

# SECURITY TOKEN OFFERINGS: REGULATORY GAPS IN EXISTING EU FINANCIAL SERVICES REGULATION

James Camilleri

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## ABSTRACT

The digital revolution is unstoppable and is permeating every aspect of life. Thus, it was only a question of time before it would enter the financial realm of securities. This has created the concept of security tokens and STOs – an upshot of the rise to popularity of ICOs. Inheriting the ground-breaking qualities of DLT-based technologies, security tokens present novel regulatory challenges when compared to traditional securities. It is possible to assimilate security tokens to various EU laws, but existing regulatory gaps will debilitate the powers of the blockchain. The overhaul of the securities market is that security tokens can, *inter alia*, be more cost-effective and less time-consuming. These benefits mean that security tokens cannot be, for all intents and purposes, identical to their traditional counterparts.

With ongoing developments, the technology to reap these benefits is already out there. Maintaining traditional regulatory frameworks is right and fitting but technological advancements call for the review of such checks and balances – not as a form of deregulation but as a means of incorporating change. The financial regulatory authority that denounces new forms of innovation as a threat to the system is a thing of the past, yet it may have certain reservations for the sake of public safety. Rather than established financial regulators trying to reinvent themselves to new technologies, it is easier for a specialised entity to take onboard the supervision of a new sector of the market that is inherently different from traditional ones. On these lines, the vision of a Digital Lab, as suggested by France's AMF, would be to have a supranational entity to cater for STOs and other innovative technologies and collaborate with existing financial supervisory authorities.

**Keywords:** Security Token Offerings (STOs); Distributed Ledger Technology (DLT); Financial Instrument Test; Digital Lab; technology-neutral legislation

*To my family*

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*Securities and Exchange Commission v W.J. Howey Co et al* [1946] 328 U.S. 293.

*In re RealNetworks* No. 00 C 1366, 2000 WL 631341 (N.D. Ill. May, 8, 2000).

### European Union Case Law

Case 120/78 *Rewe-Zentral AG v Bundesmonopolverwaltung für Branntwein* ECLI:EU:C:1979:42.

Case C-481/99 *Heininger* [2001] ECLI:EU:C:2001:684.

C-639/18 *KH v Sparkasse Südholstein* [2020] ECLI:EU:C:2020:477.

### Italian Case Law

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Council Directive 85/611/EEC of 20 December 1985 on the coordination of laws, regulations and administrative provisions relating to undertakings for collective investment in transferable securities (UCITS) [1985] OJ L375/3.

Council Directive 93/22/EEC of 10 May 1993 on investment services in the securities field [1993] OJ L141/27.

Directive 98/26/EC of the European Parliament and of the Council of 19 May 1998 on settlement finality in payment and securities settlement systems [1998] OJ L166/45.

Directive 98/48/EC Of the European Parliament and of the Council of 20 July 1998 amending Directive 98/34/EC laying down a procedure for the provision of information in the field of technical standards and regulations [1998] OJ L217/18.

Directive 2000/31/EC of the European Parliament and of the Council of 8 June 2000 on certain legal aspects of information society services, in particular electronic commerce, in the Internal Market (Directive on electronic commerce) [2000] OJ L178/1.

Directive 2002/65/EC of the European Parliament and the Council of 23 September 2002 concerning distance marketing of consumer financial services and amending Council Directive 90/619/EEC and Directives 97/7/EC and 98/27/EC [2002] OJ L271/16.

Directive 2003/71/EC of the European Parliament and of the Council of 4 November 2003 on the prospectus to be published when securities are offered to the public or admitted to trading and amending Directive 2001/34/EC [2003] OJ L345/64.



Directive 2004/39/EC of the European Parliament and of the Council of 21 April 2004 on markets in financial instruments amending Council Directives 85/611/EEC and 93/6/EEC and Directive 2000/12/EC of the European Parliament and of the Council and repealing Council Directive 93/22/EEC [2004] OJ L145/1.

Directive 2004/109/EC of the European Parliament and of the Council of 15 December 2004 on the harmonisation of transparency requirements in relation to information about issuers whose securities are admitted to trading on a regulated market and amending Directive 2001/34/EC [2004] OJ L390/38.

Commission Directive 2007/14/EC of 8 March 2007 laying down detailed rules for the implementation of certain provisions of Directive 2004/109/EC on the harmonisation of transparency requirements in relation to information about issuers whose securities are admitted to trading on a regulated market [2007] OJ L69/27.

Commission Recommendation of 11 October 2007 on the electronic network of officially appointed mechanisms for the central storage of regulated information referred to in Directive 2004/109/EC of the European Parliament and of the Council (notified under document number C(2007) 4607) [2007] OJ L267/16.

Directive 2009/65/EC of the European Parliament and of the Council of July 2009 on the coordination of laws, regulations and administrative provisions relating to undertakings for collective investment in transferable securities (UCITS) (recast) [2009] OJ L302/32.

Directive 2009/110/EC of the European Union and of the Council of 16 September 2009 on the taking up, pursuit and prudential supervision of the business of electronic money institutions amending Directives 2005/60/EC and 2006/48/EC and repealing Directive 2000/46/EC [2009] OJ L267/7.

Regulation (EU) No 1095/2010 of the European Parliament and of the Council of 24 November 2010 establishing a European Supervisory Authority (European Securities and Markets Authority) amending Decision No 716/2009/EC and repealing Commission Decision 2009/77/EC [2010] OJ L331/84.

Directive 2011/61/EU of the European Union and of the Council of 8 June 2011 on Alternative Investment Fund Managers and amending Directives 2003/41/EC and 2009/65/EC and Regulations (EC) No 1060/2009 and (EU) No 1095/2010 [2011] OJ L174/1.

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 [2011] OJ L304/64.

Directive 2013/50/EU of the European Parliament and of the Council of 22 October 2013 amending Directive 2004/109/EC of the European Parliament and of the Council on the harmonisation of transparency requirements in relation to information about issuers whose securities are admitted to trading on a regulated market, Directive 2003/71/EC of the European Parliament and of the Council on the prospectus to be published when securities are offered to the public or admitted to trading and Commission Directive 2007/14/EC laying down detailed rules for the implementation of certain provisions of Directive 2004/109/EC [2013] OJ L294/13.

Regulation (EU) No 596/2014 of the European Parliament and of the Council of 16 April 2014 on market abuse (market abuse regulation) and repealing Directive 2003/6/EC of the European Parliament and of the Council and Commission Directives 2003/125/EC, 2003/125/EC and 2004/72/EC [2014] OJ L173/1.

Directive 2014/65/EU of the European Parliament and of the Council of 15 May 2014 on markets in financial instruments and amending Directive 2202/92/EC and Directive 2011/61/EU (recast) [2014] OJ L173/349.

Regulation (EU) No 600/2014 of the European Parliament and of the Council of 15 May 2014 on markets in financial instruments and amending Regulation (EU) No 648/2012 [2014] OJ L 173/84.

Regulation (EU) No 909/2014 of the European Parliament and of the Council of 23 July 2014 on improving securities settlement in the European Union and on central securities depositories and amending Directives 98/26/EC and 2014/65/EU and Regulation (EU) No 236/2012 [2014] OJ L257/1.

Directive (EU) 2015/849 of the European Parliament and of the Council of 20 May 2015 on the 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.

Directive (EU) 2015/2366 of the European Parliament and of the Council of 25 November 2015 on payment services in the internal market, amending Directives 2002/65/EC, 2009/110/EC and 2013/36/EU and Regulation (EU) No 1093/2010, and repealing Directive 2007/64/EC [2015] OJ L337/35.

Regulation (EU) 2016/679 of the European Parliament and of the Council 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 (General Data Protection Regulation) [2016] OJ L119/1.

Regulation (EU) 2017/1129 of the European Parliament and of the Council of 14 June 2017 on the prospectus to be published when securities are offered to the public or admitted to trading on a regulated market, and repealing Directive 2003/71/EC [2017] OJ L168/12.

Directive (EU) 2018/410 of the European Parliament and of the Council of 14 March 2018 amending Directive 2003/87/EC to enhance cost-effective emission reductions and low-carbon investments, and Decision (EU) 2015/1814 [2018] OJ L76/3.

Directive (EU) 2018/843 of the European Parliament and of the Council of 30 May 2018 amending Directive (EU) 2015/849 on the prevention of the use of the financial system for the purposes of money laundering or terrorist financing, and amending Directives 2009/138/EC and 2013/36/EU [2018] OJ L56/43.

Directive (EU) 2018/1673 of the European Parliament and of the Council of 23 October 2018 on combating money laundering by criminal law [2018] OJ L284/22.

Commission Delegated Regulations (EU) 2019/979 of 14 March 2019 supplementing Regulation (EU) 2017/1129 of the European Parliament and of the Council with regard to regulatory technical standards on key financial information in the summary of a prospectus, the publication and classification of prospectuses, advertisements for securities, supplements to a prospectus, and the notification portal, and repealing Commission Delegated Regulation (EU) No 382/2014 and Commission Delegated Regulation (EU) 2016/301 [2019] OJ L166/1.

Commission Delegated Regulations (EU) 2019/980 of 14 March 2019 supplementing Regulation (EU) 2017/1129 of the European Parliament and of the Council as regards the format, content, scrutiny and approval of the prospectus to be published when securities are offered to the public or admitted to trading on a regulated market, and repealing Commission Regulation (EC) No 809/2004 [2019] OJ L166/26.

Regulation (EU) 2019/1156 of the European Parliament and of the Council of 20 June 2019 on facilitating cross-border distribution of collective investment undertakings and amending Regulations (EU) No 345/2013, (EU) No 346/2013 and (EU) No 1286/2014 [2019] OJ L188/55.

Directive (EU) 2019/1160 of the European Parliament and of the Council of 20 June 2019 amending Directives 2009/65/EC and 2011/61/EU with regard to cross-border distribution of collective investment undertakings [2019] OJ L188/106.

## French Legislation

Code de commerce, partie législative – Commercial Code

Code monétaire et financier, partie législative – Monetary and Financial Code

## German Legislation

Kapitalanlagegesetzbuch (KAGB) – Capital Investment Code

Kreditwesengesetz (KWG) – Banking Act

Zahlungsdiensteaufsichtsgesetz (ZAG) – Payment Supervision Act

## Maltese Legislation

Companies Act, Chapter 386 of the Laws of Malta.

Innovative Technology Arrangements and Services Act, Chapter 592 of the Laws of Malta.

Investment Services Act, Chapter 370 of the Laws of Malta.

Malta Digital Innovation Authority Act, Chapter 591 of the Laws of Malta.

Virtual Financial Assets Act, Chapter 590 of the Laws of Malta.

## TABLE OF TREATIES

Treaty establishing the European Economic Community [1958].

Consolidated Version of the Treaty on European Union [2012] OJ C326/13.

Consolidated version of the Treaty on the Functioning of the European Union [2012] OJ C 326/47.

## ABBREVIATIONS

AIFMD	Directive 2011/61/EU of the European Union and of the Council of 8 June 2011 on Alternative Investment Fund Managers and amending Directives 2003/41/EC and 2009/65/EC and Regulations (EC) No 1060/2009 and (EU) No 1095/2010 [2011] OJ L174/1
AMF	Autorité des marchés financiers – French Financial Markets Regulator
AMF Announcement	‘Review and analysis of the application of financial regulations to security tokens’ (2020) AMF < <a href="http://www.amf-france.org/sites/default/files/2020-03/legal-analysis-security-tokens-amf-en_1.pdf">www.amf-france.org/sites/default/files/2020-03/legal-analysis-security-tokens-amf-en_1.pdf</a> > accessed 25th August 2020
AML	Anti-Money Laundering
AMLD 4	Directive (EU) 2015/849 of the European Parliament and of the Council of 20 May 2015 on the 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
AMLD 5	Directive (EU) 2018/843 of the European Parliament and of the Council of 30 May 2018 amending Directive (EU) 2015/849 on the prevention of the use of the financial system for the purposes of money laundering or terrorist financing, and amending Directives 2009/138/EC and 2013/36/EU [2018] OJ L56/43
AMLD 6	Directive (EU) 2018/1673 of the European Parliament and of the Council of 23 October 2018 on combating money laundering by criminal law [2018] OJ L284/22

BaFin	Bundesanstalt für Finanzdienstleistungsaufsicht – German Federal Financial Supervisory Authority
BFT	Byzantine Fault Tolerance
<i>Cassis de Dijon</i>	<i>Case 120/78 Rewe-Zentral AG v Bundesmonopolverwaltung für Branntwein</i> ECLI:EU:C:1979:42
CFT	Combating the Financing of Terrorism
CISs	Collective Investment Schemes
CISA	Certified Information Systems Auditor
CISO	Chief Information Security Officer
CMU	Capital Markets Union
CRD	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 [2011] OJ L304/64
CSDR	Regulation (EU) No 909/2014 of the European Parliament and of the Council of 23 July 2014 on improving securities settlement in the European Union and on central securities depositories and amending Directives 98/26/EC and 2014/65/EU and Regulation (EU) No 236/2012 [2014] OJ L257/1
CSDs	Central Securities Depositories
CJEU	Court of Justice of the European Union



Digital Lab	Digital Laboratory
DLT	Distributed Ledger Technology
DMCFSD	Directive 2002/65/EC of the European Parliament and the Council of 23 September 2002 concerning distance marketing of consumer financial services and amending Council Directive 90/619/EEC and Directives 97/7/EC and 98/27/EC [2002] OJ L271/16
EBA	European Banking Authority
EBSI	European Blockchain Services Infrastructure
ECB	European Central Bank
ECD	Directive 2000/31/EC of the European Parliament and of the Council of 8 June 2000 on certain legal aspects of information society services, in particular electronic commerce, in the Internal Market (Directive on electronic commerce) [2000] OJ L178/1
EEA	European Economic Area
EEC Treaty	Treaty establishing the European Economic Community [1958]
EMD 2	Directive 2009/110/EC of the European Union and of the Council of 16 September 2009 on the taking up, pursuit and prudential supervision of the business of electronic money institutions amending Directives 2005/60/EC and 2006/48/EC and repealing Directive 2000/46/EC [2009] OJ L267/7
Entity	Professional Investor Funds investing in Virtual Currencies; and issuers of VFAs

ESFS	European System of Financial Supervision
ESMA	European Securities and Markets Authority
EU	European Union
FATF	Financial Action Task Force
Feedback Statement	'Feedback Statement to the Consultation Document on Security Token Offering' (2020) MFSA Ref No: 12-2019
FIT	Financial Instrument Test
GDPR	General Data Protection Regulation
<i>Howey</i>	<i>Securities and Exchange Commission v W.J. Howey Co et al</i> [1946] 328 U.S. 293
ICOs	Initial Coin Offerings
ICT	Information and Communication Technology
IPO	Initial Public Offering
ISA	Investment Services Act, Chapter 370 of the Laws of Malta
ISP	Investment Service Provider
ISS	Information Society Service
IT	Information Technology

ITAS Act	Innovative Technology Arrangements and Services Act, Chapter 592 of the Laws of Malta
KAGB	Kapitalanlagegesetzbuch – German Capital Investment Code
KH	C-639/18 <i>KH v Sparkasse Südholstein</i> [2020] ECLI:EU:C:2020:477
KWG	Kreditwesengesetz – German Banking Act
Landgericht Kiel	Regional Court, Kiel, Germany
MAR	Regulation (EU) No 596/2014 of the European Parliament and of the Council of 16 April 2014 on market abuse (market abuse regulation) and repealing Directive 2003/6/EC of the European Parliament and of the Council and Commission Directives 2003/125/EC, 2003/125/EC and 2004/72/EC [2014] OJ L173/1
MBR	Malta Business Registry
MDIA	Malta Digital Innovation Authority
MDIA Act	Malta Digital Innovation Authority Act, Chapter 591 of the Laws of Malta.
MFSA	Malta Financial Services Authority
MiFID II	Directive 2014/65/EU of the European Parliament and of the Council of 15 May 2014 on markets in financial instruments and amending Directive 2202/92/EC and Directive 2011/61/EU (recast) [2014] OJ L173/349; and Regulation (EU) No 600/2014 of the European Parliament and of the Council of 15 May 2014 on markets in financial instruments and amending Regulation (EU) No 648/2012 [2014] OJ L 173/84
MiFIR	Markets in Financial Instruments Regulation

MSs	Member States
MTF	Multilateral Trading Facility
NCA	National Competent Authorities
OTF	Organised Trading Facility
PC	Personal Computer
PIFs	Professional Investor Funds
Prospectus Regulation	Regulation (EU) 2017/1129 of the European Parliament and of the Council of 14 June 2017 on the prospectus to be published when securities are offered to the public or admitted to trading on a regulated market, and repealing Directive 2003/71/EC [2017] OJ L168/12
PSD 2	Directive (EU) 2015/2366 of the European Parliament and of the Council of 25 November 2015 on payment services in the internal market, amending Directives 2002/65/EC, 2009/110/EC and 2013/36/EU and Regulation (EU) No 1093/2010, and repealing Directive 2007/64/EC
SFD	Directive 98/26/EC of the European Parliament and of the Council of 19 May 1998 on settlement finality in payment and securities settlement systems [1998] OJ L166/45
SME	Small and Medium-Sized Enterprises
STOs	Security Token Offerings
TD	Directive 2004/109/EC of the European Parliament and of the Council of 15 December 2004 on the harmonisation of transparency requirements in

relation to information about issuers whose securities are admitted to trading on a regulated market and amending Directive 2001/34/EC [2004] OJ L390/38

TEU Consolidated Version of the Treaty on European Union [2012] OJ C326/13

TFEU Consolidated version of the Treaty on the Functioning of the European Union [2012] OJ C 326/47

UCITS Undertakings for Collective Investment in Transferable Securities

UCITS I Council Directive 85/611/EEC of 20 December 1985 on the coordination of laws, regulations and administrative provisions relating to undertakings for collective investment in transferable securities (UCITS) [1985] OJ L375/3

UCITS IV Directive 2009/65/EC of the European Parliament and of the Council of July 2009 on the coordination of laws, regulations and administrative provisions relating to undertakings for collective investment in transferable securities (UCITS) (recast) [2009] OJ L302/32

URD Universal Registration Document

US United States of America

VFA ACT Virtual Financial Assets Act, Chapter 590 of the Laws of Malta

VFAs Virtual Financial Assets

ZAG Zahlungsdiensteaufsichtsgesetz – German Payment Supervision Act

## INTRODUCTION

The relationship between the fields of law and technology is a curious one. The law wants stability and foreseeability. Technology wants to innovate and advance. It would seem the two are not compatible. Yet the law seeks to regulate everything, and the expansion of the technological revolution is such that regulation is even more necessary. The uncontrollable nature of technology makes the conventional notions of territory and jurisdiction sound naïve. Its volatile nature makes things trending today appear old and obsolete tomorrow. Despite these challenges the law has not failed in the regulation of technology. Instead, it has had to view the art and science of regulation from a different perspective. The uncontrollable nature of technology means there is only so much a sole jurisdiction can achieve and that efforts at an international level are more likely to be efficacious. The volatile nature of technology means it is pointless regulating something which within a short time will have drastically mutated – leading to the concept of technology-neutral legislation.

As time goes by the union between law and technology gets deeper. The downcast image of the IT (information technology) geek who knows how to use a computer but cannot communicate with people in real life is long forgotten. Children of the second millennium are brought up surrounded by information and communication technology ('ICT') devices. A computer no longer means a bulky set of electronic components connected by a myriad of wires and cables. Nowadays, computers come in all shapes and sizes: desktop PCs (personal computers), laptops, tablets, and smartphones – to name the most common. Even in this day and age, not everyone can be considered an IT guru – many people have only a vague understanding of the technicalities of connecting to the internet and using some of the household names in social media and software applications. However, in a developed society relatively few are the people who remain IT-illiterate. Gone are the days when the legislator will shy away from regulating in the sphere of technology – although the challenges caused by its uncontrollable and volatile nature remain.

### Financial Instruments

Falempin, Van Hecke, Coheur and Walsh, in their handbook describe a security as follows:<sup>1</sup>

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<sup>1</sup> Luc Falempin, Philippe Van Hecke, Daniel Coheur and Eamon Walsh, 'Tokenized Securities: the ultimate handbook on how to issue compliant securities on the blockchain' (2019) <<https://tokeny.com/wp-content/uploads/2019/01/TOKENIZED-SECURITIES.pdf>> accessed 14<sup>th</sup> July 2020.

[A] security is a fungible and negotiable financial instrument that holds some type of monetary value. It can represent ownership in a company's stock, a creditor relationship with an entity through a bond, or rights to ownership as represented by an option. To keep it simple, a security can be broken down into three overarching categories; equities, funds and debts.

The standard definition of a financial instrument is:<sup>2</sup>

[A] monetary contract between two parties, which can be traded and settled. The contract represents an asset to one party (the buyer) and a financial liability to the other party (the seller).

A financial instrument is deemed to be negotiable if, *inter alia*, the ownership can be transferred from one person to another. Falempin *et al* define equity, debt, and fund (or investment fund) in the context of securities as follows:<sup>3</sup>

Equity is an investment in stock issued by another company. The stock can be either private or public, and represents ownership of an entity. [...]

Debt represents money that is borrowed and has to be repaid. The issuer of the bond (or debt) owes the holders debt and is therefore generally obliged to pay them interest, and to pay the principle on the maturity date [...]

An investment fund is a supply of capital belonging to numerous investors used to collectively purchase securities. Each investor retains ownership and control of their own shares. [...]

### The Howey Test

All securities are financial instruments but not all financial instruments are securities and for the topic under review it is important to distinguish which financial instruments are securities and which are not, irrespectively of whether a new medium is being applied. The Howey test is a set of criteria developed by the Supreme Court of the United States of America (the 'US') to determine whether a financial instrument qualifies as a security. *Securities and Exchange Commission v W.J. Howey Co et al ('Howey')* was decided by the US Supreme Court on the 27<sup>th</sup> May 1946.<sup>4</sup> This judgment decided whether the process of offering units of agricultural land dedicated to the cultivation of citrus fruits would qualify under the definition of a security in the US Securities Act of 1933.<sup>5</sup> Examining the unitisation of a citrus grove under US law may sound remote from the analysis of STOs under EU law but the principle is still relevant and deserves a mention in this

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<sup>2</sup> 'Financial instrument definition' (IG) <[www.ig.com/en/glossary-trading-terms/financial-instrument-definition#:~:text=A%20financial%20instrument%20is%20a,other%20party%20\(the%20seller\)](http://www.ig.com/en/glossary-trading-terms/financial-instrument-definition#:~:text=A%20financial%20instrument%20is%20a,other%20party%20(the%20seller)>)> accessed 14<sup>th</sup> July 2020.

<sup>3</sup> Falempin *et al* (n 1).

<sup>4</sup> 328 U.S. 293.

<sup>5</sup> *ibid* para 1.

study. The respondent, W.J. Howey Co, owned agricultural land where citrus fruit trees were cultivated.<sup>6</sup> Howey Co retained fifty percent of the cultivated land for its own use and the other fifty percent was offered to the public in the form of units of land.<sup>7</sup> The transfer of units to the public was affected by way of contract.<sup>8</sup> Howey Co cultivated the land on behalf of the unit owners and the eventual net profits were distributed accordingly.<sup>9</sup> The court considered the contracts entered into between Howey Co and the unit owners to be investment contracts.<sup>10</sup> The definition of an investment contract provided by the court is the basis of the Howey test:<sup>11</sup>

[A]n investment contract for purposes of the Securities Act means a contract, transaction or scheme whereby a person invests his money in a common enterprise and is led to expect profits solely from the efforts of the promoter or a third party[.]

The Supreme Court concluded that the contracts in question constituted a security under the Securities Act 1933.<sup>12</sup>

## Innovative Technologies

There are various examples throughout history of society's initial rejection of ground-breaking technologies. 'The Luddites' were a movement of the 19<sup>th</sup> century against the introduction of manufacturing machines and to this day the word 'luddite' still means somebody opposed to new technologies.<sup>13</sup> The Luddites of the 1800s were a violent movement that resorted to breaking and burning down machinery.<sup>14</sup> Nonetheless, this did not prevent the industrial revolution from happening. A more recent example would be the internet and the information revolution. With hindsight, state-restrictions against something as ground-breaking as the internet seem futile just like the luddite movement proved to be ineffective against the industrial revolution. However, one should also recall content-restrictions of the internet as occurs, for example, in China – although the aim is not to restrict the technology itself, but the diffusion of content deemed to be contrary to public policy. As it were, initial state-restrictions of a new technology may be stifling as not all technologies have the power, as does the internet, to drop down barriers. Blockchain technologies

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<sup>6</sup> *ibid* para 3.

<sup>7</sup> *ibid*.

<sup>8</sup> *ibid* para 4.

<sup>9</sup> *ibid* para 6.

<sup>10</sup> *ibid* para 12.

<sup>11</sup> *ibid* para 11.

<sup>12</sup> *ibid* para 13.

<sup>13</sup> Evan Andrews, 'Who Were the Luddites?' (*History.com*, 26<sup>th</sup> June 2019) <[www.history.com/news/who-were-the-luddites#:~:text=The%20original%20Luddites%20were%20British,robbing%20them%20of%20their%20livelihood](http://www.history.com/news/who-were-the-luddites#:~:text=The%20original%20Luddites%20were%20British,robbing%20them%20of%20their%20livelihood)> accessed 1<sup>st</sup> August 2020.

<sup>14</sup> *ibid*.



are relatively new and have been subject to a fair share of state-restrictions deemed to be in the public interest. Whether the technology will live up to the expectations has to be seen. The rise of blockchain technology has been haphazard yet it remains a constant of the digital revolution with supporters insisting it will eventually lead to a blockchain revolution.

## Fintech

The term fintech (financial technology) was not conceived for the introduction of blockchain to the financial services industry however at present it is amongst the most innovative technologies of the sector. The automation of financial industry products and services that initiated the fintech sector as a separate branch has been growing steadily ever since, and the powers of blockchain have helped it grow further. The adoption of blockchain technology by the fintech sector was greeted with scepticism by financial experts, state governments and the public. However, some have sought to strike while the iron is hot. Thus, while some experts in the field have dismissed crypto assets as being too volatile, others have specialised in it to become the pioneers of blockchain technology. This also applies to state governments, some of which refuse to acknowledge it while others have embraced it in the hope of boosting their economy.

## Distributed Ledger Technology

Distributed ledger technology ('DLT') is a technical subject that in other circumstances would be obscure to most people other than the IT-specialists. The ensuing development of DLT into the concept of the blockchain and its ushering into the sphere of finance and economics has contributed to the rise of DLT from being another acronym of the 'computer geeks' to becoming, with the words 'blockchain' and in particular 'Bitcoin', a fashion statement. Bitcoin is a cryptocurrency that acts as a digital medium of exchange comparable, in several respects, to what is associated with the functionality of money. Never mind the technicalities of DLT, if there is something that will capture the attention of people – that is mention of the word money. There has been more than a fair share of attention and speculation surrounding the concept of blockchain. The fact that some people who jumped on the blockchain bandwagon became rich overnight has fuelled further speculation. Things in the blockchain world have been moving so fast that people jumping on the bandwagon one day have made extraordinary returns on investment and others jumping the next day have not made any profits whatsoever. In toto, the DLT technology debate remains divided but despite various setbacks this does not mean the sceptics

are having the upper hand. Rather than a question of ‘if’ blockchain technology will revolutionise various industries; it may be a question of ‘how’.

Blockchain technology falls under the nature of uncontainability and volatility of technology in general. Its associations with the spheres of finance and economics is unprecedentedly tight although this was expected to happen sooner or later. Because technology in its purer form is uncontainable and volatile does not mean it cannot be made more containable or less volatile. Technology is a manmade artifact and it can be moulded and remoulded into new forms limited only by the creativity of human beings. The topic under review – security token offerings (‘STOs’) – is the peculiar union between a well-established concept of the financial world, securities (also referred to in this study as ‘traditional securities’, to distinguish them from security tokens), and a concept of the, so to speak, volatile world of blockchain technology called tokens. This marriage has the potential of leading to new-age technologies that defy the intrinsic nature of uncontainability and volatility whilst taking advantage of the benefits technology has to offer.

The potential of DLT is such that many (or arguably all) industries may be influenced. The revolution to the financial industry has predominated the media for various reasons, one of them possibly being that money is a common denominator people can easily relate to. Several Member States (‘MSs’), including Malta, have commenced to legislate around blockchain vis-à-vis the financial sector – in particular, cryptocurrencies. The European Union (‘EU’) institutions may want to legislate around cryptocurrencies themselves since it defies the process of harmonisation for each MS to have a different national framework to every other MS, or not have any framework in place whatsoever. Due to the sensitive nature of cryptocurrencies (or crypto assets) there may also be public interest concerns the EU will want to tackle at a supranational level.

## Securities

The concept of securities is fundamental to understanding the concept of STOs. While some experts venerate the unlocking of future DLT technology applications, others play down the hype as being an overstatement. The populist label of blockchain being the technology of the future may be causing a disservice as some people might regard it as merely science fiction. A brief study of something as traditional as securities will help to drive home the point that blockchain

technology is not something reserved for the Starship Enterprise,<sup>15</sup> but is a technologically advanced tool applicable in various everyday situations. It also stresses the fact that STOs are a more stable way of raising capital with the aid of blockchain technology than ICOs.

Securities are a well-known concept of the financial sphere and although STOs fall under the science of blockchain, securities themselves are distinct from blockchain technology and the term has its roots in the early developments of finance and commerce of the 16<sup>th</sup> and 17<sup>th</sup> centuries – way before anyone had phantomed the use of DLT technologies.<sup>16</sup> The union between securities and blockchain tokens is a curious one and would have raised a few eyebrows if it were not for the fact that blockchain became the hip word it is today and is being associated with anything under the sun, including Malta's very own 'Blockchain Island'. Not everyone, however, is convinced of the potential of blockchain technology and some are critical of its shortcomings. Those who are sceptical, consider it a fad that will not live up to the expectations. There is plenty of speculation surrounding DLT technology fuelled by the media and the digital gold rush. The truth is that in technology years blockchain has already stood the test of time. Irrespectively of the enthusiasm or otherwise with which certain investors may jump on the bandwagon in the hope of becoming IT magnates of the likes of Bill Gates,<sup>17</sup> Mark Zuckerberg,<sup>18</sup> or Jeff Bezos,<sup>19</sup> technology is in the first place a tool and so long as there is a void which it can fill, there will be a spot for it on the market.

The demand for securities is undoubted having had a presence in the world of finance for the past four hundred years or so. Digital tokens are a tool that can be employed in the circulation of securities and, given the characteristics of DLT technology, have arguably been proven to effectively work in the intended scope. Information technology and the law are not always on the best of terms with the IT industry accusing the law of hampering innovation and the law accusing the IT industry of disregarding public safety. The fragmentation of blockchain technology regulation in the EU territory means it cannot flourish at a supranational level but instead only in those jurisdictions where a commitment to regulate has been taken by the

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<sup>15</sup> Of the *Star Trek* science fiction franchise, see <[https://intl.startrek.com/database\\_article/enterprise](https://intl.startrek.com/database_article/enterprise)> accessed 14<sup>th</sup> July 2020.

<sup>16</sup> 'The Development Of Securities Trading' (*Britannica*) <[www.britannica.com/topic/security-business-economics/The-development-of-securities-trading](http://www.britannica.com/topic/security-business-economics/The-development-of-securities-trading)> accessed 9<sup>th</sup> July 2020.

<sup>17</sup> Co-founder of software company Microsoft.

<sup>18</sup> Co-founder of social media Facebook.

<sup>19</sup> Founder of multi-national technology company Amazon.

respective legislator. STOs may offer support to overcome the limitations of DLT regulation fragmentation by being exposed to the regulation of securities for which there is a well-established legal framework and a better level of harmonisation.

From a regulatory perspective it is interesting to observe how different legislators react to the traditional securities/blockchain technology combination. Even though technology is intrinsically uncontrollable and volatile does not mean these are indispensable characteristics. While containing technology is deemed to be counterproductive by the computer scientist; the legislator will want to do so in the public interest, amongst other things. People investing in crypto assets and losing money may be said to be victims of the market forces at play, but the government may not take such a liberal view and want to interfere with the market, as it is empowered to do. Technology-stifling regulation is frowned upon but the other extreme – no regulation – is hardly an option. Initial coin offerings ('ICOs') are often compared to STOs as an example of the consequences of insufficient regulation. ICOs quickly gained popularity as a means of raising funding for various types of projects, particularly for start-up undertakings. It is similar in principle to an initial public offering ('IPO') where a private company begins offering shares to the public. An IPO works through a regulated stock exchange. In the spirit of DLT technology, ICOs are decentralised and the role of the middleman removed. This made raising funds through ICOs less cumbersome than IPOs but the popularity of ICOs eventually dropped. The ease of setting up an ICO meant that scammers could operate unchecked and investors seeking redress from the law courts would hardly know where to begin.

## CHAPTER 1: TOKENISATION

Digital tokens (or 'tokens') are defined as:<sup>20</sup>

Transferable units generated within a distributed network that tracks ownership of the units through the application of blockchain technology.

In theory, any real asset can be represented as a digital token through tokenisation which is defined as:<sup>21</sup>

[A] process where some form of assets are converted into a token that can be moved, stored, or recorded on a blockchain.

This process has found fertile grounds for its use in financial markets and security tokens are the result of,<sup>22</sup>

materializing the ownership in a security through the issuance of a "token" registered on a distributed ledger (DLT) infrastructure.

Any asset tokenised on the blockchain will impart to its corresponding token the rights attached to the asset in the real world and hence the continued existence of the asset is indispensable. The tokenisation of securities has been gaining steady momentum and although trends in the DLT world evolve rapidly there remains a sustained hype for the potential of STOs. It is usual to compare STOs to ICOs because of the element of raising capital. Although successful, ICOs are notorious for not being adequately regulated causing frustration to investors and a growing distrust towards them. The aim of STOs is for them to fall under the same rules and regulations applicable to securities causing them to consequently fall under an already well-regulated regime. The applicable jurisdictions are where the STO is issued and where it is marketed.<sup>23</sup> Some jurisdictions may either require that an STO be issued directly as a blockchain token or else it is first issued as a traditional security to be then converted to a token at a later stage.<sup>24</sup> An adequate regulatory framework is of the essence also in the event of the parties to an STO seeking redress from the law courts.<sup>25</sup>

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<sup>20</sup> 'Understanding Digital Tokens: Market Overviews and Proposed Guidelines for Policymakers and Practitioners' Token Alliance, Chamber of Digital Commerce <<https://aws.digitalchamber.org/download/7153/>> accessed 14<sup>th</sup> July 2020.

<sup>21</sup> 'What is Tokenization' (*eToro*) <[www.etorox.com/blockchain-academy/what-is-tokenization](http://www.etorox.com/blockchain-academy/what-is-tokenization)> accessed 14<sup>th</sup> July 2020.

<sup>22</sup> Falempin *et al* (n 1).

<sup>23</sup> 'The Tokenisation of Assets and Potential Implications for Financial Markets' (2020) OECD Blockchain Policy Series <[www.oecd.org/finance/The-Tokenisation-of-Assets-and-Potential-Implications-for-Financial-Markets.htm](http://www.oecd.org/finance/The-Tokenisation-of-Assets-and-Potential-Implications-for-Financial-Markets.htm)> accessed 15<sup>th</sup> July 2020.

<sup>24</sup> *ibid* 14.

<sup>25</sup> *ibid* 15.

## 1.1 Characteristics of Tokenisation

### 1.1.1 Intermediation

The role of intermediaries is often under fire in any DLT discussion. The decentralised nature of DLT technology is praised by pro-blockchain stakeholders for dispensing with the need of an intermediary, which presence is considered an added expense and a burden. The invention of smart contracts is another facet of blockchain technology that has boosted the potential of STOs. Like a conventional contract, smart contracts entail several obligations, the difference being they are spelled out in a digital format. A smart contract functions by means of computer programming code but this is carried out by a third-party that has nothing to do with the purpose of the contract itself. The actual parties to the contract do not need to know how to code and, in fact, may be totally obscure to the inner workings of how a smart contract operates. It is coded in such a manner that it automatically enforces execution of the contract.<sup>26</sup> Smart contracts operate over a blockchain and hence share the same characteristics of immutability.<sup>27</sup> DLT technology predates the invention of blockchain and so do smart contracts – the term was coined by Nick Szabo, an American computer scientist, in 1994.<sup>28</sup> Apart from the third-party that codes the smart contract, there is no need for intermediaries either in the drafting stage and eventually at the point of enforcement of the contract.<sup>29</sup> In theory, the smart contract process is secure enough to afford the contracting parties peace of mind the technology is as reliable as if it were done by a trusted intermediary, such as a notary. In practice it still needs to be seen what sort of litigation may ensue in the law courts but theoretically a smart contract is expected to be fool proof. This is because by running on top of a blockchain the contents of the contract agreed to by the parties cannot be altered and because it is self-executing, a smart contract cannot be forestalled – what is agreed to by the parties cannot be different from what is stated in the contract. The savings are potentially double as the expense of a middleman is spared and so is the need for any subsequent litigation. Ethereum is a technology frequently associated with smart contracts. It is a software platform running on a blockchain and includes Ether – a virtual currency.<sup>30</sup> Ethereum accounts can

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<sup>26</sup> Matthew N. O. Sadiku, Kelechi G. Eze, Sarhan M. Musa, 'Smart Contracts: A Primer' (2018) 5 J of Scientific and Engineering Research 538, 538.

<sup>27</sup> *ibid.*

<sup>28</sup> *ibid.*

<sup>29</sup> *ibid.*

<sup>30</sup> Stefano Ferretti and Gabriele D'Angelo, 'On the Ethereum Blockchain Structure: a Complex Networks Theory Perspective' (2019) *Currency and Computation Practice and Experience* <[www.researchgate.net/publication/335326217\\_On\\_the\\_Ethereum\\_blockchain\\_structure\\_A\\_complex\\_networks\\_theory\\_perspective](http://www.researchgate.net/publication/335326217_On_the_Ethereum_blockchain_structure_A_complex_networks_theory_perspective)> accessed 15<sup>th</sup> July 2020.

either be of the type controlled by users or else another type controlled by smart contract code.<sup>31</sup> By having its own cryptocurrency, the Ether is the asset that fuels the Ethereum blockchain.

### 1.1.2 Efficiency

Another benefit of asset tokenisation is the possibility to trace the transactional history of the asset and record a set of information concerning the asset in question and the entities interacting with it.<sup>32</sup> This is bound to lead to higher levels of transparency. However, it should be noted that certain information can only be as accurate as the data being inputted as this process involves human interaction and, with the present technology, cannot easily be automated.<sup>33</sup> The possibility to own a small fraction of an asset could become a reality as a tokenised asset can be divided into digital slices – thus creating a new market segment for investors. Thus, an expensive asset will not necessarily require a large investor or a group of larger investors but can instead be tokenised and digital fractions of it offered to many small investors.<sup>34</sup> Another advantage is the speed at which the transfer of ownership of tokenised assets can be performed which at best is practically instantaneous.<sup>35</sup> This is well in contrast to the often bureaucratic procedures where middlemen are involved.

### 1.1.3 Scalability

Asset tokenisation does not come without its challenges and these can influence the prospects of the technology. DLT technology operates across computer networks and the devices connected to those networks. Asset tokenisation is no exception and any hypothetical expansion of global STO demands would have to be met by a corresponding increase in network size and number of connected devices.<sup>36</sup> This is always a concern for any ICT system as the multiplication of networks and devices in a given system invariably increases the costs and also the skills required to maintain it. The latter may prejudice the stability of the system and make it prone to system failure as well as increase the susceptibility to hacker attacks.<sup>37</sup> Any organisation needs to take the threat of hacking seriously and those operating in the blockchain industry more so. A former key blockchain industry player called Mt. Gox operated as a successful cryptocurrency exchange between the

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<sup>31</sup> *ibid.*

<sup>32</sup> OECD Blockchain (n 23) 16.

<sup>33</sup> *ibid.*

<sup>34</sup> *ibid* 17.

<sup>35</sup> *ibid* 18.

<sup>36</sup> *ibid* 19.

<sup>37</sup> *ibid.*

years 2010 to 2014, until it was the target of a major hacker attack that eventually led to its filing for bankruptcy.<sup>38</sup>

#### 1.1.4 Cryptography

Cryptography is presently one of the cardinal components of DLT technology. Meanwhile, quantum computing is slowly but surely gaining ground and cryptographic algorithms considered robust under current technology would have nothing to offer by way of security if treated using a quantum computer. This is not to say that cryptographic technology may not also evolve but it is an important consideration given that an unsecure blockchain is practically of no use. On the other hand, concerns surrounding anti-money laundering ('AML') and combating the financing of terrorism ('CFT') has been steadily gaining momentum and certain characteristics of DLT-based technologies, notably those offering user-anonymity, have come under fire in the AML/CFT race. The Financial Action Task Force ('FATF') declared in an Interpretation Note to Recommendation 15 on New Technologies (INR. 15):<sup>39</sup>

The threat of criminal and terrorist misuse of virtual assets is serious and urgent, and the FATF expects all countries to take prompt action to implement the FATF Recommendations in the context of virtual asset activities and service providers. [...]

#### 1.1.5 Decentralisation

The automation of intermediary services is having an impact on a substantial part of the financial services industry. One of the topics for debate is to what extent will intermediary services be wiped out in practice. In other words, even if in theory intermediation could be completely wiped out, it could be the case that this will never happen because a total automation of intermediary services would not be desirable. An important thing to note is that even if blockchain technology is associated with decentralisation and the elimination of intermediaries, it is not to say that intermediary services are consequently ruled out as in fact the use of a middleman in the blockchain sphere is perfectly feasible and in certain cases may make more sense than having the full automation of all intermediary services.<sup>40</sup>

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<sup>38</sup> Jake Frankenfield, 'Mt. Gox' (*Investopedia*, 2<sup>nd</sup> February 2020) <[www.investopedia.com/terms/m/mt-gox.asp](http://www.investopedia.com/terms/m/mt-gox.asp)> accessed 15<sup>th</sup> July 2020.

<sup>39</sup> 'Public Statement on Virtual Assets and Related Providers' (2019) <[www.fatf-gafi.org/publications/fatfrecommendations/documents/public-statement-virtual-assets.html](http://www.fatf-gafi.org/publications/fatfrecommendations/documents/public-statement-virtual-assets.html)> accessed 16<sup>th</sup> July 2020.

<sup>40</sup> OECD Blockchain (n 23) 25.



### 1.1.6 Speed of Transfer

It is easy to understand why tokenised assets can speedily be transferred from one owner to another. The transfer of a tokenised asset is reduced to a computer transaction;<sup>41</sup> just as nowadays money can be transferred from one account to another by means of a software platform application. The quasi-instantaneous transfer of tokenised assets is seen as a benefit, but it also means that as soon as the transfer of ownership is completed so too must all the necessary payments be settled.<sup>42</sup> This is in stark contrast to what is witnessed presently where a transfer of asset ownership initiated at a certain point in time will be delayed by various procedural requirements along the way, and only afterwards will all the necessary payments fall due.<sup>43</sup> The overall benefits of tokenised securities, such as transparency, efficiency, and speed could have the effect of making the securities market more accessible both from the issuers' and from the investors' point of view. This will expand the market, making it easier for issuers to release their products and leave investors with a wider selection of products to choose from. Higher profits, greater competition and better comparison tools should translate into a market with added liquidity and lower prices.<sup>44</sup>

## 1.2 Central Securities Depositories

The framework of a financial instruments market must include the use of central securities depositories ('CSDs'). In a nutshell, the purpose of CSDs is to ascertain there is a perfect correlation between the security transactions executed in a given timespan (usually a day) and the securities actually issued in the same period.<sup>45</sup> This prevents the illicit creation or deletion of securities, whether intentionally or accidentally.<sup>46</sup> In the days when financial instruments were originally represented by physical certificates as a proof of ownership, these were inefficient and precarious.<sup>47</sup> Central depositories first started by filing these certificates in one place rather than being held by investors themselves.<sup>48</sup> Eventually, the physical certificates held at the CSD were dispensed with as they became replaced by digital entries in a computer database.<sup>49</sup> Just to show

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<sup>41</sup> *ibid* 26.

<sup>42</sup> *ibid*.

<sup>43</sup> *ibid*.

<sup>44</sup> *ibid* 31.

<sup>45</sup> 'Chapter 12: Central securities depositories' (2018) <[https://publications.banque-france.fr/sites/default/files/media/2019/06/28/819029\\_livre\\_chapitre\\_12\\_en.pdf](https://publications.banque-france.fr/sites/default/files/media/2019/06/28/819029_livre_chapitre_12_en.pdf)> accessed 17<sup>th</sup> July 2020 2.

<sup>46</sup> *ibid*.

<sup>47</sup> *ibid* 3.

<sup>48</sup> *ibid*.

<sup>49</sup> *ibid*.

how decentralised asset tokenisation can be – DLT technologies coupled with smart contracts could recreate an automated version of the CSD registry.<sup>50</sup> This once again highlights the speed and ease with which tokenised assets can be transferred – rather than going through a bureaucratic CSD registry, the same procedure can be achieved by means of the DLT technology characteristics of, *inter alia*, immutability and transparency and this in the time it takes a microprocessor to crunch a series of binary digits.<sup>51</sup> This is still more true in theory than in practice and it is not to say the presence of CSDs will not remain in existence for other political or social reasons.<sup>52</sup>

The powers of decentralisation of blockchain technology is a topic worthy of its own study. It is true that certain bureaucratic bottlenecks can be automated and the benefits of cost and efficiency as well as speed of transaction reaped. However, the concept that blockchain technology can be self-regulating is far from the truth.<sup>53</sup> Different jurisdictions can take different approaches but the possibility is that if all traditional securities products and services were put on the blockchain, rather than having a plethora of intermediary services, there could instead be one principle intermediary regulator – irrespectively of whether such principle intermediary regulator could also be automated or not.<sup>54</sup> A case in point is the practice of fraud which never fails to exist in the world of financial services. Fraudsters can be smart enough to be always a step ahead and blockchain is no exception as new technologies may present novel ways to prevent former fraud practices, but they may also open new fraud opportunities not previously envisioned.<sup>55</sup>

The process of security tokenisation does not alter the underlying principles of trading in securities. Technically, it is the use of DLT technologies to transfer tokenised securities' ownership as, formerly, digital entries on a computer database had replaced the movement of physical certificates from one owner to another. Legally, however, the step from digital entries to tokenised assets may not be as neat as appears to the computer scientist.<sup>56</sup> It varies from one jurisdiction to another, but whether tokenised securities are to be treated in the eyes of the law as traditional securities has not been universally recognised.<sup>57</sup> It is not just a case of inertia of the

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<sup>50</sup> OECD Blockchain (n 23) 32.

<sup>51</sup> *ibid.*

<sup>52</sup> *ibid* 33.

<sup>53</sup> *ibid.*

<sup>54</sup> *ibid.*

<sup>55</sup> *ibid* 34.

<sup>56</sup> *ibid* 40.

<sup>57</sup> *ibid.*

law, there are intrinsic economic considerations that may make tokenised securities different from traditional ones. Regulation can help but it is no mean feat legislating for an innovative technology that is still in evolution.<sup>58</sup>

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<sup>58</sup> *ibid.*

## CHAPTER 2: MAIN APPLICABLE EU LAWS AND EXISTING REGULATORY GAPS

Comprehending the EU regulation relevant to STOs is not a straightforward endeavour. Applying existing rules and regulations to new technologies can create confusion and uncertainty which will invariably need further clarification from the competent authorities. Litigation is an option where a business concern seeks further clarification from the courts. However, for start-up businesses the legal costs involved may be prohibitive. Besides, challenging the competent authorities may prove to be futile. On the other hand, regulating a new technology is something the legislator may choose not to do or be unable to do because of the pitfalls this entails. STO regulation within the EU territory both at a supranational and national level presents a variety of statutes that can be perplexing and yet is the reality of the current situation. EU institutions cannot legislate at a supranational level as they please but only in the areas where competence has been conferred. At what point will the EU institutions legislate in the DLT field at the level of a specific EU directive or regulation is not clear but if the spread of blockchain technology is going to be slow but steady it may eventually have to do so.

### 2.1 General Concepts

#### 2.1.1 The Principle of Conferral

The principle of conferral is one of the cornerstones of the EU. It was officially spelled out in the Consolidated Version of the Treaty on European Union ('TEU').<sup>59</sup> Article 4, paragraph 1 of the TEU declares:

In accordance with Article 5, competences not conferred upon the Union in the Treaties remain with the Member States.

Article 5, paragraphs 3 and 4 of the TEU declare:

3. Under the principle of subsidiarity, in areas which do not fall within its exclusive competence, the Union shall act only if and in so far as the objectives of the proposed action cannot be sufficiently achieved by the Member States [...] but can rather, by reason of the scale or effects of the proposed action, be better achieved at Union level.
4. Under the principle of proportionality, the content and form of Union action shall not exceed what is necessary to achieve the objectives of the Treaties.

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<sup>59</sup> [2012] OJ C326/13.

Therefore, before criticising the EU institutions for not doing enough to promote harmonisation in the DLT technology sphere, it should first be considered whether there is a mandate by the MSs in such a way as to constitute a conferral on the institutions to regulate at a supranational level.

### 2.1.2 *Cassis de Dijon* Principle

The *Cassis de Dijon* principle is an essential element of the Internal Market. The preliminary reference ruling itself is a relatively old judgment, but it applies to the free movement of goods and services and it would be expected this can be applied to the issuance of STOs. Delivered on the 20<sup>th</sup> February 1979, *Rewe-Zentral AG v Bundesmonopolverwaltung für Branntwein*<sup>60</sup> (*'Cassis de Dijon'*) concerned the importation of an alcoholic beverage from France to the Federal Republic of Germany.<sup>61</sup> Rewe-Zentral AG (*'Rewe'*) was an undertaking established in Cologne, Germany.<sup>62</sup> It applied to the Federal Monopoly Administration for Spirits (*'Bundesmonopolverwaltung'*) for the importation of the liqueur Cassis de Dijon – which application was rejected due to a mismatch in the percentage alcoholic content of the liqueur and that of the minimum alcoholic percentage permitted by German national law.<sup>63</sup> The applicant claimed this constituted a quantitative restriction as stated in Article 30 of the Treaty establishing the European Economic Community,<sup>64</sup> (*'EEC Treaty'*) – today Article 34 of the Consolidated version of the Treaty on the Functioning of the European Union,<sup>65</sup> (*'TFEU'*).<sup>66</sup> The court agreed with the applicant that the Bundesmonopolverwaltung's action was in breach of Article 30 of the EEC Treaty.<sup>67</sup> For the study under review, it is worth noting that although the issuance of STOs, in conjunction with Article 56 TFEU, could theoretically benefit from the *Cassis de Dijon* principle, Article 36 TFEU declares:

The provisions of Article 34 and 35 shall not preclude prohibitions or restrictions on imports, exports or goods in transit justified on grounds of public morality, public policy or public security [...]

The point is that MSs may seek to restrict innovative technology products, such as security tokens, on the grounds of public policy or public security.

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<sup>60</sup> Case 120/78 ECLI:EU:C:1979:42.

<sup>61</sup> *ibid* para 2.

<sup>62</sup> *ibid* 651.

<sup>63</sup> *ibid* para 2.

<sup>64</sup> [1958].

<sup>65</sup> [2012] OJ C 326/47.

<sup>66</sup> *Cassis de Dijon* (n 60) para 4.

<sup>67</sup> *ibid* 665.

### 2.1.3 Blockchain in Europe

The European Blockchain Partnership brings together the Member States of the EU and members of the European Economic Area ('EEA') and is, *inter alia*, developing a European Blockchain Services Infrastructure ('EBSI').<sup>68</sup> The European Blockchain Observatory and Forum is a collaboration of the European Commission and European Parliament to boost innovation in the field.<sup>69</sup> At this point, there is no sign of harmonisation at an EU level. MSs are encouraged to benefit from the advantages blockchain technology has to offer but each country is free to be as liberal or as conservative towards this relatively new technology as they think fit. As a matter of fact, a practically different approach by each MS of the EU is being witnessed.

### 2.1.4 ESMA

Regulation (EU) No 1095/2010 of the European Parliament and of the Council of 24 November 2010 establishing a European Supervisory Authority (European Securities and Markets Authority) [...] <sup>70</sup> ('ESMA') is a result of the High-Level Group on Financial Supervision in the EU (the de Larosière Report).<sup>71</sup> The report was commissioned following the financial crisis of the late 2000s and led to the creation of the European System of Financial Supervision ('ESFS') framework. One of the main scopes of the authority is the fostering of investor protection. Article 9, paragraph 4 of the regulation declares that ESMA,

shall establish [...] a Committee on financial innovation, which brings together all relevant competent national supervisory authorities with a view to achieving a coordinated approach to the regulatory and supervisory treatment of new or innovative financial activities [...]

This is relevant to STO innovation since it is part of ESMA's constitution to promote the development of such technologies.

## 2.2 Table of Relevant EU Statutes

Table 2.1 below, gives the list of EU legislation identified as relevant to the issuance of STOs. Each piece of legislation will be examined in further detail to understand what it consists of, how it may be applied to STOs, and what gaps exist in their application to the innovation of security tokens.

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<sup>68</sup> 'Blockchain Technologies' (*European Commission*) <<https://ec.europa.eu/digital-single-market/en/blockchain-technologies>> accessed 9<sup>th</sup> July 2020.

<sup>69</sup> *ibid.*

<sup>70</sup> [...] amending Decision No 716/2009/EC and repealing Commission Decision 2009/77/EC [2010] OJ L331/84.

<sup>71</sup> 2009.

Name of Legislation	Brief Description	Year of Enactment	Applicability	Regulatory Gaps
<b>AIFMD</b>	[...] on Alternative Investment Fund Managers [...] <sup>72</sup>	2011	Security tokens forming part of an alternative investment fund	Only for transferable securities admitted to trading on a regulated market
<b>AMLD 5</b>	[...] on the prevention of the use of the financial system for the purposes of money laundering or terrorist financing [...] <sup>73</sup>	2018	Definition of 'virtual currencies' is broad enough to encompass security tokens	Specific AML/CFT challenges
<b>CRD</b>	[...] on consumer rights [...] <sup>74</sup>	2011	14-day cooling-off period for parties contracting security tokens acting at a distance	Excludes security tokens subject to price fluctuations within the withdrawal period
<b>CSDR</b>	[...] on improving securities settlement in the European Union and on central securities depositories [...] <sup>75</sup>	2014	Security token trading reported to CSDs	<ul style="list-style-type: none"> <li>• Must fall under definition of 'transferable securities' in MiFID II</li> <li>• Incompatibility with securities settlement system</li> </ul>
<b>DMCFSD</b>	[...] concerning distance marketing of consumer financial services [...] <sup>76</sup>	2002	Complementing the CRD	Excludes security tokens subject to price fluctuations within the withdrawal period
<b>E-Commerce Directive</b>	[...] on certain legal aspects of information society services, in particular electronic commerce, in the Internal Market [...] <sup>77</sup>	2000	<ul style="list-style-type: none"> <li>• STO issuers as information society service providers</li> <li>• Country of origin rule</li> <li>• contracts in digital form</li> </ul>	N/a
<b>EMD 2</b>	[...] on the taking up, pursuit and prudential supervision of the business of electronic money institutions [...] <sup>78</sup>	2009	Tokens as e-money	Must fall under definition of 'electronic money'
<b>MAR</b>	[...] on market abuse [...] <sup>79</sup>	2014	Market abuse in the issuance/trade of security tokens	<ul style="list-style-type: none"> <li>• Must fall under MiFID II definition of 'transferable securities'</li> <li>• Conflict between territorial scope and online security tokens</li> </ul>
<b>MiFID II</b>	[...] on markets in financial instruments [...] <sup>80</sup>	2014	Security tokens as transferable securities	Must fall under definition of 'transferable securities'
<b>Prospectus Regulation</b>	[...] on the prospectus to be published when securities are offered to the public or admitted to trading on a regulated market [...] <sup>81</sup>	2017	Publication of a prospectus by issuers of STOs	<ul style="list-style-type: none"> <li>• Must fall under definition of 'transferable securities' in MiFID II</li> <li>• Conflict between territorial scope and online STOs</li> </ul>
<b>PSD 2</b>	[...] on payment services in the internal market [...] <sup>82</sup>	2015	Security tokens as e-money offering payment services	Must fall under definition of 'electronic money' in EMD 2

<sup>72</sup> (n 95).

<sup>73</sup> (n 103).

<sup>74</sup> (n 121).

<sup>75</sup> (n 116).

<sup>76</sup> (n 124).

<sup>77</sup> (n 147).

<sup>78</sup> (n 161).

<sup>79</sup> (n 88).

<sup>80</sup> (n 86).

<sup>81</sup> (n 108).

<sup>82</sup> (n 166).

<b>SFD</b>	[...] on settlement finality in payment and securities settlement systems <sup>83</sup>	1998	Security tokens forming part of a payment and securities settlement system	Must fall under definition of 'transferable securities' in MiFID II
<b>Transparency Directive</b>	[...] on the harmonisation of transparency requirements in relation to information about issuers whose securities are admitted to trading on a regulated market [...] <sup>84</sup>	2004	Transparency requirements for issuers of STOs	Must fall under definition of 'transferable securities' in MiFID II
<b>UCITS IV</b>	[...] on the coordination of laws, regulations and administrative provisions relating to undertakings for collective investment in transferable securities [...] <sup>85</sup>	2009	Security tokens as part of an undertaking for collective investment	Must fall under definition of 'transferable securities' in MiFID II

Table 2.1: EU legislation applicable to STOs and existing regulatory gaps

## 2.3 MiFID II

Directive 2014/65/EU of the European Parliament and of the Council of 15 May 2014 on markets in financial instruments [...] <sup>86</sup> and Regulation (EU) No 600/2014 ('MiFIR'), <sup>87</sup> (collectively known as 'MiFID II') defines 'transferable securities' in Article 4, paragraph 1, point 44 as,

those classes of securities which are negotiable on the capital market, with the exception of instruments of payment [...]

Transferable securities are listed as financial instruments under MiFID II and this attaches specific requirements to those undertakings dealing in financial instruments. Besides, financial instruments may only be traded in the following recognised venues:

- 1) Regulated market. This is defined in Article 4, paragraph 1, point 21 of MiFID II as 'a multilateral system operated and/or managed by a market operator, which brings together [...] multiple third-party buying and selling interests in financial instruments [...] in a way that results in a contract [...] which is authorised and functions regularly and in accordance with Title III' of MiFID II – Title III containing the relevant provisions to 'Regulated Markets.'
- 2) Multilateral trading facility ('MTF'). This is defined in Article 4, paragraph 1, point 22 of MiFID II and is similar to a regulated market 'operated by an investment firm or a market operator' and 'results in a contract in accordance with Title II' of MiFID II – Title II

<sup>83</sup> (n 171).

<sup>84</sup> (n 167).

<sup>85</sup> (n 93).

<sup>86</sup> [...] and amending Directive 2202/92/EC and Directive 2011/61/EU (recast) [2014] OJ L173/349.

<sup>87</sup> Of the European Parliament and of the Council of 15 May 2014 on markets in financial instruments and amending Regulation (EU) No 648/2012 [2014] OJ L 173/84.



containing the relevant provisions for the ‘Authorisation and Operating Conditions for Investment Firms.’

- 3) Organised trading facility (‘OTF’). This is defined in Article 4, paragraph 1, point 23 of MiFID II as ‘a multilateral system which is not a regulated market or an MTF and in which multiple third-party buying and selling interests in bonds, structured finance products, emission allowances or derivatives are able to interact in the system in a way that results in a contract in accordance with Title II’ of MiFID II (see point 2 *supra*).
- 4) Systematic internaliser. This is defined in Article 4, paragraph 1, point 20 of MiFID II as ‘an investment firm which [...] deals on own account when executing client orders outside a regulated market, an MTF or an OTF without operating a multilateral system[.]’

An investment firm is defined in Article 4, paragraph 1, point 1 of MiFID II as,

any legal person whose regular occupation or business is the provision of one or more investment services to third parties and/or the performance of one or more investment activities on a professional basis.

Investment firms must comply with the MiFID II requirements, including of organisation under Articles 16 and 17, and of investor protection and information to clients of Article 24.

For the issuance of an STO to be regulated by MiFID II, a security token would have to qualify as a transferable security under the broader concept of a financial instrument. To be negotiable on a capital market, as required by the definition of ‘transferable securities’, a security token would have to possess the ability to be traded on any of the four recognised venues mentioned *supra*. Therefore, MiFID II would not be applicable to STOs issued with the intent of being traded on the blockchain, or some other innovative technology, so long as such novel technologies do not possess the requisites to be recognised as an established capital market.

## 2.4 Market Abuse Regulation

Regulation (EU) No 596/2014 of the European Parliament and of the Council of 16 April 2014 on market abuse (market abuse regulation) [...] <sup>88</sup> (‘MAR’) often invokes the MiFID II definition of ‘transferable securities’ although it also contains a text-book definition of traditional ‘securities’ in Article 3, paragraph 2 point (a). Security tokens that can be classified as financial instruments and can be traded on a recognised venue could trigger the application of MAR. For example, insider

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<sup>88</sup> [...] and repealing Directive 2003/6/EC of the European Parliament and of the Council and Commission Directives 2003/125/EC, 2003/125/EC and 2004/72/EC [2014] OJ L173/1.

dealing, which may be quintessential for start-up businesses issuing STOs to finance their projects, would be prohibited under MAR. Insider dealing is understood in Article 8 MAR as,

aris[ing] where a person possesses inside information and uses that information by acquiring or disposing of, for its own account or for the account of a third-party, directly or indirectly, financial instruments to which that information relates. [...]

The uncontainability of technology makes establishing territorial boundaries one of the controversial bones of contention of internet-assisted technologies. DLT technology is distributed because devices are spread apart and can use the networking power of the internet to communicate almost instantaneously from one side of the planet to another. Jurisdictions operate on the principle that what occurs within their territory is part of the forum. There are exceptions to this concept but what occurs outside the territory of the forum is subject to legal uncertainty despite international treaties and conventions. Article 2, paragraph 4 of MAR declares:

The prohibitions and requirements in this Regulation shall apply to actions and omissions, in the Union and in a third country [...]

In practice, it would be difficult to apply MAR to online security tokens originating from the EU territory but being traded in a recognised venue located in a third country because it may not be possible to enforce MAR in such situations.

## 2.5 Collective Investment Schemes (CISs)

### 2.5.1 Undertakings for Collective Investment in Transferable Securities ('UCITS') and Alternative Investment Fund Managers Directive

Council Directive of 20 December 1985 on the coordination of laws, regulations and administrative provisions relating to undertakings for collective investment in transferable securities (UCITS),<sup>89</sup> (the first UCITS Directive, 'UCITS I') describes UCITS in Article 1 sub-article 2 as:

- the sole object of which is the collective investment in transferable securities of capital raised from the public and which operate on the principle of risk-spreading, and
- the units of which are, at the request of holders, re-purchased or redeemed, directly or indirectly, out of those undertaking's assets. Action taken by a UCITS to ensure that the stock exchange value of its units does not significantly vary from their net asset value shall be regarded as equivalent to such re-purchase on redemption.

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<sup>89</sup> 85/611/EEC [1985] OJ L375/3.

The main purpose for the drafting and enactment of UCITS I was to create an investment fund market at the European level as well as a supranational investor protection layer.<sup>90</sup>

There are various reasons why security token issuers may want to engage in UCITS activities. The fact UCITS are regulated at an EU level is one of them. Security token issuers setting up UCITS will first apply in a particular MS. Following approval, the issuer may register to operate in any other MS of the EEA. The good reputation of UCITS means they are considered respectable investment funds including by nations outside the EEA, such as Asia and South America.<sup>91</sup> Also consequent to their reputation, investors of UCITS face less rigorous due diligence measures.<sup>92</sup> A depositary must be assigned with the custody of a UCITS fund, as established in Chapter IV ‘Obligations Regarding the Depositary’ of the fourth UCITS Directive (‘UCITS IV’).<sup>93</sup> In line with Article 25 UCITS IV, a security token issuer shall not act as depositary, or vice versa.

UCITS IV provides the following definition of ‘transferable securities’:

- i. shares in companies and other securities equivalent to shares in companies (shares);
- ii. bonds and other forms of securitised debt (debt securities);
- iii. any other negotiable securities which carry the right to acquire any such transferable securities by subscription or exchange[.]

This definition does not add anything new to that of a transferable security under MiFID II. Therefore, it can be assumed that in order for a security token to form part of a collective investment fund and benefit from the provisions of UCITS IV it must possess the properties of a transferable security and have the ability to be traded only on a recognised venue. To engage in UCITS activities, a security token issuer must have an initial capital of at least €125,000.<sup>94</sup>

Directive 2011/61/EU of the European Union and of the Council of 8 June 2011 on Alternative Investment Fund Managers [...] <sup>95</sup> (‘AIFMD’) was a response of the EU institutions to the

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<sup>90</sup> Raina Pace, ‘A Maltese Study on the UCITS Framework and Investor Protection’ (BCom dissertation, University of Malta 2017) 2.

<sup>91</sup> ‘UCITS Guide for asset managers’ (2019) Carne Group, 10 <[www.carnegroup.com/wp-content/uploads/2019/06/300004-CARNE-UCITS-GUIDE-V2.04.19.pdf](http://www.carnegroup.com/wp-content/uploads/2019/06/300004-CARNE-UCITS-GUIDE-V2.04.19.pdf)> accessed 9<sup>th</sup> August 2020.

<sup>92</sup> *ibid.*

<sup>93</sup> Directive 2009/65/EC of the European Parliament and of the Council of July 2009 on the coordination of laws, regulations and administrative provisions relating to undertakings for collective investment in transferable securities (UCITS) (recast) [2009] OJ L302/32.

<sup>94</sup> Art 7, para (a).

<sup>95</sup> [...] and amending Directives 2003/41/EC and 2009/65/EC and Regulations (EC) No 1060/2009 and (EU) No 1095/2010 [2011] OJ L174/1.

global financial crisis witnessed towards the end of the 2000s.<sup>96</sup> It forms an integral part of the EU's Capital Markets Union ('CMU') which aims to consolidate the MSs' capital markets.<sup>97</sup> Since the enactment of the AIFMD, the traffic of alternative investment funds ('AIFs') throughout the MSs has significantly increased although compatibility issues still persist between one MS's regulatory system and another.<sup>98</sup> Recent developments have seen the enactment of Directive (EU) 2019/1160 of the European Parliament and of the Council of 20 June 2019 [...] with regard to cross-border distribution of collective investment undertakings,<sup>99</sup> and Regulation (EU) 2019/1156 of the European Parliament and of the Council of 20 June 2019 on facilitating cross-border distribution of collective investment undertakings [...].<sup>100</sup>

An AIF has the same properties as UCITS but is regulated by a different directive. As with UCITS, a STO licenced as an AIF in a particular MS may register to operate in any other MS of the EEA – subject to compliance formalities of the jurisdiction hosting the AIF.<sup>101</sup> Article 9, paragraph 1 AIFMD requires an internally managed AIF to have an initial capital of at least €300,000; paragraph 2 requires an AIFM appointed as external manager of AIFs to have an initial capital of at least €125,000. The directive does not define securities but it makes reference to transferable securities admitted to trading on a regulated market and for all intents and purposes can be assumed to apply the MiFID II definition to security tokens forming part of an alternative investment fund.

## 2.6 Anti-Money Laundering Directive

The growing importance of AML rules and regulations has been noted *supra*. Under present EU laws is Directive (EU) 2015/849 of the European Parliament and of the Council of 20 May 2015 on the prevention of the use of the financial system for the purposes of money laundering or terrorist financing [...],<sup>102</sup> referred to as the fourth Anti-Money Laundering Directive ('AMLD 4') amended by

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<sup>96</sup> Report from the Commission to the European Parliament and the Council assessing the application and the scope of Directive 2011/61/EU of the European Parliament and of the Council on Alternative Investment Fund Managers COM(2020) 232 final, 3.

<sup>97</sup> *ibid* 5.

<sup>98</sup> *ibid*.

<sup>99</sup> [...] amending Directives 2009/65/EC and 2011/61/EU [2019] OJ L188/106.

<sup>100</sup> [...] and amending Regulations (EU) No 345/2013, (EU) No 346/2013 and (EU) No 1286/2014 [2019] OJ L188/55.

<sup>101</sup> 'The Security Token Issuer's Guide to Alternative Investment Funds (AIFs) in Malta' (*ICO Launch Malta*) <<https://icomalta.com/the-security-token-issuers-guide-to-alternative-investors-funds-aifs-in-malta>> accessed 8<sup>th</sup> September 2020.

<sup>102</sup> [...], 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.

Directive (EU) 2018/843<sup>103</sup> (the fifth Anti-Money Laundering Directive, 'AMLD 5'). Directive (EU) 2018/1673 of the European Parliament and of the Council of 23 October 2018 on combating money laundering by criminal law<sup>104</sup> (the sixth Anti-Money Laundering Directive, 'AMLD 6') shall become effective as of the 6<sup>th</sup> December 2020<sup>105</sup> and relevant institutions should implement its provisions within the following six months. AMLD 4 does not apply to security tokens whereas AMLD 5 extends to providers engaged in exchange services between virtual currencies and fiat currencies as well as custodian wallet providers.<sup>106</sup> AMLD 6 flags the need of ad hoc AML measures for virtual currencies.<sup>107</sup> Article 1, sub-article 2, point (a), romanette (ii), point (d) of AMLD 5 gives the following definition of 'virtual currencies':

[A] digital representation of value that is not issued or guaranteed by a central bank or a public authority, is not necessarily attached to a legally established currency and does not possess a legal status of currency or money, but is accepted by natural or legal persons as a means of exchange and which can be transferred, stored and traded electronically[.]

Even if not specifically declared, this definition is broad enough to encompass security tokens. Therefore, it can be assumed that security tokens do benefit from the provisions of the AMLD 5.

## 2.7 The Prospectus Regulation

The ranking of STOs as financial instruments gives rise to unprecedented assimilations between a DLT-based technology and traditional pieces of legislation applicable to financial instruments. The assimilation of Regulation (EU) 2017/1129<sup>108</sup> ('the Prospectus Regulation') to STOs has been one of the hot topics in the ongoing blockchain debate. The assimilation of the Prospectus Regulation is interesting for the topic under review for two reasons. Firstly, it is a traditional piece of legislation and, therefore, does not assume any prerequisite knowledge of DLT technologies. Secondly, it tackles one of the drawbacks of blockchain technology, which is the general lack of knowledge that surrounds a complex, innovative technology. This lack of knowledge creates problems both for the STO issuer who may be faced with the distrust of the public to acquire

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<sup>103</sup> Of the European Parliament and of the Council of 30 May 2018 amending Directive (EU) 2015/849 on the prevention of the use of the financial system for the purposes of money laundering or terrorist financing, and amending Directives 2009/138/EC and 2013/36/EU [2018] OJ L56/43.

<sup>104</sup> [2018] OJ L284/22.

<sup>105</sup> Art 13(1) AMLD 6.

<sup>106</sup> Recital 8 AMLD 5.

<sup>107</sup> Recital 6 AMLD 6.

<sup>108</sup> Of the European Parliament and of the Council of 14 June 2017 on the prospectus to be published when securities are offered to the public or admitted to trading on a regulated market, and repealing Directive 2003/71/EC [2017] OJ L168/12.

crypto assets; and for the investor, who may be the victim of a scam or a bad investment due to not knowing better.

The Prospectus Regulation requires the publication of a prospectus by issuers of securities. It replaces the former Prospectus Directive, implemented in 2003.<sup>109</sup> The scope of the Prospectus Regulation as described in Article 1, paragraph 1 is to,

[lay] down requirements for the drawing up, approval and distribution of the prospectus to be published when securities are offered to the public or admitted to trading on a regulated market situated or operating within a Member State.

The Prospectus Regulation seeks to make the issuance of securities more user-friendly for issuers while providing more relevant information for investors.<sup>110</sup> The definition of 'securities' in the Prospectus Regulation is that of 'transferable securities' in MiFID II and therefore only security tokens tradable on a regulated market are allowed. An STO issuer interested in publishing a prospectus must choose from the following three types:

- 1) The universal registration document ('URD'), as outlined in Article 9, paragraph 1 of the Prospectus Regulation:

Any issuer whose securities are admitted to trading on a regulated market or an MTF may draw up every financial year a registration document [...] describing the company's organisation, business, financial position, earnings, and prospectus, governance and shareholding structure.

- 2) A simplified prospectus, as outlined in Article 14, paragraph 1 of the Prospectus Regulation:

The following persons may choose to draw up a simplified prospectus under the simplified regime for secondary issuances [...]:

- a) issuers whose securities have been admitted to trading on a regulated market or on an SME [small and medium-sized enterprises] growth market continuously for at least the last 18 months and who issue securities fungible with existing securities which have been previously issued.
- b) issuers whose equity securities have been admitted to trading on a regulated market or an SME growth market continuously for at least the last 18 months and who issue non-equity securities;
- c) offerors of securities admitted to trading on a regulated market on an SME growth market continuously for at least the last 18 months.

- 3) A growth prospectus, as outlined in Article 15, paragraph 1 of the Prospectus Regulation:

The following persons may choose to draw up an EU Growth prospectus under the proportionate disclosure regime [...]:

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<sup>109</sup> Directive 2003/71/EC of the European Parliament and of the Council of 4 November 2003 on the prospectus to be published when securities are offered to the public or admitted to trading and amending Directive 2001/34/EC [2003] OJ L345/64.

<sup>110</sup> Tom Fagernäs, Joel Kanervo, Gabriel Núñez and Andrés Alcalá, 'The Why and How of the New European Union Prospectus Regulation' (2019) 20 Business L Intl 5, 8.

- a) SMEs;
- b) issuers [...] whose securities are traded [...] on an SME growth market, provided those issuers had an average market capitalisation of less than EUR 500 000 000 [...];
- c) issuers [...] where the offer of securities to the public is of a total consideration in the Union that does not exceed EUR 20 000 000 calculated over a period of 12 months [...];
- d) offerors of securities issued by issuers referred to in points (a) and (b).

The simplified prospectus is an example of issuer user-friendliness by permitting secondary issuances to take advantage of a less laborious format. Another thing is the URD can be used for multiple securities issuances rather than having to draw up a different URD for each type of securities. In a nutshell, the issuances of STOs under this format will consist of three documents: (i) the URD, of which an STO issuer only needs to maintain one; (ii) a specific securities note; and (iii) a summary note. Therefore, documents (i), (ii) and (iii) together can be submitted by the STO issuer as the prospectus seeking approval from the competent authority. An STO issuer will be exempt from the provision of the Prospectus Regulation where:

- the STO will raise less than €1 million in a year;<sup>111</sup>
- the STO is offered to less than 150 people in a year;<sup>112</sup>
- an STO with a unit denomination of at least €100,000;<sup>113</sup>

Also, a particular MS may choose to exempt STOs raising up to less than €8 Million in a year.<sup>114</sup>

STOs would more likely be available online meaning they would technically be offered in any part of the world where the website is accessible. This creates a conflict between Commission Delegated Regulation (EU) 2019/980,<sup>115</sup> Annex 28, point 3 which requires the prospectus to specify the '[c]ountry[ies] where the offer(s) to the public takes place.' Thus, in the case of STOs made in the online context it is counterproductive to try to limit the territorial scope of the offer. A solution to this problem, from an EU perspective, would be to inform the competent authority of every MS to which the online STO applies about the prospectus to be published. Also, Article 7, paragraph 7, point (b) of the Prospectus Regulation requires that in the prospectus summary it be identified 'all markets where the securities are or are to be traded.' In

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<sup>111</sup> Art 1, para 3 Prospectus Regulation.

<sup>112</sup> *ibid* art 1, para 4, point (b).

<sup>113</sup> *ibid* art 1, para 4, point (c).

<sup>114</sup> *ibid* art 3, para 2, point (b).

<sup>115</sup> Of 14 March 2019 supplementing Regulation (EU) 2017/1129 of the European Parliament and of the Council with regard to regulatory technical standards on key financial information in the summary of a prospectus, the publication and classification of prospectuses, advertisements for securities, supplements to a prospectus, and the notification portal, and repealing Commission Delegated Regulation (EU) No 382/2014 and Commission Delegated Regulation (EU) 2016/301 [2019] OJ L166/1.

the case of an online STO the issuer would need the option to omit the provision of such information.

## 2.8 CSDR

Regulation (EU) No 909/2014 of the European Parliament and of the Council of 23 July 2014 on improving securities settlement in the European Union and on central securities depositories [...] <sup>116</sup> (the Central Securities Depository Regulation, 'CSDR') forms part of the ensuing reforms witnessed at an EU level in response to the global financial crisis that affected various parts of the world, including the European territory. <sup>117</sup> The CSDR creates a harmonised cross-border playing field for the MSs' CSDs. As a result, all the MS CSDs must adhere to the same stringent rules of procedure. <sup>118</sup> Failure to comply with these rules of procedure will result in sanctions against the concerned CSD MS. <sup>119</sup> Noteworthy for the study under review is Article 3, paragraph 2 CSDR which dictates that:

Where a transaction in transferable securities takes place on a trading venue the relevant securities shall be recorded in book-entry form in a CSD on or before the intended settlement date [...].

The CSD debate is one of the linchpin arguments surrounding STO innovation. Caution would militate in favour of preserving the role of the CSD and, hence, against the adoption of security tokens that will disrupt the long history of traditional CSDs. Yet, the writing is on the wall that the role of CSDs must change even if it is agreed, as many argue, that their presence cannot and will not be wiped out. Article 2, paragraph 1, point 11 of the CSDR considers the possibility of a 'settlement internaliser' that 'executes transfer orders on behalf of clients or on its own account other than through a securities settlement system.' Essentially, the argument is not whether CSD functions should or should not be automated but that they be automated in a way that preserves the public safety and security measures which form part of any respectable CSD. However, there is also in the CSDR an intrinsic propensity towards centralisation that seems to defeat the ability of introducing decentralising innovative technologies. It is believed the settlement internaliser option offers a good potential for STO expansion, but it is still not adequately clear how this is to be reconciled with such provisions of the CSDR as Article 3, paragraph 2 quoted *supra*.

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<sup>116</sup> [...] and amending Directives 98/26/EC and 2014/65/EU and Regulation (EU) No 236/2012 [2014] OJ L257/1.

<sup>117</sup> 'Central Securities Depository Regulation (CSDR): Preparing for a New Settlement Regimen' (2018) Broadridge, 3 <[www.broadridge.com/\\_assets/pdf/broadridge-csdr-wp-october2018.pdf](http://www.broadridge.com/_assets/pdf/broadridge-csdr-wp-october2018.pdf)> accessed 15<sup>th</sup> August 2020.

<sup>118</sup> *ibid*.

<sup>119</sup> Art 63 CSDR.



## CHAPTER 3: ANCILLARY APPLICABLE EU LAWS AND EXISTING REGULATORY GAPS

The Prospectus Regulation is one of the pieces of EU legislation often associated with STOs, yet if one is to dig into the piles of EU laws other examples are to be found. These legal instruments were not drafted with DLT technologies in mind and the extent of their application to STOs is still being debated. From this perspective, STOs give the impression of a legal catch causing these pieces of EU law to apply to DLT technologies – at least, with the limitations noted in this study. This is not against the will of the EU institutions given their efforts to promote blockchain technology,<sup>120</sup> and confirmed by the fact ESMA, as the relevant competent authority, could have released a statement forbidding STOs – which it has not done. Besides the principle of conferral argument, the perils of legislating in the ICT sphere may be overriding. That is to say, the EU institutions would choose not to legislate specifically in the field of DLT technologies but allow traditional legal instruments to grow around these technologies. ‘A rolling stone gathers no moss’ – and rising technologies that have a short lifespan will not exist long enough to allow traditional legal instruments to grow around them. Therefore, one could hypothesize the situation were the survival of innovative technologies depends, in part, on their ability to assimilate with traditional laws. An example of this would be ICOs whose popularity rose and then waned again, *inter alia*, due to legal uncertainties surrounding them.

The technology of STOs began to ride on the former popularity of ICOs because STOs found their own legal space *ab initio*. This turns the tables upside-down for the computer scientist, who instead of working against the legal current hoping to divert its course; instead rides on the legal flow and uses it to carry the technology to new heights. A new technology that assimilates with traditional legal instruments – if it is not forbidden from doing so – has the juridical potential to grow. Whether the technology continues to expand will then depend on other factors, such as the ease with which it can be taken up by the public and whether it is superseded by more innovative technologies. If a new technology that *ab initio* has legal ground can stand the test of time; it would eventually influence the legal instruments it is riding (or attempting to ride) on to the extent where subsequent drafted amending or replacing laws will incorporate the new technology. If the success of the innovative technology is such as to become a part of society, it is possible to project a situation where the technology will replace the traditional objects of society.

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<sup>120</sup> See s 2.1.3.

In this scenario, the technologies in question would have come full-circle and be the legal standard rather than the exception. This is not to say all innovative technologies have to go through this cycle but with new technologies sprouting like mushrooms, it is more realistic to envision this hypothesis rather than that the legislator will regulate every new technology to hit the market.

### 3.1 The Right of Withdrawal

#### 3.1.1 Consumer Rights and Distance Marketing of Consumer Financial Services Directives

Directive 2011/83/EU of the European Parliament and of the Council of 25 October 2011 on consumer rights [...] <sup>121</sup> (Consumer Rights Directive, 'CRD') was preceded by a Green Paper on the Review of the Consumer Acquis. <sup>122</sup> One of the salient features of the CRD is the right of withdrawal (aka the cooling-off period): <sup>123</sup>

[T]he consumer shall have a period of 14 days to withdraw from a distance or off-premises contract, without giving any reason, and without incurring any costs [...]

In other words, where the contracting parties are acting at a distance, each party may unilaterally undo the contract without suffering any consequences for up to 14 days from when the contract was agreed to. The fourteen-day right of withdrawal is important enough to merit another directive specifically for parties contracting financial services that are acting at a distance from each other. Directive 2002/65/EC of the European Parliament and the Council of 23 September 2002 concerning distance marketing of consumer financial services [...] <sup>124</sup> (Distance Marketing of Consumer Financial Services Directive, 'DMCFSD') complements the Consumer Rights Directive.

*Pacta sunt servanda* (which translates to 'agreements must be kept') is a fundamental principle of contract law. Basically, what it means is a written agreement validly consented to by the parties has the force of law. Other than attacking the validity of the written agreement, consenting parties have the obligation to fulfil the contents of the written agreement and, except by mutual consensus, one party can enforce the fulfilment of the contract on the other party in a court of law. The right of withdrawal does away with the *pacta sunt servanda* principle for the fourteen-day cooling-off period.

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<sup>121</sup> [...], 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 L304/64.

<sup>122</sup> [2007] COM(2006) 744 final.

<sup>123</sup> Art 9 CRD.

<sup>124</sup> [...] and amending Council Directive 90/619/EEC and Directives 97/7/EC and 98/27/EC [2002] OJ L271/16.

For example, in *Heininger*<sup>125</sup> the Sixth Chamber of the Court of Justice of the European Union ('CJEU') was questioned on the interpretation of, *inter alia*, Council Directive 85/577/EEC of 20 December 1985 to protect the consumer in respect of contracts negotiated away from business premises,<sup>126</sup> now repealed by the CRD.<sup>127</sup> The applicants, Mr and Mrs Heininger, had agreed to the terms and conditions of a loan from the bank.<sup>128</sup> The applicants subsequently made a request to the bank for the cancellation of the loan agreement.<sup>129</sup> They complained the loan agreement had been concluded at their residence by means of an agent not directly employed by the bank and who had never informed them of their right of withdrawal.<sup>130</sup> The Munich Regional Court of the Federal Republic of Germany and the Munich Higher Regional Court turned down the Heiningers request.<sup>131</sup> The German Federal Court of Justice ('Bundesgerichtshof') sought a request for a preliminary ruling from the CJEU.<sup>132</sup> The Sixth Chamber confirmed the application of Council Directive 85/577/EEC to the issue at hand and that the agent in question was under the duty to inform the applicants of the cooling-off period.<sup>133</sup> Since the agent had omitted to do so, the cooling-off period never commenced and the applicants were entitled to cancel the loan agreement.<sup>134</sup>

However, *KH v Sparkasse Südholstein ('KH')*,<sup>135</sup> should also be noted. It concerned certain loan agreements entered between KH, an individual, and Sparkasse Südholstein ('Sparkasse').<sup>136</sup> The terms and conditions of the contract permitted the initial interest rate to be reviewed after a certain length of time.<sup>137</sup> In 2008, the two parties communicated remotely to settle an updated interest rate but Sparkasse did not mention KH's right of withdrawal.<sup>138</sup> In 2015, KH communicated to Sparkasse his intention to withdraw from the loan agreement on the basis of the right of withdrawal which not having been communicated had never started the cooling-off period.<sup>139</sup> The question ended in the Regional Court, Kiel, Germany ('Landgericht Kiel') which then

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<sup>125</sup> Case C-481/99 [2001] ECLI:EU:C:2001:684.

<sup>126</sup> [1985] OJ L372/31.

<sup>127</sup> *Heininger* (n 125) para 1.

<sup>128</sup> *ibid* para 16.

<sup>129</sup> *ibid* para 17.

<sup>130</sup> *ibid*.

<sup>131</sup> *ibid* para 19.

<sup>132</sup> *ibid* para 24.

<sup>133</sup> *ibid* 9986.

<sup>134</sup> *ibid* 9987.

<sup>135</sup> C-639/18 [2020] ECLI:EU:C:2020:477.

<sup>136</sup> *ibid*.

<sup>137</sup> *ibid*.

<sup>138</sup> C-639/18 *KH v Sparkasse Südholstein* [2020] ECLI:EU:C:2020:206, Opinion of AG Sharpston, para 21.

<sup>139</sup> *ibid* para 22.

sought the reference for a preliminary ruling from the CJEU.<sup>140</sup> The conclusion of the First Chamber was that the said interest rate modification was not to be considered as a separate financial services distance contract.<sup>141</sup>

Article 2, point (b) DMCFSF defines a financial service as ‘any service of a banking, credit, insurance, personal pension, investment or payment nature;’ Article 2, point (a) DMCFSF defines a distance contract as:

[A]ny contract concerning financial services concluded between a supplier and a consumer under an organised distance sales or service provision scheme run by the supplier, who, for the purpose of that contract, makes exclusive use of one or more means of distance communication up to and including the time at which the contract is concluded;

and Recital 15 of the DMCFSF complements the definition of a distant contract as being ‘those the offer, negotiation and conclusion of which are carried out at a distance.’

Due to the digital nature of STOs it is highly probable they would thrive online, particularly if the regulatory obstacles of decentralisation and disintermediation were to be overcome. Considering online STOs would fit under the definition of financial services contracted at a distance it is assumed STO investors can avail themselves of the provisions of the CRD and DMCFSF. However, Article 16, point (b) CRD also declares the right of withdrawal shall not apply to,

the supply of goods or services for which the price is dependent on fluctuations in the financial market which cannot be controlled by the trader and which may occur within the withdrawal period[.]

Security tokens traded online are subject to price fluctuations within the withdrawal period that are beyond the control of the trader and, therefore, this will exclude the parties to the contract from availing themselves of the right of withdrawal. On the other hand, the issuance of an online STO not subject to price fluctuations within the withdrawal period that are beyond the control of the issuer would be a prime example where the right of withdrawal may be availed of by the contracting parties.

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<sup>140</sup> *ibid* para 1.

<sup>141</sup> *KH* (n 138).

The right of withdrawal in the distance contracting of traditional securities was tested in the Italian courts. In Judgment No. 201 of the Ancona Court of Appeal,<sup>142</sup> an investor contracted securities at the distributor of a bank acting in representation of a company's securities issuance.<sup>143</sup> It turned out the company issuing securities defaulted and the investor sought to annul the contract because it was signed at a distributor of the bank, therefore off-premises, and s/he was not informed at the time of signing about the right of withdrawal. The investor's claim was turned down by the court because it did not agree the bank's distributor could be considered off-premises.<sup>144</sup> Like the *KH* case *supra*, Judgment No. 403 of the Court of Bolzano,<sup>145</sup> concerned the disclosure of the right of withdrawal in subsequent iterations of a contract.<sup>146</sup> The court agreed the parties contracted at a distance but considered it sufficient for an investor to be informed of the right of withdrawal at the point of agreeing to contract securities without requiring once again disclosure at the time of confirming the same agreement.

### 3.2 E-Commerce Directive

Directive 2000/31/EC of the European Parliament and of the Council of 8 June 2000 on certain legal aspects of information society services, in particular electronic commerce, in the Internal Market (Directive on electronic commerce),<sup>147</sup> (the E-Commerce Directive, 'ECD') was the first effort of its kind at a supranational European Community level.<sup>148</sup> The uncontrollable nature of the internet called for regulation in the sphere at a supranational level.<sup>149</sup> Article 2, point (a) of the ECD defines 'information society service' ('ISS') as follows:

[A]ny service normally provided for remuneration, at a distance, by electronic means and at the individual request of a recipient of services.

The term 'at a distance' as used here is that understood in Directive 98/48/EC<sup>150</sup> Article 1, paragraph 2, meaning that 'the service is provided without the parties being simultaneously present.' As with the CRD and the DMCFS, this can be applied to online STOs since issuers are

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<sup>142</sup> [2016].

<sup>143</sup> 'Two important Italian rulings on right to withdraw from securities transactions' (*Allen & Overy*, 18<sup>th</sup> July 2016) <[www.allenoverly.com/en-gb/global/news-and-insights/publications/two-important-italian-rulings-on-right-to-withdraw-from-securities-transactions](http://www.allenoverly.com/en-gb/global/news-and-insights/publications/two-important-italian-rulings-on-right-to-withdraw-from-securities-transactions)> accessed 8<sup>th</sup> September 2020.

<sup>144</sup> *ibid.*

<sup>145</sup> [2016].

<sup>146</sup> *Allen & Overy* (n 143).

<sup>147</sup> [2000] OJ L178/1.

<sup>148</sup> Youseph Farah, 'Electronic Contracts and Information Society Services under the E-Commerce Directive' (2009) J of Internet L 3, 3.

<sup>149</sup> *ibid.*

<sup>150</sup> Of the European Parliament and of the Council of 20 July 1998 amending Directive 98/34/EC laying down a procedure for the provision of information in the field of technical standards and regulations [1998] OJ L217/18.

providing a service through electronic means where the contracting parties are at a distance from each other. In such event, the issuance and trading of security tokens can be considered an ISS and benefit from the provisions of the ECD.

### 3.2.1 Country of Origin Rule

The ECD uses a form of 'country of origin' rule that it refers to as a 'coordinated field.' It is defined in Article 2, point (h) ECD. This is to be read in conjunction with Article 3 ECD:

1. Each Member State shall ensure that the information society services provided by a service provider established on its territory comply with the national provisions applicable in the Member State in question which fall within the coordinated field.
  2. Member States may not, for reasons falling within the coordinated field, restrict the freedom to provide information society services from another Member State.
- [...]

These provisions apply to goods or services provided by electronic means.<sup>151</sup> Particularly relevant to the issuance and trading of security tokens are also the exceptions listed in the Annex of the ECD, as following:<sup>152</sup>

- copyright, neighbouring rights, and certain other intellectual and industrial property rights;
- the emission of electronic money by certain financial institutions;
- certain provisions of EC [European Community] securities law and insurance law;
- the freedom of parties to choose the law applicable to their contract;
- contractual obligations concerning consumer contracts;
- the formal validity of real estate contracts where such contracts are subject to formal requirements in the Member State where the real estate is situated; and
- the permissibility of unsolicited commercial communications by electronic mail.

Under the assumption that security token issuance and trading activities qualify as ISS, their issuers and traders should benefit from the country of origin rule by arguing that a STO validly formed under the jurisdiction of one MS could not be restricted from providing services in another MS by, for example, having to be licensed once again in the other jurisdiction. However, it may be the case that MSs may seek to prevent the trading of security tokens by applying any of the restrictions listed *supra*.

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<sup>151</sup> Art 2(h)(ii) ECD.

<sup>152</sup> Mark F. Kightlinger, 'A Solution to the *Yahoo!* Problem? The EC E-Commerce Directive as Model for International Cooperation on Internet Choice of Law' (2003) 24 Michigan J of Intl L 719, 735.

### 3.2.2 Contract Forms

Article 9 of the ECD requires MSs to make the validity of contracts in electronic format as standard. Even in the current digital age, the form of a contract is a fundamental element to a particular jurisdiction such that a contract lacking the stipulated form will lead to its nullity.<sup>153</sup> STOs would be expected to make use of technological forms of contracting, including the use of smart contracts.<sup>154</sup> Could these innovative forms of contracting lead to the invalidity of an otherwise valid contract involving security tokens? Although it should not be taken for granted, the digital revolution has either caused the legislator to intervene and make contract forms acceptable in their digital version or, in other cases, the courts have taken a more flexible approach towards otherwise valid digital contracts that have not yet been specifically recognised by the legislator.<sup>155</sup> In a judgment of the US District Court, *In re RealNetworks*,<sup>156</sup> the plaintiffs brought an action against RealNetworks, a software developing company, alleging its products allowed RealNetworks to access users' data without prior consent.<sup>157</sup> The company's License Agreement stated such action needed to be resolved by arbitration, however one of the plaintiffs raised additional arguments opposing the order to have the action so resolved.<sup>158</sup> The defendant's software products may be freely downloaded but before installation the user must accept the company's digital License Agreement.<sup>159</sup> The intervening plaintiff's opposition included that the License Agreement was not a 'writing'.<sup>160</sup> The US District Court quoted authoritative definitions of the word 'writing' or 'written' and came to the conclusion that a License Agreement in electronic format constitutes a 'writing.'

### 3.3 Electronic Money Directive and Payment Services Directive

Directive 2009/110/EC of the European Union and of the Council of 16 September 2009 on the taking up, pursuit and prudential supervision of the business of electronic money institutions [...] <sup>161</sup> (the second Electronic Money Directive, 'EMD 2') governs the commercial activity of issuing electronic money ('e-money'). The definition of e-money is given in Article 2, point 2 of EMD 2:

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<sup>153</sup> Farah (n 148) 8.

<sup>154</sup> See s 1.1.1.

<sup>155</sup> Farah (n 148) 8.

<sup>156</sup> No. 00 C 1366, 2000 WL 631341 (N.D. Ill. May, 8, 2000).

<sup>157</sup> *ibid.*

<sup>158</sup> *ibid.*

<sup>159</sup> *ibid.*

<sup>160</sup> *ibid.*

<sup>161</sup> amending Directives 2005/60/EC and 2006/48/EC and repealing Directive 2000/46/EC [2009] OJ L267/7.

‘[E]lectronic money’ means electronically, including magnetically, stored monetary value as represented by a claim on the issuer which is issued on receipt of funds for the purpose of making payment transactions [...], and which is accepted by a national or legal person other than the electronic money issuer[.]

According to the European Banking Authority’s (‘EBA’) interpretation of this definition, a token would be considered e-money if it,<sup>162</sup>

- a. is electronically stored;
- b. has monetary value;
- c. represents a claim on the issuer;
- d. is issued on receipt of funds;
- e. is issued for the purpose of making payment transactions;
- f. is accepted by persons other than the issuer.

Therefore, if a proposed security token issuance satisfies the definition of electronic money, an authorisation for the issuer as an electronic money institution would be required (unless a relevant exemption is available)<sup>163</sup>. To be granted authorisation under the EMD 2 to act as an electronic money institution, a security token issuer would have to apply to the national competent authority (‘NCA’). The issuer can first apply for the license and if approved by the NCA, the STO issuer may allocate the initial capital afterwards, up to six months from the approval of the licence.<sup>164</sup> The minimum equity capital cannot be less than €350,000.<sup>165</sup> As a licenced electronic money institution, an STO issuer may apply for authorisation to provide payment services under Directive (EU) 2015/2366<sup>166</sup> (the second Payment Services Directive, ‘PSD 2’). An STO issuer granted authorisation as a payment institution, *inter alia*, under Annex I, point 5 PSD 2 ‘Issuing of payment instruments and/or acquiring of payment transactions,’ shall be required to hold capital that is at no time less than €125,000.

### 3.4 Transparency Directive

Directive 2004/109/EC of the European Parliament and of the Council of 15 December 2004 on the harmonisation of transparency requirements in relation to information about issuers whose

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<sup>162</sup> ‘Report with advice for the European Commission: on crypto-assets’ (2019) EBA Report, 13 <<https://eba.europa.eu/sites/default/documents/files/documents/10180/2545547/67493daa-85a8-4429-aa91-e9a5ed880684/EBA%20Report%20on%20crypto%20assets.pdf?retry=1>> accessed 8<sup>th</sup> September 2020.

<sup>163</sup> Art 9 EMD 2.

<sup>164</sup> ‘Licensing of payment and e-money institutions in EU’ (*Ecovis*, 1<sup>st</sup> July 2016) <<https://ecovis.it/licensing-of-payment-and-e-money-institutions-in-eu>> accessed 8<sup>th</sup> September 2020.

<sup>165</sup> Art 4 EMD 2.

<sup>166</sup> Of the European Parliament and of the Council of 25 November 2015 on payment services in the internal market, amending Directives 2002/65/EC, 2009/110/EC and 2013/36/EU and Regulation (EU) No 1093/2010, and repealing Directive 2007/64/EC [2015] OJ L337/35.



securities are admitted to trading on a regulated market [...] <sup>167</sup> (the Transparency Directive, ‘TD’), amended in 2013 by Directive 2013/50/EU, <sup>168</sup> declares in Article 1, paragraph 1 that its scope is:

[To establish] requirements in relation to the disclosure of periodic and ongoing information about issuers whose securities are already admitted to trading on a regulated market situated or operating within a Member State.

The TD should be read in the light of Commission Directive 2007/14/EC of 8 March 2007 laying down detailed rules for the implementation of certain provisions of Directive 2004/109/EC [...], <sup>169</sup> and Commission Recommendation of 11 October 2007 on the electronic network of official appointed mechanisms for the central storage of regulated information referred to in Directive 2004/109/EC [...]. <sup>170</sup> The definition of ‘securities’ given in the Transparency Directive refers to that of ‘transferable securities’ in what today is MiFID II and therefore only security tokens tradable on regulated markets would fall under the provisions of this directive.

### 3.5 SFD

Directive 98/26/EC of the European Parliament and of the Council of 19 May 1998 on settlement finality in payment and securities settlement systems, <sup>171</sup> (the Settlement Finality Directive, ‘SFD’) was drafted in order to aid in avoiding the systemic risks that come with forming part of a payment and securities settlement system, especially in the event of one of the participants facing insolvency. <sup>172</sup> Settlement finality is understood in the financial industry as the point at which a transaction made over a payment channel becomes irreversible, notwithstanding situations such as the bankruptcy of any of the parties to the transaction. <sup>173</sup> In the context of security tokens, settlement finality is achieved by way of the Byzantine Fault Tolerance (‘BFT’) protocol. <sup>174</sup> This is the point at which two-thirds of the nodes in the blockchain reach consensus – this is in essence, a

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<sup>167</sup> [...] and amending Directive 2001/34/EC [2004] OJ L390/38.

<sup>168</sup> Of the European Parliament and of the Council of 22 October 2013 amending Directive 2004/109/EC of the European Parliament and of the Council on the harmonisation of transparency requirements in relation to information about issuers whose securities are admitted to trading on a regulated market, Directive 2003/71/EC of the European Parliament and of the Council on the prospectus to be published when securities are offered to the public or admitted to trading and Commission Directive 2007/14/EC laying down detailed rules for the implementation of certain provisions of Directive 2004/109/EC [2013] OJ L294/13.

<sup>169</sup> [...] on the harmonisation of transparency requirements in relation to information about issuers whose securities are admitted to trading on a regulated market [2007] OJ L69/27.

<sup>170</sup> [...] of the European Parliament and of the Council (notified under document number C(2007) 4607) [2007] OJ L267/16.

<sup>171</sup> [1998] OJ L166/45.

<sup>172</sup> ‘Settlement Finality Directive notifications’ (*European Union Open Data Portal*, 28<sup>th</sup> June 2017)

<<https://data.europa.eu/euodp/data/dataset/SFD>> accessed 15<sup>th</sup> August 2020.

<sup>173</sup> Mels Dees, ‘Settlement finality in DLT for digital securities.’ (*Medium*, 27<sup>th</sup> March 2019)

<<https://medium.com/dusk-network/settlement-finality-in-dlt-489b7dffe713>> accessed 7<sup>th</sup> September 2020.

<sup>174</sup> *ibid.*

probabilistic rather than absolutely final approach.<sup>175</sup> The definition of ‘securities’ in SFD refers to section B of the Annex to Directive 93/22/EEC,<sup>176</sup> later repealed by Directive 2004/39/EC of the European Parliament and of the Council of 21 April 2004 on markets in financial instruments, in turn repealed by MiFID II.<sup>177</sup> Therefore, only security tokens tradable on regulated markets would fall under the provisions of this directive.

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<sup>175</sup> Ki Chong Tran, ‘What is Byzantine Fault Tolerance (BFT)?’ (*Decrypt*, 5<sup>th</sup> June 2019)

<<https://decrypt.co/resources/byzantine-fault-tolerance-what-is-it-explained>> accessed 7<sup>th</sup> September 2020.

<sup>176</sup> Of 10 May 1993 on investment services in the securities field [1993] OJ L141/27.

<sup>177</sup> [...] amending Council Directives 85/611/EEC and 93/6/EEC and Directive 2000/12/EC of the European Parliament and of the Council and repealing Council Directive 93/22/EEC

## CHAPTER 4: STO REGULATION IN MALTA, GERMANY, AND FRANCE

### 4.1 Malta

#### 4.1.1 Malta Financial Services Authority

The Virtual Financial Assets Act, Chapter 590 of the Laws of Malta (the 'VFA Act') was enacted on the 1<sup>st</sup> November 2018. It forms part of the government's efforts to promote the 'Blockchain Island' brand and, more technically, involves the merging of Professional Investor Funds ('PIFs') with the innovation of crypto assets.<sup>178</sup> The main form of regulation of funds in Malta is through the Investment Services Act of 1994 (the 'ISA').<sup>179</sup> The activities of fund managers are licensed and supervised under the ISA. The Malta Financial Services Authority (the 'MFSA') is the sole financial regulator of the island state. Besides the ISA, PIFs are also governed by the MFSA's Investment Services Rules for Professional Investor Funds.<sup>180</sup> PIFs are a watered-down version of UCITS and AIFs,<sup>181</sup> being less rigorously regulated and requiring a minimum investment of €100,000.<sup>182</sup> The MFSA's 'Discussion Paper on Initial Coin Offerings, Virtual Currencies and Related Service Providers' issued on the 30<sup>th</sup> November 2017,<sup>183</sup> subdivided virtual currencies into coins and tokens and further distinguished tokens into either securitised or utility.<sup>184</sup> The discussion paper defines 'securitised tokens' as,<sup>185</sup>

those embedding either underlying assets (akin to commodities) or rights (e.g. quasi-equity rights) and effectively refer to those tokens that qualify as financial instruments.

The partial or total lack of crypto asset regulation is regrettable leading in turn to abuse of the system, not only in Europe but worldwide. For example, in a 2018 Press Release of the US Securities and Exchange Commission, a court order was obtained against Titanium Blockchain Infrastructure Services Inc. for running a fraudulent ICO scheme.<sup>186</sup> A similar Press Release also of 2018 was published in respect to Tomahawk Exploration LLC for running a

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<sup>178</sup> Christopher P. Buttigieg and Christos Efthymiopoulos, 'The regulation of crypto assets in Malta: The Virtual Financial Assets Act and beyond' (2019) 13 L and Financial Markets Rev 30, 32.

<sup>179</sup> Chapter 370 of the Laws of Malta.

<sup>180</sup> 2015 <[www.mfsa.mt/wp-content/uploads/2019/01/001\\_ISR\\_PIF-Introduction\\_20150618.pdf](http://www.mfsa.mt/wp-content/uploads/2019/01/001_ISR_PIF-Introduction_20150618.pdf)> accessed 22<sup>nd</sup> August 2020.

<sup>181</sup> See s 2.5.

<sup>182</sup> 'Investment services rules for qualifying Professional Investor Funds Part A: The application process' (2020) MFSA, Rule 3.09 <[www.mfsa.mt/wp-content/uploads/2019/01/20180129\\_VCFunds\\_PIFs\\_PartA.pdf](http://www.mfsa.mt/wp-content/uploads/2019/01/20180129_VCFunds_PIFs_PartA.pdf)> accessed 22<sup>nd</sup> August 2020.

<sup>183</sup> MFSA Ref: 08-2017 <[www.mfsa.mt/wp-content/uploads/2018/12/20171130\\_DiscussionPaperVCs.pdf](http://www.mfsa.mt/wp-content/uploads/2018/12/20171130_DiscussionPaperVCs.pdf)> accessed 22<sup>nd</sup> August 2020.

<sup>184</sup> *ibid* 3.

<sup>185</sup> *ibid* 4.

<sup>186</sup> 2018-94.

fraudulent oil exploration ICO fund.<sup>187</sup> The VFA Act seeks to regulate the public offering of virtual financial assets ('VFAs') which it defines in Article 2, sub-article 2 as:

[A]ny form of digital medium recordation that is used as a digital medium of exchange, unit of account, or store of value and that is not:

- a) electronic money;
- b) a financial instrument; or
- c) a virtual token[.]

The MFSA purviews the VFA Act in collaboration with the Malta Digital Innovation Authority ('MDIA') established by the MDIA Act enacted on the 15<sup>th</sup> July 2018.<sup>188</sup> The intrinsic volatility of crypto assets make them vulnerable to crime and is a major stumbling block for the transition from traditional to crypto assets. So long as investors fear their DLT investments will unexpectedly disappear into the digital abyss the blockchain revolution will not occur. The Innovative Technology Arrangements and Services Act (the 'ITAS Act'),<sup>189</sup> calls for the engagement of suitably qualified persons registered with the MDIA to verify the robustness of an innovative technology arrangement.<sup>190</sup>

#### 4.1.1.1 Financial Instrument Test

Following the enactment of Malta's blockchain statutes package, the MFSA thought it wise to distinguish between financial services as falling under MiFID II and those caught by the VFA Act. This was dubbed the Financial Instrument Test ('FIT'), see Diagram 4.1 below, and it is relevant to the study under review since one of the objectives of STOs is to be regarded as financial instruments despite having properties of an innovative technology. The FIT wants to determine if a DLT-enabled asset falls under (i) the VFA Act, (ii) conventional financial services regulation, and (iii) neither of points (i) or (ii).<sup>191</sup> Article 2, sub-article 2 of the VFA Act defines DLT as:

[A] database system in which information is recorded, consensually shared, and synchronised across a network of multiple nodes [...]

Given the VFA Act's definition of a VFA,<sup>192</sup> if it can be established that a DLT-enabled asset is electronic money, a financial instrument, or a virtual token; consequent to the fact it falls under one of these categories would exclude it from the provisions of the VFA Act. Following the order of

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<sup>187</sup> 2018-152.

<sup>188</sup> Chapter 591 of the Laws of Malta.

<sup>189</sup> Chapter 592 of the Laws of Malta.

<sup>190</sup> Buttigieg and Efthymiopoulos (n 178) 33.

<sup>191</sup> Francesco Sultana, Christos Kinanis and Charalambos Meivatzis, 'Malta: The Financial Instrument Test' (*Mondaq*, 28<sup>th</sup> August 2018) <[www.mondaq.com/fin-tech/731004/the-financial-instrument-test](http://www.mondaq.com/fin-tech/731004/the-financial-instrument-test)> accessed 22<sup>nd</sup> August 2020.

<sup>192</sup> See *supra*.

sequence of the FIT, if a DLT-enabled asset is a virtual token as defined in the VFA Act then it will be excluded from the provisions of the act.<sup>193</sup> In the event that a DLT-enabled asset does not qualify as a virtual token the FIT seeks to establish if it falls under the definition of a ‘transferable security’ as provided by MiFID II, in which case it will be regulated by the directive.<sup>194</sup>

If the DLT-enabled asset does not qualify either as a virtual token or as a transferable security the next iteration under the FIT is to establish whether it qualifies as a money-market instrument defined in Article 4, sub-article 1, point 17 MiFID II as,

those classes of instruments which are normally dealt in on the money market, such as treasury bills, certificates of deposit and commercial papers and excluding instruments of payment[.]

There again, a DLT-enabled asset falling under the money-market instrument definition will be governed by MiFID II as opposed to the VFA Act.<sup>195</sup> If it does not qualify as a money-market instrument, the next iteration is to see if the DLT-enabled asset qualifies as a unit in a collective investment scheme, in which case it would be regulated by MiFID II.<sup>196</sup> If it does not qualify as a unit in a collective investment, the DLT-enabled asset is checked to see if it qualifies as a financial derivative. This is defined at length in MiFID II but, in a nutshell, a derivative is a type of security which ‘derives’ rights from a transferable security.<sup>197</sup> If the DLT-enabled asset is a financial derivative under MiFID II then it is governed by the directive.<sup>198</sup> Finally, if it does not qualify as a financial derivative the FIT examines if the DLT-enabled asset is an emission allowance financial instrument as understood under Directive (EU) 2018/410 of the European Parliament and of the Council of 14 March 2018 [...] to enhance cost-effective emission reductions and low-carbon investments [...].<sup>199</sup> If the DLT-enabled asset is considered an emission allowance financial instrument, it will be governed by MiFID II not the VFA Act.<sup>200</sup> A DLT-enabled asset that passes the FIT and, hence, qualifies as a VFA must also form part of a ‘VFA Service’ as defined in Article 2 and falling within the Second Schedule of the VFA Act.

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<sup>193</sup> Sultana, Kinanis and Meivatzis (n 191).

<sup>194</sup> *ibid.*

<sup>195</sup> *ibid.*

<sup>196</sup> *ibid.*

<sup>197</sup> See art 4(1) 44 and Annex I s C (4) to (10) MiFID II.

<sup>198</sup> Sultana, Kinanis and Meivatzis (n 191).

<sup>199</sup> [...] amending Directive 2003/87/EC [...], and Decision (EU) 2015/1814 [2018] OJ L76/3.

<sup>200</sup> Sultana, Kinanis and Meivatzis (n 191).

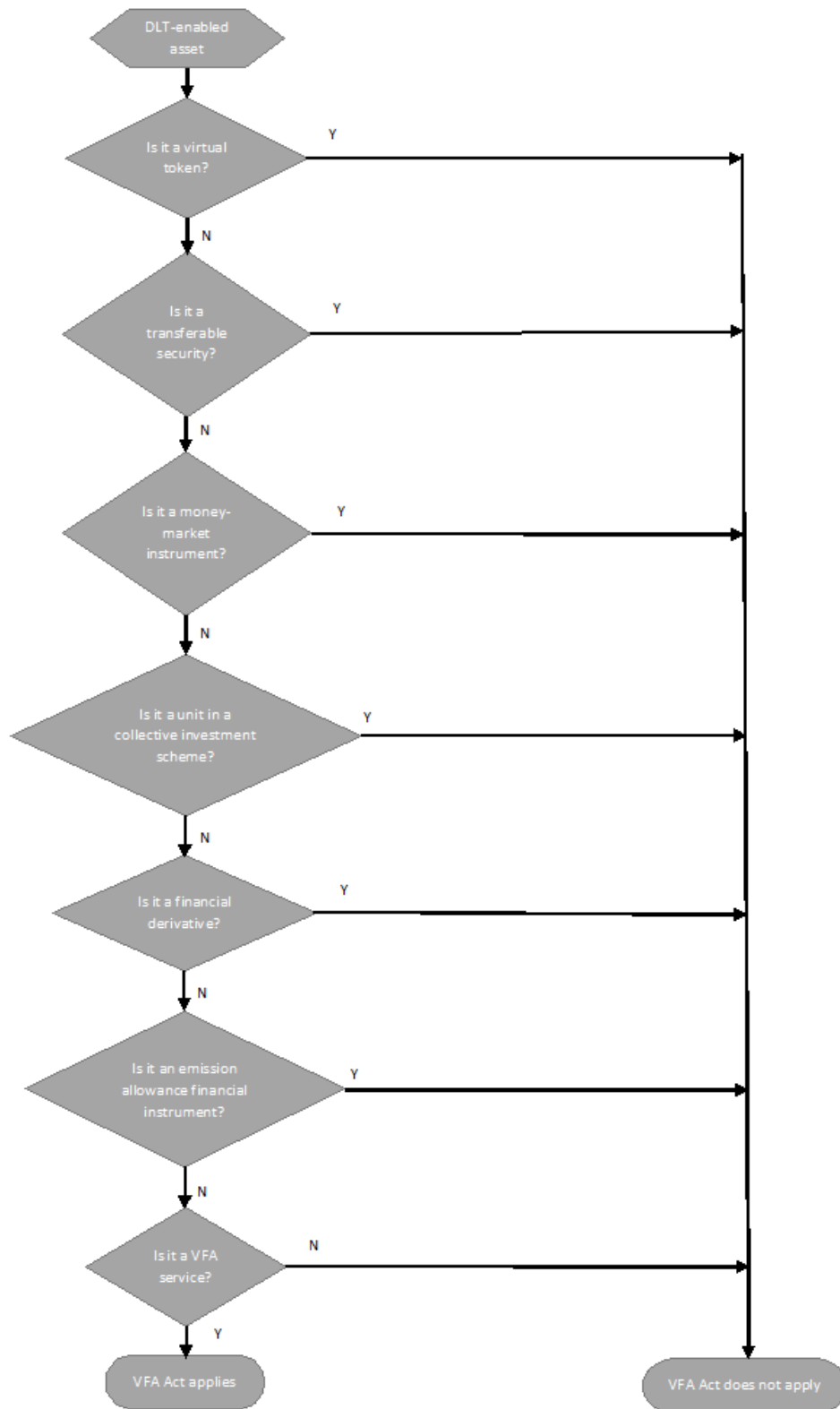


Diagram 4.1: MFSa FIT flowchart

#### 4.1.1.2 MFSA Feedback Statement

In the MFSA's 'Feedback Statement to the Consultation Document on Security Token Offering' published on the 25<sup>th</sup> February 2020,<sup>201</sup> ('the Feedback Statement') the authority believes the first port of call for issuers of DLT-enabled assets to be marketed, for all intents and purposes as one would a traditional security, should be the FIT.<sup>202</sup> In the event that the FIT still leaves scope for doubt, the next step is to consider MiFID II's definition of a 'transferable security'.<sup>203</sup> The MFSA reiterates what is recognised, amongst academic and professional circles, as the fundamental elements of a transferable security. The first element, as it were, is that of transferability.<sup>204</sup> This is understood as the intrinsic ability of a security to have its ownership transferred from one person to another.<sup>205</sup> In order for an asset to be transferable it has to be negotiable on a market.<sup>206</sup> The regulated capital markets as recognised under MiFID II have been outlined *supra*,<sup>207</sup> but it is not to say that if a security token cannot be traded on one of the MiFID II regulated markets, it is by default illegal within the EU territory.<sup>208</sup>

As is being discussed in this study, the relationship between law and technology has changed over the years and the 'wild west' concept of innovative technologies has been gradually phased out. The change was brought on from both ends of the spectrum. The law has become more flexible than it used to be back in the days when innovation was often met with scepticism. Technology too has changed as it no longer considers the law as an enemy that wants to stifle it. Instead, the situation being witnessed today is that the computer scientist tries to win the sympathy of the legislator who is willing to cooperate. In the scenario presented here, security token issuers do not want to trade on an unregulated, let alone illegal, market. On the contrary, they want to trade on a regulated market and if the current regulated markets cannot adequately accommodate the new technology it may be the legislator's move to tweak existing ones or set up one ad hoc. Traditional securities have varying rights associated with them depending on which class of securities they belong to.<sup>209</sup> Security tokens emulating traditional securities must be

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<sup>201</sup> Ref No: 12-2019.

<sup>202</sup> *ibid* s 1.1.2.

<sup>203</sup> *ibid*.

<sup>204</sup> *ibid*.

<sup>205</sup> *ibid*.

<sup>206</sup> *ibid*.

<sup>207</sup> See s 2.3.

<sup>208</sup> The Feedback Statement (n 201) s 1.1.2.

<sup>209</sup> *ibid*.

compatible with a certain class type and offer the same forms of rights.<sup>210</sup> Once again, it is not excluded novel security class types cannot eventually take shape by virtue of security tokens although it is still being debated what may such novel security class types consist of.

The MFSA is in collaboration with the Malta Business Registry (the 'MBR') to revamp parts of the Companies Act, Chapter 386 of the Laws of Malta.<sup>211</sup> The objective, is in part to cater for the use of DLT technologies within the capital structure of a company.<sup>212</sup> On the other hand, the embracing of innovative technologies should be technology-neutral by not applying a particular label, such as DLT, but rather be open to new innovations whatever the trend at a particular point in time may be.<sup>213</sup> Change should not come solely from the regulator's end, but even at a micro-level companies can do their part to include DLT technologies at the executive level.<sup>214</sup> Another reform in the pipeline initiated by the MFSA is to make due diligence requirements when listing securities on a regulated market in the Maltese territory streamlined and, as a matter of fact, avoid discriminating between traditional and token securities or between established and start-up enterprises.<sup>215</sup>

The importance of cybersecurity cannot be overemphasised – whether speaking in general about the current digital age or, more specifically, about DLT technologies. The MFSA's 'Guidance Notes on Cybersecurity'<sup>216</sup> recommends entities acting as either Professional Investor Funds investing in Virtual Currencies,<sup>217</sup> and issuers of VFAs,<sup>218</sup> (collectively referred to as the 'Entity') to designate a Chief Information Security Officer (the 'CISO'),<sup>219</sup> having, *inter alia*, the following responsibilities:<sup>220</sup>

- Overall integration of cyber defence management aspects within the Entity;  
[...]
- Establish a corporate methodology for cyber risk management;  
[...]

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<sup>210</sup> *ibid.*

<sup>211</sup> *ibid* s 1.1.6.

<sup>212</sup> *ibid.*

<sup>213</sup> *ibid.*

<sup>214</sup> *ibid.*

<sup>215</sup> *ibid* s 1.1.8.

<sup>216</sup> <[www.mfsa.mt/wp-content/uploads/2019/06/Cybersecurity-Guidance-Notes.pdf](http://www.mfsa.mt/wp-content/uploads/2019/06/Cybersecurity-Guidance-Notes.pdf)> accessed 23<sup>rd</sup> August 2020.

<sup>217</sup> 'Investment Services Rules for Professional Investor Funds Part B: Standard Licence Conditions Appendix I Supplementary Licence Conditions' (2018) MFSA, s 9 <[www.mfsa.mt/wp-content/uploads/2019/05/PIF\\_B\\_AppendixI-20190614.pdf](http://www.mfsa.mt/wp-content/uploads/2019/05/PIF_B_AppendixI-20190614.pdf)> accessed 23<sup>rd</sup> August 2020.

<sup>218</sup> 'Virtual Financial Assets Rulebook Chapter 2 Virtual Financial Assets Rules for Issuers of VFAs' MFSA (2018) <[www.mfsa.mt/wp-content/uploads/2019/02/VFAR\\_Chapter2\\_FINAL.pdf](http://www.mfsa.mt/wp-content/uploads/2019/02/VFAR_Chapter2_FINAL.pdf)> accessed 23<sup>rd</sup> August 2020.

<sup>219</sup> Guidance Notes (n 216) Note 2.2.2.

<sup>220</sup> *ibid* Note 2.3.2.



- Promote cyber threats awareness and provide training on mitigation processes across the Entity including employees, suppliers, partners and customers;
- Work with the relevant functions (technological and business) within the Entity in order to analyse and assess the levels of inherent risk, the respective controls required, and the levels of residual risk and exposure to cyber threats;

[...]

- Develop relevant metrics and measurements, prepare and disseminate status reports and provisioning of continuous reports;

[...]

The MFSA believes stakeholders operating in the field of issuing security tokens should preferably have a sound knowledge of DLT technologies.<sup>221</sup> Although it is agreed knowledge in the subject matter of innovative technologies may require expert exposure – it cannot be justified for the director of a company involved in one way or another in the issuing of security tokens to remain indifferent to the technicalities involved.<sup>222</sup> As a case in point, attention is drawn to Article 136A, sub-article 3, point (a) romanette i of the Companies Act calling for company directors to,

be obliged to exercise the degree of care, diligence and skill which would be exercised by a reasonable diligent person having [...] –

- i. the knowledge, skill and experience that may reasonably be expected of a person carrying out the same functions as are carried out by or entrusted to that director in relation to the company[.]

The study under review has already observed the importance of CSDs, as well as the inherent powers of disintermediation of DLT technologies. The MFSA acknowledges that the traditional role of CSDs will be altered by the rise of blockchain-enabled securities and envisions the option of making use of a blockchain-based system having the same functionality as a CSD.<sup>223</sup> This once again confirms the preference of having the directors of a company engaged in issuing security tokens to be well-versed in the technology. In the situation where a company chooses to register securities on a blockchain, the directors will remain responsible for their proper registration – same as if they were registered with a CSD.<sup>224</sup>

The set-up of a STO would qualify as an innovative technology arrangement as understood in the First Schedule of the ITAS Act. As part of the MDIA's certification process, an innovative technology arrangement would need to be vetted by a Systems Auditor, as defined in Article 2, sub-article 2 ITAS Act. The Systems Auditor may either be an individual or a legal

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<sup>221</sup> The Feedback Statement (n 201) s 1.1.10.

<sup>222</sup> *ibid.*

<sup>223</sup> *ibid.*

<sup>224</sup> *ibid.*

organisation and may act in collaboration with a Subject Matter Expert, an individual who may be either employed with the Systems Auditor or else sub-contracted.<sup>225</sup> To register as a Systems Auditor or a Subject Matter Expert, the applicant must meet the requirements detailed in Part IV ITAS Act and ensemble possess the following qualifications:<sup>226</sup>

- a minimum bachelor's degree in ICT and/or Information Security;
- a Certified Information Systems Auditor ('CISA') certification or equivalent;
- have experience in carrying out audits;
- have experience in innovative technology arrangements of not less than two years during the last three years.

While the MFSA is taking steps to embrace the decentralised abilities of the blockchain, on the other hand permission-less decentralisation poses, in the opinion of the MFSA, security concerns that make it difficult to integrate with traditional systems.<sup>227</sup> The Feedback Statement does not rule out the application of permission-less decentralisation but pinpoints a conflict with Title IV 'Transaction Reporting' of MiFIR Article 26, paragraph 1 which dictates, *inter alia*, that:

Investment firms which execute transactions in financial instruments shall report complete and accurate details of such transactions to the competent authority as quickly as possible, and no later than the close of the following working day.

In the case of permission-less systems it would be difficult to monitor transactions in such a manner.

The overall position of the MFSA on the issue of DLT disintermediation powers is that there is ample room for its utilisation and, to a certain extent, this is a welcome feature of the blockchain revolution.<sup>228</sup> Having said that, there are valid reasons why a certain level of intermediation may still be desirable for reasons of public safety, such as, combating AML/CFT. Therefore, the MFSA believes that even if DLT technologies made it possible, there would still not be a case for total disintermediation.<sup>229</sup> As typically occurs in such situations, it is likely hybrid

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<sup>225</sup> 'Chapter 01 Part A Systems Auditor Guidelines (2019) MDIA, 4 <<https://mdia.gov.mt/wp-content/uploads/2019/07/Systems-Auditor-Guidelines.pdf>> accessed 24<sup>th</sup> August 2020.

<sup>226</sup> *ibid* 8.

<sup>227</sup> The Feedback Statement (n 201) s 1.3.2.

<sup>228</sup> *ibid* s 1.3.4.

<sup>229</sup> *ibid*.

platforms will be witnessed which, depending on their ongoing success, would eventually replace traditional forms of intermediation.<sup>230</sup>

## 4.2 Germany

### 4.2.1 BaFin

The German Federal Financial Supervisory Authority (Bundesanstalt für Finanzdienstleistungsaufsicht, 'BaFin') published two relevant guidelines to the study under review. The Circular of the 20<sup>th</sup> February 2018 concerns the 'Regulatory classification of so-called Initial Coin Offerings (ICOs) lying tokens or cryptocurrencies as financial instruments in the field of Securities supervision.'<sup>231</sup> The Report of the 16<sup>th</sup> August 2019 concerns the '[P]rospectus and authorisation requirements in connection with the issue of so-called crypto tokens.'<sup>232</sup> BaFin believes that for a security to meet the requirements of a transferable security as understood under MiFID II, the main criterion is for it to possess the ability to be documented.<sup>233</sup> However, whether a security token does possess this ability cannot be determined *prima facie*.<sup>234</sup> It must also meet other regulatory securities supervision requirements as, for instance, the MAR. Thus, if a security token fails to comply with the necessary national and supranational regulatory requirements this will result in the prohibition of the security token project from going ahead.<sup>235</sup>

In the view of BaFin, security token regulation can be divided into prospectus requirements and authorisation requirements.<sup>236</sup> The prospectus requirements are mainly those found in the Prospectus Regulation,<sup>237</sup> supplemented by Commission Delegated Regulations (EU) 2019/979,<sup>238</sup> and (EU) 2019/980. The Prospectus Regulation applies to securities, the definition of which reverts to that in MiFID II. Thus, as was already determined in this study, if a security token

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<sup>230</sup> *ibid* s 1.3.8.

<sup>231</sup> WA 11-QB 4100-2017/0010. Original: 'Aufsichtsrechtliche Einordnung von sog. Initial Coin Offerings (ICOs) zugrunde liegenden Token bzw. Kryptowährungen als Finanzinstrumente im Bereich der Wertpapieraufsicht.'

<sup>232</sup> WA 51-Wp 7100-2019/0011 und IF 1-AZB 1505-2019/0003. Original: 'Zweites Hinweisschreiben zu Prospekt- und Erlaubnispflichten im Zusammenhang mit der Ausgabe sogenannter Krypto-Token.'

<sup>233</sup> WA 11-QB (n 231).

<sup>234</sup> *ibid*.

<sup>235</sup> *ibid*.

<sup>236</sup> WA 51-Wp (n 232) s V(a).

<sup>237</sup> See s 2.7.

<sup>238</sup> Of 14 March 2019 supplementing Regulation (EU) 2017/1129 of the European Parliament and of the Council with regard to regulatory technical standards on key financial information in the summary of a prospectus, the publication and classification of prospectuses, advertisements for securities, supplements to a prospectus, and the notification portal, and repealing Commission Delegated Regulation (EU) No 382/2014 and Commission Delegated Regulation (EU) 2016/301 [2019] OJ L166/1.

fits the MiFID II definition of a security, notwithstanding any other gaps in the statute, the Prospectus Regulation should apply. The issue of a token under German law may call for an authorisation, licence, and/or permit depending on the nature of the token.<sup>239</sup> So far BaFin does not have public rules of procedure for assessing which form of authorisation applies to which type of token. Given the relative infancy of the technology it can be safely assumed BaFin considers each request on a case-by-case basis although, as would normally happen, the higher the number of requests tackled by the regulator, the sooner will a standard procedure take shape.<sup>240</sup> For example, a token issuance having properties similar to a deposit service would require authorisation under the Banking Act (Kreditwesengesetz, 'KWG').<sup>241</sup> A token issuance having e-money properties would require a permit under the Payment Supervision Act (Zahlungsdiensteaufsichtsgesetz, 'ZAG').<sup>242</sup> A token issuance having properties similar to investment services would require authorisation under the Capital Investment Code (Kapitalanlagegesetzbuch, 'KAGB').<sup>243</sup> And a token issuance having properties similar to financial services would require a permit under the KWG.<sup>244</sup>

## 4.3 France

### 4.3.1 AMF Announcement

In an announcement of the 27<sup>th</sup> February 2020 (the 'AMF Announcement'),<sup>245</sup> the French Financial Markets Regulator (Autorité des marchés financiers, 'AMF') tabled a pro-European wide approach to security tokens. The AMF approves of the application of the Prospectus Regulation to STOs.<sup>246</sup> It considers EU legislation to be compatible with the advancement of security tokenisation despite recognising the need to iron out potential conflicts with the CSDR, as discussed *supra*.<sup>247</sup> The AMF agrees EU law does not preclude the trading of security tokens on traditional markets – so long as they do not have an element of decentralisation – in which case regulated markets would need to be modified to accommodate such innovation.<sup>248</sup> Trading of

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<sup>239</sup> WA 51-Wp (n 232) s V(d)(aa).

<sup>240</sup> *ibid*.

<sup>241</sup> *ibid* s V(d)(aa)(1).

<sup>242</sup> *ibid* s V(d)(aa)(2).

<sup>243</sup> *ibid* s V(d)(aa)(3).

<sup>244</sup> *ibid* s V(d)(aa)(4).

<sup>245</sup> 'Review and analysis of the application of financial regulations to security tokens' <[www.amf-france.org/sites/default/files/2020-03/legal-analysis-security-tokens-amf-en\\_1.pdf](http://www.amf-france.org/sites/default/files/2020-03/legal-analysis-security-tokens-amf-en_1.pdf)> accessed 25<sup>th</sup> August 2020.

<sup>246</sup> *ibid* 1.

<sup>247</sup> *ibid*.

<sup>248</sup> *ibid* 1-2.

security tokens not listed on regulated markets, that is directly on the blockchain, is not deemed illegal by the AMF but, as noted in the study under review, would not fall under those situations regulated by MiFID II.<sup>249</sup> The AMF's vision for overcoming the obstacles that exist by virtue of the CSDR *et al* is to construct a digital laboratory ('Digital Lab') within the purview of ESMA that will compensate for the disapplication of, *inter alia*, the CSDR when a conflict occurs between DLT-based securities and the regulation.<sup>250</sup>

Under French law a public offer of traditional securities must go through an intermediary – usually an investment service provider ('ISP'), who must comply with the jurisdiction's AML/CFT duties.<sup>251</sup> Due to the disintermediation of DLT technologies, there is the possibility an ISP will not be involved in an STO. Differently to the issuance of traditional securities where an issuer who does not engage an ISP is exempt from the AML/CFT duties; in the case of the issuance of ICOs, French law has made it obligatory for the issuer to perform the AML/CFT duties normally reserved for the ISP.<sup>252</sup> Consequently, it is understood the same applies to issuers of STOs.

As it stands, French company law also presents obstacles to the implementation of security tokens.<sup>253</sup> Article L. 211-4 paragraph 1 of the Monetary and Financial Code<sup>254</sup> declares:<sup>255</sup>

Transferable securities issued on French soil under French legislation, regardless of their form, must be entered in accounts maintained by the issuer or an authorised intermediary.

This is more difficult to implement on the blockchain because the account username and the user's actual name are not necessarily the same.<sup>256</sup> The solution would be either for the regulator to maintain a register of an issuer's real name with that of the corresponding username; or another option, which may be simpler, is the operation of a software application that can verify a

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<sup>249</sup> *ibid* 2.

<sup>250</sup> *ibid*.

<sup>251</sup> *ibid*.

<sup>252</sup> *ibid*.

<sup>253</sup> *ibid*.

<sup>254</sup> Original: 'Code monétaire et financier, partie législative', as of 20<sup>th</sup> March 2006.

<sup>255</sup> Original: 'Les valeurs mobilières émises en territoire français et soumises à la législation française, quelle que soit leur forme, doivent être inscrites en comptes tenus par l'émetteur ou par un intermédiaire habilité.'

<sup>256</sup> The AMF Announcement (n 245) 13.

username's real identity.<sup>257</sup> Another example of company law obstacles, is found in Article L. 227-2 of the Commercial Code<sup>258,259</sup>

The société par actions simplifiée [simplified joint-stock companies] may not offer financial securities to the public nor have its shares admitted for trading on a regulated market[.]

STOs are popular with start-up ventures which would fall under the definition of a simplified joint-stock company.<sup>260</sup> However, Article L. 411-2 of the Monetary and Financial Code constitutes certain exemptions which may still afford start-up ventures the possibility to issue STOs if falling within certain prescribed parameters.

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<sup>257</sup> *ibid.*

<sup>258</sup> Original: 'Code de commerce, partie législative'; as of 1<sup>st</sup> July 2013.

<sup>259</sup> Original: 'La société par actions simplifiée ne peut procéder à une offre au public de titres financiers ou à l'admission aux négociations sur un marché réglementé[.]'

<sup>260</sup> The AMF Announcement (n 245) 13.

## CONCLUSION

It is understood current EU legislation does not fully cater for security tokens. This is not a surprise since the legislation was tailored for traditional securities. However, it does not mean security tokens are destined to fail because they do not have absolute legal support. On the contrary, security tokens are the future and traditional securities, while not becoming obsolete, will have to make space for innovation. DLT-based technologies do not necessarily constitute the entire future of innovation, but they still have considerable potential to offer and it is hard to believe they will not continue being developed over the coming years.

The financial industry strives to be cautious – at least in theory. In practice, cases of fraudulent governance abound but these distinct cases do not represent the entire industry. The consequences of a financial crisis can be devastating and when they occur fingers are pointed, *inter alia*, against the key players of the industry, such as banking institutions and financial regulators. Only a fool keeps repeating the same mistakes whereas the wise learn from previous mistakes. As also happens with other industries, certain checks and balances are the result of lessons learnt in the aftermath of a crisis – implemented for the sake of public interest and safety. Certain critics denounce them as bureaucratic measures which benefit the key players more than the public, however it is not desirable to have a market where there is no consumer protection. For example, following the financial crisis of the late 2000s, several measures were introduced in the EU and other jurisdictions of the world that seek to prevent the onslaught of another financial crisis, or at least one similar to the previous.

A prevalent regulatory gap encountered under EU law is the definition of transferable securities in MiFID II and the consequent need to be tradable on a regulated market. There are valid reasons why securities should only be traded on a recognised market, amongst which are concerns of public interest. It is well and fitting that investors should be protected from scammers and fraudsters or simply lousy investment proposals. This has created a framework that so far has worked in protecting investors as much as possible. From an innovative technology perspective, the transferable securities definition is debilitating. The purpose of asset tokenisation is to create new boundaries which will open unprecedented horizons in the securities market industry. Amongst the strengths of blockchain is the power of disintermediation and decentralisation. This benefit is eradicated if security tokens are tied down to the four trading venues currently recognised by MiFID II.

STOs evolved from ICOs because the former is more stable than the latter. The evolution, however, needs to continue. The benefits of digitisation should be always coupled with minimisation of the volatile and uncontrollable properties of a technology. The trick is to, on the one hand, find a balance between containing a technology whilst letting it prosper, and on the other hand, avoid stifling the technology such that it will fail to exist. Laws aimed at the use of innovative technologies, such as the CRD, DMCFS and ECD, are more readily assimilated by STOs. Other laws operating in more traditional settings, such as the CSDR, stifle innovative technologies. All those statutes that adopt the MiFID II transferable securities definition have the disadvantage of preventing security tokens from taking full advantage of the powers of DLT-enabled technologies

The checks and balances created by the traditional statutes are not being criticised as archaic and obsolete and not belonging in the present age. Deregulation in the securities market could lead to a financial bubble which would eventually lead to financial crisis – as the history of financial markets has proven time and again. Not all forms of disintermediation and decentralisation are desirable. As with everything, there can be uses and abuses and in fact it is one of the AML/CFT concerns surrounding blockchain technology that criminals are using the powers of decentralisation to perpetrate illegalities. This should not be the general label of anything associated with DLT-enabled technologies, though.

Besides the regulatory gaps at an EU level, namely the MiFID II definition of ‘transferable securities’; those statutes that use the ‘transferable securities’ definition; and the CSDR, at a MS level there are several regulatory gaps in the national financial supervisory laws, rules, and regulations. These regulatory gaps are stifling the possibility of STOs to compete with traditional securities. Is it possible to fill in the MiFID II, CSDR and national legislation regulatory gaps? The issue is intrinsically a question of decentralisation. Other issues pertinent to security tokens, such as the difficulty to pinpoint a particular territory in the case of an online setting, or the prevalence of usernames on a virtual platform can be more easily overcome by the regulator acknowledging the existing of these teething issues and acting accordingly.

Instead, sorting the MiFID II and CSDR limitations would require the intervention of the legislator. Regarding decentralised trading of security tokens, it is evident that an ad hoc recognised venue would have to be established for there to be the same level of control as there is



for traditional securities. It is, in a way, a contradiction to expect decentralised trading venues to be subject to supervisory control but the point about technological innovation is of creating new playing fields not previously envisioned. Therefore, it could be hypothesised that a specific regulatory authority was created for the purpose of supervising decentralised blockchain security token trading venues. Due to the internet-based framework of DLTs it would be easier to regulate at a supranational than at a national level. This is because a decentralised blockchain trading venue is unlikely to be confined by a particular jurisdiction. The nature of the internet is intrinsically cross-border and even though it spans well beyond the boundaries of the EU territory, it is possible to envision the EU taking a third country approach towards jurisdictions beyond its territory as it has done in other contexts such as the General Data Protection Regulation (the 'GDPR').<sup>261</sup>

This could be part of the Digital Lab envisioned by the AMF,<sup>262</sup> which would collaborate with entities, such as ESMA, with the object of catering for DLT-based security tokens and, possibly, other future innovative technologies. In other words, the Digital Lab would, *inter alia*, be responsible for supervising decentralised security token trading venues and, perhaps using NCAs, allow them to get licenced. The same concept could also be used in the case of the CSDR. The duties of CSDs have been shaped over centuries of development and cannot be altered at short notice. Where an STO cannot satisfy the requirements of the CSDR, the Digital Lab would step-in to vouch for the STO issuer – so long as the issuer can in turn satisfy the requirements of the Digital Lab. It should not be forgotten that STO innovation is another cogwheel in the broader DLT-based technology revolution. Although it is believed security tokenisation can bring a breath of fresh air to the development of blockchain, because they are more stable than crypto currencies, there is so much going on by way of innovative technologies that all stakeholders are struggling to follow what will happen next. Eventually, when the dust begins to settle, the Digital Lab may well be standing in the horizon.

The point here is to encourage the trend of combining traditional rights with new technologies, as is being done with STOs, and in so doing gradually eradicate regulatory gaps between one and the other. Although still in its infancy, the hypothesis would be to view a right as independent from a specific medium. This 'independent right' could be associated with legal

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<sup>261</sup> Regulation (EU) 2016/679 of the European Parliament and of the Council 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 (General Data Protection Regulation) [2016] OJ L119/1.

<sup>262</sup> See s 4.3.1.

instruments considered traditional but it could likewise be associated with other mediums such as that of the blockchain. Should blockchain be superseded by some other innovative technology, the independent right could be 'grafted' to it. Talking about superseding blockchain technology may sound premature but in the volatile world of technology this may not be as farfetched as one would assume. What matters at this stage is the principle that what is being termed an 'independent right' can be associated with one or more mediums. By way of example, it could be hypothesised the independent right is the ownership of securities and the possible mediums in which it could be grafted is either the traditional medium or the blockchain medium. Note for the sake of this hypothesis, the default medium is not necessarily the traditional one – although everyone assumes it is. Still, it may be a productive train of thought to view traditional securities and security tokens as both being legitimate children of the same mother, rather than the former being the legitimate child and the latter an illegitimate one.

When considering the future of STOs, technology-neutral legislation seems to be the keyword. As already noted apart from national financial services legislation, amongst the prime impediments to STO development at an EU level are MiFID II and the CSDR. These statutes are difficult to overcome in the given context and this is not surprising. Their role is to, *inter alia*, provide stability in the financial services market. History has taught stakeholders in the industry that prudence is never enough. Therefore, measures catering for the protection of investors are not to be regarded as an obstacle. Having been drafted in a time when technological innovation had not yet pervaded the securities sector, these statutes meet the purpose for which they were drafted – which is the prevention of fraud and financial crises. These objectives still need to be kept in place as is evidenced by the AML/CFT alerts of the competent authorities towards crypto assets.

Legislators and regulators need to think in a more technology-neutral perspective and reap the benefits of innovative technologies while still maintaining high levels of investor protection. There still need to be regulated markets and recognised trading venues but the ones envisioned by MiFID II were not intended for security tokens. Hybridisation is the more gradual way of acknowledging change and still prevent the onslaught of an unsuspected crisis. Therefore, MiFID II's recognised trading venues would at first remain intact. To these can be added the legal acknowledgment that security token may be traded on the blockchain. Without going into too much detail, DLTs can permit different forms of trading venues. Not all need to be acknowledged

by the financial regulator and, for the sake of prudence, only strictly regulated blockchain venues that can give the concerned stakeholders peace of mind would be considered. This is a catch-22 situation where over regulation does not allow the technology to grow but under regulation will leave scoundrels free to perpetrate their misdemeanours. Similarly, for the CSDR, without going into too much detail, hybridisation will legalise blockchain forms of securities settlement systems that can operate side-by-side with traditional ones.

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