal Tech solution provider and the client-user using the legal services. At present, only law firms and practicing lawyers are required to purchase professional indemnity insurance. Extending this to Legal Tech solution providers will also level the playing field as the overheads that one must incur to provide legal services will be less disproportionate, while also ensuring that all client-users have a practical claim (i.e. a claim where damages are actually recoverable) against any legal solution provider that they use.

The quantum of the professional indemnity or liability insurance that an LSP has to pay annually is an interesting question for discussion. This thesis puts forth the proposal that the amount of professional indemnity or liability insurance payable by individual LSPs depends on the status of their registration, i.e. as a lawyer or as a Legal Tech solution provider. A lawyer under the LSP Regulation would not be required to pay as much premiums for their professional liability insurance because having undergone the entire process of studying, testing and practice, the lawyer should be well equipped to practice law with lesser risk of malpractice. In the case of a Legal Tech solution provider, as anyone can work in a Legal Tech solution company, the premiums will have to be higher as the likelihood for malpractice is theoretically higher. The cost of the professional indemnity insurance would then be an important factor for independent lawyers who are considering working towards admission to the bar or simply setting up or joining a Legal Tech solution provider.

6. Cross-border provision of legal services by lawyers

With the national bar examination, this may hamper the provision of legal services by lawyers who intend to practice in another EU member state but do not speak that EU member state's language and are therefore unable to take the national bar examination for purposes of admission and thereafter registration to practice. This will then prevent them from competing with Legal Tech solution providers that do not have this requirement as they can simply register and make the necessary declarations, thereby allowing them practice quickly.

The importance of language cannot be overlooked as law is language specific. Similar to the Establishment Directive, a foreign lawyer registration scheme would be introduced, whereby lawyers are permitted to register in another EU member state as a foreign lawyer immediately and are able to practice EU law and the laws of the EU member state that he or she is qualified in immediately. However, the said foreign lawyer would be required to practice in the local setting for three years with conditions similar to the Establishment Directive, after which, he or she will be permitted to be admitted to that bar. Otherwise, the foreign lawyer can also sit for the national bar examination and be admitted immediately upon passing the national bar examination, so long that he or she retains the title of lawyer in his or her own home jurisdiction.

The precondition to take the national bar examination is satisfied when an applicant has fulfilled the requirements to take the EU bar examination. Therefore, a foreign lawyer seeking admission has two options to be admitted to practice in a target EU member state, instead of having to go through the entire admission process as is the current situation or qualify by virtue of the Establishment Directive which can be a lengthy process in itself.

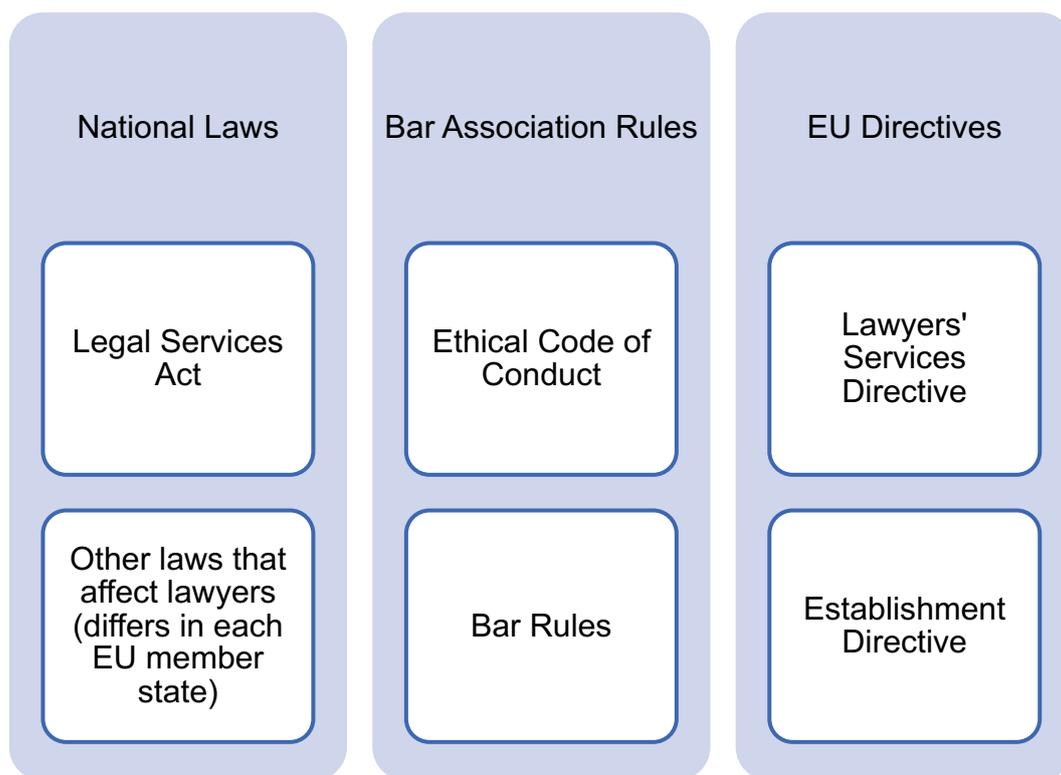
7. Shareholding and ownership of LSPs

Under the LSP Regulation, the rules on shareholding and ownership of law firms will be restricted to active LSPs who are lawyers and they are not permitted to merge or acquire non-lawyer LSPs. The acquisition of more than 10% of shares of a non-lawyer LSP is subject to approval by the registration officer. As for LSPs which are Legal Tech companies, these LSPs may be owned by any legal entity that is permitted to own shares in a company,⁶⁴⁸ although the registration officer has the discretion to disallow the registration, merger or acquisition of an LSP if there are public policy concerns on a specific shareholder owning a part of the LSP. These public policy concerns include shareholders who have committed serious crimes or shareholders who have committed civil or criminal fraud. If an applicant is denied registration as an LSP, he or she will have the opportunity to appeal this decision before the courts, akin to an administrative legal process. The registration officer also has the discretion to reject the acquisition of a non-lawyer LSP if there is fear of anticompetitive behavior. As with the registration process, the purchaser or seller of the LSP may appeal against the decision of the registration officer and seek a review of the decision.

E. Implementing the LSP Regulation

The goal of the LSP Regulation is to standardize the legal profession and the provision of legal services by LSPs. The present situation of how rules and laws are scattered in different legislations and associations can be summarized in the subsequent page:

⁶⁴⁸ A lawyer who is registered as an active LSP is not permitted to own a Legal Tech company, although should he or she decide to work for a Legal Tech LSP or leave the industry altogether, there is nothing stopping him or her from acquiring shares in a Legal Tech LSP.

Illustration 19: Present Situation of Regulations and Rules Affecting Lawyers

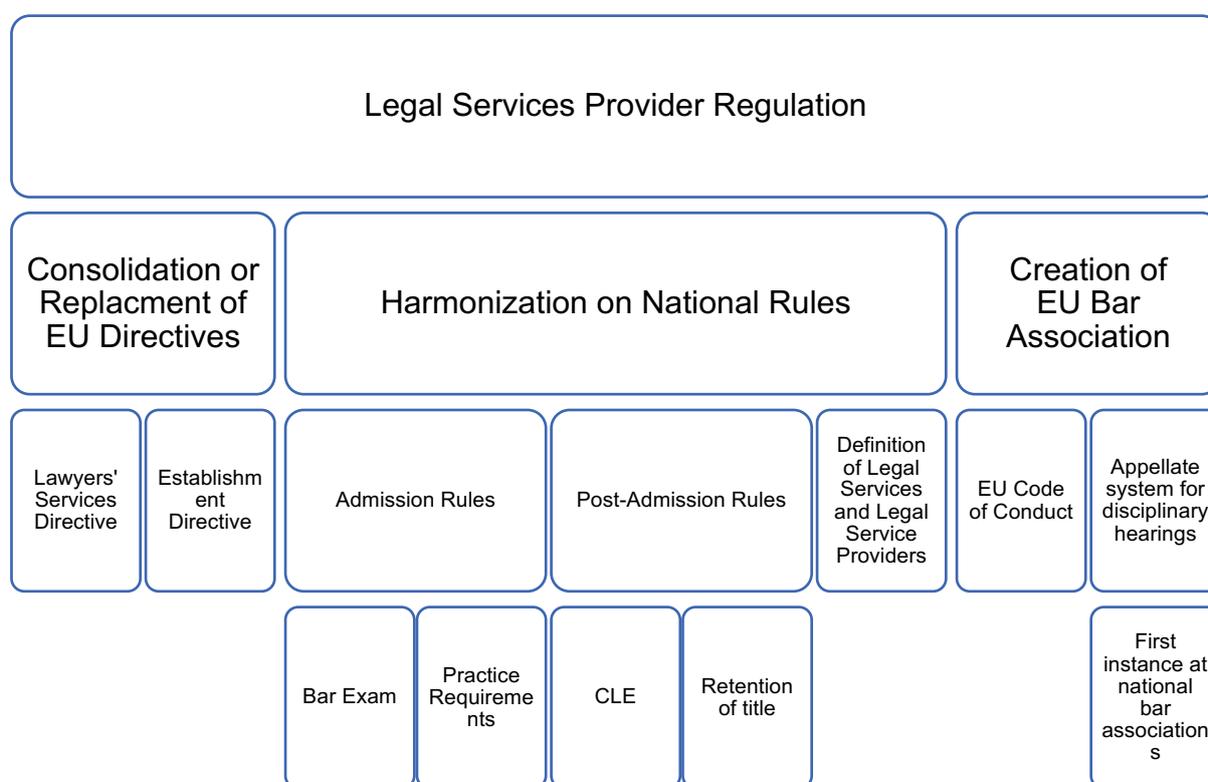
There are three different tiers of laws and regulations that lawyers have to work with, and thus an ideal framework should consolidate these three tiers into one regulation, i.e. the LSP Regulation.

1. Full Reform

An entire overhaul of the existing framework for the regulation of legal services in the EU is one way to meet the key principles of regulation. Barring political will and bureaucracy within each EU member state, a full reform comprises regulation that would be applied to any LSP and will also harmonize the existing differences in the legal profession across EU member states. The end goal of the LSP Regulation is to also merge existing EU directives that are targeted towards the practice of law and the establishment of lawyers across EU member states, such as the Establishment Directive and the Lawyers' Services Directive into one omnibus regulation.

The LSP Regulation would thus tackle the following aspects: (1) standardization of admissions process; (2) standardization on definitions and entities permitted to provide legal services; (3) standardization on the use and continued retention of the title of lawyer; (4) absorption of the Establishment Directive; (5) standardization of legal ethics rules to be adopted by all EU member states, i.e. the EU Code of Conduct; (6) standardization of disciplinary hearings and its appeal system; and (7) any other administrative matter that needs to be addressed in the regulation or directive.

Illustration 20: Full Reform of the Legal Industry at the EU Level



Considering the scale of the LSP Regulation, it should be noted that certain elements can be carried out first, followed by others. The EU Bar Association should first be created, which will be in charge of developing the EU Code of Conduct. Following which, the EU Bar Association can look into harmonization of existing EU Directives, followed by the mammoth task of harmonizing national rules on admission and post-admission as the last step.

2. Standalone Legislation

A standalone legislation, i.e. a legislation that is enacted without repealing any existing legislation (although amendments can be made), is a secondary option although not the most favorable solution. A standalone legislation can either be an EU regulation or directive. However, as the standalone legislation assumes that all other laws on the provision of legal services remain untouched, such a standalone legislation will most likely not be as effective and coherent as a full reform.

Considering all the points highlighted in Chapter 3, it would be almost impossible to create a standalone legislation that would incorporate those discussed elements properly. Rules on the provision of legal services are too different in each EU member state that a standalone legislation in the form of an EU regulation or directive would be able to address the issues properly. It would be a patchy solution to an otherwise challenging and complex problem. Therefore, it is strongly suggested that a full reform be made instead of a standalone legislation if there are serious efforts intended to reform the legal industry.

F. Creation of the EU Bar Association

The standardization of the legal industry through a full reform also means that there is a possible argument for the need of certain centralized bodies to interpret legal ethics, monitor the implementation of bar examinations, or even ensure that all legal service providers have taken up professional indemnity insurance. In this regard, it is important to analyze which functions are already being performed by existing organizations or institutions, and whether it would make sense to create a new centralized body to handle such affairs. The subsequent sections will call for the creation of the EU Bar Association, which will be in charge of administering the following aspects: (1) interpretation of legal ethics; (2) disciplinary issues; (3) administering of bar examinations; and (4) investigating of registration officers that will work for national bar associations.

1. Interpretation of legal ethics

This is largely done by bar associations at the present moment and the courts of each EU member state. Considering that there is a wide amount of literature in each EU member state on this topic, and that the EU Code of Conduct will be implemented in every EU member state, the EU Bar Association would serve an important role in producing commentary on the interpretation of the EU Code of Conduct. The EU Code of Conduct will be part of the regulation to ensure that EU member states are obliged to adopt it; therefore, any final interpretation of the directive can ultimately be challenged at the ECJ, and thus the ECJ maintains consistent interpretation of the EU Code of Conduct.

2. Disciplinary issues

The EU Bar Association would also be in charge of disciplinary issues for breaches of the ethical code of conduct, similar to what most national bar associations are presently doing. The EU Bar Association could create an online portal, similar to the EU ODR platform, where any client-user who is an alleged victim of malpractice can lodge a complaint online, and the complaint will be sent to national bar associations who are otherwise experienced in disciplining lawyers who have flouted the ethical code. The key difference would be that the EU Bar Association would release guidelines or commentaries on disciplinary matters and the national bar association would be required to follow the guidelines or commentaries issued by the EU Bar Association. In the event that there is a challenge on the decision of the national bar association's decision, the LSP can appeal to the EU Bar Association, which would be the final stage of appeal for disciplinary hearings.

3. Bar examinations

Bar examinations are taken in the language of the home country, and therefore national bar associations or the Ministry of Justice or Law of each country are better equipped to regulate the bar examination. However, the EU Bar Association should set formalities that must be met when the bar association or Ministry of Justice or Law designs the bar examination. The EU Bar Association as a centralized body may be useful if the EU Bar Association creates a standardized bar examination for all EU

member states similar to what the US has, i.e. the Uniform Bar Examination⁶⁴⁹ and the MPRE,⁶⁵⁰ which are standardized examinations that have been adopted in the majority of states in the US. Candidates who take the Uniform Bar Examination are able to use the results from this bar examination for admission at another US state which recognizes the UBE, thereby allowing for easier admission to the bar in another state.⁶⁵¹

A centralized body, such as the EU Bar Association, to govern the EU Bar Examination in terms of format, content and execution will be more efficient in carrying out such standardized examinations. Bar associations or the Ministry of Justice or Law who were formally in charge in the designing and preparation of the bar examination will have their roles changed; instead, they will be involved in invigilating and executing the examination in each EU member state and will also be responsible in translating the bar examination in the national language of the EU member state, so that no one is discriminated from taking the bar examination because they do not speak the language.

The EU Bar Association would also be in charge of determining the format and regulating the difficulty of the national bar examination that will be held in individual member states, although the actual questions and content will be determined by individual national bar associations bar associations. National bar associations will be in charge of administering the bar examination and grading of the bar examinations. Admission as an EU lawyer would therefore be premised on passing the EU Bar Examination and a national bar examination.

⁶⁴⁹ National Conference of Bar Examiners, 'Uniform Bar Examination' <www.ncbex.org/exams/ube/> accessed 11 March 2019.

⁶⁵⁰ National Conference of Bar Examiners, 'Multistate Professional Responsibility Examination' (n 254).

⁶⁵¹ The US legal profession is regulated at the state level. Therefore, any lawyer/attorney admitted into one state has to be re-admitted at another state's bar, i.e. a lawyer who is qualified in California cannot practice in New York and must seek requalification pursuant to the rules stipulated by the state of New York. Therefore, examinations such as the Uniform Bar Examination help in the mobility of lawyers within the US. Kendra L Basner and others, 'Regulation of the legal profession in the United States: overview' (Thomson Reuters Practical Law 1 April 2018) <[https://uk.practicallaw.thomsonreuters.com/2-633-6340?transitionType=Default&contextData=\(sc.Default\)&firstPage=true&comp=pluk&bhcp=1](https://uk.practicallaw.thomsonreuters.com/2-633-6340?transitionType=Default&contextData=(sc.Default)&firstPage=true&comp=pluk&bhcp=1)> accessed 20 July 2019.

4. Investigating of registration officers that will work for national bar associations

The national bar association will be in charge of appointing a registration officer that will oversee the registration of LSPs and the merger and acquisitions of LSPs. Considering that the registration officer has substantial authority, the EU Bar Association will have the authority to investigate registration officers if there are allegations of dishonesty, fraud or potential civil or criminal breaches.

III. The Changed Roles of Several Stakeholders

A. The Legal Profession Itself

With the LSP Regulation, the role of the lawyer has changed – as it no longer has the monopoly over the provision of legal services (although in some EU member states lawyers never had the monopoly of the provision of legal services), lawyers are no longer the *only* experts in their field. However, if they are no longer the only experts, why would someone still seek admission to become a lawyer; would the undercurrents then push law graduates toward setting up a Legal Tech company instead of working towards being admitted to the bar?

The key therefore lies in the quantum of the insurance payable by an LSP and the ability to establish or practice in another EU member state. If the LSP is an admitted attorney, he or she would pay significantly less premiums, as compared to a Legal Tech solution provider. Since the professional indemnity insurance affects the overheads of operations, availability of openings to work at LSP providers will be affected by these costs. For lawyers intending to practice cross-border, he or she would not be required to pay additional insurance premiums if he or she is only practicing as a foreign lawyer. If he or she qualifies to become a lawyer in the state where he or she is practicing as a foreign lawyer, he or she will be required to pay a small supplementary fee to cover the additional bar registration on his or her existing insurance plan.

The quantum of the insurance payable is fixed by the EU Bar Association in consultation with the insurance companies and the national bar associations so that

lawyers who are admitted in one EU member state and registered there will pay for the insurance premium of that bar. Lawyers intending to be admitted into more than one EU member state will pay a supplementary fee. Legal Tech solution providers will have two insurance premium options – one for provision of legal services locally and another for provision of legal services within the EU. It goes without saying that the premiums payable by Legal Tech solution providers will most likely be significantly higher than lawyers.

A lawyer may be keen to seek admission to the bar just so that he or she can, in his personal name, seek admission in another EU member state and establish himself or herself there as an independent lawyer quickly if he or she passes the bar examination

With the full reform, it is hoped that a lawyer can finally call himself or herself an EU lawyer, and Legal Tech solution providers are able to operate within the EU without having doubts on whether they are permitted to provide legal services in another EU member state. This would thus achieve the goal of fair competition as elaborated upon in Chapter 5.II.A.

B. Trainee Lawyers

The new LSP Regulation will no doubt affect the status of trainee lawyers and law graduates, particularly in EU member states on the continent that follow the civil law tradition. In EU member states such as Austria, law graduates and trainee lawyers are permitted to provide legal services with limitations.⁶⁵² With the implementation of the LSP Regulation where only registered LSPs are permitted to provide legal services, and registration is only permitted when the conditions for admission to the bar are fulfilled, such law graduates and trainee lawyers are not permitted to provide legal services in the same way that they could with existing rules governing the legal profession.

⁶⁵² Die Österreichischen Rechtsanwälte, 'Rechtsanwaltsanwärter Info Guide' (n 79) 6.

This is indeed a problem; however, it should be seen as a compromise, i.e. a reduction in the period of time needed for admission as a lawyer in exchange for being unable to provide legal services as a lawyer for that same period of time to be trained. For such jurisdictions, the training period to become a lawyer pursuant to the Establishment Directive requires long practice durations coupled with bar examinations whereby candidates are only permitted to take thrice (Slovenian bar examination)⁶⁵³ or twice (Austrian bar examination)⁶⁵⁴ in their lifetime, failing which, they are barred from taking the bar examination and being called to the bar. The LSP Regulation should be drafted to reach a middle ground and reasonable training time for trainee lawyers, and also drafted to have no restrictions on retaking either the EU bar examination or national bar examination. There is arguably no loss in multiple retakes of the examinations – determined candidates who really wish to practice law will have the chance to do so as long as they persevere, and the EU Bar Association and national bar associations who are administering the bar examination would cover their costs through the bar examination fees.

Ultimately, if a law graduate is unwilling to become a trainee lawyer or work for the requisite duration, or unable to pass the EU Bar Examination, nothing is stopping them from starting a Legal Tech company, working for a Legal Tech solution provider or working in-house for a company. The options still remain open to them to partake in the legal industry in a different manner from the traditional lawyering path, thereby allowing them to make use of their skills that they have acquired at university. What the LSP Regulation intends to do is to also provide more career options to law graduates, while making sure that the career path that they seek is sustainable and would allow them to continue to progress.

C. The National Bar Associations

With the harmonization of the legal profession and the provision of legal services, the role of national bar associations will evolve. In a large part, the role of national bar

⁶⁵³ Zakon o pravniškem državnem izpitu 1994 (n 255), art 20.

⁶⁵⁴ Rechtsanwaltsprüfungsgesetz (n 627), art 25(2).

associations remains unchanged. National bar associations will no longer be involved in producing ethical guidelines or commentaries for lawyers as this role is absorbed by the EU Bar Association. However, as they would be assisting the EU Bar Association in administering the disciplinary proceedings, they would be required to follow new developments made by the EU Bar Association on ethical rulings.

Disciplinary hearings are also heard by the national bar associations at the first instance; therefore, the national bar associations are obliged to maintain a tribunal for hearings on the breach of ethics although they are required to follow the procedures and guidelines laid out by the EU Bar Association and the EU Code of Conduct when hearing the disciplinary case. For national bar associations that have been traditionally involved in disciplinary proceedings on breach of ethical rules by lawyers, there should not be much difference in terms of administration but rather difference in terms of the laws and its interpretation and application thereof.

Furthermore, with the streamlining of the bar examinations, national bar associations now play a crucial role in administering the bar examinations and translating standardized examinations into the national language for the candidates. They will also invigilate the bar examinations and provide recommendations to the EU Bar Association on how to improve the entire examination process. Data collected from these national bar associations can help the EU Bar Association develop better quality examinations for subsequent examinations. National bar associations are also involved in creating the content and syllabus for the national bar examinations for candidates seeking to be admitted in that specific EU member state. They will also be involved in the administering of such national bar examinations. National bar associations are required to keep a register of all LSPs and are also in charge of verifying whether professional indemnity insurance has been paid by LSPs.

In some countries, a lawyer's pension is tied to the pension fund managed by the bar association. This is in the case of Austria, where contributions are paid by lawyers to

the lawyer's pension fund and managed by the bar association.⁶⁵⁵ As such a practice is not throughout the whole of EU, and the LSP Regulation does not intend to change the rules governing social contributions of lawyers or employees of Legal Tech solution providers, such roles traditionally played by national bar associations will remain unchanged.

Therefore, the national bar association's role largely remains unchanged, although some functions of it have been removed while other functions have been changed to fit into the larger scheme of the LSP Regulation. One should not forget that the national bar associations are also important in ensuring the promotion of the legal profession and the promotion of the rule of law and will retain this important function. Hotlines for lawyers to dial when they need consoling or therapy will also remain in place to support the fraternity.

D. The CCBE

As the EU Bar Association is set up and the legal industry is harmonized across EU member states, one relevant question is the role and impact of the CCBE such as the whether the general principles of the CCBE Code of Conduct should be reflected in the EU Code of Conduct as well since almost all EU member states are members of the CCBE but the EU as an entity is not. While the EU Bar Association is not required to adopt the views of the CCBE, the EU Bar Association can nonetheless source inputs from the CCBE during its drafting process so that it will produce an EU Code of Conduct that is endorsed by the CCBE as reflecting its principles. This will be consistent with EU member states' position as most member states' bar associations are members of the CCBE.⁶⁵⁶

With the harmonization of the legal profession and provision of legal services, another role that the CCBE can move towards to is that of an informal ombudsman or watchdog of the EU Bar Association. The CCBE is an "international non-profit

⁶⁵⁵ Koch and Schusterbauer, 'Soziale Absicherung für RechtsanwältInnen und RechtsanwaltsanwärterInnen' (n 308) 8-9.

⁶⁵⁶ Council of Bars and Law Societies of Europe, 'Welcome to CCBE | About | Members' (n 642).

association”⁶⁵⁷ with almost close to six decades of history and should thus remain and independent association that “[advances] the views of European lawyers and [defends] the legal principles upon which democracy and the rule of law are based”.⁶⁵⁸ The CCBE can thus provide suggestions and conduct research on whether the EU Bar Association’s practices are in line with its principles.

IV. METHODS TO IMPLEMENT THE REGULATION OF LEGAL TECH

There are several methods that can be used to implement legislation regulating Legal Tech and the legal industry. This largely depends on whether regulation is implemented on the EU or national level and will be discussed in the subsequent sections.

A. EU Regulation or Directive

1. A new legislation

If a new legislation at the EU level is adopted, it is suggested that a Regulation instead of a Directive is used. Indeed, the legal industry has many stakeholders involved, coupled with the fact that most regulations concerning the practice of law are old and entrenched laws. Indeed, the use of an EU directive might be a preferable method instead of a regulation, as this would give time to parties to transpose their laws accordingly. The provision of legal services is also at the heart of the livelihoods of lawyers and thus providing a gradual transposition gives lawyers time to adapt to the changes.

Despite these arguments for a directive to be used; however, the directive cannot support the suggestions raised in the LSP Regulation. First, as this framework involves the creation of an EU Bar Association, an EU Regulation is needed because a Directive does not allow for the creation of a supranational body that has supervisory

⁶⁵⁷ Council of Bars and Law Societies of Europe, ‘Who we are’ <www.ccbe.eu/about/who-we-are/> accessed 16 March 2019.

⁶⁵⁸ *ibid.*

powers.⁶⁵⁹ Second, while the regulation is implemented with immediate effect, EU member states will likely be given time to ensure that they comply with the new regulations.⁶⁶⁰ Therefore, bar associations and national legislators will be given reasonably sufficient time to prepare for the implementation of the LSP Regulation, although it is suggested that the EU Commission undertakes a survey with all registered bar associations in each EU member state to determine what is the appropriate timeline for the implementation of the regulation.

2. Amending existing directives

Elements found in the Establishment Directive should be subsumed into the new LSP Regulation, while the Establishment Directive should be replaced by this new LSP Regulation. The existing regime on the mobility of lawyers will therefore be replaced by the LSP Regulation which should permit lawyers to operate cross-border with less restrictions than before. Legal Tech solution providers that wish to operate cross-border will be required to register themselves with the national bar association that they intend to operate in.

B. National Initiatives

If initiatives are undertaken at the national level, the regular lawmaking process of each EU member state will have to be used. If a full reform of the entire legal industry is envisioned, a consolidation of existing national laws and the new proposed laws on the regulation of Legal Tech should be made. The bar associations of each EU member state should also work together with the EU legislators when preparing this new legislation. Bar associations can consolidate research on bar statistics and legal ethics decisions in their member state and provide it to the European Commission when they are determining how to draft the LSP Regulation. In the case of a country

⁶⁵⁹ As directives have to be transposed into national law, a directive does not give one the EU the authority to set up a supervisory or supranational body that will oversee the regulation of the provision of legal services. TFEU (n 170), art 288.

⁶⁶⁰ In practice, the time given for compliance to the LSP Regulation can be made similar to the General Data Protection Regulation.

that has multiple state bar associations and a national bar association, the national bar association is responsible for the duties as highlighted in this framework; however, it may assign certain duties such as registration of LSPs to local state bar associations to facilitate processes.

V. SUGGESTIONS ON WHEN AND WHERE LEGAL TECH SHOULD BE REGULATED

A. Where, or at Which Level Should Legal Tech be Regulated?

As previously mentioned in Chapter 2.V.D, there is no regulation specifically dealing on Legal Tech being discussed at the EU level. While there have been some calls for reform at the national level in some member states, such as amending the admissions criteria,⁶⁶¹ or discussions by third-party services that would affect the operations of law firms such as increasing the professional indemnity insurance rates for solicitors,⁶⁶² most of these reforms are targeted towards increasing the barriers of entry to practice law or to continue to practice law for existing lawyers. In this sense, there are hardly any suggestions to reform the entire legal profession on both the EU and national level to encompass Legal Tech. Reforms should thus be taken on both the EU and the national level so as to allow for greater efficiency and change in the regulation of the legal profession.

B. When Should the LSP Regulation be Implemented?

Considering that there is hardly any regulation on the operation of Legal Tech at this point in time, it is suggested that adoption of regulatory measures should commence sooner rather than later. Bar associations can take the lead in studying the feasibility

⁶⁶¹ The Bar Standards Board is intending to “change the training and qualification process to become a barrister”. See Bar Standards Board, ‘Future Bar Training’ <www.barstandardsboard.org.uk/qualifying-as-a-barrister/future-requirements/> accessed 11 March 2019.

⁶⁶² Lucy Hook, ‘Renewal season reveals PII market for lawyers hardening, insurers looking to lift rates’ (Insurance Business 1 November 2018) <www.insurancebusinessmag.com/uk/news/professional-liability/renewal-season-reveals-pii-market-for-lawyers-hardening-insurers-looking-to-lift-rates-115219.aspx> accessed 11 March 2019.

of such regulations in their own member state by first conducting a survey on the current state of the legal industry in their own member state – this should theoretically not be difficult to implement as each bar association has a register of admitted lawyers and can require lawyers to complete a compulsory survey whenever payment of the bar association fees (which is compulsory in almost all bar associations in all EU member states).

Elements of the survey should include (but not be limited to) the seniority of the lawyer, their views on whether they will be replaced by Legal Tech, the likelihood of them moving out of the legal industry, their opinion on how the legal industry will be in the next five years, the rate of adoption of Legal Tech in their law firm, whether they feel that amendments should be made to the rules governing admission of a lawyer, whether more flexibility in working cross-border should be provided, what IT skills they currently possess and what IT skills they believe they need in the years to come in order to operate as a lawyer. A good template that bar associations can consider is the Legal Tech survey conducted by the Law Society of Singapore and the Ministry of Law in Singapore, which reported on elements such as the “mixed views about legal technology at the moment”,⁶⁶³ “law firms likely to persist with legal tech adoption”,⁶⁶⁴ “potential for law firms to anchor their legal services around legal technology”,⁶⁶⁵ amongst others. These findings were presented in an infographic and colorful manner instead of a lengthy write-up or report. The use of an infographic is certainly an applauded method as it allows quicker reading and scrolling of key salient facts, which will also help capture the attention of time-pressed lawyers better.

Knowledge of how the legal industry presently feels about such matters through a proper survey – rather than through conferences, events or panel discussions – is a better method in gauging the actual sentiment of the legal industry and to determine what subsequent actions should be taken. Most Legal Tech conferences require one to pay a hefty attendance fee and topics are already pre-selected: this will already

⁶⁶³ Law Society of Singapore & Ministry of Law Singapore, *Legal Technology in Singapore: 2018 Survey of Legal Practitioners*.

⁶⁶⁴ *ibid.*

⁶⁶⁵ *ibid.*

likely exclude firms that are not interested in paying such a price to listen to topics that they feel will not benefit their practice of the law. The better method is thus through an official and mandatory survey issued by the bar association or Ministry of Law.

C. Step-by-Step Implementation

As implementing a framework for the regulation of Legal Tech potentially involves amending several old laws on the provision of legal services and legal ethics rules, the ramifications may be severe or unpredictable. In order to better control the effects and consequences of the new regulatory measures, the EU member states may apply the LSP Regulation in stages.

VI. THE PROPOSED APPROACH

The previous chapter analyzed the considerations when deciding to regulate Legal Tech. The proposed approach to regulate Legal Tech is in effect a regulation to harmonize the legal profession and the profession of legal services. This proposed approach which is based on the previous discussions in Chapters 4-7 and will be presented below.

A. Full Reform

The suggested approach is that of a full reform of the legal profession and the provision of legal services. This will enable for a better harmonized legal services market unlike a standalone legislation.

B. Format of a Regulation

An EU Regulation is the suggested method of implementing the LSP Regulation. This would give legislators, the Ministry of Law or Justice, bar associations, Legal Tech companies and other affected stakeholders the possibility to create the relevant supranational associations to exercise the powers granted to them under the LSP Regulation.

C. Creation of the EU Bar Association

A centralized EU Bar Association via the LSP Regulation that is in charge of drafting the EU Code of Conduct should be created. This body will help in streamlining and standardizing certain processes that are to be implemented in EU member states.

D. Co-existence of Other Regulations and Directives

Other regulations and directives such as the GDPR, Product Liability Directive and the Trade Secrets Directive will continue to apply and will continue to co-exist with the LSP Regulation.

VII. DOES THE PROPOSED APPROACH ADDRESS THE CHALLENGES HIGHLIGHTED IN CHAPTERS 4, 5 AND 6? AN ANALYSIS

A. Access to Justice

The LSP Regulation recognizes and permits Legal Tech solution providers to provide legal services to the public. Previously, in some EU member states, the provision of certain legal services was disallowed. By allowing new types of LSPs, there is arguably greater access to justice as client-users have a wider choice in the LSPs that they can choose from and a cheaper solution to their legal problems. While LSPs may have to bear additional compliance costs to comply with legal ethical rules and professional indemnity insurance, this is necessary to ensure that there is not only access to justice, but *proper* access to justice. Client-users of LSPs, regardless of the type of LSPs they are, will know that the LSP that they have hired is competent as it is properly and formally regulated by the EU Bar Association and the national bar associations.

B. Fair Competition

By extending professional liability insurance and the ethical code of conduct to all LSPs as a requirement under the LSP Regulation, all those who are intending to provide legal services are now operating at the same playing field as they are subject to the same compliance costs and concerns. This then ensures that there is fairer

competition between those who are working in the same industry and competing to provide the same services to client-users.

C. Consumer Protection

The extension of professional liability insurance and the ethical code of conduct to all LSPs as a requirement under the LSP Regulation also has the additional benefit of consumer protection – as all LSPs are obliged to comply with the ethical code and take up professional liability insurance, the level of consumer protection is similar to the protection that they have when they engage lawyers in the previous regulation regime. Therefore, the LSP Regulation through its blanket application of the professional liability insurance and the ethical code of conduct ensures not just fair competition but also consumer protection.

D. Structural Changes in Law Firms

The LSP Regulation is unlikely to change the current course or trend of law firms becoming leaner with a partner-heavy structure. The LSP Regulation, if anything, hopes to allow lawyers to compete better by reducing the time taken to qualify as a lawyer while also allowing lawyers to provide cross-border legal services more readily. This will hopefully attract more junior lawyers to join the legal profession as the time take to qualify and provide legal services as a professional across Europe is shorter and regulated across the whole of the EU in a similar manner. This will hopefully increase mobility for junior lawyers searching for jobs at law firms in the EU.

E. Legal Education

The LSP Regulation shapes the legal education landscape by providing guidelines to universities to provide a standardized set of courses with certain breadth that permits their law graduates to seek jobs not only in law firms, academia or in-house roles, but also in Legal Tech companies that are providing legal solutions digitally. This is similar to what is predicted in Chapter 6, i.e. where universities have to consider providing technology modules to law graduates so as to give them a broader selection of roles that they can apply for upon graduation.

F. Future Lawyers

The general fear is that with Legal Tech, there will be less positions available for junior associates and lawyers will be made redundant. An important question would be whether it makes sense to have the LSP Regulation and an EU Bar Association when there is a declining ratio of lawyers per capita. The LSP Regulation allows greater access to the legal market by different LSPs, thereby reducing the monopoly that lawyers held. However, this arguably means that there is lesser incentive for a law graduate to qualify as a lawyer because there is the easier option of joining a Legal Tech solution provider which qualifies as an LSP.

This entire thesis has discussed how the legal profession has been impacted by Legal Tech – the goal of the LSP Regulation is therefore not to increase the amount of law graduates working in law firms, but rather to provide different career opportunities for law graduates while at the same time ensuring that the legal industry evolves properly. If there are greater benefits to becoming a lawyer, considering that there is now fairer competition between a lawyer as compared to a Legal Tech solution provider, market forces will lead towards an increment in the number of lawyers in the market. Until then, one should not forget that the LSP Regulation is not intended to increase the number of lawyers operating in the market, but to ensure that the legal industry and the legal profession are operating in a fair market where public policy concerns are adequately addressed, while at the same time, the supply and demand of law graduates and positions for these people are adequately met, thereby reducing frictional unemployment due to mismatch of skills.

VIII. CHAPTER SUMMARY

Chapters 7 and 8 have discussed the regulation of Legal Tech and have provided a framework on its regulation, which is in actuality a regulation on the provision of legal services and a regulation on the legal profession combined into one LSP Regulation. Understandably, regulation is not an easy affair as there are multiple stakeholders involved – the regulation of the legal industry affects so many stakeholders and involves the rights of people. This makes it an even harder and trickier situation for any sort of regulation to be approved and enacted.

While this thesis has proposed a full reform, it is noted that an entire full reformation may not be practically possible if done all together simultaneously. Despite this, the propositions and principles of what this thesis has suggested remains valid and can be perhaps implemented in a gradual manner. For instance, work on how to best standardize easier aspects such as the bar examination can be first conducted. Once this work is completed, other aspects such as creating an EU Bar Association could be next, followed by implementing the LSP registration process.

Whether we see such regulations being implemented will be a matter of time and political will, although it is the author's personal belief that such reforms may take some time to implement as these reforms involve multiple stakeholders across the entire EU.

Chapter 9: Rethinking the Legal Profession in the Era of Robot Lawyers

I. INTRODUCTION

The last two chapters have set out a framework to resolve the issues between the regulation of the legal profession in light of legal technology, in a bid to prevent some of the challenges highlighted in Chapter 6. Beyond this framework, there is however one technology that can change the legal industry profoundly and is worth considering in greater detail. This technology is AI – where talks about how AI has already supplanted various jobs⁶⁶⁶ and how it will continue to do so in other industries and professions in the years to come.⁶⁶⁷ It seems that the legal profession will not be spared as these AI-powered lawyers, or robot lawyers, take over increasingly more functions that were traditionally performed by lawyers.

While the prospect of AI actually taking over the job of lawyers – both senior and junior lawyers – is more science fiction than reality at this stage, what happens when these technologies become advanced enough to actually replace the cognitive and emotional functions of those providing legal services? When technology reaches such a stage, which may or may not be in our lifetimes, policy considerations become even more extensive and necessary than before. Such policy considerations must be debated and considered in a holistic manner, as an overarching guideline on the ethical rules of AI and other technologies that may become the norm in the future.

Of all technologies, AI is one of the most ethically complex technologies be it in society or law. The use of AI in law is already prevalent and has been covered at multiple junctures in this thesis. From a more general standpoint, AI is a technology that has

⁶⁶⁶ Yuan Yang and Xinning Liu, 'China's AI push raises fears over widespread job cuts' (Financial Times 30 August 2018) <www.ft.com/content/1e2db400-ac2d-11e8-94bd-cba20d67390c> accessed 3 June 2019.

⁶⁶⁷ See BBC, 'Will a robot take your job?' (BBC 11 September 2015) <<https://www.bbc.com/news/technology-34066941>> accessed 28 May 2019.

to be considered in a holistic manner as there should be a fundamental AI ethics policy which branches out into other industries. A fundamental AI ethics policy ensures that anyone developing AI for subsequent use, regardless of industry, has to fulfill the basic ethical criteria. As the legal industry also heads towards a future with AI, pushing for a fundamental set of AI ethics that interplays well with legal ethics is what we should be planning for. As previously discussed in Chapter 3.II.C, the EU Commission has put forward “a European approach to artificial intelligence and robotics”,⁶⁶⁸ which “deals with technological, ethical, legal and socio-economic aspects to boost EU’s research and industrial capacity and to put AI at the service of European citizens and economy”.⁶⁶⁹

While the EU determines and debates an AI policy, the legal industry is facing early signs of “robot lawyers” taking over certain rules in practice. This includes previously discussed Legal Tech solutions such as AI-powered due diligence software such as Kira Systems⁶⁷⁰ or Luminance.⁶⁷¹ Notwithstanding the problems associated with AI, such as bias which has been elaborated earlier in Chapter 7.IV.B, the following sections intend to explore how AI can take over the roles of lawyers in different settings.

II. THE USE OF ROBOT LAWYERS IN DIFFERENT SETTINGS

A. Robots as Lawyers

The use of a robot lawyer to completely substitute a lawyer is an interesting and exciting debate, although this is likely to happen in numerous years to come. At present, while certain legal tasks can be done by lawyers, the truth is that lawyers have numerous functions and are qualified to do different tasks and advice on an even larger spectrum of issues. A small law firm with a sole proprietor may be tasked to advice on multiple different issues, while expecting to attend court hearings or meetings before authorities. Therefore, while completely replacing lawyers with AI

⁶⁶⁸ European Commission, ‘Artificial Intelligence’ (n 217).

⁶⁶⁹ *ibid.*

⁶⁷⁰ Kira Systems (n 84).

⁶⁷¹ Luminance (n 45).

might be a distant future, theoretical discussions of the potential issues that regulators or the bar associations might face would be interesting to consider at this juncture.

If the robot lawyer or AI lawyer (“AI lawyer”) will remain as a product or under the ownership of a Legal Tech solution provider that built it, assuming that the LSP Regulation has been adopted and implemented, the Legal Tech solution provider that owns the AI lawyer product or service would be the entity regulated by the LSP Regulation. However, one prevailing issue is that of whether AI should be recognized as a separate legal entity or whether it should remain as a product or chattel owned by a recognized legal entity that produced it. This is especially important in determining AI liability, which has been a subject matter for numerous academic debates and papers.⁶⁷² The issue of AI liability, however, may have some bearing on the recognition of a robot lawyer. If an AI were to be granted legal liability, then technically, an AI lawyer would be able to take on professional indemnity insurance in a similar manner as a natural person practicing law. The LSP Regulation may have to be amended to consider an AI lawyer as a separate entity; however, there are other challenging issues such as ensuring an AI lawyer understands and practices law ethically. The developer of the AI system is instrumental in setting this course right for the AI lawyer, but beyond a certain point where AI lawyers are able to learn on their own or from other AI lawyers,⁶⁷³ it may become difficult to ensure that such AI lawyers are behaving or performing their functions in an ethical manner.

Apart from bar acts and ethical code of conducts, numerous amendments may be needed in criminal and civil procedure codes to allow for the proper representation of a client by an AI lawyer – as an AI lawyer may not necessarily exist in a physical form, court hearings may slowly develop to a point where most if not all hearings are conducted in the digital space, i.e. through an Intranet or through a secure online

⁶⁷² This issue of artificial intelligence has been discussed almost two decades ago – even till today, it still remains a topic of discussion. See George S Cole, ‘Tort liability for artificial intelligence and expert systems’ (1990) 10(2) *Computer Law Journal* 127; and Woodrow Barfield, ‘Liability for Autonomous and Artificially Intelligent Robots’ (2018) 9(1) *Paladyn, Journal of Behavioral Robotics* 193.

⁶⁷³ This technology is already present, i.e. kickstarting deep reinforcement learning, where “‘teacher’ agents are used to kickstart the training of a new ‘student’ agent”. Simon Schmitt and others, ‘Kickstarting Deep Reinforcement Learning’ (arXiv 10 March 2018) <<https://arxiv.org/pdf/1803.03835.pdf>> accessed 20 July 2019.

platform. Procedural rules may then have to be amended to permit such forms of hearings by such AI entities.

More importantly, the right to a lawyer has always been held to be an important human right and this right is protected in the EU Charter.⁶⁷⁴ If an AI lawyer has its own separate legal entity, the question is whether the use of an AI lawyer suffices as sufficient representation under the EU Charter, thereby disallowing the party so using the AI lawyer from alleging that he or she did not have legal representation and therefore has her human rights under the EU Charter violated. As previously discussed in the framework for the LSP Regulation, the use of a Legal Tech solution provider would only apply for civil cases and not for criminal cases.⁶⁷⁵ This is to ensure a proper safeguard for those who are penalized under the law and are seeking to challenge the charge. Flowing from this, an AI lawyer should thus also be only permitted to represent clients in civil proceedings and hence the use of an AI lawyer for criminal proceedings would not mean that the client-user has sought adequate legal representation for his or her case.

However, lawyers are not just problem solvers – in many cases, the added layer of a human touch in the attorney-client relationship is what business development teams for law firms have been focusing on. Providing a good quality legal product is the basic requirement in the legal industry, but what makes a client stay on with the same firm is arguably this human trust that they have in their lawyers. Will AI lawyers then be trained to provide this human touch and prevent client neglect? This would be an interesting element to include in an AI lawyer as this involves designing an entire interface and not just a piece of software solving legal problems. In Ng's article concerning designing chatbots for pro bono legal clinics,⁶⁷⁶ she highlighted how dialogues in certain technologies such as chatbots could be well-designed in order to allow users to adapt and use the product better.⁶⁷⁷ Such design elements can be taken into consideration when developers create AI lawyers that are required to interact with

⁶⁷⁴ This has been discussed in Chapter 4.III.B.

⁶⁷⁵ See Chapter 8.II.D.3.(i).

⁶⁷⁶ Ng, 'Designing and Building Chatbots for Pro Bono Legal Clinics' (n 38).

⁶⁷⁷ *ibid* 206-208.

client-users and at present, there are universities that have Legal Design Labs that look at designing legal application interfaces to be more user-friendly.⁶⁷⁸

B. Robots as Adjudicators

Although legal technology in the form of online dispute resolution has not been largely discussed, for the purposes of completeness, it should be noted that there are numerous discussions of how robot lawyers or AI can take over the role of an adjudicator.⁶⁷⁹ An adjudicator, such as an arbitrator or a mediator, does not have to be a lawyer. They can be professionals who are experts in a certain industry, such as in the case of the construction and infrastructure industry, whereby there are several arbitrators who are not construction lawyers but quantity surveyors or architects.⁶⁸⁰ As a result, there is no prerequisite that such adjudicators be legally trained. However, considering that certain alternative dispute resolution methods such as arbitration have their own procedural rules and precedents for interpretation, many arbitrators are legally trained and specialized in dispute resolution.

Considering that numerous lawyers are adjudicators or represent clients before an adjudication process such as mediation or arbitration, the discussion of how AI can replace adjudicators – though not directly related to this thesis as this thesis focuses on the regulation of lawyers and not arbitrators or adjudicators – nonetheless remains a relevant one for consideration, especially for lawyers that offer such services. The use of AI to replace lawyers raises several issues, such as fairness in decision making, which has been highlighted in the earlier Chapter 7.IV.B. Besides the actual decision-

⁶⁷⁸ This is the case of the Stanford Legal Design Lab, where it intends to “use human-centered design and agile development methodology to design new solutions for legal services”. Stanford Law school, ‘The Legal Design Lab’ <<https://law.stanford.edu/organizations/pages/legal-design-lab/>> accessed 3 June 2019.

⁶⁷⁹ See Ng and Benedetti del Rio (n 32); Lucas Bento, ‘International Arbitration and Artificial Intelligence: Time to Tango?’ (Kluwer Arbitration Blog 23 February 2018) <<http://arbitrationblog.kluwerarbitration.com/2018/02/23/international-arbitration-artificial-intelligence-time-tango/>> accessed 20 July 2019; Christine Sim, ‘Will Artificial Intelligence Take Over Arbitrators?’ (2018) 14(1) Asian Journal of International Arbitration 1.

⁶⁸⁰ For example, the Centre for Dispute Resolution which has its head office in London, UK, has UK arbitrators that are not lawyers – they have an architect who is an adjudicator and a chartered surveyor who is an arbitrator in their panel. See CEDR, ‘CEDR Arbitrators’ <www.cedr.com/solve/arbitrators/> accessed 3 June 2019.

making process, existing procedural rules concerning arbitrators and mediators should be amended or clarified to allow for non-humans to represent parties at the arbitration proceeding.⁶⁸¹ Although automatic dispute resolution for small scaled disputes have already been operating in the e-commerce marketplace for numerous years,⁶⁸² these claims are normally small in nature and parties to such dispute would be unlikely to retain a lawyer to fight for these claims due to the value of the claim being significantly less than the legal fees.

One other important issue with the use of such a robot adjudicator or AI adjudicator is the enforceability of such a decision domestically and in foreign courts. The recognition and enforcement of an arbitral award domestically is generally not a problem as national legislature can enact relevant legislation to ensure that such decisions made by an AI adjudicator are recognized and enforceable under domestic law. The trickier issue is the enforcement of such decisions in foreign jurisdictions, such as enforcement of an arbitral award with the Convention on the Recognition and Enforcement of Awards⁶⁸³ (the “New York Convention”) or the recent Convention on International Settlement Agreements Resulting from Mediation (the “Singapore Convention”). In Ng and Benedetti del Rio’s chapter,⁶⁸⁴ the authors suggested that “some clarity on whether an algorithmic arbitrator is acceptable under the New York Convention would be appreciated even if the New York Convention does not expressly limit the use of algorithmic arbitrators”.⁶⁸⁵ Furthermore, in Benedetti del Rio and Ng’s paper, both authors highlight that while a country may not invalidate the use of an algorithmic arbitrator on the grounds of public policy under the New York Convention,⁶⁸⁶ some countries such as France only allow natural persons to be an arbitrator.⁶⁸⁷ As for the Singapore Convention, considering its novelty in the realm of

⁶⁸¹ See Ng and Benedetti del Rio (n 32) 133-134.

⁶⁸² Tyler Technologies, ‘Modria’ (n 553).

⁶⁸³ Convention on the Recognition and Enforcement of Foreign Arbitral Awards (New York, 1958).

⁶⁸⁴ Ng and Benedetti del Rio (n 32).

⁶⁸⁵ *ibid* 133.

⁶⁸⁶ *ibid* 131.

⁶⁸⁷ *ibid*.

international law, it remains to be seen whether mediation settlement agreements made by AI adjudicators will be enforceable under the Singapore Convention.⁶⁸⁸

C. Robots as Law Professors

Can a software substitute a law professor in engaging and teaching students about the law? The sky is the limit and one cannot deny that this will one day become a reality. Traditionally, the classroom was a physical space and attendance was limited to being able to be physically present. However, with the Internet and the growth of online learning platforms, the classroom has now transformed to become either a physical space, digital space or even a hybrid of both. A professor can now reach out to more students than ever before by uploading his or her seminar on popular media sharing websites or use specific online course delivery software to deliver more customized and live digital interactions with students.

Considering advancements in artificial technology, there may also be the eventual possibility that an AI takes the image of a human person and teaches a seminar with a digitally created backdrop. Developments in subsets of AI such as the Generative Adversarial Network (also known as “GAN”) has shown that AI can create its own human faces.⁶⁸⁹ As for the creation and presentation of content from an existing pool of literature, developers have to decide the data used to train the machine, which would in itself pose interesting questions on pedagogy in the setting of a law school. Bigger questions beyond teaching students about the law, such as whether to inculcate students with the notion that they are not just to serve their clients but to society, are important elements to discuss and determine. For the purposes of this thesis, it suffices to say that having AI law professors is not something that is

⁶⁸⁸ The United Nations Convention on International Settlement Agreements Resulting from Mediation, also known as the ‘Singapore Convention’, was finalized in 2018 and aims to be the New York Convention for mediation. As the Singapore Convention is a new legal instrument, literature on AI and the Singapore Convention should be forthcoming. See The United Nations Convention on International Settlement Agreements Resulting from Mediation.

⁶⁸⁹ Tero Karras, Samuli Laine and Timo Aila, ‘A Style-Based Generator Architecture for Generative Adversarial Networks’ (arXiv 29 March 2019) <<https://arxiv.org/pdf/1812.04948.pdf>> accessed 20 July 2019. The results of this research has been reported on by various online media outlets, see Zhang (n 555).

impossible in the future as advancements in AI continue to grow, though care must be taken in how these “robot professors” are trained to deliver their content.

III. HOW DO ROBOT LAWYERS FIT INTO THE LEGAL SERVICES PROVIDER REGULATION?

The LSP Regulation, which was discussed in the last chapter, is designed to include AI lawyers as long as AI lawyers do not take a separate legal entity and are considered as products or services sold or provided by the Legal Tech solution provider. If AI lawyers are granted a separate legal entity under the law, the LSP Regulation may have to be amended to adjust to the new separate legal entity. This depends on how the AI legal entity will be structured under the law. If an AI legal entity is treated similar to a company, i.e. a human shareholder must own and a human director must govern the AI legal entity, amending the LSP Regulation would be relatively easier as it would be an extension of the LSP Regulation to include AI legal entities.

The difficulty then lies in if an AI is to be treated as an entirely separate legal entity, similar to a natural person. If this is the case, the LSP Regulation will have to be carefully amended as while an AI entity may be a separate legal entity, should they be treated as independent and sentient beings that require no ownership by a natural person, then it would be tricky to determine which ethical rules and guidelines would apply to them. For instance, AI ethics has already been debated in many different circles,⁶⁹⁰ let alone deciding whether an AI is able to understand and properly interpret the highly nuanced ethical rules that it is subjected to. If humans already have a difficulty following ethical rules,⁶⁹¹ it would not be surprising that it would be difficult for humans to train machines to be ethical. As developers are not required to train AI

⁶⁹⁰ Some universities have set up specialized research centers or departments to research on AI ethics and policies. Some of these are universities in EU member states. See University of Oxford, ‘Center for the Governance of AI’ <www.fhi.ox.ac.uk/govai/> accessed 3 June 2019;

⁶⁹¹ Breaches of ethical rules are not uncommon and thus there exists disciplinary tribunals to investigate such breaches. Some of these breaches may be intentional – for example, a solicitor has been sentenced to prison for fraudulent activities such as “forging legal documents, Building Regulation certificates and bank statements” while also stealing client’s conveyancing monies. Georgia Owen, ‘Solicitor jailed for stealing conveyancing client’s money’ (Today’s Conveyancer 11 June 2018) <www.todayconveyancer.co.uk/main-news/solicitor-jailed-stealing-conveyancing-clients-money/> accessed 3 June 2019.

lawyers to be ethical, and this is not an express requirement in the LSP Regulation, such AI lawyers may thus act in an unethical manner, for instance, by focusing on solving whatever instruction it is tasked to do and not actually acting in the best interests of their clients.⁶⁹² It is however submitted that ethical rules should be imposed onto developers to ensure that they are – similar to other LSPs – creating machines that are imbued with an ethical programming core. At this point in time, the recognition of AI as a separate legal entity is unlikely, though this is an interesting aspect for debate.

It should also be noted that the developments of AI lawyers will also be impacted by relevant policies on AI by the EU and individual EU member states. As the EU seeks to develop an AI ethical use and policy guidance, such as the AI HLEG Draft Ethics Guidelines,⁶⁹³ these policies should apply to AI lawyers as well. Therefore, as developers build these AI lawyers, they should be aware of the applicable ethical guidelines that they need to consider when developing them.

IV. THE CHANGING DYNAMICS BETWEEN THE LEGAL INDUSTRY AND CONSUMERS OF LEGAL SERVICES

As can be seen in recent Legal Tech developments, an increasing number of DIY Legal Tech solution providers are appearing in the marketplace and providing legal solutions to client-users via technology.⁶⁹⁴ It can be said that as humans become more reliant on technology solutions, their trust in technology being able to solve their problems will likewise increase as well.⁶⁹⁵ Arguably, this also means that there will be a greater acceptance of novel ways of solving legal problems through technology.

⁶⁹² An AI software may, for instance, only be trained to deal with arbitration. Therefore, unless it was programmed to consider mediation if certain conditions are triggered, it would not do so. This is unlike the case of a good lawyer with sufficient experience, who would likely suggest mediation instead of arbitration in situations where it would result in a faster and less costly resolution.

⁶⁹³ European Commission, *The European Commission's High-Level Expert Group on Artificial Intelligence Draft* (n 219).

⁶⁹⁴ Singapore Legal Advice, 'WillMaker' (n 409).

⁶⁹⁵ This human-machine trust has been elaborated in earlier chapters as well. See Chapter 4.III.A.

From a law firm perspective, the growth in trust in technology can also change dynamics between the client and the lawyer. When the telephone was invented, people need not go to their lawyer's office to seek legal advice but can have a consultation with him or her over the phone. Now, with the Internet, video consultations or conference calls between multiple parties can take place at an affordable cost, thereby allowing for lawyers and clients to work without having to leave any of their offices. As technology progresses and people embrace the use of technology to work, it would not be surprising to see law firms develop an AI interface that can speak to clients directly and determine the scope of the legal services that they need. However, this also means that as people adopt technology, arguably, there is lesser need for physical face time and thus a gradual decline and lack of appreciate of the human touch. If this is a business development strategy that law firms have traditionally employed, then business development majors must evaluate how to continuously strengthen the lawyer-client relationship in light of these technological advancements.

This reality of an AI being almost like a human being has already been portrayed in films; at present, it has been reported that certain humans have accepted certain software as a person or being. The famous case of a Japanese man falling in love with in-game dating avatar and eventually conducting a marriage ceremony to marry this in-game dating avatar has been widely reported,⁶⁹⁶ although this marriage was not legally recognized.⁶⁹⁷ From a social standpoint, as we increasingly use technologies and become more comfortable with its input and suggestions, we may gradually become used to having an AI lawyer advising us in our legal tasks and eventually accepting their advice as if they were humans. The interpretation of a relationship between man and machine is constantly evolving as modern-day society progresses towards a lifestyle where individuals are hooked onto multiple digital devices.

⁶⁹⁶ This wedding ceremony happened a decade ago between a Japanese man and a virtual avatar from the popular dating game, Love+. See Kyung Lah, 'Tokyo man marries video game character' (CNN 17 December 2009)

<<http://edition.cnn.com/2009/WORLD/asiapcf/12/16/japan.virtual.wedding/index.html>> accessed 3 June 2019.

⁶⁹⁷ *ibid.*

V. CHAPTER SUMMARY

This chapter sheds light on the future of the legal profession in the context of lawyers being substituted or supplanted by technologies such as AI. While a complete substitution may seem to be a distant future considering current developments, it is no doubt interesting to consider and take note of how technology can impact existing regulations, or even render planned regulations outdated. Keeping up with technologies is an uphill battle for regulators and therefore regulators should seek to legislate laws that can withstand the test of time. This is not something new to the Europeans⁶⁹⁸ – the Austrian civil code was enacted in 1811 and this civil code is currently still largely being used.⁶⁹⁹ It is thus hoped that the proposed LSP Regulation, if enacted by the EU, will be able to stay relevant despite the rate at which existing technologies innovate and new technologies are created.

⁶⁹⁸ Zweigert and Kötz (n 302) 84.

⁶⁹⁹ The Austrian Civil Code (*Allgemeines bürgerliches Gesetzbuch*) was enacted in 1811 and remains in force, although multiple amendments have been made. *Allgemeines bürgerliches Gesetzbuch für die gesammten deutschen Erbländer der Oesterreichischen Monarchie*, JGS Nr 946/1811.

Chapter 10: Conclusion

This thesis has covered salient aspects of the regulation of the legal profession in the EU, legal technology and how legal technology has impacted and shaped the legal profession. It has sought to address the issues arising from the growth of legal technology and how it conflicts with existing regulations of the legal profession, not just from the perspective of client-user using such legal technology, but also from a law firm's perspective from using these technologies subsequently. This thesis then provided a list of parameters that a regulator must consider when deciding to adopt a framework to address the issues; it then subsequently proposes a framework based on this list of parameters.

This chapter thus intends to conclude the findings of the thesis and reflect on the research question presented in Chapter 1. The research question of this thesis was posited in the introductory chapter of this thesis, which is as follows:

“Whether existing regulation of the legal profession at the EU or national level should be reformed in light of technological developments that have either permitted legal technology companies from providing legal services directly to consumers or that have allowed law firms to operate more efficiently.”⁷⁰⁰

After considering the research and analysis of the issues surrounding the regulation of the legal profession, this thesis proposes that existing regulation of the legal profession at both the EU and national should be reformed. This is to ensure that the policy concerns of the regulation of the legal profession are adequately met regardless of whether a client-user uses a lawyer or a Legal Tech solution provider to solve his legal problems. It also ensures that there is fair competition between all LSPs in the legal market, especially in the provision of legal services cross-border. This entails an

⁷⁰⁰ See Chapter 1.II.

overhaul of the entire regulation of the legal profession at both the national level and the EU level. In essence, the overhaul comprises the harmonization of national rules on the regulation and licensing of lawyers and the superseding of existing EU directives into one omnibus legislation. This overhaul is the proposed framework as discussed in detail in Chapter 8.

The proposed framework includes the implementation of the LSP Regulation which will harmonize national laws and ethical codes on the regulation of the legal profession while incorporating existing directives relating to the practice of law in the EU. The LSP Regulation will also provide the ground for creating the EU Bar Association, which will then be in charge of administering the EU bar examination and for organizing local bar associations. National bar associations (either federal or state bar associations) will then have a different role to play as they assist the EU Bar Association in administering the EU bar examination or disciplining LSPs that have flouted legal ethical rules.

This thesis has threshed out the issues concerning the existing regulations to the legal profession and has provided insight on how legal technology will impact the legal industry. It has also provided a framework on how to address the challenges arising from the impact of legal technology. However, as with all potential regulations, further studies need to be undertaken by the EU Commission to determine whether this area should be regulated considering the EU's budget. Furthermore, considering that implementation of an EU regulation consumes the resources that are financed by EU taxpayers, understandably, the reform of the legal profession might not be of critical importance on the EU's agenda considering other pressing issues such as Brexit, defense and migration. Nonetheless, it remains an important topic at least for the legal industry and consumers of legal services, which encompass the ordinary person trying to purchase a car with a hire-purchase contract and large companies trying to get listed on the stock exchange.

This issue however has not escaped the eyes of politicians – more recently in Germany, politicians have sought to propose a new law that “aims to close the gap between those who are not regulated lawyers and the regulated lawyers, by providing the former more legal certainty and the latter more leeway in terms of professional

regulations”⁷⁰¹ – this has been noted to be a “paradigm change”⁷⁰² and “could eventually have implications for legal tech companies across the EU”.⁷⁰³

Legal technology is ultimately here to stay, and based on current trends, it seems that legal technology will only become more prevalent in our daily lives. Even if it is not a pressing issue on the EU’s agenda, it is important that lawyers and bar associations consider this reality that lawyers may face. This is, after all, the livelihood of lawyers and affects the legal profession. Lawyers will have to react and adapt quickly to prevent being rendered irrelevant in the market by legal technology, and this may perhaps be even more applicable to legal support staff.⁷⁰⁴

However, we should place more attention to the need for the regulation of legal technology – so as to ensure that the economic and social policy goals that they have sought to achieve are not compromised by legal technology. It is with the proper regulation of legal technology and the legal industry together that, hopefully, society can achieve the original policy goals and objectives that it wanted to achieve all along through the traditional regulation of lawyers. For lawyers that decide to adopt legal technology, they should likewise bear in mind the possible use and abuse of legal technology, regardless of whether it is intentional or not. Tremolada in his article *The Legal Ethics of Metadata*⁷⁰⁵ discusses how lawyers can breach their ethical rules between lawyer to lawyer, such as through accidentally sending a document with unwanted – yet confidential – metadata to the opponent.⁷⁰⁶ He further aptly stated that:

“For lawyers, technological knowhow is no longer just a desirable skill: it now poses complex and novel ethical conundrums for lawyers already

⁷⁰¹ Artificial Lawyer, ‘German Politicians Seek To Regulate ‘Legal Tech’ Companies’ (Artificial Lawyer 3 June 2019) <www.artificiallawyer.com/2019/06/03/german-politicians-seek-to-regulate-legal-tech-companies/> accessed 4 June 2019.

⁷⁰² *ibid.*

⁷⁰³ *ibid.*

⁷⁰⁴ In 2015, the BBC, with research methodology from Oxford University academics, launched an online application where one could check how high a specific job is at risk of “computerization”. According to the online application, “Legal professionals (other)” have a 3% likelihood of automation whereas “legal secretaries” have a 98% likelihood of automation. BBC, ‘Will a robot take your job?’ (n 667).

⁷⁰⁵ Tremolada (n 39).

⁷⁰⁶ *ibid* 7-8.

subject to a web of professional duties concerning competence and confidentiality. Yet, whereas competent client representation demands a minimum level of technological proficiency, many lawyers come up short with respect to this fundamental component of their professional responsibilities. This ever-evolving scenario should not correspond with a lessening of legal ethics, and lawyers must always be thoughtful not to overlook the ethical dangers that technological advancements present.”⁷⁰⁷

It would not be surprising if more and more guidelines on the issue of legal ethics and technology will be issued by bar associations, similar to the cloud computing guidelines issued by the Law Society of Singapore.⁷⁰⁸ The issuance of such guidelines is not only confined to the legal profession. The Council of Europe,⁷⁰⁹ which represents not just EU member states but also non-EU member states that are geographically within Europe,⁷¹⁰ has also issued guidelines on the use of artificial intelligence in judiciary systems.⁷¹¹ Legal technology will only continue to shape the way lawyers and even adjudicators in the legal industry perform their functions. Whether Legal Tech service providers will be subject to these guidelines then depend on whether the LSP Regulation will eventually be enacted to encompass such legal service providers.⁷¹²

Ultimately, one should look at it from a deeper and a long-term perspective – what is the climate that future generations of lawyers must operate in? This has to be considered in light of the challenges that they already face.⁷¹³ If trends predict that there will be lesser young jurists who will join the legal profession, will the quality of jurisprudence be affected in the long run? How would this affect society? These are important questions that we ourselves should consider and ponder about, if not for our

⁷⁰⁷ *ibid* 5.

⁷⁰⁸ The Law Society of Singapore, *Guidance Note 3.4.1 Cloud Computing* (n 468).

⁷⁰⁹ Council of Europe <www.coe.int/en/web/portal/home> accessed 20 July 2019.

⁷¹⁰ Council of Europe, '47 Member States' <www.coe.int/en/web/portal/47-members-states> accessed 20 July 2019.

⁷¹¹ European Commission for the Efficiency of Justice (CEPEJ), *European ethical Charter on the use of Artificial Intelligence in judicial systems and their environment* (February 2019).

⁷¹² See Chapter 8.

⁷¹³ See Chapter 6.

careers but for society at large. The legal industry is one that has been in existence throughout decades, centuries and millenniums; as stakeholders in this industry, we have a part to play in ensuring innovation in the legal industry and keeping the legal profession relevant in the decades, centuries and millenniums to come – let us keep the adage going:

“Trust me, I’m an LSP.” *

*Where an LSP can be performed by a person, a software or a robot.

Bibliography

A. Books

1. Auburn J, *Legal Professional Privilege: Law and Theory* (Hart Publishing 2000).
2. Benz M, *Strategies in Markets for Experience and Credence Goods* (Deutsche Universitäts-Verlag 2007).
3. Black N, *Cloud Computing for Lawyers* (American Bar Association 2012).
4. Bolch J, *Do Your Own Divorce: A Practical Guide to Divorcing Without a Lawyer* (How To Books 2009).
5. Engelhart K and others, *RAO Rechtsanwaltsordnung* (10th edn, Manz 2018)
6. Henssler M and Prütting H, *BRAO* (5th edn, CH Beck 2019).
7. Herring J, *Legal Ethics* (2nd ed, OUP 2017).
8. Nascimbene B, *The Legal Profession in the European Union* (Wolters Kluwer 2009).
9. Susskind R, *The Future of Law* (OUP 1996)
– – *Tomorrow's Lawyers* (2nd edn, OUP 2017).
10. Zweigert K and Kötz H, *Einführung in die Rechtsvergleichung* (3rd edn, Mohr Siebeck 1996).

B. Book Chapters and Articles

1. American Bar Association, 'ABA: Bringing Technology to the Legal Profession' (1984) 70 American Bar Association 69.
2. Barfield W, 'Liability for Autonomous and Artificially Intelligent Robots' (2018) 9(1) Paladyn, Journal of Behavioral Robotics 193.
3. Barocas S and Selbst A, 'Big Data's Disparate Impact' (2016) 104 California Law Review 641.
4. Barthelmess U and Furbach U, 'Do we need Asimov's Laws?' (arXiv.org) <<https://arxiv.org/ftp/arxiv/papers/1405/1405.0961.pdf>> accessed 20 July 2019.
5. Barton B, 'Why Do We Regulate Lawyers?: An Economic Analysis for the Justifications for Entry and Conduct Regulation' (2001) Arizona State Law Journal 429.
6. Basner K and others, 'Regulation of the legal profession in the United States: overview' (Thomson Reuters Practical Law 1 April 2018) <[https://uk.practicallaw.thomsonreuters.com/2-633-6340?transitionType=Default&contextData=\(sc.Default\)&firstPage=true&comp=pluk&bhcp=1](https://uk.practicallaw.thomsonreuters.com/2-633-6340?transitionType=Default&contextData=(sc.Default)&firstPage=true&comp=pluk&bhcp=1)> accessed 20 July 2019.
7. Bento L, 'International Arbitration and Artificial Intelligence: Time to Tango?' (Kluwer Arbitration Blog 23 February 2018) <<http://arbitrationblog.kluwerarbitration.com/2018/02/23/international-arbitration-artificial-intelligence-time-tango/>> accessed 20 July 2019.
8. Burke A, 'Prosecutorial Passion, Cognitive Bias, and Plea Bargaining' (2007) 91 Marquette Law Review 183.

9. Burt A, 'Is there a 'right to explanation' for machine learning in the GDPR?' (IAPP 1 June 2017) <<https://iapp.org/news/a/is-there-a-right-to-explanation-for-machine-learning-in-the-gdpr/>> accessed 20 July 2019.
10. Calomme C, 'Technology and its impact on legal practice' (The UK Law Societies' Joint Brussels Office 4 July 2019) <www.lawsocieties.eu/news/in-focus/technology-and-law/technology-and-its-impact-on-legal-practice/5062190.fullarticle> accessed 17 July 2019.
11. Chan E, 'The Age of Digital Disruption: The Role of the Future Lawyer' (Medium 23 October 2018) <<https://medium.com/predict/the-age-of-digital-disruption-the-role-of-the-future-lawyer-e5ea618f1b08>> accessed 20 July 2019.
12. Chew A and others, 'Legal Technology in Singapore' (LawTech.Asia 21 October 2018) <<https://lawtech.asia/legal-technology-in-singapore/>> accessed 17 July 2019.
13. Cole G, 'Tort liability for artificial intelligence and expert systems' (1990) 10(2) *Computer Law Journal* 127.
14. Daniels W, 'The Cost of Bias in the Legal Profession' (HG.org) <www.hg.org/legal-articles/the-cost-of-bias-in-the-legal-profession-18421> accessed 20 July 2019.
15. Enrique Gonzalez-Diaz F and Stuart P, 'Legal professional privilege under EU law: current issues' <http://awa2018.concurrences.com/IMG/pdf/12._f.e._gonzalez-diaz_and_p._stuart_-_legal_professional_privilege_under_eu_law.pdf> accessed 20 July 2019.
16. Fina S and Ng I, 'Big Data & Litigation: Analyzing the Expectation of Lawyers to Provide Big Data Predictions when Advising Clients' (2017) 13 *Indian Journal of Law and Technology* 1.
17. Fina S, Ng I and Vogl R, 'Perspectives on the Growth of DIY Legal Services in the European Union' (2018) 7-6 *Journal of European Consumer and Market Law* 241.
18. Gaetke E, 'Lawyers as Officers of the Court' (1989) 42 *Vanderbilt Law Review* 39.
19. Gippini-Fournier E, 'Legal Professional Privilege in Competition Proceedings Before the European Commission: Beyond the cursory Glance' (2004-2005) 28 *Fordham International Law Journal* 967.
20. Gordon L, 'How lawyers can avoid burnout and debilitating anxiety' (ABA Journal 1 July 2015) <www.abajournal.com/magazine/article/how_lawyers_can_avoid_burnout_and_debilitating_anxiety> accessed 20 July 2019.
21. Hall N, '9 Ways the Blockchain Will Change the Legal Profession' (Crypto Briefing 26 October 2018) <<https://cryptobriefing.com/9-ways-the-blockchain-will-change-the-legal-profession/>> accessed 20 July 2019.
22. Hartung M, 'Gedanken zu Legal Tech und Digitalisierung' in Hartung M, Bues M and Halblieb G (eds), *Die Digitalisierung des Rechtsmarkts* (CH Beck 2018).
23. Ng I, 'Designing and Building Chatbots for Pro Bono Legal Clinics' in Schweighofer E and others (eds), *Data Protection / LegalTech: Proceedings of the 21st International Legal Informatics Symposium IRIS 2018* (Editions Weblaw 2018).
24. Ng I and Benedetti del Rio V, 'When the Tribunal is an Algorithm: Complexities of Enforcing Orders Determined by a Software Under the New York Convention' in

- Gomez K and Rodriguez A (eds), *60 Years of the New York Convention: Key Issues and Future Challenges* (Wolters Kluwer 2019).
25. Karras T, Laine S and Aila T, 'A Style-Based Generator Architecture for Generative Adversarial Networks' (arXiv 29 March 2019) <<https://arxiv.org/pdf/1812.04948.pdf>> accessed 20 July 2019.
 26. Kleinberg J and others, 'Algorithmic Fairness, Advances in Big Data Research in Economics' <www.cs.cornell.edu/home/kleinber/aer18-fairness.pdf> accessed 20 July 2019.
 27. Knight W, 'The Dark Secret at the Heart of AI' (MIT Technology Review 11 April 2017) <www.technologyreview.com/s/604087/the-dark-secret-at-the-heart-of-ai/> accessed 20 July 2019.
 28. Koulu R, 'Why We Need Legal Technology' in Koulu R and Hakkarainen J (eds), *Law and Digitalisation: Rethinking Legal Services* (University of Helsinki Legal Tech Lab publications 2018).
 29. Kritzer H, 'Lawyers' professional liability: comparative perspectives' (2017) 24(2) *International Journal of the Legal Profession* 73.
 30. Lampič J, 'Ricardian contracts: A smarter way to do smart contracts?' (Schönherr 2019) <www.schoenherr.eu/publications/publication-detail/ricardian-contracts-a-smarter-way-to-do-smart-contracts/> accessed 20 July 2019.
 31. Logg J, Minson J and Moore D, 'Do People Trust Algorithms More Than Companies Realize?' (Harvard Business Review 26 October 2018) <<https://hbr.org/2018/10/do-people-trust-algorithms-more-than-companies-realize>> accessed 20 July 2019.
 32. Lohr S, 'A.I. is Doing Legal Work, But It Won't Replace Lawyers, Yet.' (The New York Times 19 March 2017) <www.nytimes.com/2017/03/19/technology/lawyers-artificial-intelligence.html> accessed 20 July 2019.
 33. Nugent D, 'Judicial Bias' (1994) 42 *Cleveland State Law Review* 1.
 34. Ribstein L, 'Lawyers as Lawmakers: A Theory of Lawyer Licensing' (2004) 69(2) *Missouri Law Review* 299.
 35. Ng I, 'The Art of Contract Drafting in the Age of Artificial Intelligence: A Comparative Study Based on US, UK and Austrian law' (2017) *Stanford-Vienna Transatlantic Technology Law Forum TTLF Working Papers* No. 26.
 36. Ng I, 'The Move Towards Explainable Artificial Intelligence and its Potential Impact on Judicial Reasoning' (2018) 2-2 *TTLF Newsletter on Transatlantic Antitrust and IPR Developments* 40 <<https://www-cdn.law.stanford.edu/wp-content/uploads/2015/04/2018-2-2.pdf>> accessed 20 July 2019.
 37. Ng I and Benedetti del Rio V, 'The Use of Online Dispute Resolution in the Realm of Investment Arbitration in the European Union' (2016) 1 *European Investment Law and Arbitration Review* 131.
 38. Omni Legal, 'Artificial Intelligence Won't Replace Lawyers – It Will Free Them' (Law Technology Today 27 February 2018) <www.nytimes.com/2017/03/19/technology/lawyers-artificial-intelligence.html> accessed 12 March 2019.
 39. Pfeifer J, 'The Data-Driven Lawyer and the Future of Legal Technology' (Law Technology Today 15 January 2018) <www.lawtechnologytoday.org/2018/01/the-data-driven-lawyer/> accessed 20 July 2019.
 40. Praduroux S, de Paiva V and di Caro L, 'Legal Tech Start-ups: State of the Art and Trends' <<https://vcvpaiva.github.io/includes/pubs/2016-legal.pdf>> accessed 20 July 2019.

41. Radford A and others, 'Language Models are Unsupervised Multitask Learners' <https://d4mucfpksywv.cloudfront.net/better-language-models/language_models_are_unsupervised_multitask_learners.pdf> accessed 20 July 2019.
42. Reed C and Ng I, 'Data Trusts as an AI Governance Mechanism' <<https://ssrn.com/abstract=3334527>> accessed 20 July 2019.
43. Schelkens M, 'The Freedom of Establishment of Lawyers in the European Union' <www.law.kuleuven.be/apps/jura/public/art/51n2/schelkens.pdf> accessed 20 July 2019.
44. Schmitt S and others, 'Kickstarting Deep Reinforcement Learning' (arXiv 10 March 2018) <<https://arxiv.org/pdf/1803.03835.pdf>> accessed 20 July 2019.
45. Semple N, 'Access to justice: is legal services regulation blocking the path' (2013) *International Journal of the Legal Profession* 20:3 267.
46. Sim C, 'Will Artificial Intelligence Take Over Arbitrators?' (2018) 14(1) *Asian Journal of International Arbitration* 1.
47. Skapinker M, 'Technology: Breaking the law' (*Financial Times* 11 April 2016) <www.ft.com/content/c3a9347e-fdb4-11e5-b5f5-070dca6d0a0d> accessed 13 March 2019.
48. Spencer M, 'Artificial Intelligence Regulation May Be Impossible' (*Forbes* 2 March 2019) <www.forbes.com/sites/cognitiveworld/2019/03/02/artificial-intelligence-regulation-will-be-impossible/#4a1c59e11ed0> accessed 11 March 2019.
49. Smallwood D, 'The spectrum of chief operating officer roles in law firms' (LinkedIn 1 June 2017) <www.linkedin.com/pulse/spectrum-chief-operating-officer-roles-law-firms-daniel-smallwood/> accessed 20 July 2019.
50. Stephen F, 'The European Single Market and the Regulation of the Legal Profession: An Economic Analysis' (2002) 23 *Managerial and Decision Economics* 115.
51. Thomson Reuters Practical Law, 'Chinese Walls: Maintaining client confidentiality' (Thomson Reuters Practical Law 1 November 1998) <[https://uk.practicallaw.thomsonreuters.com/Cosi/SignOn?comp=pluk&redirectTo=%2f3-100-8763%3f__lrTS%3d20181218001936411%26transitionType%3dDefault%26contextData%3d\(sc.Default\)%26firstPage%3dtrue](https://uk.practicallaw.thomsonreuters.com/Cosi/SignOn?comp=pluk&redirectTo=%2f3-100-8763%3f__lrTS%3d20181218001936411%26transitionType%3dDefault%26contextData%3d(sc.Default)%26firstPage%3dtrue)> accessed 20 July 2019.
52. Tremolada R, 'The Legal Ethics of Metadata: Accidental Discovery of Inadvertently Sent Metadata and the Ethics of Taking Advantage of Others' Mistakes' (2019) 25:4 *Richmond Journal of Law and Technology* 1.
53. Wiener J, 'The regulation of technology, and the technology of regulation' (2004) 26 *Technology in Society* 483.
54. Wright P, 'The Uberization of Law' (2015) 41 *Law Practice* 49.

C. Official Reports and Documents

1. American Bar Association, 'For Comment: Issues Paper Concerning Unregulated LSP Entities' (American Bar Association 31 March 2016) <www.americanbar.org/content/dam/aba/images/office_president/final_unregulated_lsp_entities_issues_paper.pdf> accessed 1 June 2019.
2. American Bar Association, *Report on the Future of Legal Services (2016)* <<http://abafuturesreport.com/2016-fls-report-web.pdf>> accessed 10 March 2019.

3. Baarsma B, Felsö F and Janssen K with Bremer S, 'Regulation of the legal profession and access to law' (May 2008).
4. Claessens SJFJ and others, *Evaluation of the Legal Framework for the Free Movement of Lawyers* (28 November 2012).
5. Council of Bars and Law Societies of Europe, *Guidelines for Bar & Law Societies on Free Movement of Lawyers within the European Union* <www.ccbe.eu/fileadmin/speciality_distribution/public/documents/EU_LAWYERS/EUL_Guides___recommendations/EN_FML_2016_Guide.pdf> accessed 10 March 2019.
6. Education Committee of the Utah Judicial Council Standing Committee on Resources for Self-Represented Parties, *Legal Information vs. Legal Advice* (April. 2010) <www.co.washington.or.us/lawlibrary/upload/tf_utah_legal_info-v-advise.pdf> accessed 18 March 2019.
7. European Commission, *DG Justice Guidance Document concerning Directive 2011/83/EU of the European Parliament and of the Council of 25 October 2011 on consumer rights, amending Council Directive 93/13/EEC and Directive 1999/44/EC of the European Parliament and of the Council and repealing Council Directive 85/577/EEC and Directive 97/7/EC of the European Parliament and of the Council* (June 2014) <https://ec.europa.eu/info/sites/info/files/crd_guidance_en_0.pdf> accessed 12 March 2019.
8. European Commission, *The 2018 EU Justice Scoreboard (2018)* <https://ec.europa.eu/info/sites/info/files/justice_scoreboard_2018_en.pdf> accessed 15 March 2019.
9. European Commission, *The European Commission's High-Level Expert Group on Artificial Intelligence Draft* (December 18 2018) <www.euractiv.com/wp-content/uploads/sites/2/2018/12/AIHLEGDraftAIEthicsGuidelinespdf.pdf> accessed 11 March 2019.
10. European Commission/EACEA/Eurydice, *The European Higher Education Area in 2018: Bologna Process Implementation Report (2018)* <https://eacea.ec.europa.eu/national-policies/eurydice/sites/eurydice/files/bologna_internet_0.pdf> accessed 11 March 2019.
11. European Commission for the Efficiency of Justice (CEPEJ), *European ethical Charter on the use of Artificial Intelligence in judicial systems and their environment* (February 2019).
12. Financial Conduct Authority, *Regulatory sandbox lessons learned report* <www.fca.org.uk/publication/research-and-data/regulatory-sandbox-lessons-learned-report.pdf> accessed 11 March 2019.
13. Formont C, Concetto A and Chéronnet A, *L'innovation dans la profession d'avocat* (Sciences Po École de Droit and L'Incubateur 2015) <www.sciencespo.fr/ecole-de-droit/sites/sciencespo.fr.ecole-de-droit/files/IBP%20Rapport%20Innovation_decembre2015.pdf> accessed 28 May 2019.
14. Koch U and Schusterbauer E, 'Soziale Absicherung für RechtsanwältInnen und RechtsanwaltsanwärterInnen' (Die Österreichischen Rechtsanwälte 22 January 2019).
15. Law Society of Singapore & Ministry of Law Singapore, *Legal Technology in Singapore: 2018 Survey of Legal Practitioners*.

16. LawGeex, *Comparing the Performance of Artificial Intelligence to Human Lawyers in the Review of Standard Business Contracts* (February 2018).
17. Legal Tech Initiative Austria, *Legal Tech Landscape Austria 2018* <https://docs.wixstatic.com/ugd/f4276b_98cea5ce90974862bbad2a1ffc40ca3d.pdf> accessed 10 March 2019 (Legal Tech Landscape Austria 2018).
18. Singapore Academy of Law, 'Legal Technology Manual for Lawyers' <www.sal.org.sg/Resources-Tools/Legal-Technology-Vision/Legal-Technology-Manual> accessed 11 March 2019.
19. New York State Bar Association, *The Practice of Law in New York State* (September 2015).
20. Soh J (ed), *2019 State of Legal Innovation Report Asia Pacific* (Singapore Academy of Law and Singapore Management University 2019) <www.dropbox.com/s/hwsdvwe0ms3t3or/%28Final%29%20State%20of%20Legal%20Innovation%20in%20APAC%20Report%20%2813%20April%202019%29.pdf?dl=0> accessed 28 May 2019.
21. The Law Society of Singapore, *Guidance Note 3.4.1 Cloud Computing* <www.lawsociety.org.sg/DesktopModules/Bring2mind/DMX/Download.aspx?Command=Core_Download&EntryId=3255&language=en-SG&PortalId=0&TabId=787> accessed 2 June 2019.
22. U.S. Commodity Futures Trading Commission, *A Primer on Smart Contracts* (27 November 2018) <www.cftc.gov/sites/default/files/2018-11/LabCFTC_PrimerSmartContracts112718_0.pdf> accessed 11 March 2019.
23. Universität Wien, 'Leitungsbericht & Wissenschaftsbilanz 2017' <www.univie.ac.at/fileadmin/user_upload/startseite/Dokumente/Leistungsbericht_2017_interaktiv.pdf> accessed 11 March 2019.
24. Veith C and others, *Technology Will Change the Business of Law* (Boston Consulting Group and Bucerius Law School 2016) <www.bucerius-education.de/fileadmin/content/pdf/studies_publications/Legal_Tech_Report_2016.pdf> accessed 28 May 2019

D. News Sources

1. Alexandre A, 'German Financial Regulator Issues Paper on Blockchain Securities Regulation' (CoinTelegraph 9 March 2019) <<https://cointelegraph.com/news/german-financial-regulator-issues-paper-on-blockchain-securities-regulation>> accessed 11 March 2019.
2. Artificial Lawyer, 'Clifford Chance Launches Legal Tech Incubator in Singapore' (Artificial Lawyer 18 December 2018) <www.artificiallawyer.com/2018/12/18/clifford-chance-launches-legal-tech-incubator-in-singapore/> accessed 17 March 2019.
3. Artificial Lawyer, 'France Bans Judge Analytics, 5 Years in Prison for Rule Breakers' (Artificial Lawyer 4 June 2019) <www.artificiallawyer.com/2019/06/04/france-bans-judge-analytics-5-years-in-prison-for-rule-breakers/> accessed 6 June 2019.
4. Artificial Lawyer, 'German Politicians Seek To Regulate 'Legal Tech' Companies' (Artificial Lawyer 3 June 2019) <www.artificiallawyer.com/2019/06/03/german-politicians-seek-to-regulate-legal-tech-companies/> accessed 4 June 2019.
5. Baker McKenzie, 'Baker McKenzie Deploys First of a 'New Generation' of Smarter Tools with ContraxSuite' (Baker McKenzie 1 August 2018)

- <www.bakermckenzie.com/en/newsroom/2018/07/lexpredict> accessed 26 July 2019.
6. Baker McKenzie, 'Baker McKenzie Launches 'First of its Kind' Global Antitrust Dawn Raid App' <www.bakermckenzie.com/en/newsroom/2017/04/global-antitrust-dawn-raid-app> accessed 13 March 2019.
 7. BBC, 'Will a robot take your job?' (BBC 11 September 2015) <<https://www.bbc.com/news/technology-34066941>> accessed 28 May 2019.
 8. Bindman D, 'Pioneering ODR platform to rein in ambitions after commercial setback' (Legal Futures 3 April 2017) <www.legalfutures.co.uk/latest-news/pioneering-odr-platform-to-rein-in-ambitions-after-commercial-setback> accessed 11 March 2019.
 9. Black N, 'Mobile Lawyer Trends (And Tips) in 2017' (Above the Law 23 February 2017) <<https://abovethelaw.com/2017/02/mobile-lawyer-trends-and-tips-in-2017/>> accessed 17 July 2019.
 10. Bryant B, 'Judges are more lenient after taking a break, study finds' (The Guardian 11 April 2011) <www.theguardian.com/law/2011/apr/11/judges-lenient-break> accessed 10 March 2019.
 11. Cellan-Jones R, 'Stephen Hawking warns artificial intelligence could end mankind' (BBC 2 December 2014) <www.bbc.com/news/technology-30290540> accessed 11 March 2019.
 12. Chambers | Student, 'Being a trainee: 8 realities of the job' (Chambers | Student January 2016) <www.chambersstudent.co.uk/where-to-start/newsletter/being-a-trainee-8-realities-of-the-job> accessed 1 June 2019.
 13. Charmatz P, 'AML and KYC regulations: tech it seriously' (Thomson Reuters Practical Law 28 June 2018) <[https://uk.practicallaw.thomsonreuters.com/w-015-4159?transitionType=Default&contextData=\(sc.Default\)&firstPage=true&comp=pluk&bhcp=1](https://uk.practicallaw.thomsonreuters.com/w-015-4159?transitionType=Default&contextData=(sc.Default)&firstPage=true&comp=pluk&bhcp=1)> accessed 1 June 2019.
 14. CNA, 'OCBC Bank Rolls out free online will writing services' (Channel NewsAsia 27 December 2018) <www.channelnewsasia.com/news/singapore/ocbc-bank-rolls-out-free-online-will-writing-service-11065948> accessed 10 March 2019.
 15. Cresci E, 'Chatbot that overturned 160,000 parking fines now helping refugees claim asylum' (The Guardian 6 March 2017) <www.theguardian.com/technology/2017/mar/06/chatbot-donotpay-refugees-claim-asylum-legal-aid> accessed 10 March 2019.
 16. Croft J, 'Chatbots join the legal conversation' (Financial Times 7 June 2018) <www.ft.com/content/0eabcf44-4c83-11e8-97e4-13afc22d86d4> accessed 10 March 2019.
 17. Davie S, 'Fewer university applicants list law as first choice, but more drawn to computing' (The Straits Times 6 July 2017) <www.straitstimes.com/singapore/education/fewer-university-applicants-list-law-as-first-choice-but-more-drawn-to-computing> accessed 11 March 2019.
 18. Dentons Rodyk, 'Dentons Rodyk enhances document review with Litera Microsystem's Artificial Document Intelligence™ (ADI)' (Dentons Rodyk 19 July 2018) <<https://dentons.rodyk.com/en/about-dentons-rodyk/news/2018/july/dentons-rodyk-enhances-document-review-with-litera-microsystem-artificial-document-intelligence>> accessed 11 March 2019.
 19. Derbyshire J, 'Big Four circle the legal profession' (Financial Times 15 November 2018) <www.ft.com/content/9b1fdab2-cd3c-11e8-8d0b-a6539b949662> accessed 11 March 2019.

20. Digibyte, 'European countries join Blockchain Partnership' (European Commission 10 April 2018) <<https://ec.europa.eu/digital-single-market/en/news/european-countries-join-blockchain-partnership>> accessed 11 March 2019.
21. Duerden A, 'EY expands global legal managed services offering with acquisition of Riverview Law' (EY 7 August 2018) <www.ey.com/en_gl/news/2018/08/ey-expands-global-legal-managed-services-offering-with-acquisition-of-riverview-law> accessed 17 March 2019.
22. Feng Zengkun, 'Singapore is facing a glut of lawyers: Shanmugam' (The Straits Times 17 August 2014) <www.straitstimes.com/singapore/singapore-is-facing-a-glut-of-lawyers-shanmugam> accessed 11 March 2019.
23. elevate, 'Elevate Acquires LexPredict, Expanding Capabilities in Artificial Intelligence and Data Science' (elevate 14 November 2018) <<https://elevateservices.com/elevate-acquires-lexpredict/>> accessed 17 March 2019.
24. European Commission, 'EU consumer rules: Airbnb commits to complying with European Commission and EU consumer authorities' demands' (European Commission 20 September 2018) <http://europa.eu/rapid/press-release_IP-18-5809_en.htm> accessed 12 March 2019.
25. European Commission, 'EU Consumer rules: The European Commission and EU consumer authorities push Airbnb to comply' (European Commission 16 July 2018) <http://europa.eu/rapid/press-release_IP-18-4453_en.htm> accessed 2 June 2019.
26. Gaskell A, 'Study Explores The Impact of Uber on the Taxi Industry' (Forbes 26 January 2017) <www.forbes.com/sites/adigaskell/2017/01/26/study-explores-the-impact-of-uber-on-the-taxi-industry/#49f3ac8d16b0> accessed 13 March 2019.
27. Hook L, 'Renewal season reveals PII market for lawyers hardening, insurers looking to lift rates' (Insurance Business 1 November 2018) <www.insurancebusinessmag.com/uk/news/professional-liability/renewal-season-reveals-pii-market-for-lawyers-hardening-insurers-looking-to-lift-rates-115219.aspx> accessed 11 March 2019.
28. InfoPro Community Manager, 'LexisNexis Acquires Ravel Law – News Coverage' (LexisNexis 14 June 2017) <www.lexisnexis.com/infopro/keeping-current/b/weblog/archive/2017/06/14/lexisnexis-acquires-ravel-law.aspx> accessed 17 March 2019.
29. Johnson K, 'Visabot helps you cut green-card red tape' (Venture Beat 11 July 2017) <<https://venturebeat.com/2017/07/11/visabot-helps-you-cut-green-card-red-tape/>> accessed 10 March 2019.
30. Kahn J, 'The AI That Can Write a Fake News Story From a Handful of Words' (Bloomberg 14 February 2019) <www.bloomberg.com/news/articles/2019-02-14/the-ai-that-can-write-a-fake-news-story-from-a-handful-of-words> accessed 11 March 2019.
31. Khatri Y, 'Blockchain Smart Contracts Subject to Financial Laws, Says CFTC Primer' (Coindesk 28 November 2018) <www.coindesk.com/blockchain-smart-contracts-subject-to-financial-laws-says-cftc-primer> accessed 11 March 2019.
32. King K, 'Robot lawyer' created by Cambridge students will now answer your legal problems via Facebook Messenger' (Legal Cheek 19 June 2017) <www.legalcheek.com/2017/06/robot-lawyer-created-by-cambridge-students-will-now-answer-your-legal-problems-via-facebook-messenger/> accessed 17 July 2019.

33. Kira Systems, 'Allen & Overy licenses Kira software as Kira Systems joins Fuse 2 cohort to drive adoption' (Kira Systems 10 July 2018) <<https://info.kirasystems.com/news/allen-overy-licenses-kira-software-joins-fuse-2-cohort>> accessed 10 March 2019.
34. Kira Systems, 'Freshfields renews contract with machine learning software Kira' (Kira Systems 24 May 2018) <<https://info.kirasystems.com/news/freshfields-renews-contract-machine-learning-software-kira>> accessed 10 March 2019.
35. Kira Systems, 'Hogan Lovells Enhancing Transactional Services with AI-Enabled Contract Review Software, Kira' (Kira Systems 28 January 2019) <<https://info.kirasystems.com/news/hogan-lovells-enhancing-transactional-services-with-ai-enabled-contract-review-software-kira>> accessed 10 March 2019.
36. Lah K, 'Tokyo man marries video game character' (CNN 17 December 2009) <<http://edition.cnn.com/2009/WORLD/asiapcf/12/16/japan.virtual.wedding/index.html>> accessed 3 June 2019.
37. Legal Geek, 'Legal Geek: Law Tech Hackathon "Law for Good"' <www.legalgeek.co/event/legal-geek-law-tech-hackathon-law-good/> accessed 10 March 2019.
38. Love T, 'Do androids dream of electric beats? How AI is changing music for good' (The Guardian 22 October 2018) <www.theguardian.com/music/2018/oct/22/ai-artificial-intelligence-composing> accessed 11 March 2019.
39. Lum S, 'Fixed legal costs proposed for civil cases' (The Straits Times 27 October 2018) <www.straitstimes.com/singapore/courts-crime/fixed-legal-costs-proposed-for-civil-cases> accessed 11 March 2019.
40. Mangan D, 'Lawyers could be the next profession to be replaced by lawyers' (CNBC 17 February 2017) <www.cnbc.com/2017/02/17/lawyers-could-be-replaced-by-artificial-intelligence.html> accessed 11 March 2019.
41. McFarland M, 'Elon Musk: 'With artificial intelligence, we are summoning the demon.' (The Washington Post 24 October 2014) <www.washingtonpost.com/news/innovations/wp/2014/10/24/elon-musk-with-artificial-intelligence-we-are-summoning-the-demon/?noredirect=on&utm_term=.0bdb8c028d82> accessed 11 March 2019.
42. Norton Rose Fulbright, 'Does the GDPR apply to your non-EU business?' (Norton Rose Fulbright May 2018) <www.nortonrosefulbright.com/en/knowledge/publications/dfff365a/does-the-gdpr-apply-to-your-non-eu-business> accessed 17 March 2019.
43. Norton Rose Fulbright, 'Norton Rose Fulbright launches AI-powered chatbot on EU GDPR, Norton Rose Fulbright' (Norton Rose Fulbright 14 May 2018) <www.nortonrosefulbright.com/en/news/06a02cee/norton-rose-fulbright-launches-ai-powered-chatbot-on-eu-gdpr> 18 March 2019.
44. Ondrej, 'LexisNexis announced that 5 legal tech startups are joining its LexMachina accelerator' (Legal Geek 4 April 2017). <www.legalgeek.co/news/lexisnexis-announced-5-legal-tech-startups-joining-lexmachina-accelerator/> accessed 10 March 2019.
45. Ondrej, 'Should law students learn to code?' (Legal Geek 5 May 2017) <www.legalgeek.co/read/should-law-students-learn-to-code/> accessed 18 March 2019.
46. Owen G, 'Solicitor jailed for stealing conveyancing client's money' (Today's Conveyancer 11 June 2018) <www.todaysconveyancer.co.uk/main-

- news/solicitor-jailed-stealing-conveyancing-clients-money/> accessed 3 June 2019.
47. Packham A, 'Cambridge students build a 'lawbot' to advise sexual assault victims' (The Guardian 9 November 2016) <www.theguardian.com/education/2016/nov/09/cambridge-students-build-a-lawbot-to-advise-sexual-assault-victims> accessed 2 June 2019.
 48. Pooley C, 'Legal tech uses AI to help business to help itself' (Financial Times 15 November 2018) <www.ft.com/content/7a990f1a-d067-11e8-9a3c-5d5eac8f1ab4> accessed 11 March 2019.
 49. Rajah & Tann Technologies, 'Rajah & Tann Technologies acquires LegalComet' (Rajah & Tann Technologies 7 November 2018) <www.rajahtannasia.com/media/3142/media-release_rajah-tann-technologies-acquires-legalcomet-1.pdf> accessed 17 March 2019.
 50. Rawlinson K, 'Microsoft's Bill Gates insists AI is a threat' (BBC 29 January 2015) <www.bbc.com/news/31047780> accessed 11 March 2019.
 51. Singapore Academy of Law, 'SAL To Launch First-Of-Its-Kind Co-Working Space' (Medium 12 March 2019) <<https://medium.com/@singaporeacademyoflaw/sal-to-launch-first-of-its-kind-co-working-space-5a8ae1292e8f>> accessed 2 June 2019.
 52. van Veenen J, 'Dutch Legal Tech List' (Dutch Legal Tech 20 February 2015) <www.dutchlegaltech.nl/2015/02/20/dutch-legal-tech-list/> accessed 2 June 2019.
 53. Vijayan KC, 'MinLaw removing proposal for fixed legal fees' (The Straits Times 24 November 2018) <www.straitstimes.com/singapore/minlaw-removing-proposal-for-fixed-legal-fees> accessed 11 March 2019.
 54. West S, 'Meeting Millennial Expectations In These Four Areas of Technology' (Forbes Technology Council 28 June 2019) <www.forbes.com/sites/forbestechcouncil/2018/06/28/meeting-millennial-expectations-in-these-four-areas-of-technology/#43c3ebd84ffc> accessed 4 June 2019.
 55. Yang Y and Liu X, 'China's AI push raises fears over widespread job cuts' (Financial Times 30 August 2018) <www.ft.com/content/1e2db400-ac2d-11e8-94bd-cba20d67390c> accessed 3 June 2019.
 56. Zhang M, 'These Portraits Were Made by AI: None of These People Exist' (PetaPixel 17 December 2018) <<https://petapixel.com/2018/12/17/these-portraits-were-made-by-ai-none-of-these-people-exist/>> accessed 3 June 2019.

E. Other Website-based Sources

1. Allen & Overy, 'Advanced Delivery: Fuse by Allen & Overy' <www.allenoverly.com/advanceddelivery/fuse/Pages/default.aspx> accessed 17 July 2019.
2. Altman Weil, inc., 'Law Firm Merger Market on Record-Breaking Pace' <www.altmanweil.com/index.cfm/fa/r.resource_detail/oid/3C0444FD-79BC-41E5-8BA8-60B2D354BE64/resource/Law_Firm_Merger_Market_on_RecordBreaking_Pace.cfm> accessed 17 March 2019.
3. American Bar Association, 'Legal Technology Buyer's Guide' <<https://buyersguide.americanbar.org/>> accessed 28 May 2019.

4. American Bar Association, 'Legal Technology Resource Center' <www.americanbar.org/groups/departments_offices/legal_technology_resources/> accessed 28 May 2019.
5. Analyze Law, 'Contract Analysis' <www.analyze-law.com/why-contract-analyzer/> accessed 4 June 2019.
6. Anwaltszukunftskongress <www.anwaltszukunftskongress.de/> accessed 26 July 2019.
7. Apple App Store, 'Baker McKenzie Dawn Raid' <<https://itunes.apple.com/de/app/baker-mckenzie-dawn-raid/id1153905937?mt=8>> accessed 4 June 2019.
8. Apple App Store Preview, 'DoNotPay' <<https://itunes.apple.com/app/id1427999657>> accessed 10 March 2019.
9. Atlassian, 'Atlassian Cloud Terms of Service' <www.atlassian.com/legal/cloud-terms-of-service> accessed 2 June 2019.
10. Asia Law Network <www.asialawnetwork.com/> accessed 17 March 2019.
11. Aws <<https://aws.amazon.com/>> accessed 2 June 2019.
12. Bar Standards Board <www.barstandardsboard.org.uk/> accessed 3 June 2019.
13. Bar Standards Board, 'Becoming a barrister' <www.barstandardsboard.org.uk/qualifying-as-a-barrister/becoming-a-barrister/> accessed 11 March 2019.
14. Bar Standards Board, 'Future Bar Training' <www.barstandardsboard.org.uk/qualifying-as-a-barrister/future-requirements/> accessed 11 March 2019.
15. Bar Standards Board, 'When might I need a barrister?' <www.barstandardsboard.org.uk/using-a-barrister/when-might-i-need-a-barrister/> accessed 2 June 2019.
16. Barreau de Bruxelles Ordre Français, 'The Bar' <www.barreaudebruxelles.info/index.php/en/our-bar/the-bar> accessed 10 March 2019.
17. Beck-shop.de: Die Fachbuchhandlung, 'Recht' <www.beck-shop.de/recht/bereichsseite.aspx?toc=4393> accessed 10 March 2019.
18. Bucerius Center on the Legal Profession, 'Legal Tech & Innovation' <www.bucerius-education.de/en/bucerius-clp/legaltech/> accessed 1 June 2019.
19. Bucerius Law School, 'Understand the future of law and legal services' <www.law-school.de/summer-programs/legal-technology-and-operations/overview/> accessed 26 July 2019.
20. Bucerius Law School, 'Topics & Schedule: Apply legal technology to your career path' <www.law-school.de/summer-programs/legal-technology-and-operations/topics-schedule/#c21521> accessed 10 March 2019.
21. CEDR, 'CEDR Arbitrators' <www.cedr.com/solve/arbitrators/> accessed 3 June 2019.
22. Centre for Public Legal Education Alberta, 'Legal Information vs. Legal Advice: What is the difference?' <www.cplea.ca/wp-content/uploads/LegalInfovsLegalAdvice.pdf> accessed 18 March 2019.
23. Claim Flights <www.claimflights.co.uk/> accessed 10 March 2019.
24. Claim Flights, 'Claim Flights GmbH Impressum | Bonn, Germany' <www.claimflights.com/impressums> accessed 10 March 2019.
25. Clicklaw <www.clicklaw.bc.ca/> accessed 17 March 2019.

26. CMS, 'CMS Dawn Raid App' <<https://cms.law/en/INT/Online-Services/CMS-Client-Services/CMS-Dawn-Raid-App>> accessed 17 July 2019.
27. CMS, 'CMS Dawn Raid App' <<https://cms.law/de/AUT/News-Information/CMS-Dawn-Raid-App>> accessed 4 June 2019.
28. CMS, 'Legal Tech' <<https://cms.law/en/INT/Annual-Review/Annual-Review-2017/Inside-CMS/LEGAL-TECH>> accessed 26 July 2019.
29. CMS, 'People: 78 Search Results (with filter Austria)' <https://cms.law/en/AUT/search/dp_eng?cx=people&id=web&sb=alpha&p=103&filter%5B%5D=sc_related_office_ids%3A1082> accessed 10 March 2019.
30. Contract () <<https://docontract.com/>> accessed 17 March 2019.
31. Contract Works <www.contractworks.com/> accessed 12 March 2019.
32. Council of Bars and Law Societies of Europe, 'Welcome to CCBE | About | Members' <www.ccbe.eu/about/members/> accessed 3 June 2019.
33. Council of Bars and Law Societies of Europe, 'Who we are' <www.ccbe.eu/about/who-we-are/> accessed 16 March 2019.
34. Council of Europe <www.coe.int/en/web/portal/home> accessed 20 July 2019.
35. Council of Europe, '47 Member States' <www.coe.int/en/web/portal/47-members-states> accessed 20 July 2019.
36. Coursera, 'Legal Tech & Startups' <www.coursera.org/learn/legal-tech-startups> accessed 17 July 2019.
37. Conseil National des Barreaux, 'L'accès à la profession par la voie normale : le CAPA' <<https://www.cnb.avocat.fr/fr/laces-la-profession-par-la-voie-normale-le-cap>> accessed 3 June 2019.
38. CrowdfundUP, 'Smart Contracts for Real Estate Transactions' (22 May 2018) <<https://crowdfundup.com/blog/109/smart-contracts-and-real-estate-transactions>> accessed 4 June 2019.
39. Dentons Rodyk, 'Kia Meng Loh: Chief Operating Officer and Senior Partner' <<https://dentons.rodyk.com/en/kiameng-loh>> accessed 17 March 2019.
40. Die Österreichischen Rechtsanwälte, 'Mitgliederzahlen' <www.rechtsanwaelte.at/kammer/kammer-in-zahlen/mitglieder/> accessed 16 March 2019.
41. Die Österreichischen Rechtsanwälte, 'Rechtsanwaltsanwärter Info Guide' <www.rechtsanwaelte.at/fileadmin/user_upload/PDF/01_Buergerservice/Broschuerere_RAA/oerak_raa_infoguide_210x210_screen.pdf> accessed 17 March 2019.
42. DoNotPay, 'Parking' <www.donotpay.com/parking/> accessed 10 March 2019.
43. Dutch Legal Tech <www.dutchlegaltech.nl/> accessed 1 June 2019.
44. Dropbox <www.dropbox.com/> accessed 2 June 2019.
45. Dropbox, 'Privacy Policy' <www.dropbox.com/privacy> accessed 6 June 2019.
46. Dropbox, 'Dropbox Terms of Service' <www.dropbox.com/terms2016> accessed 2 June 2019.
47. EU Blockchain Observatory and Forum <www.eublockchainforum.eu/> accessed 11 March 2019.
48. EU Legal Hackers Summit Open Day <<http://legalthackers.eu/>> accessed 1 June 2019.
49. EUR-Lex, 'Division of Competences within the European Union' <<https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=LEGISSUM%3Aai0020>> accessed 6 June 2019.
50. European Blockchain Hub <www.eubchub.eu/> accessed 11 March 2019.

66. Finnish Bar Association, 'We supervise attorneys-at-law' <<https://asianajaliitto.fi/en/finnish-bar-association/what-we-do/we-supervise-attorneys-at-law/>> accessed 2 June 2019.
67. Finnish Bar Association, 'Who can become a member?' <<https://asianajaliitto.fi/en/become-an-attorney-at-law/why-join-the-bar/joining-the-bar/>> accessed 3 June 2019.
68. Finnish Bar Association, 'Who we are' <<https://asianajaliitto.fi/en/finnish-bar-association/who-we-are/>> accessed 21 May 2019.
69. fwp, 'Das Team' <www.fwp.at/juristen/> accessed 11 March 2019.
70. Flightright <www.flightright.com/> accessed 17 July 2019.
71. Future-Law, 'Legal Tech Konferenz 2018' <<https://legaltech.future-law.at/#tickets>> accessed 11 March 2019.
72. Global Legal Hackathon <<https://globallegalthackathon.com/>> accessed 25 July 2019.
73. Global Legal Hackathon, '#GLH2018 Round One Winning Teams' <<https://globallegalthackathon.com/round-one-winners/>> accessed 26 July 2019.
74. Google Cloud <<https://cloud.google.com/>> accessed 2 June 2019.
75. HM Courts & Tribunals Service, 'Welcome to Money Claim Online' <www.moneyclaim.gov.uk/web/mcol/welcome> accessed 17 July 2019.
76. Humboldt Universität zu Berlin, 'The Future of Law: Technology, Innovation and Access to Justice' <https://dann.rewi.hu-berlin.de/doc/programme_-future-of-law-berlin.pdf> accessed 26 July 2019.
77. IE Law School, 'Master in Legal Tech' <www.ie.edu/law-school/programs/masters/master-legal-tech/> accessed 1 June 2019.
78. ILTACON, '2018 Download' <www.iltacon.org/downloadmaterials?_ga=2.78859796.1809332239.1543259026-246431947.1543259026&ssopc=1> accessed 17 July 2019.
79. Innovative Legal Services Forum 2019 <www.ilsf2019.com/> accessed 17 July 2019.
80. Internet Archive Wayback Machine, 'Legal Tech Konferenz 2019' <<https://web.archive.org/web/20181215095814/https://legaltech.future-law.at/>> accessed 26 July 2019.
81. Internet Archive Wayback Machine, 'Suomen Asianajaliitto: Legal Services' <https://web.archive.org/web/20170109095124/http://asianajaliitto.fi/en/legal_services> accessed 21 July 2019.
82. Investcee, 'Summer school in legal technology & operations >> July 2018, Hamburg (Germany)' <https://investcee.hu/legaltech_summer_school-2018/> accessed 26 July 2019.
83. Harvard Law School, 'Special Programs' <<https://hls.harvard.edu/dept/academics/degree-programs/special-programs/>> accessed 4 June 2019.
84. IRIS 2018, 'Information in ENGLISH' <www.univie.ac.at/RI/IRIS2018/information-in-english/> accessed 26 July 2019.
85. IURALL <<https://iurall.com>> accessed 4 June 2019.
86. JotForm, '50+ Free Contract Templates' <www.jotform.com/pdf-templates/contract> accessed 17 March 2019.
87. Jurix, 'About' <<http://jurix.nl/about/>> accessed 26 July 2019.
88. Jurix 2017, 'Schedule' <<https://jurix2017.gforge.uni.lu/schedule.html>> accessed 26 July 2019.

89. Kaplan QLTS, 'OSCE Objective Structured Clinical Examination' <<https://qlts.kaplan.co.uk/the-assessment/osce>> accessed 11 March 2019.
90. Kira Systems <<https://kirasystems.com/>> accessed 10 March 2019.
91. Kluwer Law Online, 'Kluwer Law Online Journals' <www.kluwerlawonline.com/index.php?area=Journals> accessed 10 March 2019.
92. KPMG, 'Legal Services' <<https://home.kpmg/hu/en/home/services/tax/legal-services.html>> accessed 11 March 2019.
93. Lakimiesliitto <www.lakimiesliitto.fi/> accessed 3 June 2019.
94. LawGeex, 'AI v.s. Lawyers: The Ultimate Showdown' <www.lawgeex.com/resources/aivslawyer/> accessed 4 June 2019.
95. Legal Design Lab, 'Ideabook' <www.legaltechdesign.com/pro-bono/design-work/> accessed 17 March 2019.
96. Legal Design Lab, 'New Modes of Pro Bono' <www.legaltechdesign.com/pro-bono/> accessed 17 March 2019.
97. Legal Design Lab, 'Pilot, Scaling vision, and Next Steps' <<http://www.legaltechdesign.com/pro-bono/pilot-for-new-modes-of-pro-bono/>> accessed 18 March 2019.
98. Legal Hackers, 'Global Chapters' <<https://legalthackers.org/people/>> accessed 25 July 2019.
99. Legal Revolution 2018, 'Agenda' <www.legal-revolution.com/en/agenda> accessed 10 March 2019.
100. LegalSifter <www.legalsifter.com/> accessed 12 March 2019.
101. Legal Tech Initiative Austria <www.legaltechaustria.at/> accessed 26 July 2019.
102. Legal Tech Konferenz 2019 <<https://legaltech.future-law.at/>> accessed 26 July 2018.
103. Legal Tech Lab, 'About' <www.helsinki.fi/en/networks/legal-tech-lab/about> accessed 10 March.
104. Legal Tech Lab, 'Research' <www.helsinki.fi/en/networks/legal-tech-lab/research> accessed 1 June 2019.
105. Legal Tech Lab Frankfurt am Main studentische Initiative an der Goethe-Universität <<https://legaltechlab.de/>> accessed 1 June 2019.
106. Legaltech, 'The Rise of LegalTech – The Belgian Market Overview (map)' <<https://legaltech.be/the-rise-of-legaltech-the-belgian-market-overview-map/>> accessed 1 June 2019.
107. LegalZoom.com <www.legalzoom.com/> accessed 4 June 2019.
108. Lex Machina, 'Legal Analytics for Patent Litigation' <<https://lexmachina.com/patent-litigation/>> accessed 10 March 2019.
109. LexisNexis, 'Recht' <<https://shop.lexisnexis.at/recht.html>> accessed 10 March 2019.
110. Ljubljana Legal Hackers <www.facebook.com/lju.legal.hackers/> accessed 2 June 2019.
111. Lockton, 'Claims Consultancy' <www.locktonsolicitors.co.uk/insurance-services/claims-consultancy.html> accessed 4 June 2019.
112. London Law Expo 2019 <<https://londonlawexpo.com/>> accessed 26 July 2019.
113. Luminance <www.luminance.com/> accessed 17 July 2019.
114. MANZ, 'Über MANZ' <www.manz.at/wir_ueber_uns/manz_verlag/verlag.html> accessed 2 June 2019.

115. MANZ Cloud <<https://cloud.manz.at/index.html>> accessed 2 June 2019.
116. Microsoft, 'OneDrive' <<https://onedrive.live.com/>> accessed 2 June 2019.
117. My Law BC <<https://mylawbc.com/>> accessed 17 March 2019.
118. My Law BC, 'Our publications' <<https://mylawbc.com/pubs/>> accessed 17 March 2019.
119. National Conference of Bar Examiners, 'Multistate Bar Examination' <www.ncbex.org/exams/mbe/> accessed 11 March 2019.
120. National Conference of Bar Examiners, 'Multistate Professional Responsibility Examination' <www.ncbex.org/exams/mpre/> accessed 11 March 2019.
121. National Conference of Bar Examiners, 'Uniform Bar Examination' <www.ncbex.org/exams/ube/> accessed 11 March 2019.
122. NetLawMedia, 'Ruth Ward: Head of Knowledge & Collaboration Technologies' <<https://londonlawexpo.com/speakers/ruth-ward/>> accessed 17 March 2019.
123. Nolo, 'Quicken WillMaker Plus 2019' <<https://store.nolo.com/products/quicken-willmaker-plus-wqp.html>> accessed 11 March 2019.
124. ODR Europe, 'ODR platforms & apps' <www.odreurope.com/odr-services/odr-platforms-apps> accessed 12 March 2019.
125. Open Data Institute, 'What is a data trust?' <<https://theodi.org/article/what-is-a-data-trust/>> accessed 15 March 2019.
126. Oxford Dictionaries, 'Co-working' <<https://en.oxforddictionaries.com/definition/co-working>> accessed 2 June 2019.
127. Oxford Dictionaries, 'Hackathon' <<https://en.oxforddictionaries.com/definition/hackathon>> accessed 18 March 2019.
128. Oxford Dictionaries, 'Lawyer' <<https://en.oxforddictionaries.com/definition/lawyer>> accessed 10 March 2019.
129. Oxford Dictionaries, 'Stakeholder' <<https://en.oxforddictionaries.com/definition/stakeholder>> accessed 10 March 2019.
130. Oxford University Press: Academic, 'Law' <<https://global.oup.com/academic/category/law/?cc=si&lang=en&>> accessed 10 March 2019.
131. PandaDoc <www.pandadoc.com/contract-generator/> accessed 12 March 2019.
132. QLTSchool, 'The Solicitor and Barrister Profession in the UK – What is the Difference' (QLTS 30 October 2011) <www.qlts.com/blog/the-solicitor-and-barrister-profession-in-the-uk-what-is-the-difference> accessed 20 July 2019.
133. Rajah & Tann Technologies <www.rttechlaw.com/> accessed 11 March 2019.
134. Relevant, 'Legal Tech' <www.relevant.dk/event_legal_tech> accessed 2 June 2019.
135. Republic of Slovenia Ministry of Justice, 'Areas of Work' <www.mp.gov.si/en/areas_of_work/> accessed 10 March 2019.
136. Republika Slovenija Ministrstvo za Pravosodje, 'Pravniški državni izpit' <www.mp.gov.si/si/izobrazevanje_v_pravosodju_cip/pravniški_državni_izpit/> accessed 10 March 2019.
137. Republika Slovenija Ministrstvo za Pravosodje, 'Pristop na podlagi 19A. člena ZPDI' <www.mp.gov.si/si/izobrazevanje_v_pravosodju_cip/pravniški_državni_izpit/pristop_na_podlagi_19a_clena_zpdi/> accessed 11 March 2019.

138. Richard Susskind <www.susskind.com/> accessed 17 July 2019.
139. Robot Lawyer LISA <<http://robotlawyerlisa.com/>> accessed 10 March 2019.
140. Rocket Lawyer <www.rocketlawyer.com/> accessed 4 June 2019.
141. Rocket Lawyer, 'All the legal help you need. Anytime. Anywhere.' <www.rocketlawyer.com/plans-pricing.r/#/> accessed 4 June 2019.
142. Rojs, Peljhan, Prelesnik & Partners, 'Experts' <www.rppp.si/experts/> accessed 10 March 2019.
143. Ross Intelligence <<http://rossintelligence.com/>> accessed 10 March 2019.
144. Singapore Legal Advice, 'WillMaker' <<https://willmaker.singaporelegaladvice.com/>> accessed 10 March 2019.
145. Singapore Management University, 'Bachelor of Science (Computing & Law)' <<https://sis.smu.edu.sg/bsc-computing-law>> accessed 4 June 2019.
146. Singapore Management University, 'Legal Tech 101 and the Ethics Surrounding Legal Tech' <<https://law.smu.edu.sg/newsletter/31236>> accessed 28 May 2019.
147. Slovenia Business Point, 'Compulsory membership of the Slovenian Bar Association' <<http://eugo.gov.si/en/other-conditions/otherCondition/14192/showOtherCondition/>> accessed 2 June 2019.
148. Slovenská advokátska komora, 'Profile' <www.sak.sk/blox/cms/en> accessed 11 March 2019.
149. Solicitors Regulation Authority, 'FAQs about keeping of the roll' <www.sra.org.uk/mysra/roll/faqs.page> accessed 17 March 2019.
150. Solicitors Regulation Authority, 'Key features of the Qualified Lawyers Transfer Scheme' <www.sra.org.uk/solicitors/qlts/key-features.page> accessed 3 June 2019.
151. Solicitors Regulation Authority, 'Qualified Lawyers Transfer Scheme' <www.sra.org.uk/solicitors/qlts.page> accessed 26 July 2019.
152. Solicitors Regulation Authority, 'Qualifying law degree providers' <www.sra.org.uk/students/courses/qualifying-law-degree-providers.page> accessed 11 March 2019.
153. Solicitors Regulation Authority, 'Reporting an individual or firm' <www.sra.org.uk/consumers/problems/report-solicitor.page#how-complain> accessed 4 June 2019.
154. Solicitors Regulation Authority, 'Your health, your career' <www.sra.org.uk/solicitors/resources/your-health-your-career.page> accessed 4 June 2019.
155. Stanford Law School, 'CodeX Techindex' <<https://techindex.law.stanford.edu/>> accessed 10 March 2019.
156. Stanford Law School, 'Joint Degree and Cooperative Programs' <<https://law.stanford.edu/education/degrees/joint-degrees-within-stanford-university/#slnav-established-joint-degrees>> accessed 4 June 2019.
157. Stanford Law School, 'Sixth Annual CodeX FutureLaw' <<https://www-cdn.law.stanford.edu/wp-content/uploads/2017/08/CodeX-FutureLaw-2018-Agenda-1.pdf>> accessed 17 July 2019.
158. Stanford Law school, 'The Legal Design Lab' <<https://law.stanford.edu/organizations/pages/legal-design-lab/>> accessed 3 June 2019.
159. Suomen Asianajajaliitto, 'Legal Services' <www.asianajajaliitto.fi/en/legal_services> accessed 11 March 2019.

160. Swansea University, 'Swansea University Launches Brand New LLM in LegalTech'
<www.swansea.ac.uk/law/news/swanseauniversitylaunchesbrandnewllminlegaltch.php> accessed 1 June 2019.
161. The Bologna process: setting up the European higher education area [1999]
<<https://eur-lex.europa.eu/legal-content/EN/TXT/?uri=LEGISSUM%3Ac11088>>
accessed 2 June 2019.
162. The Competition Authority, 'solicitors & barristers' <www.ccpic.ie/business/wp-content/uploads/sites/3/2017/03/Solicitors-and-barristers-full-report.pdf>
accessed 17 July 2019.
163. The Law Society, 'Alternative business structures'
<www.lawsociety.org.uk/support-services/advice/practice-notes/alternative-business-structures/#abs3> accessed 16 March 2019.
164. The Law Society, 'Ethics' <www.lawsociety.org.uk/support-services/ethics/>
accessed 11 March 2019.
165. The National Center for Technology & Dispute Resolution, 'Provider List'
<<http://odr.info/provider-list/>> accessed 2 June 2019.
166. The New York State Board of Law Examiners, 'Bar Exam Eligibility'
<www.nybarexam.org/Eligible/Eligibility.htm> accessed 2 June 2019.
167. The New York State Board of Law Examiners, 'Mandatory 50-Hour Pro Bono Requirement' <www.nybarexam.org/MPB.html> accessed 10 March 2019.
168. The New York State Board of Law Examiners, 'NYLC & NYLE Course Materials & Sample Questions'
<www.nybarexam.org/Content/CourseMaterials.htm> accessed 16 March 2019.
169. The New York State Board of Law Examiners, 'New York Law Course (NYLC)' <www.newyorklawcourse.org/> accessed 16 March 2019.
170. The State Bar of California, 'Attorney Applicants'
<www.calbar.ca.gov/Admissions/Requirements/Attorney-Applicants> accessed 18 March 2019.
171. Trello <<https://trello.com/>> accessed 2 June 2019.
172. Trello Help, 'Clouds Terms of Service – Summary of Changes'
<<https://help.trello.com/article/1125-cloud-terms-of-service-summary-of-changes>>
accessed 2 June 2019.
173. Trust Service Authority of Slovenia, 'Legal Explanations Regarding the Regulation of Electronic Signatures' <www.si-ca.si/eng/eng-pravnapojasnila.php>
accessed 11 March 2019.
174. Tyler Technologies, 'Modria' <<https://www.tylertech.com/products/modria>>
accessed 3 June 2019.
175. UNCITRAL, 'UNCITRAL Model law on Electronic Commerce (1996)'
<www.uncitral.org/uncitral/en/uncitral_texts/electronic_commerce/1996Model.htm
l> accessed 11 March 2019.
176. Universität Wien, '030043 SE Moot Court aus International Commercial Arbitration (2018S)'
<<https://ufind.univie.ac.at/de/course.html?lv=030043&semester=2018S>> 11
March 2019.
177. University of Helsinki Legal Tech Lab, 'Hack the Law!'
<www.helsinki.fi/en/networks/legal-tech-lab/hack-the-law-2018-0> accessed 26
July 2019.
178. University of Helsinki, 'Legal Tech Con' <www.helsinki.fi/en/networks/legal-tech-lab/events/legal-tech-con-2018> accessed 2 June 2019.

179. University of Oxford, 'Center for the Governance of AI' <www.fhi.ox.ac.uk/govai/> accessed 3 June 2019.
180. VanillaLaw Docs <<http://vanillalawdocs.com/>> accessed 11 March 2019.
181. Visabot <<https://visabot.co/>> accessed 10 March 2019.
182. Wallstreetdocs <www.wallstreetdocs.com/> accessed 11 March 2019.
183. WeWork, 'Business services and then some' <www.wework.com/benefits> accessed 2 June 2019.
184. Wikipedia, 'Legal Technology' (Wikipedia 2019) <https://en.wikipedia.org/wiki/Legal_technology> accessed 26 July 2019.
185. Wolters Kluwer, 'Global Legal Hackathon 2019' <<https://hackathon.wolterskluwer.hu/>> accessed 11 March 2019.