

UNIVERSITY OF ZIMBABWE

FACULTY OF LAW



***DODGING THE INEVITABLE, A CRITICAL ANALYSIS OF THE ADOPTION OF
CRYPTOCURRENCY ON ZIMBABWEAN BANKING LEGAL FRAMEWORK***

BY

TAFADZWA JAMES

**A THESIS SUBMITTED IN PARTIAL FULFILMENT OF THE REQUIREMENTS FOR
THE MASTER'S DEGREE IN COMMERCIAL LAWS (LLMCO)**

SUPERVISOR

MRS V.MUTANDWA

UNIVERSITY OF ZIMBABWE

FACULTY OF LAW

2022

APPROVAL FORM

The undersigned certify that they have read and recommended the University of Zimbabwe for acceptance of a dissertation entitled:

“Dodging the inevitable, a critical analysis of the adoption of cryptocurrency on Zimbabwean banking legal framework”

Submitted by Tafadzwa James in partial fulfilment of the requirements of Master’s Degree in Commercial Laws.

Supervisor: Mrs V.Mutandwa

Program Coordinator

DECLARATION

I, the undersigned, hereby declare that the work contained in this dissertation is my own original work and that I have not previously, in its entirety or in part, submitted it at any other university in order to obtain an academic qualification.

Tafadzwa James

Dated: 1 August 2022

DEDICATIONS

To my late father, Luckson James Kazembe, this piece of work is for you. You raised me to be a good man, wishing you were still here to see your son climbing up the rungs to greater heights.

ACKNOWLEDGEMENTS

I would like to convey my greatest appreciation to my supervisor, Mrs V.Mutandwa, I am grateful for the noble assistance you rendered to me towards the birth of this piece of work. Your appetite for excellence and perfection contributed to the outcome of this fine and wonderful piece of work.

To my mother, Neddy Kazembe, all the prayers you used to make for me were not deposited in deaf ears, they are bringing forth fruits which I continue to witness every day. Your love and care is forever appreciated.

To my wife Trisha River and my daughter Arya Tadiswa James, thank you for allowing me to do this. I feel so proud to have you around me.

Special thanks goes to Freddy Masarirevu, Anah Bobby, Patience Sizzy, Tatenda Nyamayaro, Essy Bhasera and Pau for your moral support and encouragement.

ABSTRACT

Since the introduction of virtual or digital currencies around the year 2009, the global financial and investment sphere has never been the same. Cryptocurrency, in particular Bitcoin has swept the world away and has virtually littered financial literature. Some users of cryptocurrencies consider them as digital currency which monetary value although not issued by any central bank, while others consider them as digital assets and thus hold on to them as investments rather than currencies. Be that as may, the main question that arises is the regulation of cryptocurrencies. Globally, there is no consensus on the regulatory framework of cryptocurrencies due to different classification and legal status that they are given in different jurisdictions. Suffice to say, some countries recognize them as taxable assets while other countries have banned them outrightly. Other countries who have not pronounced themselves on the subject remain in the middle ground. Zimbabwe, in particular, has not taken a firm stand on the issue of cryptocurrency. At one point the RBZ banned its use, and later, the government intimated that it was on course to develop a legal framework for the use of cryptocurrencies in Zimbabwe. This paper seeks to look at the regulation of cryptocurrency in Zimbabwe, whether the current legal framework prohibits its use or otherwise. The paper will also look at how the law can be developed to ensure that people can trade in cryptocurrency while under the protection and regulation of the law.

Table of Contents

Chapter 1: Background and Scope of Study.....	8
Background to the study.....	8
Statement of the problem	9
Objectives	10
Research questions	11
Significance of the study.....	11
Literature review.....	12
Chapter synopsis.....	14
Chapter 2: The concept of crypto currency	16
Introduction	16
What is cryptocurrency?.....	16
Characteristics of cryptocurrency	19
Bitcoin	20
A critique of cryptocurrency	22
Chapter 3: A perspective on the regulation of cryptocurrencies	24
Introduction	24
Divergent positions	24
Regulation of cryptocurrency: the approach of other jurisdictions	27
United States of America	28
The European Union	29
Non-European Countries	35
Conclusion.....	37
Chapter 4: Regulation of cryptocurrency in Zimbabwe.....	38
Introduction	38
Background	38
The legal effect of non-regulation of cryptocurrency in Zimbabwe	39
The Golix case	41
Emerging Trends	43
The significance of adopting cryptocurrency in Zimbabwe	44
Conclusion.....	45
Chapter 5: Conclusion and Recommendations.....	47
Introduction	47

Summary of the concept of cryptocurrency	47
Regulation of cryptocurrencies in Japan.....	48
Background	48
Regulation of Exchanges of Cryptocurrencies	50
Recommendations for Zimbabwe.....	56
Conclusion.....	58
Bibliography	59

Chapter 1: Background and Scope of Study

Background to the study

Over the years Zimbabwe has been on the look out to curb for illicit financial dealings including but not limited to money laundering. This has led to the enactment of various legislation and regulations including the Money Laundering and Proceeds of Crime Act Chapter 9:24. The regulation of banks and financial institutions has become stricter and a number of regulations and standards are continuously being adopted so as to prevent financial crimes. Technological advancements have on the other hand continued to skyrocket with each day that passes by bringing with it some new technological mutations. Technology has to that end came up with a new form of currency, which can stand as a substitute for money, cryptocurrency. This in turn means that there has to be a global overhaul in as far as financial laws and regulations are concerned to ensure that the same also caters for the new currency and curtail for the potential financial threats.

The use of cryptocurrency continues to soar globally.¹ Zimbabwe is not spared in the use of cryptocurrency. There is at the moment no any interlinkage between the use of cryptocurrency and the regulated financial institutions in Zimbabwe. There are however some other countries which are moving towards attaining that and some have already attained same. In America, some states have even passed legislation that allow the state to even receive taxes in cryptocurrency². Cryptocurrency can be defined in simpler terms as a digital currency that is divorced from the central system.³ The decentralized system takes the obligation of verifying and maintaining records of the financial transactions. The digital currency is therefore managed by a kind of technology known as cryptography.⁴ Cryptography stands as a security that stands against double spending of one's

¹ Satoshi Nakamoto "Bitcoin developer chats about regulation, open source, and the elusive" [Archived](#) 3 October 2014 at the [Wayback Machine](#), PC World, 26 May 2013

² [www.africaid.org-accessed](#) on 26 April 2022

³ Raeesi, Reza "The Silk Road, Bitcoins and the Global Prohibition Regime on the International Trade in Illicit Drugs: Can this Storm Be Weathered?" (2015) 8 *Glendon Journal of International Studies / Revue d'Études Internationales de Glendon*. 8 (1–2). ISSN 2291-3920. Archived from the original on 22 December 2015.

⁴ Narayanan *et al* (2016). *Bitcoin and cryptocurrency technologies: a comprehensive introduction* (Princeton: Princeton University Press, 2016) [ISBN 978-0-691-17169-2](#).

cryptocurrency resources or the coming up of counterfeit currency⁵. The most common type of cryptocurrency is the bitcoin which was invented in the year 2008⁶. Cryptocurrency can be used as a medium of exchange between two or more account holders and it recognizes no boundary limitations. Accordingly, cryptocurrency can be exchanged between people within multi-jurisdictions. The nature of cryptocurrency has been a cause for concern amongst any jurisdictions across the globe more particularly in view of the fact that the currency is decentralized.

The government of Zimbabwe continues to pay a blind eye to the use of such currency. There could be several explanations to why the government, more particularly the Reserve Bank of Zimbabwe has taken that stance. It could be the government is hesitant to recognize the use of Cryptocurrency as that will also come with various legal issues some of which include the setting up of the necessary legal framework for the existence and use of the cryptocurrency. It could also be that the government is not yet willing to take the lead in the adoption of cryptocurrency. Currently only a few countries have adopted cryptocurrency. These include the United States of America⁷, the European Union, Canada and Australia⁸.

Statement of the problem

Zimbabwe has no legal framework whatsoever that regulates the exchange of cryptocurrency between parties. The use of cryptocurrency is however not remaining static and await the responsible authorities to pitch up the necessary legal guidelines. This poses various legal problems within the jurisdiction. These include money laundering, financing of terrorism and financial illicit transaction. Law is not static. It should be able to continuously develop and embrace various situation that any jurisdiction may find itself in. The use of cryptocurrency accordingly calls for the necessary adjustments to be made within our banking legal framework. Our jurisdiction accordingly has to decide

⁵ www.investopedia.com-accessed on 26 April 2022

⁶ <https://money.us.new.com/investment>-accessed on 26 April 2022

⁷ This was done through the Bank Secrecy Act

⁸ www.investopedia.com-accessed on 11 April 2022

on whether or not it will continue to entertain the use of Cryptocurrency within its borders, it is however impossible to ban the use of cryptocurrency more particularly in view of the fact that the currency is decentralized and requires no government intervention at all for its functionality. If the answer to the foregoing is in the affirmative, it means a regulating framework has to be put in place for the use of cryptocurrency to thrive. It is inevitable for any progressive nation to dodge the use of cryptocurrency in light of the vast technological advancements worldwide. There are however a number of issues surrounds the question of regulation of cryptocurrency arises. The questions include whether or not such a currency can be effectively regulated considering the fact that it is a decentralized currency. If it cannot be effectively regulated, are we better off ignoring it per se or something should be done?

Objectives

The objectives of the research are largely three-fold. As has been outlined above, the use of cryptocurrency is not regulated in Zimbabwe. It is against this backdrop that this research finds its core objectives. Firstly, the research will seek to exhume the legal implications associated with the choice to either adopt or not adopt cryptocurrency. The research will lay bare whether or not it is more beneficial for our jurisdiction to continue with the current status quo or it should thrive to ensure that the use of cryptocurrency is regulated. It is indeed a fact that the regulation of cryptocurrency is not a walk in the park at all. This is particularly so in view of the fact that cryptocurrency is largely a private digital currency which the state has no control whatsoever in its issuance. The legislation to be passed may be rendered useless or circumvented by the technological methods which gave birth to the currency. Ultimately, the central objective is to explore on whether or not Zimbabwe is better off being a nation with no cryptocurrency regulations at all or it should to some extent adopt some regulations that regulate the same. This will include a discussion on whether or not it is legally feasible to have the state's grip on cryptocurrency, an asset that is privately controlled through block chain technology or government should just keep a hands-off approach to same. Secondly, the research will then look at possible legal changes that may arise owing to the adoption of cryptocurrency

to our banking law and discuss the possible impact of same within the financial market. Regulation of cryptocurrency will definitely have to take a holistic approach to our Zimbabwean banking legal framework as this will clearly be a major shift from the historic banking laws. The key changes on the legal framework will be discussed and analyzed and major inroads of each and every aspect discussed in detail. Lastly the research will seek to make proposals and recommendations with regards to the way forward. Should Zimbabwe adopt cryptocurrency, if so, what, the discussion will recommend important changes that should be made to the Zimbabwean banking legal framework.

Research questions

The thesis shall seek to address the following research questions;

1. Is Zimbabwe better off without any regulations governing the use of cryptocurrency?
2. Is the regulation of cryptocurrency feasible?
3. What impact will the adoption of cryptocurrency have on our banking legal framework?
4. Is our current banking legal framework adequate to extend to cryptocurrency once adopted?
5. What are the major changes that should be made to our banking legal framework to capture the use of cryptocurrency?

Significance of the study

The study will endeavor to locate the trade in foreign currency within the legal framework of Zimbabwe's banking and finance system. Being a highly regulated economic sector, and the usage and trade in cryptocurrency being on the rise, the study can be identified as a worthy contribution to literature on cryptocurrency in this jurisdiction. It will explore on the possibility of the regulation of cryptocurrency drawing lessons from other jurisdictions that have realized the need to regulate same. A continued use of the cryptocurrency without any regulating framework definitely poses a threat to the nation which should be tamed. The study will lay bare the legal problems associated with having an unregulated "currency" in our midst and convincingly explore if it is possible to have it

regulated and the changes that have to be made to the banking legal framework should cryptocurrency be adopted in our jurisdiction.⁹

Literature review

Introduction

Cryptocurrency is generally a novel currency which has slightly above a decade tenure since it was introduced into the global modern financial system.¹⁰ The introduction of virtual currencies, and in particular crypto currency has not been without controversy as there is no consensus on its recognition and regulation. This is chiefly because different jurisdictions are not in agreement on whether cryptocurrency is a digital currency or a digital asset and this has a bearing on how they are regarded in individual jurisdictions. Ultimately, this determines whether they are regulated and/or recognized in a particular jurisdiction or not.

Definition of cryptocurrency

Bryans¹¹ defines cryptocurrency by reference to its characteristics. He holds that a cryptocurrency is a form of a decentralized virtual currency which is not issued by a central institution, nor relies on a central institution for trust, but relies on a cryptograph and makes use of protocols such as peer to peer systems.¹² Bryans proceeds to assert that what makes cryptocurrency peculiar is not only because they are not issued by a central

⁹In a Press Statement on The Use of Virtual Currencies in Zimbabwe, 2017 available at <https://www.rbz.co.zw/documents/publications/press/press-statement---use-of-virtual-currencies-in-zimbabwe.pdf>. The Governor of the Reserve Bank of Zimbabwe admitted that trade in cryptocurrency was growing steadily in Zimbabwe, although he expressed his reservations towards its use.

¹⁰ Milutinovic M "Cryptocurrency" (2018) 64 *Ekonomika* 1 105.

¹¹ Bryans D "Bitcoin and Money Laundering: Mining for an Effective Solution" (2014) 89 1 *Indiana Law Journal* 13 441.

¹² Park, *et al* "Nodes in the Bitcoin Network: Comparative Measurement Study and Survey"(2019) 7 *IEEE Access* 5700.

institution, but also that they system is designed as much as possible to avoid central institutions like central banks.¹³

Joubish *et al* summarizes that cryptocurrency is a type of digital currency which relies on the system called cryptography for trust and reliability, alongside a proof-of-work scheme, in order to create, manage and sustain the currency.¹⁴

A critique of the use of cryptocurrency

Harvey¹⁵ summed some of the benefits of adopting cryptocurrency as being: it boasts advanced security features; it is convenient to use and compatible with mobile devices; it has low costs of production and transmission through blockchain transmission protocols and relatively low inflation risks in the long term.

However, legal academics and economic commentators have raised some issues with regards to the adoption and usage of cryptocurrency. As Harvey¹⁶ points out their early record of illiquidity, high volatility and susceptibility to nebulous uses as some of the issues surrounding adoption of cryptocurrency, Ahamed *et al*¹⁷ also raises the issue of its difficulty of being classified as either a digital currency or digital asset. This has been a central issue encumbering the adoption of a universal and uniform recognition of cryptocurrency globally. Further, it has also been argued by Glaser *et al*¹⁸ that cryptocurrency cannot be classified as a currency because when users adopt it, they adopt because they are looking for an alternative investment base and not necessarily an alternative currency.

Regulation of cryptocurrency

¹³ *Ibid.*

¹⁴ Joubish *et al* "Paradigms and Characteristics of Good Quality Research" (2011) 12 *World Applied Sciences Journal* 11 2084.

¹⁵ Harvey *et al* "Understanding Cryptocurrencies" (2020) 18 *Journal of Financial Econometrics* 2 183.

¹⁶ *Ibid.*

¹⁷ *Ibid* fn 8.

¹⁸ Glaser *et al* "Bitcoin – Asset or Currency? Revealing Users' Hidden Intentions" 2014 JO – ECIS 2014 Proceedings – 22nd European Conference on Information Systems.

Gans and Halaburda¹⁹ intimates that the fast rate at which cryptocurrency is being adopted by users and the manner in which it has dominated the global financial sector makes it more than necessary to recenter our attention towards interrogating issues relating to the regulation of cryptocurrency. In determining the need for regulation, the authors distinguish cryptocurrencies which are issued by platforms like Amazon and Facebook whose function is to provide subsidies to participate on such functions,²⁰ on one hand, and those which are independent of any platform, like Bitcoin on the other hand. Independent cryptocurrencies that are not issued by any central institution can affect price, financial and payment stability and therefore there is greater need for regulation.

Chapter synopsis

Chapter 1: Background and Scope of the Study.

Outlines the background of the study, its significance and objectives. Gives an overall and summarised version of the study.

Chapter 2: The Concept of Cryptocurrency.

This chapter introduces the reader to the concept of cryptocurrency, its definition and characteristics. It gives further gives an overview of the advantages and disadvantages of adopting cryptocurrency as part of our financial system, while giving a critique on their descriptive status in the financial system i.e., the debate on whether it is a digital currency or a digital asset.

Chapter 3: A Perceptive on the Regulation of Cryptocurrency.

This chapter forms the precursor to the main argument that is raised in this paper. Firstly, it considers the appropriateness of raising the issue of the regulation of cryptocurrency. More importantly, it offers a bird's eye view on how various jurisdictions have reacted to the use of cryptocurrency, which exposes the dissecting and at times contradictory positions.

¹⁹ Gans and Halaburda "Some Economics of Private Digital Currency" (2013) Bank of Canada; Staff Working Paper 13-38. Handle: RePEc:bca:bocawp:13-38.

²⁰ *Ibid.*

Chapter 4: Regulation of cryptocurrency in Zimbabwe.

This chapter considers whether the Reserve Bank of Zimbabwe recognizes or allows the use of cryptocurrency in Zimbabwe. It reveals the inconsistent positions of the central bank's officials with regards to the need to formulate a legal framework for the use of cryptocurrency. This chapter will ultimately establish whether the use of cryptocurrency is currently allowed in Zimbabwe and whether the current legal framework allows for its adoption.

Chapter 5: Conclusions and Recommendations.

Drawing from the conclusion reached in Chapter 4, this chapter will recommend on ways in which the law can be developed to cater for the adoption of cryptocurrency. Additionally, it will look at frameworks developed in other jurisdictions discussed herein, to find a suitable one for Zimbabwe. Also, this chapter will summarize the arguments raised in this paper, and conclude the paper.

Chapter 2: The concept of crypto currency

Introduction

This chapter introduces the concept of digital currencies in general and cryptocurrency in particular. It seeks to give a detailed definition of cryptocurrency, how it operates and the forms of cryptocurrency that exists currently. It provides a general overview of cryptocurrency and the legal framework required for its trade in a particular jurisdiction. The objective of this chapter is to determine whether the regulation of cryptocurrency trade is feasible.

What is cryptocurrency?

In limine, cryptocurrency must be explained in the context of digital currency because that is exactly what it is, a digital currency. Digital currencies are removed from the traditional currency that dominates the world of commerce and can either be based on a central institution or can be based on a decentralized network system.²¹ Digital currencies therefore come in two forms being; either centralized or decentralized. A digital currency is labeled centralized if it is issued by a central institution or a central banker which regulates the functions and circulations of such a currency and further regulates the rates and the process by which the digital currency can be exchanged back to the normal currency.²² The Linden Dollar is an example of a centralized digital currency which is issued by the Linden Lab and is used in the online virtual world Second Life. Linden Lab is the central institution which, like in the case of traditional currencies, serves as the source of trust.

A decentralized digital currency, however, is not issued by a central institution. The idea of a decentralized digital currency actually is to try and avoid central institutions as much as possible through building a network of transaction partners.²³ Whereas with centralized

²¹ Trautman L “Virtual Currencies; Bitcoin & What Now after Liberty Reserve, Silk Road, and Mt. Gox?” (2014) 20 *Richmond Journal of Law and Technology* 4 37.

²² *Ibid* fn 6.

²³ Karlstrom H “Do libertarians dream of electric coins? The material embeddedness of Bitcoin” (2014) 15 *Distinktion: Journal of Social Theory* 1 25.

digital currency the central institution is the source of trust, with decentralized digital currency, trust is developed through observation of behaviors by transaction partners.²⁴ Where the observation of the behavior of transaction partners is not possible, mechanisms ought to be put in place to ensure reliable transaction. One such mechanism is found in cryptocurrencies which is a decentralized system based on a cryptograph which is the source of trust. Cryptocurrency is therefore a form of a decentralized digital currency which is based on a cryptograph which provides trust and a platform for reliable transactions.

Bryans describes cryptocurrency as a digital token produced by cryptographic algorithms.²⁵ The digital token is transported through cyber space through by making use of protocols such as peer-to-peer networking. Like any other currency or commodity, the value of the tokens is determined by supply and demand dynamics and one of the greatest appeal asset of the tokens is that they are based on a decentralized system.

Therefore, cryptocurrency falls within the family of digital currencies which are based on cryptography, coupled together with a proof-of-work system, in order to issue out and regulate the currency. It is a system that does not need the central banker for its functionality but rather it is based on a peer-to-peer network of computer nodes working in harmony to create and verify transactions that pertain to the transfer of the currency within the network.²⁶ Like electronic money transfers, cryptocurrency can be sent instantly and securely between any two or more transacting parties and the said transfers are dependent on the online or internet infrastructure and cryptographic security removing the need to involve a trusted third party. The trust therefore is developed upon observation of the behaviour of transaction partners over time as complemented by cryptograph. Its value is not backed by any single government, organization or any centralized institution.²⁷.As a way to safeguard on security of the currency, all cryptocurrencies are dependent on cryptography to manage their creation and transfers. All cryptocurrencies

²⁴ *Ibid.*

²⁵ *Ibid* fn 6.

²⁶ *Ibid* fn 8.

²⁷ Ametrano F "Hayek Money: The Cryptocurrency Price Stability Solution" (2014) *SSRN Electronic Journal*. 10.2139/ssrn.2425270.

use public key cryptography; a pair of public and a private cryptographic key ensure that it is secure.²⁸

Cryptocurrency and other digital currencies like Bitcoin and Ethereum are simply computer files that a certain group of people have elected to attach a value to them and in the eyes of such people, the same are seen and put at par with ordinary money issued by a central banker. Cryptocurrency therefore has the basic requirements and ingredient of money in circulation in any jurisdiction, which is that of obtaining the trust of the group of people who use it in their transactions. The value of money is determined by the confidence it inspires coupled with the willingness to accept that money in the future and the belief that the money will keep a certain value so that it can be used for future trades.²⁹ Asmundson and Oner³⁰ posits that money as we know it has three functions which are: to store of value, that is saving; acts as a unit of account by providing a common base for prices and; functions as medium of exchange in trade.

With currencies issued by central bankers which are opposed to cryptocurrencies under discussion, the public attaches to same a certain value to the coins or paper banknotes and the government acting through the central banks guards against inflation of the money and further regulates its functions within its economy. This is however different with cryptocurrencies in the sense that there is no such central institution to take that role of the central banker or the government in as far as maintaining the value and stability of the currency. It is for the foregoing reason that most jurisdictions are hesitant to adopt the currency. Digital currencies fall into two broad distinctions which are sovereign and non-sovereign digital currency.³¹ Sovereign digital currency is a central bank issued currency which carries the value of the currency of a particular jurisdiction, but is not available in physical notes and coins.³² An example is the RTGS in Zimbabwe which is regarded as

²⁸ Wiatr M “Bitcoin as a modern financial instrument” (2014) cited in Mazikana T “The Impact of cryptocurrencies in Zimbabwe. An Analysis of Bitcoins” (2019) *SSRN Electronic Law Journal* DOI: 10.13140/RG.2.217100.26243.

²⁹ Camera G. & Casari M “The Coordination Value of Monetary Exchange: Experimental Evidence” (2014) 6 *American Economic Journal: Microeconomics* 1 290.

³⁰ Asmundson and Oner “Bank to Basics: Whats is Money? Without it, modern economies could not function” (2012) 49 *Finance & Development* 3 18.

³¹ Ibid fn 6.

³² Assad Raza “The Rise of A Sovereign Digital Currency in China” (2021) available at <https://warroom.armywarcollege.edu/articles/sovereign-digital-currency/> (accessed on 11 July 22).

Zimbabwean currency issued by the Central Bank but exists only as bank deposits.³³ On the other hand, a non-sovereign digital currency such as Bitcoin is a private currency that is not issued by the central bank and is therefore not subject to the control of a central institution.³⁴

Characteristics of cryptocurrency

Cryptocurrency has been described as a digital or electronic currency that is interdependent on a system called cryptography for security and trust.³⁵ The currency is therefore difficult to imitate or replicate because of cryptography which acts as the security feature. A defining feature of a cryptocurrency and arguably its most endearing allure is its organic nature.³⁶ The currency is divorced from the government's central banker unlike the traditional currency. Accordingly it has little or no government control or interference in most cases.³⁷ It is a currency which thrives on the existence of the internet and computer technology for its existence and functionality. It has no relationship whatsoever with traditional financial institutions and infrastructure. Cryptocurrency dealings and transfers are dependent on the currency's network which is charged with a duty of verifying transactions.³⁸ The currency is protected and encrypted therefore it is not possible for one to vary his or her credit either upwards or downwards.

The most prevalent type of cryptocurrency is the Bitcoin. It is important to make reference to Bitcoin at this point in explaining cryptocurrency since it is the first kind of cryptocurrency and the most valued one.³⁹ It is more often than not pointed as the ancestor of all the other cryptocurrencies and all other cryptocurrencies that superseded same are referred to as altcoins, it has revolutionized the global financial system.⁴⁰ Ever

³³ See SI 33 of 2019.

³⁴ Ibid fn 30.

³⁵ Pernice *et al* "Cryptocurrency" (2021) 10 *Internet Policy Review* 2.

³⁶ Ibid.

³⁷ Schaub *et al* "Cryptocurrency value changes in response to national elections. Do they behave like money or commodities?" (2020) 27 *Applied Economic Letters* 14 1136.

³⁸ Liu *et al* "Cryptocurrency Shocks" (2020) *SSRN Electronic Journal* <https://doi.org/10.2139/ssrn.3744260>.

³⁹ Paulina Likos and Coryanne Hicks "The History of Bitcoin, the First Cryptocurrency" (2022) available at <https://money.usnews.com/investing/articles/the-history-of-bitcoin>.

⁴⁰ Ibid.

since the invention of the Bitcoin in the year 2009, the global community has witnessed its growth and influence soaring to greater heights with each day that passes by.⁴¹ The major distinction between the Bitcoin and the traditional currency lies on the fact that traditional currencies are dependent on the regulatory power of the government which characteristic is missing on Bitcoins.⁴² The value of fiat currencies therefore lies with the government responsible for issuance of same whereas when it comes to cryptocurrencies, with the Bitcoin included, the value of same depends on willing seller, willing buyer basis. It makes use of a peer-to-peer blockchain interconnection that is a chronologically arranged chain of blocks where each and every block has its own list of transactional information where all transacting members are equal.⁴³

Bitcoin

Bitcoin is a communication peer-to-peer system that enables a payment system and use of electronic currency.⁴⁴ The Bitcoin was first introduced in the market in the year 2008 by an anonymous developer named Satoshi Nakamoto.⁴⁵ The concept of cryptocurrency was however not something totally novel to the global community, it was something that had previously been debated in the year 1998. Bitcoin therefore came as a materialization of that which was previously suggested.⁴⁶ In view of the fact that this thesis has aptly described beyond peradventure the concept of cryptocurrencies, it shall extensively rely on Bitcoins as the most notorious example of cryptocurrency in an endeavor to lay bare how cryptocurrencies and blockchain technology works.

⁴¹ Ali, S, T; Clarke, D; Mccorry, P; Bitcoin: Perils of an Unregulated Global P2P Currency [By S. T Ali, D. Clarke, P. McCorry Newcastle upon Tyne: Newcastle University: Computing Science, 2015. (Newcastle University, Computing Science, Technical Report Series, No. CS-TR-1470).

⁴² Iwamura, Mitsuru; Kitamura, Yukinobu; Matsumoto, Tsutomu (28 February 2014). "Is Bitcoin the Only Cryptocurrency in the Town? Economics of Cryptocurrency and Friedrich A. Hayek". [SSRN 2405790](https://ssrn.com/abstract=2405790).

⁴³ Law, Laurie; Sabett, Susan; Solinas, Jerry "How to Make a Mint: The Cryptography of Anonymous Electronic Cash " (1997) 46 *American University Law Review* 4.

⁴⁴ Böhme R *et al* Bitcoin: "Economics, Technology, and Governance" (2015) 29 *Journal of Economic Perspectives* 2 215.

⁴⁵ Nakamoto S "Bitcoin: A Peer-to-Peer Electronic Cash System" (2008) available at <https://metzdowd.com>.

⁴⁶ Kelly B "An Analysis of Cryptocurrency, Bitcoin, and the Future" (2014) 1 *International Journal of Business Management and Commerce* 9.

As has been previously stated, Bitcoin entered the global market back in 2009 following its creation and since then, its use has continued to rise. Bitcoin had 6.56 million users in 2016 and 11.05 million one year later in 2017.⁴⁷ Bitcoin functions with what is termed blockchain technology, and blockchain technology refers to a new form of technology that uses encryption. The blockchain is in actual fact a ledger that is constantly and automatically updated and maintained by computers. Thus eliminating and rendering useless the traditional role of a middleman such as banking institutions and the corresponding regulatory authorities and infrastructure. The blockchain is public. This is the most distinguishing feature that it has. Everyone can see and access same as it acts as a public ledger. It automatically gets updated after every transaction. Everyone on the platform owns his or her own copy of the ledger. This fact is rather disturbing for most individual who transact in Bitcoins as it brings with it a breach on one's right to privacy. The major advantage of the public ledger system as has been depicted above is that it renders the overdependence on traditional middlemen in as far as transacting is concerned useless. Every transaction becomes a block which is examined or checked by others computers which then approve the transaction, these verifiers are commonly termed miners.⁴⁸ After a transaction is approved, it is added to the chain of blocks that is the blockchain and goes through.

Fraud and double transactions are avoided totally owing to the fact that all the transactions that take place on the platform are public and in the event that someone attempts to corrupt same, the mathematics behind the transaction would flag it and hinder a consensus among all the ledgers. As a result, the traditional middlemen systems such as banks are partly replaced by cryptographic verification which are more effective and secure.⁴⁹ The same technology though prevalent on private e-currencies such as Bitcoin, can also be employed to support cryptocurrency issued by a central bank or a government.

⁴⁷ Weber *et al* "Exploiting the Human Factor: Social Engineering Attacks on Cryptocurrency Users" (2020) DOI – 10.1007/978-3-030-50506-6_45.

⁴⁸ Dwyer P "The Economics of Bitcoin and Similar Private Digital Currencies" (2014) 17 *Journal of Financial Stability* 91.

⁴⁹ Swan M *Blockchain* (O'Reilly Media Inc, Sebastopol: 2015)

Bitcoin's major function appears to be that of being a means of payment. Costs for transacting in Bitcoins are always kept very minimal thereby making it easy and affordable to transfer large sums of money at immense speeds worldwide⁵⁰ Transactions are executed almost instantly and further do not get affected by time constraints, one can transact at whatever time he may so wish. That being the fact, it is quite unfortunate that Bitcoin is still considered as a second fiddle and not a substitute for traditional money in almost all jurisdictions.⁵¹ Currently Bitcoins are mainly used for speculative purposes rather than a means of payment, resulting in a lot a volatility that is much higher than similar derivatives, such as currency exchange rates. This volatility results in uncertainty about Bitcoin value, making it a risky investment and even riskier as a substitute for traditional currency.⁵²

A critique of cryptocurrency

Perhaps some of the most important benefits of adopting cryptocurrency are that: it boasts advanced security features; it is convenient to use and compatible with mobile devices; it has low costs of production and transmission through blockchain transmission protocols and relatively low long inflation risks in the long term. ⁵³ These benefits of cryptocurrency are so appealing that even traditional banks like Citibank are now developing their own forms of cryptocurrency in order to utilize blockchain transmission protocols and cut costs.⁵⁴

Some of the issues that are fueling hesitancy and fear in adopting cryptocurrency are; their record of illiquidity, high volatility and potentially nebulous uses as noted by Harvey.⁵⁵ Furthermore, a major debate surrounding the adoption and use of cryptocurrency hangs

⁵⁰ Sauer B "Virtual Currencies, the Money Market, and Monetary Policy" (2016) 22 2 *International Advances in Economic Research* 1 117.

⁵¹ Ibid.

⁵² Bratspies R "Cryptocurrency and the Myth of the Trustless Transaction" (2018) 25 *Mich. Telecom. & Tech. L. Rev.* 1.

⁵³ Ibid fn 10.

⁵⁴ Moore and Stephen "Should cryptocurrencies be included in the portfolio of international reserves held by central banks?" (2016) 4 *Cogent Economics and Finance* 1.

⁵⁵ Ibid fn 6.

around whether to classify it as a digital or virtual currency and the manner in which to determine their value.⁵⁶

In addition to the confusion around whether it's a virtual or digital currency is the fact that economist have questioned if cryptocurrency should be considered as a currency in the first place. One school of thought on this subject is that, given the definition of cryptocurrency, one which has been detailed above, it should be easy for anyone to classify it as a currency. However, Glaser et al postulates that people who are making use of cryptocurrency are not necessarily looking for an alternative transaction system but all looking for an alternative investment vehicle.⁵⁷ The implication of this assertion therefore is that in bitcoins, for example, users consider themselves holding on to an investment rather than a currency hence it becomes a form of a digital asset as opposed to a digital or virtual currency.

In the United States, one of the early jurisdictions to adopt cryptocurrency, the Inland Revenue Service considers cryptocurrencies as a virtual currency and therefore it is seen as an asset.⁵⁸ As an asset, cryptocurrency is subject to capital asset taxes under U.S. financial laws. In other jurisdictions which, like the United States, which adopted the use of cryptocurrency at an early stage such as Canada, Norway and Sweden, cryptocurrencies are recognized as assets. However, Germany takes a different approach amongst the countries which have since adopted cryptocurrency. In that jurisdiction, cryptocurrencies are a unit of account for the purpose of trade and taxation within its borders albeit as "private money".⁵⁹ As a result of these conflicting approaches to cryptocurrency on whether it is a currency or a digital asset, there has been lack of consensus on that issue. It has been therefore left to each jurisdiction to determine whether cryptocurrencies will be considered a digital currency or digital asset, which at the end of the day creates confusion on the global stage.

⁵⁶ *Ibid*

⁵⁷ *Ibid* fn 13.

⁵⁸ Drawbaugh and Temple-West "Bitcoins are property not currency, IRS says regarding taxes" (2014) , retrieved from Reuters available at <https://www.reuters.com/article/2014/03/25/bitcoin-irs-idUSL1NOMM1L820140325>.

⁵⁹ Clinch M "Bitcoin recognized by German as private money" (2013) retrieved May 2022 from CNBC available at <http://www.cnbc.com/id/100971898>.

Chapter 3: A perspective on the regulation of cryptocurrencies

Introduction

In the previous chapter it was established that cryptocurrency's unique and most distinct feature is that it does not involve a central institution for its issuance or for the purpose of providing trust, but rather trust is guaranteed by cryptograph. Now the question which begs the mind is, against this backdrop, is it necessary or feasible to regulate the use of cryptocurrency? In this chapter, the paper seeks to explore the various competing arguments for and against cryptocurrency regulation and recognition. The experience of different jurisdictions will be considered to have a clearer picture.

Divergent positions

Academics and legal scholars are not in consensus on whether cryptocurrency should be regulated or not and compelling arguments have been put forward in support of the different positions.

Gandal and Halaburda⁶⁰note that considering the manner in which the market has warmed up to cryptocurrency and the manner in which the trade in cryptocurrency has become an integral element of the global financial system, perhaps it is about time to interrogate whether the regulation and oversight of cryptocurrency is now a necessity. In conducting this investigation, the authors have distinguished between cryptocurrencies issued by companies, for example Amazon and Facebook on one hand, and those not tied to any platform on the other hand. The authors argue that a majority of the cryptocurrencies issued by companies are largely subsidies for buyers to participate on their platforms such as Kindle and Amazon coins. Such a system is mainly advantageous to the company concerned as it reduces costs in the sense that these currencies are made to be expended on items listed on the platform concerned rather than some external

⁶⁰ Gandal, N. & Halaburda, H. "Can we predict the winner in a market with network effects? Competition in cryptocurrency market." (2016) 7 *Games* 3 4.

goods and services. As such, these kinds of cryptocurrencies might not need to be subject for regulation.⁶¹

However, and on the other hand, cryptocurrencies that are not issued by a specific platform and are therefore independent of any institution like the Bitcoin, can have a negative impact on price stability, financial stability and payment stability. Therefore, there might be a case for further regulation.⁶² Put differently, the argument being advanced here is that the need to regulate cryptocurrency is primarily dependent on their impact on price, financial and payment stability. A cryptocurrency which has an impact on price, financial and payment stability in an economy ought to be regulated but those which do not have any such impact are not necessary to regulate. The problem with this argument is that it groups cryptocurrencies into two: those that must be regulated and those where there is no need for such regulation. It does not provide a solution where there is an overlap and that is the most striking shortcoming of this argument.

Cryptocurrencies that interacts with traditional currencies at a relatively low level and hence does not significantly have an effect on the macro economy of any jurisdiction might not be necessary to regulate.⁶³ Five risks exist in relation to cryptocurrency that have a significant interaction with traditional currency and are of interest to the central banking institution. These are price stability, financial stability, payment system stability, lack of regulation and reputation.⁶⁴ These will be explained below.

Firstly, cryptocurrency could make the function of a central bank of maintaining price stability a mammoth task if their usage and circulation limits the central bank's control of the money supply through open market operations, which scenario is mostly likely to happen owing to the decentralized nature of cryptocurrencies. This reduced control over the money supply automatically has a negative impact on financial stability through the central bank's subsequent inability to intervene and interfere with the foreign exchange rate market. In addition, speculation with respect to the virtual currency could occur due

⁶¹ *Ibid.*

⁶² *Ibid.*

⁶³ "[UK regulatory approach to cryptoassets and stable coins: Consultation and call for evidence](#)" (PDF). HM Treasury. Retrieved 1 October 2021.

⁶⁴ (ECB, 2012).

to the history of cyber-attacks and since there is no lender of last resort for these currencies. The value of virtual currency union is immensely dependent on whether or not another party is willing and ready to accept the unit as a means of final payment, hence there is no guarantee of payment.⁶⁵ Moreover, since there is no legal basis for virtual currencies, the definition of the rights and obligations of each party remains hazy. While the virtual currencies may be subject to price, financial, payment and lack of regulation risk, given that lack of interaction between virtual currencies and those issued by central banks.⁶⁶

The economic reality of every jurisdiction is that economic agents consider the functionality and credibility of the central bank to determine the stability and reliability of the payment and financial system. Therefore, where there exists a parallel currency that is not under any regulatory framework of the banking system, a reputational risk accrues in the financial and banking system of that jurisdiction for the reasons canvassed above. As a result, if a major event does occur the general public are entitled to perceive that the central bank was not effectively executing its functions.

While it is suggested that the implications of cryptocurrency on central bank policy at present might be limited owing to various factors, including but not limited to the fact that virtual currencies are not being adopted and used compulsorily, economic models' technological innovations within the banking system suggests that digital currency can impact on the demand and supply for money.⁶⁷ Trautman⁶⁸ notes that, because monetary policy depends on a stable velocity of money, cryptocurrency which is manifestly unregulated can have a negative impact on the income velocity of money. The result will be a reduced monetary base as well as a reduced precision of the central bank's ability and capacity to control monetary liabilities.

The above demonstrates that the effect of the non-regulation of cryptocurrency is two-fold: firstly, it curtails the central bank from its effective function of pursuing a desired

⁶⁵ (FCB, 2012).

⁶⁶ ECB (2012)

⁶⁷ *Ibid.*

⁶⁸ Lawrence Trautman "Virtual Currencies Bitcoin & What Now After Liberty Reserve, Silk Road, and Mt. Gox?" (2014) 20 *RICH. J.L. & TECH.* 13. Available at <http://jolt.richmond.edu/v20i4/article13.pdf>.

monetary policy and; secondly, it has a negative impact on price, financial and payment systems stability. Monetary policy is thus affected at a country level, hence Laursen and Kyed's solution is to establish international cooperation through the International Monetary Fund.⁶⁹ It appears, that he is proposing an international regulatory framework.

The author notes that ideally, one of the major functions of reserve banks is to hold on to currency reserves whose purpose is to counter speculative attacks on the currency.⁷⁰ They can affect interest rates by causing a raise of same or intervene in the currency market. If the central bank runs out of reserves, it can draw down on its quotas at the IMF. The problem arises however when wealthy Bitcoin investors launch a speculative attack on a currency when there is relatively little that can be done at present as neither the central bank nor the IMF hold Bitcoin in reserves because Bitcoin is not subject to any central institution.⁷¹

Laursen and Kyed, thus, presents two possible solutions to this problem; either the International Monetary Fund can attempt to exercise indirect control or regulation of cryptocurrency; or it could offer the digital quasi currency quasi-membership status.⁷² These solutions are at an international level and therefore do not contemplate individual regulation in each jurisdiction for the sake of uniformity. Such approaches will, therefore, need to be further discussed as there are governance issues that would need to be addressed. Given the growth of Bitcoin, the need to take combative action against potential speculative attacks is crystal clear.⁷³

[Regulation of cryptocurrency: the approach of other jurisdictions](#)

Strictly speaking, the international community is not in consensus on what status cryptocurrency should be afforded and whether or not it should be regulated. Different

⁶⁹ Laursen A & Kyed JH "Virtual Currencies" (2014) *Danmark National bank Monetary Review*, 1st Quarter 85.

⁷⁰ Camera G *et al* "Money and Trust Among Strangers" (2013) 110 *Proceedings of the National Academy of Sciences* 14889 37.

⁷¹ Bryans D "Bitcoin and Money Laundering: Mining for an Effective Solution" (2014) 89 *Indiana Law Journal* 441.

⁷² *Ibid* fn 67.

⁷³ Chuen DLK *Handbook of Digital Currency: Bitcoin, Innovation, Financial Instruments, and Big Data* (London: Elsevier, 2015).

countries have taken differing position ranging from outright condemnation of cryptocurrency to adoption and regulation of the same. This section will give examples of jurisdictions that have taken a position on cryptocurrency.

United States of America

The regulation and supervision of virtual currency is the responsibility of the state concerned. As a way of illustration the states of Idaho, Louisiana, New York and Washington employ a certain concept to the effect that the transmission and transacting in virtual currency including the mining thereof are essentially regulated by money transfer laws on the “unification of monetary services.” In turn, for the implementation of cryptocurrency services, a license is required.⁷⁴

When it comes to the federal level, there is in force what is termed the Guidance of the Internal Revenue Service No. 2014- 21 of 25 March 2014. The said piece of legislation recognizes electronic currency as a digital container of value which acts as a medium of exchange, a unit of settlement and a valuable stock. Virtual money is classified as a property for the sole purposes of taxation at the federal level⁷⁵. In view of the preceding, trading in cryptocurrency is therefore subjected to taxation thus employees who earn their salaries in Bitcoins have to pay the necessary taxes using Bitcoins. In the year 2011, FinCEN issued some regulatory provisions which have an impact in the transfers and exchange of cryptocurrency. The regulations provided that a foreign-located entity operating within the financial sector qualifies as a Money Services Business (MSB) in the event that it conducts its affairs as a MSB either wholly or partly within the boundaries of the United States. According to FinCEN:

Whether or not a foreign-located person’s MSB activities occur within the United States depends on all of the facts and circumstances of each case, including whether persons in the United States are obtaining MSB services from the foreign-located person, such as

⁷⁴Washington State Department of Financial Institutions, Virtual Currency Regulation (Jun. 18, 2018), available at <http://www.dfi.wa.gov/documents/money-transmitters/virtual-currency-regulation.pdf>.

⁷⁵Financial Crimes Enforcement Network, Application of FinCEN’s Regulations to Persons Administering, Exchanging, or Using Virtual Currencies: Guidance (FIN-2013-G001), 18 March 2013 (Jun. 18, 2018), available at <https://www.fincen.gov/sites/default/files/shared/FIN-2013-G001.pdf>.

sending money to or receiving money from third parties through the foreign-located person.⁷⁶

The aforesaid regulatory principles issued by FINCEN in the year 2011 were later followed up by some guiding principles issued in the year 2013 which principles provided that all entities and individuals in the business of transmitting and or exchanging virtual currency fall under the broad bracket of money transmitters and were therefore supposed to fall under the regulation of the Bank Secrecy Act together with the correlative regulations issued to complement the said Act. In view of the preceding, all cryptocurrency exchangers were therefore mandated to register with FinCEN under MSBs.⁷⁷

Following the development foregoing, on the 26th of July 2017, FinCEN of the U.S. Department of the Treasury made an announcement that Canton Business Corporation (BTC-e) was supposed to pay a civil penalty of \$110 million. The said institution stands as one of the biggest virtual currency internet-based exchanges by volume in the world, it was fined for its willful breach of federal anti-money laundering legal provisions.⁷⁸

The European Union

Most countries are demonstrating an inability to respond effectively, adequately and competently respond to technological innovations and advancement which require new regulatory frameworks to give them legal basis.⁷⁹ The reality of the widespread use of cryptocurrency is there for all to see, although its adoption into a recognized legal framework remains very slow.⁸⁰ To resolve the legal issues associated with the adoption of virtual currency, the European Union has acknowledged the need to create a new legal framework to regulate it, but is yet to adopt cryptocurrency. The EU currently has no legal

⁷⁶*Ibid.*

⁷⁷Financial Crimes Enforcement Network, Bank Secrecy Act Regulations – Definitions and Other Regulations Relating to Money Services Businesses, 76 F.R. 43585, 43588, 21 July 2011 (Jun. 18, 2018), available at www.gpo.gov/fdsys/pkg/FR-2011-07-21/pdf/2011-18309.pdf

⁷⁸ Financial Crimes Enforcement Network, FinCEN Fines BTC-e Virtual Currency Exchange \$110 Million for Facilitating Ransomware, Dark Net Drug Sales, 26 July 2017 (Jun. 18, 2018), available at <https://www.fincen.gov/sites/default/files/2017-07/BTC-e%20July%2026%20Press%20Release%20FINAL1.pdf>.

⁷⁹ Guttman B *The Bitcoin Bible: All You Need to Know About Bitcoins* (Germany: BoD, 2013).

⁸⁰ Camera G. & Casari M. “The Coordination Value of Monetary Exchange: Experimental Evidence” (2014) 6 *American Economic Journal: Microeconomics* 1 290.

definition or description of virtual currencies. What has been clarified in most European jurisdictions is the status of such currencies in so far as tax remittances are concerned.

The first attempt to provide the necessary brooding ground for discussions on digital currencies was set by the European Central Bank report “Virtual Currency Schemes.”⁸¹ The report considers that the currencies properly resemble traditional money in all material respect save for the fact that the currencies are virtual. It further noted that the currencies are complemented by their own retail payment systems; these two aspects are covered by the term virtual currency scheme. Virtual currency schemes in the European Union are considered relevant in several areas of the financial system and are have therefore captured the attention of central banks. This, among other factors, properly accounts for the ECB’s interest in conducting an analysis, especially in light of its mandate as a catalyst for payment systems and overseer duties. The report by the ECB starts by laying a definition and also classifying virtual currency schemes based on observed characteristics; which characteristics are subject to mutations in the long run, which could affect the present definition. It therefore defined a virtual currency as a type of unregulated, digital money which is issued and usually controlled by its developers, and used and accepted among the members of a specific virtual community.⁸²

Depending on their interaction with traditional money and the real economy, the ECB has classified virtual currency into three types namely;⁸³

- i. Those that refer to closed virtual currency schemes, commonly made use of in online games;
- ii. Those that have a unidirectional flow (usually an inflow), i.e. there is a conversion rate for purchasing the virtual currency, which can subsequently be used to buy virtual goods and services, but exceptionally also to buy real goods and services;
- iii. Those that have a bidirectional flow, i.e. the virtual currency in this respect acts like any other convertible currency, with two exchange rates (buy and sell), which

⁸¹ European Central Bank, Virtual Currency Schemes (October 2012) (Jun. 18, 2018), available at <http://www.ecb.europa.eu/pub/pdf/other/virtualcurrencyschemes201210en.pdf>.

⁸²European Central Bank, Virtual Currency Schemes (October 2012) (Jun. 18, 2018), available at <http://www.ecb.europa.eu/pub/pdf/other/virtualcurrencyschemes201210en.pdf>.

⁸³ Irina Cvetkova “Cryptocurrencies Legal Regulation” (2018) 5 *BRICS Law Journal* 2 144.

can subsequently be used to buy virtual goods and services, but also to purchase real goods and services.

The ECB considers that the absence of a distinct legal framework leads to other important differences as well:

- i. Traditional financial actors, including central banks, are not involved. The issuer of the currency and scheme owner is usually a non-financial private company. This implies that typical financial sector regulation and supervision arrangements are not applicable;
- ii. The link between virtual currency and traditional currency (i.e. currency with a legal tender status) is not regulated by law, which might be problematic or costly when redeeming funds, if this is even permitted;
- iii. The fact that the currency is denominated differently (i.e. not the euro, U.S. dollar, etc.) means that complete control of the virtual currency is given to its issuer, who governs the scheme and manages the supply of money at will.

The ECB considers that in the current situation, virtual currency schemes, poses no threat to financial stability as the money in circulation is currently low and are currently generally unregulated nor supervised.

The United Kingdom

The United Kingdom has been accommodating in its attitude towards cryptocurrency and provides a template of how states should respond to innovation and technological advancement in the financial sector. It is one of the most favorable and convenient jurisdictions for conducting a cryptocurrency business. While the authorities have not been hostile to cryptocurrency business, the UK however, is yet to work out the final position of the government on legal regulation of cryptocurrency. The income (profit) of an economic entity is subjected to the ordinary taxes of any government including capital gains tax and income tax.⁸⁴

⁸⁴Revenue and Customs Brief 9 (2014): Bitcoin and Other Cryptocurrencies, Policy Paper, GOV.UK, 3 March 2014 (Jun. 18, 2018), available at <https://www.gov.uk/government/publications/revenueand-customs-brief-9-2014-bitcoin-and-other-cryptocurrencies/revenue-and-customs-brief-9-2014-bitcoin-and-other-cryptocurrencies>

Luxembourg

The Luxembourg financial regulatory commission (CSSF) has adopted the position that virtual currency including cryptocurrency is not legal tender. It warns that virtual currencies entail risks for their holders, and makes emphasis to the fact that financial services providers conducting their business within the financial sector are mandated to seek authorization from the responsible minister and compulsorily fall under the supervision of the CSSF. It can be observed that the CSSF condemns cryptocurrency on the basis that it does not fit within the current structure of the financial system. However, the question should really revolve around whether it is necessary to develop a new regulatory framework.

Netherlands

In Netherlands, cryptocurrency is not regulated under the Financial Supervision Act but the central bank expresses reservations of the use of virtual currency to consumers. One court has ruled that it is a “medium of exchange” but not electronic money, and another court has classified virtual currency as an “object” which can be seized in terms of the operative criminal evidence laws. A court in Netherlands determined a matter in favour of an individual who was owed a small amount of cryptocurrency in mining proceeds. The court in its ruling expressed that cryptocurrency has as integral part of it a transferable value and accordingly all the necessary property rights expressed in terms of the law attach to it. It appears that the Netherlands regards Bitcoin as a digital object which therefore cannot be subject to any financial regulations.⁸⁵

Poland

It is not illegal to trade in cryptocurrency in the jurisdiction. There are however no any legal framework providing for same as a legal tender. Cryptocurrencies are subject to capital gains taxes and value-added tax. However, calls are now rising from within the

⁸⁵Rechtbank Amsterdam, ECLI:NL:RBAMS:2018:869, 14 February 2018 (Jun. 18, 2018), available at <https://uitspraken.rechtspraak.nl/inziendocument?id=ECLI:NL:RBAMS:2018:869>.

authorities of Poland to bring the use of cryptocurrency within regulatory frameworks for the protection of consumers since it is experiencing rapid growth.⁸⁶

Portugal

This jurisdiction has been closely monitoring developments within European Union which includes the decision by the EU to closely monitor and regulate cryptocurrencies so as to curb for illicit financial dealings and money laundering. Portugal's Securities Market Commission has in the past made a disclosure that it had assigned itself a mandate to supervise its banks more particularly in view of the development and the ever soaring cryptocurrencies.⁸⁷

Spain

Virtual currencies' status in Spain in as far as they relate to other areas of law remain unclear. It is however reportedly indicated that such currencies are subjected to tax as an electronic payment system under gambling law. The Spanish government is however tirelessly working on coming up with the necessary legislation to regulate blockchain technologies and the necessary infrastructure including companies that are associated with the type of technology under discussion.⁸⁸

Sweden

Sweden unlike most jurisdictions that are hesitating to adopt digital currency, it has taken the necessary currency to consider issuing a digital currency through the central bank. The national bank advised the public that it is currently having discussions to create a

⁸⁶Rzecznik Finansowy apeluje o uregulowanie finansowych technologii, PolskieRadio, 14.02.2017 [Finance Spokesperson Appeals for the Regulation of Finance Technology, PolskieRadio, 14 February 2017] (Jun. 18, 2018), available at <https://www.polskieradio.pl/78/1227/Artykul/1727516,RzecznikFinansowy-apeluje-o-uregulowanie-finansowych-technologii>.

⁸⁷ Portugal's Regulator is Supervising Banks and Brokerages to Halt Bitcoin "Euphoria," CCN.com, 14 December 2017 (Jun. 18, 2018), available at <https://www.ccn.com/portugals-regulator-issupervising-banks-and-brokerages-to-halt-bitcoin-euphoria/>.

⁸⁸Giulio Prisco, Government of Spain Considers Blockchain-Friendly Regulations, Bitcoin Magazine, 22 February 2018 (Jun. 18, 2018), available at <https://bitcoinmagazine.com/articles/government-spainconsiders-blockchain-friendly-regulations/>.

national digital currency to act as a substitute of money and such a national cryptocurrency shall be called the E-krona.⁸⁹

Switzerland

The Swiss financial regulator has seen the need to regulate cryptocurrency more particularly in the wake of money laundering and illicit financial dealings. The Swiss Financial Market Supervisory Authority (FINMA) revealed a potential ICO regulation which would use a three-tier system for classifying tokens based on their use and the rights and benefits they confer on a purchaser. The proposed course of action, which is yet to be implemented, identifies quad groups of tokens, which are as follows;

- i. Payment tokens (cryptocurrencies), which would not be classified as securities;
- ii. Utility tokens, which would generally not be considered securities if they have a use or can be exchanged for a service. However, the purchaser must be able to use the token at the time of the ICO;
- iii. Asset tokens, which are widely considered securities and are subject to Swiss securities law;
- iv. Hybrid tokens, which will have to be assessed on a case-by-case basis.⁹⁰

Belgium

Belgium has taken a negative stance towards cryptocurrencies. Its first stance was to ensure that its citizens do not entertain the use and trade in cryptocurrencies. Through the National Bank of Belgium, the state issued a stern warning to its citizens and investors not to trade in cryptocurrency as it viewed same as a threat to the transacting public. The government did not however pay a blind eye to the currency at all. It has at the core of its heart a desire to protect its citizens and is taking the necessary steps to impose strict regulations on cryptocurrency trade. Cryptocurrency is however therefore not a legal tender with the national boundaries.

⁸⁹E-krona, the Next National Cryptocurrency of Sweden, Crypto Economy, 2 February 2018 (Jun. 18, 2018), available at <https://www.crypto-economy.net/en/e-krona-the-next-national-cryptocurrencyof-sweden/>.

⁹⁰ FINMA, FINMA Publishes ICO Guidelines, Press Release, 16 February 2018 (Jun. 18, 2018), available at <https://www.finma.ch/en/news/2018/02/20180216-mm-ico-wegleitung/>.

Bulgaria

The Bulgarian legal framework in as far as the same relates to cryptocurrencies appears to be hazy. The Bulgarian National Revenue Agency (NRA) requires that income obtained from cryptocurrency transactions by natural persons is subjected to tax and must be declared with the yearly tax return. The tax due is 10% from the annual basis of assessment. The NRA further asserts that for the purpose of tax deductions on the income obtained from the sale of cryptocurrencies shall be afforded the same treatment afforded to income acquired from the sale of financial assets. Where the transactions are carried out by a legal entity, the rules for corporate taxation shall be applicable. Nevertheless, the NRA stance is not clearly established, for the fact remains that virtual currencies are scarcely regulated in Bulgaria. Therefore, those requirements shall not apply to Bitcoin and other crypto exchanges.⁹¹

Non-European Countries

Argentina

According to the nation's National Constitution, which designates the Central Bank as the sole institution permitted to issue legal money, virtual currencies are not recognized as legal tender.⁹²

Australia

Except for operations related to fiat money or other financial instruments, cryptocurrency activity is not required to obtain a license in Australia because virtual currency is not regarded as a financial product. The Australian Digital Currency & Commerce Association created the Australian Digital Currency Industry Code of Conduct, which only applies to members of the Association and provides the correct guidelines for conducting cryptocurrency business in the nation.⁹³

⁹¹Vassil Kostov, The Legal Framework of Cryptocurrencies in Bulgaria, Legal Net, 13 February 2018 (Jun. 18, 2018), available at <https://1legal.net/en/blog-read129-the-legal-framework-of-cryptocurrencies-inbulgaria>.

⁹² Ignacio Olivera Doll & Camila Russo, Argentina's Biggest Futures Market Plans to Join the Bitcoin Party, Bloomberg, 2 November 2017 (Jun. 18, 2018), available at <https://www.bloomberg.com/news/articles/2017-11-02/argentina-s-biggest-futures-market-plans-to-join-bitcoin-party>.

⁹³ Australian Government, Australian Taxation Office, Tax Treatment of Cryptocurrencies (Jun. 18, 2018), available at <https://www.ato.gov.au/General/Gen/Tax-treatment-of-crypto-currencies-in-Australia---specifically-bitcoin/>

Brazil

The digital currency Niobium Coin (NBC), according to the Comissão de Valores Mobiliários (CVM) of Brazil's Securities Exchange Commission, is not a financial asset. According to the CVM, virtual currencies are only to be regarded as securities if they pay investors interest or dividends or allow for participation in corporate management through voting.⁹⁴

Cyprus

Recently, the Central Bank confirmed openly for the first time that Bitcoin is not prohibited, but it also emphasized the dangers of using an uncontrolled digital currency. In accordance with a decision made by the European Banking Authority in December 2017, the banking regulator has twice previously warned consumers that there are dangers associated with trading in virtual currencies (EBA). The Cyprus Stock Exchange and the Securities and Exchange Commission (CySEC), despite their early enthusiasm, are now reluctant to permit bitcoin-traded products, such as derivatives, as a result of this action.⁹⁵

India

The government declared in 2013 that it did not wish to control the exchange of Bitcoin. A significant tightening of regulations governing the flow of money started in 2016–2017. At the same time, the government started arbitrarily taking gold from residents. Blockchain solutions for banks and other technologies also became more widely available. The fundamental stand of the Reserve Bank of India (RBI) with regard to Bitcoin and other cryptocurrencies is that they are not legal tender currencies. They cannot be

⁹⁴ Brazilian SEC Confirms: Digital Currency Niobium Coin (NBC) Is Not a Financial Asset, Markets Insider, 22 January 2018 (Jun. 18, 2018), available at <http://markets.businessinsider.com/news/stocks/braziliansec-confirms-digital-currency-niobium-coin-nbc-is-not-a-financial-asset-1013591426>.

⁹⁵ Elias Hazou, Central Bank Says Bitcoin Is Not Illegal, CyprusMail, 26 February 2014 (Jun. 18, 2018), available at <http://cyprus-mail.com/2014/02/26/central-bank-says-bitcoin-is-not-illegal/>.

used for payments as usual currencies. Rather, they have big risks without any regulation and support. The RBI has issued warnings three times, first in December 2013, then in February 2017 and finally on 5 December 2017. The initial caution by the RBI in 2013 explains why investment in virtual currencies such as Bitcoin is risky.⁹⁶

Conclusion

As can be gleaned from the foregoing, countries are not in consensus on what to make of cryptocurrency. Some countries are still adopting a traditional stance i.e. the authorities will not accept a currency that is not controlled by the central bank. Others have been receptive, putting in place regulations to that recognize the business of trading in cryptocurrency for the purposes of tax. Those who have given legal recognition have recognized cryptocurrency either as a digital asset, or digital currency. Again, there is no consensus on this as well.

⁹⁶ Tojo Jose, Cryptocurrency Regulation in India, Indian Economy, 7 January 2018 (Jun. 18, 2018), available at <https://www.indianeconomy.net/splclassroom/cryptocurrency-regulation-in-india/>

Chapter 4: Regulation of cryptocurrency in Zimbabwe

Introduction

This chapter forms the gist of this paper. It seeks to zoom in on the legal status of cryptocurrency in Zimbabwe, in particular the attitude that the authorities have adopted against it. Further, it will consider whether the current legislative and regulatory framework in the financial sector is sufficient to protect consumers of Bitcoin. This section will further canvass contemplated instruments and policies that the country has committed to put in place with regards to the functionality of cryptocurrency in the mainstream economy.

Background

In the past, Zimbabwean authorities, in particular the Reserve Bank of Zimbabwe has exhibited elements of outright disdain of cryptocurrency. In 2017, the Reserve Bank of Zimbabwe Governor issued a statement warning citizens against the use and trade in Bitcoin.⁹⁷ In that Statement, the Governor adopted the definition of “virtual currency” given by the Financial Action Task Force, which is;

A digital representation of value, that can be traded and functions as; (1) medium of exchange; (2) unit of account and/or; (3) a store of value, but does not have legal tender status.⁹⁸

In the Statement, the Governor emphasizes that virtual currencies are not legal tender, and differentiates them from a fiat currency and a e-money. A fiat currency is described in the Statement as coin and paper money that is designated as the legal tender of a particular country while e-money is used to electronically represent and transfer value dominated in fiat currency.⁹⁹ What is more peculiar about the Statement and what might be seen as the then position of the Reserve Bank is that while it rightfully points out that cryptocurrency is unregulated in the country, it goes further to caution against its trade by

⁹⁷ Press Statement on The Use of Virtual Currencies in Zimbabwe, 2017 available at <https://www.rbz.co.zw/documents/publications/press/press-statement---use-of-virtual-currencies-in-zimbabwe.pdf>.

⁹⁸ *Ibid.*

⁹⁹ *Ibid.*

insinuating that it is attractive to criminals and money-launderers.¹⁰⁰ This classification of trade in cryptocurrency as an enterprise of choice by tax evaders, terrorists and fraudsters exposes the stereotypical approach adopted by the Zimbabwean authorities. This stands to be in stark contrast with the fact that the Statement acknowledges that the use of virtual currencies is increasingly globally as well as in Zimbabwe.¹⁰¹ Therefore, as things stand in Zimbabwe, there is no specific legal instrument which regulates cryptocurrency in Zimbabwe. The question that follows is whether the lack of such regulation makes it illegal to trade in cryptocurrency in Zimbabwe or it simply represents a non-interventionist approach.¹⁰² It is submitted that legal recognition of cryptocurrency in Zimbabwe does not necessarily mean that it would be unlawful to trade in cryptocurrency. What it simply means is that there is no legal framework for its regulation hence its trade is outside the scope of the law.¹⁰³ It is therefore not a surprise that despite the existence of a regulating legal framework, there is trade in cryptocurrency currently occurring in Zimbabwe.¹⁰⁴

The legal effect of non-regulation of cryptocurrency in Zimbabwe

It should be emphasized that there is a legal difference between non-recognition of cryptocurrency and its banning.¹⁰⁵ From what has been learnt above, Zimbabwe has neither banned the use of cryptocurrencies nor does it recognize them as legal tender nor an asset. The Minister of Finance and the Governor of the Reserve Bank of Zimbabwe have different attitudes towards the adoption of cryptocurrencies but there has been no established policy position on the issue. The former has however appeared tolerant to the

¹⁰⁰ *Ibid.*

¹⁰¹ *Ibid.*

¹⁰² Mazikana et al “An appraisal of Corporate Social Responsibility (CSR) practices in Small and Medium (SMEs) enterprises in Chegutu, Zimbabwe” (2017) 20 *IOSR Journal of Business and Management* 6 51 – 57 (IOSR-JBM) e-ISSN: 2278-487X, pISSN: 2319-7668. www.iosrjournals.org.

¹⁰³ Reserve Bank of Zimbabwe Bans Cryptocurrency Trading. Banks Given 60 days To Comply (Full Statement), Techzim, Published: 12 May 2018, Retrieved: 22 May 2018.

¹⁰⁴ Mangudya, J (2017). Reserve Bank of Zimbabwe Defends Ban On Cryptocurrencies In Court.

<https://www.techzim.co.zw/2018/06/reserve-bank-of-zimbabwe-defends-ban-oncryptocurrencies-in-court/>.

¹⁰⁵ For example, in Poland, cryptocurrencies are not illegal but at the same they are not legal tender. See fn 72.

idea of the adoption of the cryptocurrencies despite previous utterances by the latter as highlighted above.¹⁰⁶

The legal effect of the non-recognition of cryptocurrencies in Zimbabwe is that it results in their de facto trading as there is no law which expressly prohibits their use. The result is that consumers of cryptocurrency in Zimbabwe have no legal protection in this trade and secondly, the taxman is prejudiced of taxes that should be coming from the trade in cryptocurrencies because of lack of regulation. It can be argued that whilst Zimbabwe's rigid approach to the use of cryptocurrency might be justified on the grounds of its volatility, it is apparent that non-regulation is harmful on two fronts, that is, consumers are nonetheless trading in cryptocurrencies hence remain exposed to its risks which is exacerbated by lack of regulation and; secondly, the country is missing out on a substantial tax base.

In addition, the lack of recognition of cryptocurrencies in Zimbabwe makes it extremely consumers to classify them; whether it is money or a digital asset in the context of the general legal framework. What is certain, however, is that cryptocurrency cannot be classified as money or a digital currency in terms of the existing legislation surrounding this subject. It must be understood that what is regarded as money which has legal tender in terms of the Reserve Bank of Zimbabwe Act are bank notes and coins that are issued by the Reserve Bank of Zimbabwe (RBZ) in terms of sections 40 and 41.¹⁰⁷ Since cryptocurrencies cannot be issued by the RBZ in terms of this provision, they cannot be regarded as legal tender or a currency.

To put this point beyond doubt, cryptocurrencies do not even qualify to be regarded as electronic currency. Statutory Instrument 33 of 2019 specifies the currency that is legally recognized in Zimbabwe.¹⁰⁸ This SI introduces an electronic currency called the RTGS¹⁰⁹ which is defined as “any funds held as bank deposits under the Real Time Gross

¹⁰⁶<https://www.bing.com/search?q=cryptocurrency+regulation+in+zimbabwe+mtuli+ncube&qs=n&form=QBRE&sp=1&pg=cryptocurrency+regulation+in+zimbabwe+mt&sc=8>

¹⁰⁷ Reserve Bank of Zimbabwe Act [Chapter 22:15].

¹⁰⁸ Presidential Powers (Temporary Measures) (Amendment of the Reserve Bank of Zimbabwe Act and Issue of Real Time Gross Settlement (RTGS Dollars)) Regulations, 2019.

¹⁰⁹ Ibid s 4 (1) (a).

Settlement established in terms of the National Payments Systems Act [Chapter 24:23].¹¹⁰ The RTGS electronic currency operates on the same value and in the same environment as the bond notes and coins issued by the RBZ in terms of section 4 (2). This present SI also expressly provides that the RTGS Dollar is legal tender.¹¹¹ What puts to rest the unlikely argument that cryptocurrency may be regarded as a currency with legal tender in terms of the existing legislation is SI 142 of 2019.¹¹² It provides that only the Zimbabwe Dollar, which consist of the three elements above, shall be legal tender in Zimbabwe and categorically ousters the status of any other foreign currencies¹¹³ as legal tender in Zimbabwe.¹¹⁴ Having established that cryptocurrencies cannot be recognized as legal tender given the existing legal framework, the next question is can they be regarded as digital assets given that they are already being traded in Zimbabwe? For a clearer answer to this question, it is convenient to consider the 2018 case of *Bitfinance (pvt) Ltd t/a Golix v Reserve Bank of Zimbabwe & Another* (hereinafter referred to as the Golix case).¹¹⁵

The Golix case

This case was an urgent chamber application brought by the Applicant in the High Court challenging a circular of the Reserve Bank which sought to ban the trade in cryptocurrencies.¹¹⁶ The challenge was brought in terms of section 68 of the Constitution which grants every person the right to administrative conduct.¹¹⁷ The impugned circular, in part, read:

5. In order to safeguard the integrity, safety and soundness of the country's financial system, and to protect the public in general, all financial institutions are hereby required to:

¹¹⁰ Ibid s 2.

¹¹¹ Ibid s 4 (1) (c).

¹¹² Reserve Bank of Zimbabwe (Legal Tender) Regulations, 2019.

¹¹³ (Read in digital currencies)

¹¹⁴ Ibid s 2.

¹¹⁵ HH 4696/2018

¹¹⁶ Circular to Banking Institutions No.2 of 2018.

¹¹⁷ Constitution of Zimbabwe, 2013.

- a. ensure that they do not use, trade, hold and/or transact in any way in virtual currencies;
 - b. ensure that they do not provide banking services to facilitate any person or entity in dealing with or settling virtual currencies; and
 - c. exit any existing relationships with virtual currency exchanges within sixty days of the date of this Circular and proceed to liquidate and reconstitute existing account balances.
6. For the avoidance of doubt, banking services include maintaining accounts, registering, trading, clearing, collateral arrangements, remittances, payment and settlement accounts, giving loans against virtual tokens, accepting them as collateral, opening accounts of exchanges dealing with them and transfer / receipt of money in accounts relating to purchase/ sale of virtual currencies.

The applicants argued that the RBZ had no authority or jurisdiction to issue a ban on the trade of cryptocurrency which was being facilitated by the Applicant. The argument that was put forwards by the Applicants was that it carried on an emerging business in blockchain technology and therefore could not be regulated by the RBZ for it was not a banking institution nor did it deal in currency¹¹⁸ The Applicant further argued that there was no regulation of cryptocurrencies in Zimbabwe, unlike in other countries.¹¹⁹ In as much as the Applicant was concerned, cryptocurrency was not legal tender, and at best, it is a digital asset which was traded on a platform which it operated.¹²⁰ It was a digital asset traded using legal tender and hence fell within the ambit of any other asset that can be bought and sold.

In response, the RBZ argued that the business of the Applicant could be classified as a financial service provider which fell under the regulation of the RBZ Act.¹²¹ It must however be pointed out that this averment was misplaced and exposed a clear misunderstanding of cryptocurrencies in a jurisdiction where they are not especially regulated. The court agreed with the Applicants and overturned the ban on the use of cryptocurrencies. What must be understood at this point is that non-regulation of

¹¹⁸ Ibid para 33 of the Applicant's Founding Affidavit.

¹¹⁹ Ibid para 36.

¹²⁰ Ibid para 37.

¹²¹ Ibid para 17 Respondent's Responding Affidavit.

cryptocurrencies allows for the trade of cryptocurrencies albeit as digital assets as opposed to digital currency. This is because, a digital currency, like any other currency must be regulated and issued by a central institution which is not the same with cryptocurrencies. Put differently, cryptocurrency can only be regarded as a digital currency in Zimbabwe where regulation is put in place which regards them as currencies.

Emerging Trends

It is clear that in the past, Zimbabwean authorities have been hostile to the issue regulating cryptocurrencies, let alone allowing their trade within the country. However, of late, there appear to be a change of attitude especially in the face of widespread adoption and regulation of cryptocurrencies around the world. Speculation is now rife that Zimbabwe is on the verge of putting regulation in place for the adoption of cryptocurrencies.¹²² In early 2022, the Ministry of Communication published a General Notice¹²³ which gave notice that a Public Private Partnership Agreement between The Republic of Zimbabwe and Daedalus World Limited wherein the latter would assist the former in collecting revenue through taxing companies that provide cryptocurrency services, among others. This agreement is a clear resolve by the country to adopt and recognize cryptocurrency business especially for the purposes of tax.

The Chronicle reported that the has now resolved to regulate and adopt cryptocurrencies and a draft framework on how they will operate is underway.¹²⁴ It has been suggested that the RBZ has observed increasing use of cryptocurrencies in Zimbabwe and around the world and the benefits that can be yielded cannot be ignored.¹²⁵ The RBZ Deputy Director of financial markets and national payment systems hinted that

We have already started to come up with a fintech framework because in regulation everything should be well structured. The framework, which is a regulatory sandbox, will be assessing the cryptocurrency companies as to how they are going to operate. Once you enter the sandbox, you either exists as a bona fide product to enter the market or you

¹²² <https://bitcoinist.com/zimbabwe-finally-regulates-cryptocurrency/>.

¹²³ General Notice 71A of 2022.

¹²⁴ Mthobisi Tshuma "RBZ warms up to cryptocurrencies" *Chronicle* 16 March 2020. Available at <https://www.chronicle.co.zw/rbz-warms-up-to-cryptocurrencies/>

¹²⁵ Ibid.

are guided to say that you need to partner a bank, or a mobile money platform or your product needs to be licensed like a microfinance company.¹²⁶

This passage gives an overview of how the RBZ seeks to regulate the cryptocurrency business going forward. Suffice to say, this business will be brought under the regulation of the RBZ and will be treated more or less as a microfinance company. Despite this statement and commitment being made in early 2020, there has not been any progress concerning the regulation or legal adoption of cryptocurrencies in Zimbabwe. It is therefore proper if this paper can suggest a model that can be followed in regulating the industry which can be drawn from other jurisdictions which have successfully regulated.

The significance of adopting cryptocurrency in Zimbabwe

While the advantages of cryptocurrency have been canvassed at length in preceding chapters, it is important to consider the relevance of cryptocurrencies in the Zimbabwean economic context. These advantages have been summarized by a Zimbabwean economist Courage Musona in an opinion column in the *Zimbabwe Independent*.¹²⁷

Firstly, he noted that cryptocurrencies have relatively low transacting fees as opposed to credit and debit cards, especially when transacting internationally. This is especially true and relevant in an environment like's Zimbabwe's economy which has an acute cash crisis and most of the transactions are processed using credit and debit cards. It is a no brainer therefore that introducing cryptocurrencies will not only ease the cash liquidity crisis but equally insulate consumers from being forced to process transactions through credit cards which is costly for them.

The second advantage is that the Zimbabwe's Diaspora remittances contributes significantly to the economy of the country.¹²⁸ However, such earnings could have been more if not for the sometimes-exorbitant fees charged by money transfer platforms such as Western Union and Mukuru.com.¹²⁹ Thus the RBZ and the relevant authorities may alleviate this problem and facilitate an inflow of even more volumes of foreign currency

¹²⁶ Ibid.

¹²⁷ "Cryptocurrencies: A fade or the future" *Zimbabwe Independent* 26 November 2021 available at

¹²⁸ See <https://zwnews.com/zimbabwes-diaspora-remittances-reach-us1-4-billion-in-2021/> Diaspora remittances amounted to US1.6 Billion in 2021 contributing 29% of the total export earnings (6% of GDP).

¹²⁹ Ibid fn 121.

form the Diaspora community through adopting cryptocurrencies as a legitimate and recognized business in the country.

In addition to exorbitant fees charged by international money transfer platforms, it is often complained that at times money that has been transferred take long to reflect into the account of the recipient. The inconvenience that results cannot be overstated. The adoption of cryptocurrencies will cure these deficiencies since it is faster to process and receive money through digital currency than through the traditional financial institutions.¹³⁰ In addition, cryptocurrencies are flexible, they support both the banked and the unbanked.¹³¹

The last advantage of adopting cryptocurrencies in Zimbabwe is that it can be a sober solution to inflation and price instability. This point must be understood in the context that Zimbabwe is struggling with hyperinflation and massive price instability owing to the seemingly irresistible temptation of inflating the local currency to “maintain” its value. This has caused unprecedented exchange rate volatilities which has resulted in price instability and inflation. Cryptocurrency adoption may address these ills since it cannot be manipulated as there is controlled quantity limits and the algorithms in the system.¹³²

Conclusion

In summary, this chapter has brought to the fore four issues. Firstly, it has demonstrated that currently, cryptocurrency is not regulated, and there is uncertainty in relation to the attitude of the RBZ in respect to the adoption and regulation of cryptocurrencies in Zimbabwe. On one hand is the Governor of the RBZ banning the trade of cryptocurrencies and discouraging members of the public from trading in them, while on the other hand the Minister of Finance is warming up to the after a visit to Dubai. The second issue canvassed in this chapter is the legal effect of non-regulation which has resulted in the de facto trade in cryptocurrencies as digital currencies, which the RBZ tried to ban but

¹³⁰ Ibid fn 10.

¹³¹ Ibid fn 121.

¹³² Boshkov T “Blockchain and Digital Currency in the World of Finance” in Asma Salman *et al* eds Blockchain and Cryptocurrencies (2019) DOI: 10.5772/intechopen.74182.

was stopped by the High Court. Thirdly, this section considered the emerging trends on cryptocurrency adoption in Zimbabwe where the Reserve Bank hinted to be developing a legal framework for the use and trade of cryptocurrencies. Finally, we looked at the relevance of adopting cryptocurrencies in an economy like Zimbabwe which is rife with liquidity crisis, inflation and price instability.

In the next chapter, this paper will place focus on the way forward; how the law can be developed to give effect to blockchain technology drawing lessons from other jurisdictions.

Chapter 5: Conclusion and Recommendations

Introduction

This chapter summarizes the points raised herein on the concept of cryptocurrency, regulation and its role in the financial sector. In addition, since we have established that cryptocurrency is not regulated in Zimbabwe, it will recommend on ways in which the law can be developed to cater for the adoption and functioning of cryptocurrency. Additionally, it will look at frameworks developed in other jurisdictions discussed herein, to find a suitable one for Zimbabwe. Thereafter, the paper will be concluded.

Summary of the concept of cryptocurrency

Cryptocurrency has been described as a form of a decentralized digital currency which is based on a cryptograph which provides trust and a platform for reliable transactions and is produced by cryptographic algorithms.¹³³ It works alongside a proof-of-work scheme, in order to create and manage the currency.¹³⁴ The Bitcoin became the first form of cryptocurrency to illustrate the concept of cryptocurrencies which had been mooted and introduced in 1998, and to date it remains the most popular and sought after cryptocurrency.

It has also been established that there are two schools of thought with regards to the classification of cryptocurrencies. One is of the view that given the characteristics and the inherent nature of cryptocurrencies, it should not be difficult to classify them as a currency or money so to put it. The other school of thought differs and adopts the position that consumers who deal in cryptocurrency do so because they consider cryptocurrencies alternative investment and not alternative currencies.¹³⁵ It has been suggested not to exhaust this debate as it was suggested that this issue should be settled by each jurisdiction when establishing the legal framework for cryptocurrency.

¹³³ Ibid fn 6.

¹³⁴ Ibid fn 8.

¹³⁵ Ibid fn 13.

In addition, there has been no consensus on whether cryptocurrencies must or must not be regulated. In arguing for and against regulation, scholars have distinguished between cryptocurrencies that are issued by companies to provide subsidies to consumers who wish to participate on their platforms and those which are not tied to any platform.¹³⁶ Accordingly, those that are not tied to any platform were considered appropriate to regulate. This issue again has no consensus and jurisdictions tend to determine for themselves depending with their economic and financial realities. Suffice to say, under chapter 3, this paper perused the approach of a number of countries with regards to the regulation and adoption of cryptocurrencies which included the US, Europe and some the Balkan states.

Lastly, this dissertation established that cryptocurrencies are not recognized under Zimbabwean law currently but that does not translate into the fact that cryptocurrency business is illegal. This was the position of the High Court which overturned a ban on the trade of foreign currency. However, it has been hinted by the RBZ that it is in the process of establishing a framework for the trade in cryptocurrencies which would be regulated more or less like microfinance company. At the very end, the significance of adopting cryptocurrencies in Zimbabwe has been canvassed, in particular in an economy facing a cash crisis, price instability and inflation rate which has gone out of control. Having given this summary on cryptocurrency, the final inquiry is now on how Zimbabwe can develop its law to facilitate the adoption of cryptocurrency. But before we make that final inquiry, it is prudent to consider an example of a jurisdiction with a nuanced legal framework on cryptocurrency which can provide a benchmark for Zimbabwe.

Regulation of cryptocurrencies in Japan

Background

Japan is a natural choice for a benchmark in regulating cryptocurrency because it is the leading country in the regulation of cryptocurrency.¹³⁷ Cryptocurrencies are neither considered money in Japan nor are they comparable to fiat money, however, the country

¹³⁶ Ibid fn 43.

¹³⁷ <https://complyadvantage.com/insights/cryptocurrency-regulations-around-world/>

has approved bitcoin as legal tender.¹³⁸ If a company wishes to offer cryptocurrency exchange services in Japan, it must register as a Cryptoasset Exchange Provider (CAEP), according to the regulations adopted in Japan.¹³⁹ The goals of this rule are to protect cryptocurrency exchange users and stop money laundering and terrorism financing related to cryptocurrency.¹⁴⁰

The Mt. Gox civil rehabilitation proceedings in February 2014, which involved the largest cryptocurrency exchange in the world at the time and offered services for trading cryptocurrency for fiat currencies, may be linked to the need for this regulation in Japan.¹⁴¹ The regulatory environment helped the Japanese cryptocurrency market grow steadily at first, but after January 2018, when one of the biggest cryptocurrency exchanges in the world reported missing cryptocurrencies worth about USD 530 million as a result of a cyberattack on its network things started to go south.¹⁴²

As a result of this attack and the growing usage of cryptocurrency for speculative purposes, the Japan Virtual Currency Exchange Association (JVCEA) was established in April 2018 to improve the regulatory environment of cryptocurrency. JVCEA is a self-regulatory financial institution that develops rules for self-governance, supports its members in adhering to laws, and addresses and communicates user issues.¹⁴³ Financial Services Agency of Japan ("FSA") established a "Study Group on Virtual Currency Exchange Business" to evaluate the effectiveness and sufficiency of the regulatory measures in dealing with cryptocurrency exchange services. In December 2018, the study group released its report proposing a new legal framework for dealing with cryptocurrencies, which prompted the submission of a bill to review some of the laws

¹³⁸ Arora, Gaurav "Cryptoasset Regulatory Framework in Japan" (October 27, 2020). Available at SSRN: <https://ssrn.com/abstract=3720230> or <http://dx.doi.org/10.2139/ssrn.3720230>.

¹³⁹ This regulation was brought about by the amendment of the Payment Services Act, 2009 and the Financial Instruments and Exchange Act, 1948.

¹⁴⁰ Ibid fn 132.

¹⁴¹ Trautman, Lawrence J "Virtual Currencies; Bitcoin & What Now after Liberty Reserve, Silk Road, and Mt. Gox?" (2014) 20 *Richmond Journal of Law and Technology* 4 Available at SSRN: <https://ssrn.com/abstract=2393537> or <http://dx.doi.org/10.2139/ssrn.2393537>.

¹⁴² Takashi Mochizuki and Paul Vigna "Cryptocurrency Worth \$530 Million Missing from Japanese Exchange" *The Wall Street Journal*, available at: <https://www.wsj.com/articles/cryptocurrency-worth-530-million-missing-from-japaneseexchange-1516988190>.

¹⁴³ Ibid fn 132.

governing cryptocurrencies.¹⁴⁴ The Payment Services Act of 2009 ("PSA") and the Financial Instruments and Exchange Act of 1948 ("FIEA") were the two laws that the measure primarily sought to modify. The changes become effective in May 2020.

The PSA has been updated to:

- a. change the term "virtual currency" to "cryptoasset";
- b. strengthen cryptocurrency asset custody service regulation;
- c. Tighten restrictions for CAESPs, including requirements that they store user funds with third parties, preferably in "cold wallets," and that if user funds are stored in "hot wallets," the exchange must have assets of comparable value.¹⁴⁵

Basic legal terminology when referring to digital assets has been changed from "virtual currency" to "cryptoasset" to be consistent with terminology used in international meetings like the G20 and to avoid confusion and make it easier for users to distinguish between crypto-assets and fiat currencies.¹⁴⁶

The FIEA was amended to give effect to

- a. the establishment of electronically recorded transferrable rights and the rules that apply to cryptocurrencies;
- b. the establishment of legislation controlling derivative transactions using cryptocurrencies;
- c. Implementation of laws to prevent unfair practices in cryptocurrency or cryptocurrency derivative transactions.¹⁴⁷

Regulation of Exchanges of Cryptocurrencies

The term "cryptoasset" is defined in the PSA as

1. proprietary value that may be used to pay an unspecified person the price of any goods purchased or borrowed or any services provided and which may be:

¹⁴⁴ FSA, Report from Study Group on Virtual Currency Exchange Services, December 21, 2018, available at: <https://www.iosco.org/library/ico-statements/Japan%20-%20FSA%20-%2020181221%20->

¹⁴⁵ PSA, available at: <http://www.japaneselawtranslation.go.jp/law/detail/?id=3078&vm=02&re=02&new=1>.

¹⁴⁶ Ibid fn 132.

¹⁴⁷ FIEA, available at: <http://www.japaneselawtranslation.go.jp/law/detail/?id=2355&vm=02&re=02>.

1. sold to or purchased from an unspecified person (provided that recorded on electronic devices or other objects by electronic means excluding currency denominated assets (such as Japanese Yen or US Dollar); and
 2. that may be transferred using an electronic data processing system; or
2. proprietary value that may be exchanged reciprocally for proprietary value specified in the (i) with an unspecified person and that may be transferred using an electronic data processing system.¹⁴⁸

From the foregoing, it is clear that cryptocurrency is considered as legal tender in Japan that can be used to purchase goods and services, although it is not categorized as money. In addition to that, PSA recognizes cryptoassets as being tradable and transferrable using an electronic data system. This definition gives a clear guideline on what constitutes and should therefore be regarded as cryptocurrency for the purposes of regulation in Japan. As a take home point, a statutory definition of cryptocurrency is fundamental.

The key regulators of the cryptoasset exchange services were intended to be the PSA and the Act on Prevention of Transfer of Criminal Proceeds ("APTCP"). Exchange services are defined as participation in any of the following as a business;¹⁴⁹

- i. sale and purchase of cryptoasset or exchange of cryptoasset for other cryptoasset;
- ii. intermediary, brokerage, or delegation for the acts listed in (i) above; or
- iii. management of users' money in connection with the acts listed in (i) or (ii) above;
- iv. management of users' cryptoassets for the benefits of another person (custodian services).

With the PSA changes, the activities under (iv) point were added because, in order to resolve the risks shared by cryptocurrency custody providers and exchange providers, management of cryptocurrency for the benefit of others will constitute an exchange service.¹⁵⁰ According to the PSA, all exchange service providers must be registered with both the local financial bureau and the FSA¹⁵¹. The organization carrying out such activities is subject to criminal prosecution if the exchange provider is not registered. Such registration can only be requested by a stock company or a foreign CAESP having a

¹⁴⁸ Article 2 of PSA.

¹⁴⁹ Ibid.

¹⁵⁰ Ibid fn 132.

¹⁵¹ Ibid Article 63-2.

business office in Japan.¹⁵² Some of the main requirements for application as an exchange service provider are:

1. a sufficient financial basis with a minimum capital amount of JPY10 million and net assets with a positive value;
2. a satisfactory organizational structure and systems to provide the exchange services appropriately and properly; and
3. certain systems to ensure compliance with the applicable laws and regulations.¹⁵³¹⁵⁴

To verify that candidates have set processes in place to conduct exchange services, the FSA asks applicants to complete a 400-question checklist. Additionally, FSA also creates a thorough progress chart as a result above. The registration procedure represents a form of FSA due diligence. In essence, it is similar to granting a license. The CAESP registry is made available to the public once registration is complete.

¹⁵² Ibid Article 63-5.

¹⁵³ Ibid.

¹⁵⁴ The applicant is further required to submit an application containing:

- a. its trading name and address;
- b. capital amount;
- c. director's name and address;
- d. the name of the cryptoassets to be handled;
- e. contents and means of CAES;
- f. name of outsourcee (if any) and its address; and
- g. method of segregation management and other particulars.

The registration application must be accompanied by documents including:

- a. a document pledging that there are no circumstances constituting grounds for refusal of registration;
- b. extract of the certificate of residence of its directors, etc.;
- c. a resume of the directors, etc.;
- d. a list of shareholders;
- e. financial documents;
- f. documents containing particulars regarding the establishment of a system for ensuring the proper, secure provision/performance of CAES;
- g. an organizational chart;
- h. internal rules; and
- i. a form of the contract to be entered into with users.

The exchange providers must take the appropriate steps for managing information security¹⁵⁵, entrusted party management¹⁵⁶, consumer protection¹⁵⁷, and management of users' property¹⁵⁸. Additionally, all CAESPs are required to set up an internal management system that will provide fair and appropriate answers to customer complaints and enforce policies that will allow any disputes to be resolved through financial alternative dispute resolution procedures.¹⁵⁹

CAESPs are expected to keep records of their services, including books and documents¹⁶⁰, as well as a variety of written reports that are accompanied by financial records and an audit report on those records¹⁶¹ by a certified public accountant or auditing company. Additionally, the FSA has the power to direct CAESPs to improve their operations in order to comply with supervision.¹⁶²

The Financial Instruments and Exchange Act, 1948, governs transactions involving various financial instruments and the issue of securities in Japan. The term "cryptoasset" has recently been added to the definition of "financial instruments" with the FIEA modifications, and other characteristics of cryptoassets, such as their prices and interest rates, have been integrated under the purview of "financial indicators."

In general, securities covered by the FIEA are categorized as securities under paragraphs 1 and 2. Among many other financial instruments, paragraph 1 securities include shares of capital stock firms, bonds, investment trust units, shares of investment corporations, warrants, and commercial paper.¹⁶³ They are also known as liquid securities and are subject to more onerous regulations than securities listed in paragraph 2. Securities covered by paragraph 2 include limited partnership interests, limited liability partnership interests, and limited liability company interests (excluding units of investment trusts).¹⁶⁴

¹⁵⁵ Ibid Article 63-8.

¹⁵⁶ Ibid Article 63-9.

¹⁵⁷ Ibid Article 63-10.

¹⁵⁸ Ibid Article 63-11.

¹⁵⁹ Ibid Article 63-12.

¹⁶⁰ Ibid Article 63-13.

¹⁶¹ Ibid Article 63-14.

¹⁶² Ibid Article 63-16.

¹⁶³ Article 2, Paragraph 1 of FIEA.

¹⁶⁴ Ibid Article 2, Paragraph 2.

Compared to securities listed under paragraph 1, they have less liquidity and are subject to laxer regulations.

The FIEA revisions introduced a new regulatory framework for securities transferred using electronic data processing units called electronically recorded transferrable rights ("ERTRs"). This is because the securities transferred through electronic data processing units are even more liquid than the securities described in Paragraph 1. The ERTR approach makes the range of tokens covered by the FIEA clearer.¹⁶⁵ The rights outlined in Article 2 of the FIEA, paragraph 2, known as ERTRs, are represented by the proprietary value transferred by using a system for processing electronic data stored on electronic devices, or by excluding the rights outlined in the applicable Cabinet Office Ordinance, electronic methods. The FIEA changes affect securities that can be transferred electronically. Three categories of processing systems are distinguished:

1. Securities covered by paragraph 1 that are transferable using electronic data processing systems, such as shares and bonds;
2. ERTRs: Securities described in paragraph 2 that can be transferred through the use of electronic data processing systems, such as contractual rights, trust beneficiary interests, and interests in collective investment schemes;
3. Non-ERTR Tokenized Securities under paragraph two include trust beneficiary interests and interests in collective investment schemes, as well as contractual rights that are transferable via electronic data processing systems. However, non-ERTR tokenized paragraph 2 securities are distinct from ERTRs in that there are some limitations on how they can be negotiated.

The main goal of the FIEA changes was to subject ERTRs to the same strict regulations that apply to securities listed under Paragraph 1. An electronic book record of the transfer of the proprietary value and the transfer of the right must occur virtually simultaneously for a right to qualify as an ERTR. Additionally, the party or intermediary should be aware of the seller's actual possession status at the time of transfer.

¹⁶⁵ Ibid fn 132.

After the FIEA modifications, (a) Tokenized Paragraph 1 Securities and (b) ETRs are considered as Paragraph 1 Securities, whereas (c) Non-ERTR Tokenized Paragraph 2 Securities are handled as Paragraph 2 Securities for the purposes of determining the treatment of rights under such Securities. As a result, their treatment in terms of disclosure and licensing (registration) requirements differs significantly.

According to the study group's December 21, 2018, report, which was created by the FSA, cryptoasset derivative trading constituted almost 80% of all cryptocurrency trades in Japan in 2017.¹⁶⁶ "Cryptoassets" were added to the definition of financial instruments as part of the FIEA modifications in order to bring derivative transactions under the FIEA's jurisdiction and subject them to specific laws. Since cryptocurrency assets will be considered financial instruments, cryptocurrency asset derivative transactions will be considered OTC derivative transactions.¹⁶⁷

Since crypto asset transactions were not subject to any prohibitions or penalties with regard to unfair acts under the existing provisions of the FIEA or PSA, the FIEA revisions introduced prohibitions against certain unfair acts with respect to cryptoasset spot transactions and cryptoasset derivative transactions (without limitations as to the violating party). The FIEA changes included prohibitions on:

- Wrongful acts;
- Fraudulence;
- Assault or intimidation;
- Dissemination of rumours;
- Market manipulation.

The restrictions are meant to improve user protection and stop illegal gains. However, the FIEA Revisions do not restrict insider trading because of difficulties identifying undisclosed material facts.

¹⁶⁶ FSA, Report from Study Group on Virtual Currency Exchange Services, December 21, 2018, available at: <https://www.iosco.org/library/ico-statements/Japan%20-%20FSA%20-%2020181221%20-%20Report%20of%20the%20Study%20Group%20on%20Virtual%20Currencies.pdf>

¹⁶⁷ Article 2, Paragraph 22, available at: <http://www.japaneselawtranslation.go.jp/law/detail/?id=2355&vm=02&re=02>

APTCP mandates specific business operators, such as CAESPs registered with PSA and a Type 1 or Type 2 financial business operator under the FIEA, to implement KYC and other preventive procedures in order to stop money laundering, terrorist funding, and other malicious uses of cryptocurrencies. The regulated organizations are obliged to take the following procedures: (i) KYC, which records and verifies the identification of customers; (ii) recording and verifying transactions; (iii) reporting suspicious transactions to the FSA; (iv) PEP monitoring; and (v) other suitable actions.

The way that cryptoassets are treated in Japan with regard to consumption tax has been a crucial problem. Before, if the transferor's office was in Japan, the sale of cryptoassets was subject to consumption tax. With changes to Japanese tax rules, the same was repealed in 2017¹⁶⁸. The National Tax Agency of Japan abolished the practice of including cryptocurrencies in the scope of consumption taxation and declared that gains realized from their sale or use will be treated as miscellaneous income. This means that taxpayers will not be able to use losses from other sources to offset gains from the sale or use of cryptocurrencies.

Recommendations for Zimbabwe

There is no doubt that policy makers in the Zimbabwe's financial sector have a lot to learn from Japanese regulation of cryptocurrencies, Japan being the leading country on the regulation and adoption of cryptocurrencies. The recommendations suggested herein have unsurprisingly borrowed a lot from the Japanese experience. This dissertation will now turn to consider these recommendations.

Firstly, the non-regulation or non-recognition of cryptocurrency by financial regulators in Zimbabwe is unsustainable as it does not stop the trade in cryptocurrencies in Zimbabwe as demonstrated above. Following the Japanese model, it is important for Zimbabwe to develop a legal framework, either through changing the existing regulations, or bringing

¹⁶⁸ Kawamura, M. and Ozawa, K., 2017. Japan Exempts Virtual Currencies From Consumption Tax. [online] DLA Piper. Available at: [Accessed 27 October 2020].

in new regulations altogether.¹⁶⁹ Such legal instrument must clearly define cryptocurrency so that it is not difficult to ascertain the kind which is within the scope of regulation and therefore recognized by law. Its elements, and perhaps characteristics must clearly be spelt out for the avoidance of doubt.

The second recommendation is that Zimbabwe must adopt and establish a regulated exchange platform for cryptocurrencies.¹⁷⁰ Such an exchange platform for cryptocurrencies must be under the regulation of an institution, which might take whatever form but must be established by the law.¹⁷¹ The purpose of the regulatory institution must be regulating the sale and purchase of cryptocurrencies on the exchange platform in Zimbabwe including the roles of intermediaries and brokers and providing for the management of user's funds and cryptocurrency credits. A further responsibility of the regulatory institution will be the registration and licensing of exchange service entities and regulating on the procedural requirements for such registration and licensing.

Thirdly, the regulation of the entities offering exchange platforms for cryptocurrency users must be strict and watertight to ensure that information security management, management of entrusted parties, customer protection, and management of users' property prevails.¹⁷² In addition, there should be express prohibition of wrongful and improper acts like fraud, intimidation, market manipulation etc. which will provide enhanced protection to users. To guard against cryptocurrency financing terrorism and money laundering, a fear expressed by the Zimbabwe treasury as alluded to above, it must be made a prerequisite that before anyone is eligible to trade on the exchange platform, service providers must adhere to AML and KYC requirements in the same manner as registered banks do.

Lastly, and a recommendation which is very important to the fiscus, is for Zimbabwe to then develop a legal framework for taxation in the context of cryptocurrencies. It must be clear whether tax follows the transferor, the transferee of both. Due to the enormous

¹⁶⁹ For example, Japan had to amend the PSA and the FIEA to incorporate provisions which gave effect to the trade of cryptocurrencies.

¹⁷⁰ Ibid Article to PSA.

¹⁷¹ See the Zimbabwe Stock Exchange Act [24:18].

¹⁷² See Japan's PSA.

monetary value that cryptocurrencies attract today, it is important for the country to harvest dividends out of the sprawling industry by introducing a comprehensive and liberal tax regime.

Conclusion

Trade in cryptocurrency is not an extensively regulated practice in most jurisdictions around the globe. Most jurisdictions have recognized cryptocurrencies only for limited purposes, mostly taxation. Japan appears to be the only country with a comprehensive legal regime governing cryptocurrency. It is therefore not surprising that the recommendations that have been proposed for Zimbabwe in order to adopt a regulated usage of cryptocurrency follows the Japanese model significantly. The recommendations suggested above foremost recognizes the growing adoption in the use cryptocurrencies and that despite non regulations, the market have adopted the same in Zimbabwe. Therefore, the recommendations present a model for a starting point in a jurisdiction like Zimbabwe which has not adopted virtual currencies on a broad scale. Hence these recommendations remain subject to development, responding to the demands of the market.

Bibliography

Legislation

Bank Secrecy Act

Circular to Banking Institutions No.2 of 2018

Constitution of Zimbabwe, 2013

Common system of value added tax (VAT) – Directive 2006/112/ EC

European Central Bank, Virtual Currency Schemes (October 2012)

European Parliament resolution of 26 May 2016 on virtual currencies (2016/2007(INI))

Financial Crimes Enforcement Network, Application of FinCEN's Regulations to Persons Administering, Exchanging, or Using Virtual Currencies: Guidance (FIN-2013-G001),

Financial Crimes Enforcement Network, Bank Secrecy Act Regulations – Definitions and Other Regulations Relating to Money Services Businesses, 76 F.R. 43585, 43588, 21 July 2011 (Jun. 18, 2018)

General Notice 71A of 2022

Financial Instruments and Exchange Act, 1948

Foreign Exchange Act No. 87

Law on the Prevention of Money Laundering and Terrorism Financing 116(3900),

Payment Services Act, 2009

Presidential Powers (Temporary Measures) (Amendment of the Reserve Bank of Zimbabwe Act and Issue of Real Time Gross Settlement (RTGS Dollars)) Regulations, 2019

Reserve Bank of Zimbabwe Act [Chapter 22:15]

Reserve Bank of Zimbabwe (Legal Tender) Regulations, 2019.

Revenue and Customs Brief 9 (2014): Bitcoin and Other Cryptocurrencies, Policy Paper, GOV.UK, 3 March 2014 (Jun. 18, 2018)

SI 33 of 2019

Virtual Currencies: In Public Consultation the Decree Scheme to Assess the Phenomenon, Bulletin Prints No. 22 of 2 February 2018

Washington State Department of Financial Institutions, Virtual Currency Regulation (Jun. 18, 2018),

Zimbabwe Stock Exchange Act [24:18].

Case Law

Skatteverket v. David Hedqvist C-264/14

Textbooks

Chuen DLK *Handbook of Digital Currency: Bitcoin, Innovation, Financial Instruments, and Big Data* (London: Elsevier, 2015)

Guttman B *The Bitcoin Bible: All You Need to Know About Bitcoins* (Germany: BoD, 2013)

Narayanan *et al* (2016). *Bitcoin and cryptocurrency technologies: a comprehensive introduction* (Princeton: Princeton University Press, 2016)

Swan M *Blockchain* (O'Reilly Media Inc, Sebastopol: 2015)

Journals

Ametrano F "Hayek Money: The Cryptocurrency Price Stability Solution" (2014) *SSRN Electronic Journal*. 10

Anders Laursen & Jon Hasling Kyed, Virtual Currencies, Danmarks Nationalbank, *Monetary Review*, 1st Quarter 85, 87 (2014)

Arora, Gaurav "Cryptoasset Regulatory Framework in Japan" (October 27, 2020). Available at SSRN: <https://ssrn.com/abstract=3720230>

Asmundson and Oner "Bank to Basics: Whats is Money? Without it, modern economies could not function" (2012)49 *Finance & Development* 3 18

Böhme R *et al* Bitcoin: "Economics, Technology, and Governance" (2015) 29 *Journal of Economic Perspectives* 2 215

Boshkov T "Blockchain and Digital Currency in the World of Finance" in Asma Salman *et al* eds *Blockchain and Cryptocurrencies* (2019) DOI: 10.5772/intechopen.74182

Bryans D “Bitcoin and Money Laundering: Mining for an Effective Solution” (2014) 89 1 *Indiana Law Journal* 13 441

Bratspies R “Cryptocurrency and the Myth of the Trustless Transaction” (2018) 25 *Mich. Telecom. & Tech. L. Rev.* 1

Camera G. & Casari M “The Coordination Value of Monetary Exchange: Experimental Evidence” (2014) 6 *American Economic Journal: Microeconomics* 1 290

Camera G *et al* “Money and Trust Among Strangers” (2013) 110 *Proceedings of the National Academy of Sciences* 14889 37

Dwyer P “The Economics of Bitcoin and Similar Private Digital Currencies” (2014) 17 *Journal of Financial Stability* 91

Gandal, N. & Halaburda, H. “Can we predict the winner in a market with network effects? Competition in cryptocurrency market.” (2016) 7 *Games* 3 4

Gans and Halaburda “Some Economics of Private Digital Currency” (2013) Bank of Canada; Staff Working Paper 13

Glaser *et al* “Bitcoin – Asset or Currency? Revealing Users’ Hidden Intentions” 2014 *JO – ECIS Proceedings – 22nd European Conference on Information Systems*

Iwamura, Mitsuru; Kitamura, Yukinobu; Matsumoto, Tsutomu (28 February 2014). "Is Bitcoin the Only Cryptocurrency in the Town? Economics of Cryptocurrency and Friedrich A. Hayek". [SSRN 2405790](https://ssrn.com/abstract=2405790)

Irina Cvetkova “Cryptocurrencies Legal Regulation” (2018) 5 *BRICS Law Journal* 2 144.

Harvey *et al* “Understanding Cryptocurrencies” (2020) 18 *Journal of Financial Econometrics* 2 183

Joubish *et al* “Paradigms and Characteristics of Good Quality Research” (2011) 12 *World Applied Sciences Journal* 11 2084

Karlstrom H “Do libertarians dream of electric coins? The material embeddedness of Bitcoin” (2014) 15 *Distinktion: Journal of Social Theory* 1 25

Laursen A & Kyed JH “Virtual Currencies” (2014) *Danmark National bank Monetary Review*, 1st Quarter 85

Lawrence Trautman “Virtual Currencies Bitcoin & What Now After Liberty Reserve, Silk Road, and Mt. Gox?” (2014) 20 *RICH. J.L. & TECH.* 13

Law, Laurie; Sabett, Susan; Solinas, Jerry "How to Make a Mint: The Cryptography of Anonymous Electronic Cash “ (1997) 46 *American University Law Review*

Li, X. & Wang, C.A “The technology and economic determinant of cryptocurrency exchange rates: The case of Bitcoin.” (2017) 95 *Decision support system* 50

Liu *et al* "Cryptocurrency Shocks" (2020) *SSRN Electronic Journal*

Mazikana *et al* "An appraisal of Corporate Social Responsibility (CSR) practices in Small and Medium (SMEs) enterprises in Chegutu, Zimbabwe" (2017) *IOSR Journal of Business and Management* 6 51 – 57

Milutinovic M "Cryptocurrency" (2018) *64 Ekonomika* 1 105

Moore and Stephen "Should cryptocurrencies be included in the portfolio of international reserves held by central banks?" (2016) *4 Cogent Economics and Finance* 1

Park, *et al* "Nodes in the Bitcoin Network: Comparative Measurement Study and Survey"(2019) *7 IEEE Access* 5700

Pernice *et al* "Cryptocurrency" (2021) *10 Internet Policy Review* 2

Raeesi, Reza "The Silk Road, Bitcoins and the Global Prohibition Regime on the International Trade in Illicit Drugs: Can this Storm Be Weathered?"(2015) *8 Glendon Journal of International Studies / Revue d'Études Internationales de Glendon* 8

Sauer B "Virtual Currencies, the Money Market, and Monetary Policy" (2016) *22 2 International Advances in Economic Research* 1 117

Schaub *et al* "Cryptocurrency value changes in response to national elections. Do they behave like money or commodities?" (2020) *27 Applied Economic Letters* 14 1136

Trautman L "Virtual Currencies; Bitcoin & What Now after Liberty Reserve, Silk Road, and Mt. Gox?" (2014) *20 Richmond Journal of Law and Technology* 4 37

Weber *et al* "Exploiting the Human Factor: Social Engineering Attacks on Cryptocurrency Users" (2020) DO – 10.1007/978-3-030-50506-6_45

Websites

www.africaid.org-accessed on 26 April 2022

www.investopedia.com-accessed on 26 April 2022

<https://money.us.new.com/investment>-accessed on 26 April 2022

<https://complyadvantage.com/insights/cryptocurrency-regulations-around-world/>

www.investopedia.com-accessed on 11 April 2022

<https://bitcoinist.com/zimbabwe-finally-regulates-cryptocurrency/>

<https://www.rbz.co.zw/documents/publications/press/press-statement---use-of-virtual-currencies-in-zimbabwe.pdf>

<http://www.japaneselawtranslation.go.jp/law/detail/?id=2355&vm=02&re=02>.

<https://www.bing.com/search?q=cryptocurrency+regulation+in+zimbabwe+mtuli+ncube&q&form=QBRE&sp=1&pq=cryptocurrency+regulation+in+zimbabwe+mt&sc=8>

<https://zwnews.com/zimbabwes-diaspora-remittances-reach-us1-4-billion-in-2021/>

[UK regulatory approach to cryptoassets and stable coins: Consultation and call for evidence](#) (PDF). HM Treasury. Retrieved 1 October 2021

Assad Raza "The Rise of A Sovereign Digital Currency in China" (2021) available at <https://warroom.armywarcollege.edu/articles/sovereign-digital-currency/> (accessed on 11 July 22).

Clinch M "Bitcoin recognized by German as private money" (2013) retrieved May 2022 from CNBC available at <http://www.cnbc.com/id/100971898>

Bank of Lithuania, Bank of Lithuania Announces Its Position on Virtual Currencies and ICO More, 11 October 2017 (Jun. 18, 2018), available at <https://www.lb.lt/en/news/bank-of-lithuania-announcesits-position-on-virtual-currencies-and-ico>

Communiqués 2014, Commission de Surveillance du Secteur Financier (CSSF) [Sector Press Releases 2014, Financial Sector Surveillance Commission] (Jun. 18, 2018), available at http://www.cssf.lu/fileadmin/files/Publications/Communiqués/Communiqués_2014/Communiqué_virtual_currencies_140214.pdf.

Croatia and Slovenia Cryptocurrency Enthusiasts Plan Self-Regulation, Crypto Economy, 21 February 2018 (Jun. 18, 2018), available at <https://www.crypto-economy.net/en/croatia-and-slovenia-crypto-currency-enthusiasts-plan-self-regulation/>.

Czech Republic Introduces Law Regulating (Restricting) Bitcoin, CCN.com, 31 January 2017 (Jun. 18, 2018), available at <https://www.ccn.com/czech-republic-introduces-law-regulation-bitcoin/>.

Drawbaugh and Temple-West "Bitcoins are property not currency, IRS says regarding taxes" (2014) , retrieved from Reuters available at <https://www.reuters.com/article/2014/03/25/bitcoin-irs-idUSL1NOMM1L820140325>.

European Banking Authority, EBA Opinion on "Virtual Currencies," EBA/Op/2014/08, 4 July 2014 (Jun. 18, 2018), available at <http://www.eba.europa.eu/documents/10180/657547/EBA-Op-2014-08+Opinion+on+Virtual+Currencies.pdf>.

E-krona, the Next National Cryptocurrency of Sweden, Crypto Economy, 2 February 2018 (Jun. 18, 2018), available at <https://www.crypto-economy.net/en/e-krona-the-next-national-cryptocurrencyof-sweden/>.

FIEA, available at:

<http://www.japaneselawtranslation.go.jp/law/detail/?id=2355&vm=02&re=02>.

Financial Crimes Enforcement Network, FinCEN Fines BTC-e Virtual Currency Exchange \$110 Million for Facilitating Ransomware, Dark Net Drug Sales, 26 July 2017 (Jun. 18, 2018), available at https://www.fincen.gov/sites/default/files/2017-07/BTC_e%20July%2026%20Press%20Release%20FINAL1.pdf.

FINMA, FINMA Publishes ICO Guidelines, Press Release, 16 February 2018 (Jun. 18, 2018), available at <https://www.finma.ch/en/news/2018/02/20180216-mm-ico-wegleitung/>.

FSA, Report from Study Group on Virtual Currency Exchange Services, December 21, 2018, available at: <https://www.iosco.org/library/ico-statements/Japan%20-%20FSA%20-%2020181221%20->.

Giulio Prisco, Government of Spain Considers Blockchain-Friendly Regulations, Bitcoin Magazine, 22 February 2018 (Jun. 18, 2018), available at <https://bitcoinmagazine.com/articles/government-spainconsiders-blockchain-friendly-regulations/>.

IrishCoin (Jun. 18, 2018), available at <http://irishcoin.org>.

Opinion of the European Central Bank of 12 October 2016 on a proposal for a directive of the European Parliament and of the Council 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 Directive 2009/101/EC (CON/2016/49) (Jun. 18, 2018), available at https://www.ecb.europa.eu/ecb/legal/pdf/en_con_2016_49_f_sign.pdf

Mangudya, J (2017). Reserve Bank of Zimbabwe Defends Ban On Cryptocurrencies In Court. <https://www.techzim.co.zw/2018/06/reserve-bank-of-zimbabwe-defends-ban-oncryptocurrencies-in-court/>.

Mthobisi Tshuma “RBZ warms up to cryptocurrencies” *Chronicle* 16 March 2020.

Available at

<https://www.chronicle.co.zw/rbz-warms-up-to-cryptocurrencies/>

Nakamoto S “Bitcoin: A Peer-to-Peer Electronic Cash System” (2008) available at <https://metzdowd.com>.

Nermin Hajdarbegovic, Slovenia Clarifies Position on Cryptocurrency Tax, CoinDesk, 24 December 2013 (Jun. 18, 2018), available at <https://www.coindesk.com/slovenia-clarifies-position-cryptocurrency-tax/>.

Paulina Likos and Coryanne Hicks “The History of Bitcoin, the First Cryptocurrency” (2022) available at <https://money.usnews.com/investing/articles/the-history-of-bitcoin>

Peter Teffer, Estonia Tests Water for Own Virtual Currency, EUobserver, 24 August 2017 (Jun. 18, 2018), available at <https://euobserver.com/eu-presidency/138796>.

Portugal’s Regulator is Supervising Banks and Brokerages to Halt Bitcoin “Euphoria,” CCN.com, 14 December 2017 (Jun. 18, 2018), available at <https://www.ccn.com/portugals-regulator-issupervising-banks-and-brokerages-to-halt-bitcoin-euphoria/>.

Press Statement on The Use of Virtual Currencies in Zimbabwe, 2017 available at <https://www.rbz.co.zw/documents/publications/press/press-statement---use-of-virtual-currencies-in-zimbabwe.pdf>

PSA, available at: <http://www.japaneselawtranslation.go.jp/law/detail/?id=3078&vm=02&re=02&new=1>.

Reuters Staff, France to Create Legal Framework for Cryptocurrency Offerings, Reuters, 22 March 2018 (Jun. 18, 2018), available at <https://www.reuters.com/article/us-france-cryptocurrencies/france-tocreate-legal-framework-for-cryptocurrency-offerings-idUSKBN1GY0YE>.

Reserve Bank of Zimbabwe Bans Cryptocurrency Trading. Banks Given 60 days To Comply (Full Statement), Techzim, published: 12 May 2018, Retrieved: 22 May 2018.

Service of State Revenues, On Transactions and Taxes with Cryptocurrencies, 7 May 2017] (Jun. 18, 2018), available at <http://m.lvportals.lv/visi/e-konsultacijas/11918-par-darjumiem-ar-kriptoalutu-un-nodokliem>

Rechtbank Amsterdam, ECLI:NL:RBAMS:2018:869, 14 February 2018 (Jun. 18, 2018), available at <https://uitspraken.rechtspraak.nl/inziendocument?id=ECLI:NL:RBAMS:2018:869>.

Takashi Mochizuki and Paul Vigna “Cryptocurrency Worth \$530 Million Missing from Japanese Exchange” *The Wall Street Journal*, available at:

<https://www.wsj.com/articles/cryptocurrency-worth-530-million-missing-from-japaneseexchange-1516988190>.

Finance Spokesperson Appeals for the Regulation of Finance Technology, PolskieRadio, 14 February 2017] (Jun. 18, 2018), available at <https://www.polskieradio.pl/78/1227/Artykul/1727516,RzecznikFinansowy-apeluje-o-uregulowanie-finansowych-technologii>

The Legal Framework of Virtual Currency Exchange Licensing and Operation in Greece, Law & Technology (Jun. 18, 2018), available at <https://lawandtech.eu/en/2017/11/29/virtual-currency-exchangelicensing-in-greece/>.

Vassil Kostov, The Legal Framework of Cryptocurrencies in Bulgaria, Legal Net, 13 February 2018 (Jun. 18, 2018), available at <https://1legal.net/en/blog-read129-the-legal-framework-of-cryptocurrencies-inbulgaria>.

Other

Department of Finance, Discussion Paper: Virtual Currencies and Blockchain Technology (March 2018) (Jun. 18, 2018)

Satoshi Nakamoto “Bitcoin developer chats about regulation, open source, and the elusive” [Archived](#) 3 October 2014 at the [Wayback Machine](#), PC World, 26 May 2013

Gur Huberman et al., Monopoly Without a Monopolist: An Economic Analysis of the Bitcoin Payment System, Bank of Finland Research Discussion Papers 27 (2017)