

THE REGULATION OF SHADOW BANKING IN SOUTH AFRICA AND PROPOSALS
FOR REFORM BASED ON THE UNITED STATES AND CHINA EXPERIENCE

Research Report in Banking Law submitted to the Faculty of
Commerce, Law and Management, University of Witwatersrand, in
partial fulfilment of the requirements for the degree of Masters in
Commercial and Business Law

LLM

(LAWS7182)

NIPA NARENDRECUMAR

STUDENT NUMBER: 1145303

SUPERVISOR: Ms. VERINE ETSEBETH

FACULTY OF LAW

UNIVERSITY OF WITWATESRAND

JOHANNESBURG, 18 March 2019



School of Law

LLM BY COURSE WORK AND RESEARCH

PLAGIARISM DECLARATION

Surname: NARENDRECUMAR **First Name :**NIPA **Student No:** 1145303

Course Code: LAWS7182 **Course Name:** Research Report

Lecturer: Ms V Etsebeth

RESEARCH REPORT: THE REGULATION OF SHADOW BANKING IN SOUTH AFRICA AND PROPOSALS FOR REFORM BASED ON THE UNITED STATES AND CHINA EXPERIENCE

I certify that this submission does not exceed 12000 words (excluding footnotes, and the bibliography).

Plagiarism is the "failure to acknowledge the ideas or writing of another" or "presentation of the ideas or writing of another as one's own" and should be read to cover intentional and unintentional failure to acknowledge the ideas of others. In this context "others" means any other person including a student, academic, professional, published author or other resource such as the internet. The University of the Witwatersrand, Johannesburg believes that failing to acknowledge the use of ideas of others constitutes an important breach of the values and conventions of the academic enterprise. It has therefore been resolved that all students should be required to sign a declaration that they are aware that they are required to submit their own unaided work and that plagiarism is unacceptable.

I declare the following:

- I am aware that plagiarism (the use of someone else's work without their permission and or without acknowledging the original source) is wrong;

- I am aware that any work that I submit for assessment must be my own unaided work except where I have explicitly indicated otherwise;
- I am aware that I must follow the required conventions in referencing the thoughts and ideas of others;
- I understand that the University of the Witwatersrand may take disciplinary action against me if I do not submit my own unaided work or if I fail to acknowledge the ideas or words of someone else in my writing;

Signature: Nipa Narendrecumar

18 March 2019

ACKNOWLEDGEMENTS

Along the journey of my postgraduate studies, LLM program, I have been encouraged, supported and inspired by many people.

I would like to express my deepest gratitude to my supervisor, Ms. Verine Etsebeth, for the useful comments, remarks, and engagement through the learning process of this research report. My supervisor also offered her time, expertise, and continuous encouragement in guiding me to complete the research report. My deepest appreciation for all your assistance.

I am extremely indebted to my husband, Rakesh, who has been a constant source of support and encouragement during my struggle between study, work and life encounters. I am truly thankful for having you in my life.

Words fail me to express my heartfelt appreciation to my parents for believing in me. Their love and prayers have always been the reason that kept me strong during the hardest moments.

I extend my sincere thanks to my sister, Jashmini, for your understanding, encouragement in my many moments of crisis.

I would like to offer deep sense of gratitude to Dr. Anusharani Sewchurran, for her words of wisdom and guidance. Her humbleness, inquisitiveness, knowledge have provided me an inspiration to pursue my postgraduate studies.

My special thanks go to my dearest friend, Ms. Shirley Nataline, who supported me along the way, you were always there with listening ear and prompt to extend your helping hand.

I cannot list all the names of family members, friends, well-wishers here but, I keep you all in my heart with love and gratitude.

Above all, my heartfelt gratitude to the Almighty God for His abundant blessings upon me and to my Spiritual Guru for bestowing on me Her continuous grace, protection, guidance and enabling me to face the complexities of life and complete the research report.

Nipa Narendrecumar

ABSTRACT

Over the years, shadow banking has experienced a significant increase within the global financial system, with the United States (US) having the largest shadow banking sector. Emerging economies, particularly China have also seen a significant increase in shadow banking activities. Following the global financial crisis of 2007–2008, there have been concerns over the risks that are posed by shadow banking and the need for regulation of the sector. Consequently, the aim of this research report was to assess the regulation of shadow banking in South Africa and to make proposals for reform based on the experiences of the US and China. The findings show that shadow banking, while useful to the economy, poses systemic risks to the financial system. In the US, shadow banking is widespread, and had a significant impact in exacerbating the effects of the global financial crisis. Consequently, major reforms were put in place to reduce these risks through the Dodd-Frank Act and the Consumer Protection Act. The report also shows that the Chinese financial system has undergone major reforms. Due to the inadequacies of the financial system in offering credit, shadow banking has risen significantly in China amid concerns over a poor regulatory environment for averting the inherent risks. As a consequence, authorities in China are taking steps to improve regulation and avert these risks. With respect to South Africa, the environment for shadow banking remains conservative, with minimal risks posed to the financial sector. Furthermore, in spite of its risks, shadow banking activities have helped to facilitate financial inclusion in the economy. Based on these findings, it is important that South Africa adopts a progressive approach to the regulation of shadow banking activities. It is important to ensure that there is a balance between facilitating financial inclusion and ensuring that shadow banking activities do not pose a risk to the financial system, through effective regulation. This calls for smart regulation that ensures that shadow banking activities are effectively regulated to minimise risk without stifling economic growth.

TABLE OF CONTENTS

ABSTRACT.....	v
TABLE OF CONTENTS.....	Error! Bookmark not defined.
LIST OF ABBREVIATIONS/ACRONYMS	vii
1. INTRODUCTION	1
2. A BRIEF ON THE DEVELOPMENT OF SHADOW BANKING	4
3. THE SHADOW BANKING SYSTEM	5
4. ECONOMIC FUNCTIONS OF SHADOW BANKING.....	8
(a) Comparative analysis of credit intermediation in regulated banking system with shadow banking activities.....	9
5. THE SHADOW BANKING SECTOR IN THE UNITED STATES	11
(a) The four main functions of the shadow banking system	13
(b) Shadow banking and the US financial crisis	16
6. THE HISTORY OF THE FINANCIAL SYSTEM IN CHINA SINCE THE 1980s	19
7. SHADOW BANKING IN CHINA.....	24
8. THE ENVIRONMENT FOR SHADOW BANKING IN SOUTH AFRICA	29
9. PROPOSALS FOR SHADOW BANKING REFORM IN SOUTH AFRICA BASED ON THE EXPERIENCE OF THE US AND CHINA	33
10. CONCLUSION.....	37
BIBLIOGRAPHY	39

LIST OF FIGURES

Figure 1: COMPARISON OF TRADITIONAL BANKING AND SHADOW BANKING STRUCTURES	8
Figure 2: OUTLINE OF BANKING SECTOR REFORMS IN CHINA	22

LIST OF ABBREVIATIONS/ACRONYMS

ABC	Agricultural Bank of China
BAGL	Barclays Africa Group Limited
BOC	Bank of China
CBC	Construction Bank of China
DFA	Dodd-Frank Act
EU	European Union
FSB	Financial Stability Board
FSOC	Financial Stability Oversight Council
G20	Group of Twenty
GDP	Gross Domestic Product
GFC	Global Financial Crisis
GSE	Government-Sponsored Enterprise
ICBC	Industrial and Commercial Bank of China
LB	Lehman Brothers
MMF	Money Market Funds
NCA	National Credit Act
NCR	National Credit Regulator
NPLs	Non-Performing Loans
OFIs	Other Financial Intermediaries
PBOC	People's Bank of China
REPO	Repurchase Agreement
RMB	Renminbi (Chinese Legal Tender)
SARB	South African Reserve Bank
SOBs	State Owned Banks
SOEs	State Owned Enterprises
SPV	Special Purpose Vehicle
TBRs	Trust Beneficiary Rights
UK	United Kingdom
US	United States
WTO	World Trade Organization

1. INTRODUCTION

One of the most significant and most interesting results of the globalisation process has been the swift development and subsequent integration of financial markets.¹ This is possibly due to advancements in technology and deregulation, coupled with the development and implementation of more complex financial instruments.² Consequently, two financial market structures have come into being. The first of these is the traditional banking system, while the second is a parallel structure, which includes non-banking financial institutions, commonly referred to as “shadow banking”. By definition, shadow banking is credit intermediation involving activities and entities outside of the regular banking system.³ This includes all entities outside the regulated banking system that perform the core banking function: credit intermediation of accepting deposits from savers and lending it to borrowers.⁴ A key attribute of the shadow banking system is that it functions outside mainstream state supervision and, as such, outside the banking principles that regulate this system.⁵

Over the past decade, shadow banking has experienced a significant increase within the global financial system.⁶ In 2015, total assets for the global shadow banking sector rose to \$92 trillion, from \$89 trillion in 2014, rising to an all-time record of 150% of global gross domestic product (GDP) based on 21 assessed jurisdictions.⁷ Some jurisdictions with the

¹ Mehmet F. Dicle and John Leventdis ‘The impact of technological improvements on developing financial markets: The case of the Johannesburg Stock Exchange’ (2013) 3 *Review of Development Finance* 4 at 204-213; Nicholas Economides ‘The impact of the internet on financial markets’ (2001) 1 *Journal of Financial Transformation* 8 at 8-9; European Central Bank ‘How could new technology transform financial markets?’ available at https://www.ecb.europa.eu/explainers/tell-me-more/html/distributed_ledger_technology.en.html, accessed on 18 August 2017. See more: Steven L. Schwarz, Regulating Shadow Banking, 31 *Review of Banking & Financial Law* 619-642 (2012) at 625.

² Ibid

³ Financial Stability Board ‘Global Shadow Banking Monitoring Report 2015’ available at <http://www.fsb.org/wp-content/uploads/global-shadow-banking-monitoring-report-2015.pdf>, accessed on 12 January 2017; See also Financial Stability Board ‘Shadow Banking: Strengthening Oversight and Regulation Recommendations of the Financial Stability Board’ (2011) at 1; and Financial Stability Board ‘Strengthening Oversight and Regulation of Shadow Banking An Overview of Policy Recommendations’ (2013) at iv

⁴ Laura E Kodres ‘What Is Shadow Banking?’ (2013) 50 *Finance & Development* 2, available at <http://www.imf.org/external/pubs/ft/fandd/2013/06/basics.htm>, accessed on 24 January 2017

⁵ N Valckx et al ‘Shadow Banking around the Globe: How large, and how risky’ in IMF *Global Financial Stability Report—Risk Taking, Liquidity, and Shadow Banking: Curbing Excess while Promoting Growth* (2014) at 68; Małgorzata Solarz ‘The Importance of Shadow Banking Sector entities for population affected by credit exclusion’ (2013) 2 *Copernican Journal of Finance & Accounting* 2 at 190; Gillian Jones ‘Shadow banking ‘not a risk to stability’ *Business Day* 25 April 2014, available at <https://www.businesslive.co.za/bd/companies/financial-services/2014-04-25-shadow-banking-not-a-risk-to-stability/>, accessed on 26 May 2017.

⁶ Solarz op cit note 5 at 190; Jealous Chishamba ‘The Rising Dominance of Shadow Banking’ *The Zimbabwe Independent* 24 October 2014, available at <https://www.theindependent.co.zw/2014/10/24/rising-dominance-shadow-banking/>, accessed on 26 May 2017; Valckx et al op cit note 5 at 65.

⁷ Financial Stability Board ‘Global Shadow Banking Monitoring Report 2016’ available at <http://www.fsb.org/wp-content/uploads/global-shadow-banking-monitoring-report-2016.pdf>, accessed on 27 May 2017 at 1; Sophia Furber ‘Shadow Banking hits 150% of GDP’ *S&P Global Market Intelligence* 10 May

largest shadow banking systems are the United States (US), the Euro Zone⁸, and the United Kingdom (UK). Of these, the US shadow banking assets exceed those of traditional banking.⁹ However, emerging financial markets have also experienced fast growth in shadow banking activities in past years.¹⁰ In 2014, China's shadow banking grew at twice the rate of bank credit, and eventually reached 35% of the country's GDP.¹¹ South Africa has not been left behind in the growth of shadow banking activities. In 2014, shadow banking in South Africa accounted for 24% of the total assets in the financial system, including hedge funds, money market funds, trust companies, and finance companies.¹²

If managed well, shadow banking is seen as a powerful tool for economic growth.¹³ However, careless monitoring or management may be detrimental to the entire global financial system. The global concern is that increased banking regulations have a tendency to encourage the channeling of investments into less regulated areas, such as shadow banking, with the aim of avoiding restrictions.¹⁴ Whilst many jurisdictions, such as the US, the UK, and the European Union (EU) seem to have some level of control over shadow banking activities, specifically after the 2007–2008 global financial crisis (GFC), the major fear is that the growth of China's shadow banking system, whereby banks lend money at high interest

2017, available at <http://marketintelligence.spglobal.com/our-thinking/news/shadow-banking-assets-hit-record-150-of-gdp-financial-stability-board-says>, accessed on 27 May 2017;

⁸ The monetary union of 19 of the 28 European Union (EU) member states which have adopted the euro (€) as their common currency and sole legal tender. These countries are Austria, Belgium, Cyprus, Estonia, Finland, France, Germany, Greece, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, the Netherlands, Portugal, Slovakia, Slovenia and Spain

⁹ Valckx et al op cit note 5 at 65; Chishamba op cit note 6; Szu Ping Chan 'The \$75 trillion shadow hanging over the world' *The Telegraph* 30 October 2014, available at <http://www.telegraph.co.uk/finance/newsbysector/banksandfinance/11198457/The-75-trillion-shadow-hanging-over-the-world.html>, accessed on 27 May 2017; Zoltan Poszar, Tobias Adrian, Adam Ashcraft and Hayley Boesky 'Shadow Banking' (December 2013) *FRNBY Economic Policy Review* 7.

¹⁰ Valckx et al op cit note 5 at 65; See also Swati Ghosh, Ines Gonzalez del Mazo, and İnci Ötöker-Robe 'Chasing the Shadows: How Significant is Shadow Banking in Emerging Markets?' (2012). 88 World Bank Economic Premise, available at <https://openknowledge.worldbank.org/handle/10986/17088>, accessed on 15 October 2017 at 3

¹¹ Douglas Elliott, Arthur Kroeber and Yu Qiao Shadow banking in China: A primer (2015) 9 *The Brookings Institution*; Chishamba op cit note 6; Chan op cit note 9.

¹² South African Reserve Bank *Financial Stability Review* 1 ed (2016) 9; Jones op cit note 5; Chan op cit note 9.

¹³ Alan Moreira 'Is shadow banking good for the economy?' *World Economic Forum* 18 September 2014, available at <https://www.weforum.org/agenda/2014/09/shadow-banking-economy-regulation/>, accessed on 18 August 2017. "At the epicentre of the global financial crisis, shadow banking has become the focus of intense regulatory scrutiny. All reform proposals implicitly take a stance on its economic value"; Chi-Chur Chao, Mong Shan Ee and Jing Zhang 'Shadow Banking and Economic Development in Developing Countries: Evidence from China' *European Financial Management Association* at 1-3; Gaston Gelos and Nico Valckx 'The Growth of Shadow Banking' *IMFBlog* 3 October 2014, available at <https://blogs.imf.org/2014/10/03/the-growth-of-shadow-banking/>, accessed on 18 August 2017.

¹⁴ Chishamba op cit note 6; Douglas D. Elliott 'Reforming Shadow Banking in China' 2015 *Brookings* 2; The Economist Group Limited 'The Lure of Shadow Banking' *The Economist* 8 May 2014, available at <https://www.economist.com/news/leaders/21601826-shadow-banks-helped-cause-financial-crisis-better-regulated-they-could-help-avert-next>, accessed on 17 August 2017.

rates outside the regulated financial system, may have the potential to destabilise the Chinese financial system, and ultimately the global financial system.¹⁵ Based on these dynamics taking place in the shadow banking sector in different countries, it is imperative that South Africa learns from these situations and reforms its shadow banking sector, in order to facilitate growth and prevent negative effects.

The objective of this research, therefore, is to provide an analysis of the regulations governing shadow banking in South Africa and to propose reforms based on the experiences of the US and China. A question one would ask is why one would choose the US and China as comparators? To start with, the US and China are both large economies on the global stage.¹⁶ In addition, the US still has the largest shadow banking sector in the world, despite a slight decline,¹⁷ and this sector appears to contribute most to domestic systemic risk.¹⁸ However, in the context of emerging economies, the growth of shadow banking in China stands out.¹⁹ In this regard, this research report provides an exposition of how credit intermediation activities are conducted in the field of shadow banking. It is necessary to explore the importance of shadow banking and its effects in the wake of the global economic meltdown. To that end, this report seeks to review the operations of shadow banking in the US and in China, as well as the role it played during the global financial meltdown.

This research report further analyses and discusses the role of shadow banking from the South African perspective. It shows that financial intermediaries have dominated the markets in this segment of the population. It also demonstrates that despite the systemic risk of shadow banking, its activities tend to have a positive impact. Furthermore, there is evidence to show that poor regulation of shadow banking and credit markets led to risky lending practices that contributed to the destabilisation of the financial markets and plunged them into the global economic recession.

This research report will describe the US experience of shadow banking, and how the same system is dynamically implemented in the Chinese economy. These findings will provide an overview of the essential characteristics of shadow banking, as well as consumers'

¹⁵ Lynley Donnelly 'Bring shadow banks into the light' *Mail & Guardian* 10 July 2015, available at <https://mg.co.za/article/2015-07-10-bring-shadow-banks-into-the-light>, accessed on 27 May 2017; Jones op cit note 5; Sui-Lee Wee & Owen Guo 'Chinese Investment Scandal Highlights 'Shadow Banking' Risks' *New York Times* 19 April 2017, available at https://www.nytimes.com/2017/04/19/business/china-minsheng-shadow-banking.html?_r=0, accessed on 27 May 2017.

¹⁶ Alex Gray 'The world's 10 biggest economies in 2017' *World Economic Forum* 09 March 2017, available at <https://www.weforum.org/agenda/2017/03/worlds-biggest-economies-in-2017/>, accessed on 15 October 2017

¹⁷ Kodres op cit note 4

¹⁸ Valckx et al op cit note 5 at 65

¹⁹ Valckx et al op cit note 5 at 67

preference for this system in lieu of the traditional banking system. The significant pitfalls of this informal banking system are also discussed, in particular how it may put an economy at risk if it is not well executed and anchored with efficient regulations.

Based on the findings, this research discusses and provides proposals for reform such as tools to protect the financial stability and resilience of the economy.

2. A BRIEF ON THE DEVELOPMENT OF SHADOW BANKING

Many experts²⁰ in the field of shadow banking are of the view that regulation of shadow banking is necessary to expand financial markets. Intuitively, this view focuses on the merits of shadow banking and ignores the negative effects that shadow banking can bring to financial markets if it is not properly regulated. Schwarcz²¹ is of the view that the key driver for the development of shadow banking was the rapid development in technology and the demand for short-term loans during the financial crisis of 2007–2008. Pozsar and Singh²², Schwarcz²³, Mohd-Farid²⁴ and Dudley²⁵ comprehensively present the key elements in the growth of shadow banking, and analyse the system of transforming loans into marketable securities. However, their explanation of the origins of shadow banking is limited.

Pozsar's²⁶ view is that imposing regulations on shadow banking is a key factor for the economic growth of non-banking activities in developed markets. According to Pozsar, shadow banking activities should be regulated in order to facilitate economic growth.

Pozsar and Singh²⁷ state that the investor demand for short-term loans was the main driving force for the expansion of shadow banking. However, they maintain that the reasons

²⁰ Zoltan Pozsar and Manmohan Singh 'The nonbank-bank nexus and the shadow banking system' (2011) *IMF Working Paper* 289; Schwarcz op cit note 1 at 626; Muhamad A. Mohd-Farid 'Monitoring shadow banking and its challenges: the Malaysian experience' (2012). Available at <http://www.bis.org/ifc/events/6ifcconf/mohdfarid.pdf>, accessed on 12 February 2017; Dudley W. C 'Proceedings from the Center for Economic Policy Studies (CEPS) Symposium 2009: More lessons from the crisis' (2009) available at <https://www.bis.org/review/r091117a.pdf>, accessed on 18 August 2017.

²¹ Schwarcz op cit note 1 at 626

²² Pozsar & Singh op cit note 20

²³ Schwarcz op cit note 1 at 626

²⁴ Mohd-Farid op cit note 20

²⁵ Dudley op cit note 20

²⁶ T Adrian & A B. Ashcraft 'Shadow Banking: A Review of the Literature' in Garrett Jones (ed) *Banking Crises: Perspectives from The New Palgrave Dictionary* (2016) at 22; Alan Moreira and Alexi Savov 'Shadow banking and the economy' *Vox* 16 September 2014 available at <http://voxeu.org/article/shadow-banking-and-economy>, accessed on 18 August 2017; Bankenverband 'Regulation of shadow banking' *Association of German Banks* at 11

²⁷ Pozsar & Singh op cit note 20 at 3-4; Moreira & Savov op cit note 26; Robert Unger 'Traditional banks, shadow banks and the US credit boom – credit origination versus financing' *Deutsche Bundesbank Discussion Paper* (2016) at 6

for that significant development remain uncertain. Schwarcz,²⁸ however, argues that the expansion of shadow banking was due to the fast development of technology, which also facilitated the creation of innovative non-banking financial products at a lower cost compared to those of traditional banks. Another reason for the expansion of shadow banking could be due to the financial integration of economies, resulting in the financialisation of transactions and subsequent increase in demand for financial products.

Mohd-Farid²⁹ points out that in the wake of the GFC of 2007–2008, shadow banking and its related activities have required greater attention due to their ability to transmit risks to the financial sector through their significance as a source of credit and liquidity in the economy, and their interconnectedness with the conventional banking system. Intuitively, this means that in the South African context, reforms should focus on smart regulation of the sector to prevent the transmission of risks to the regulated banking system without stifling the growth of the alternative financial services sector.

Dudley³⁰ maintains that the GFC also revealed the failure of regulators and market participants to fully understand and appreciate the strength of the amplifying mechanisms, particularly those of the shadow banking system, which exacerbated business and financial cycles in the financial system. By implication, it means that effective regulation requires a thorough understanding of the financial sector and of shadow banking activities.

3. THE SHADOW BANKING SYSTEM

In recent years since the GFC, credit intermediation activities regulated outside of the banking system have had a strong ability to create vulnerability in financial markets.³¹ These outside activities are referred to as shadow banking because they act in parallel with the traditional banking system, but with the same capacity to offer mortgages and loans to third

²⁸ Schwarcz, op cit note 1 at 626; Economides op cit note 1 at 8-9; Bankenverband op cit 26 note at 8

²⁹ Mohd-Farid op cit note 20; Bankenverband op cit 26 note at 4; Sali Bakare 'Banking, Mortgage and the Credit Industry in the USA' (2016) 21 *Journal of Internet Banking and Commerce* 1 at 7. See also Bryan J. Noeth and Rajdeep Sengupta 'Is Shadow Banking Really Banking?' *Federal Reserve Bank of St. Louis October 2011*, available at <https://www.stlouisfed.org/publications/regional-economist/october-2011/is-shadow-banking-really-banking>, accessed on 25 January 2017

³⁰ Mohd-Farid op cit not 20; David Luttrell, Harvey Rosenblum & Jackson Thies *Understanding the Risks Inherent in Shadow Banking: A Primer and Practical Lessons Learned*, No.18 (2012) at 9; Schwarcz op cit note 1 at 619-625

³¹ Bakare op cit note 29 at 7. See also Noeth & Sengupta op cit note 29 at 11-12; Daniel Sanches 'Shadow Banking and the Crisis of 2007-08' (2014) 7 *Business Review* at 7; Elijah Brewer III & Ann Marie Klingenhagen 'Be careful what you wish for: The Stock Market Reactions to Bailing out Large Financial Institutions' (2010) 18 *Journal of Financial Regulation and Compliance* 1 at 58.

parties at lower interest rates.³² Shadow banking is pursued by different financial actors and has thus become a key part of the economy at both domestic and international levels.³³

Shadow banking is a descriptive term coined by McCulley.³⁴ However, due to its ambiguous activities outside of the banking regulatory system and its power to monopolise the financial markets, shadow banking has a negative connotation. Shadow banking gained prominence due to the global financial meltdown — a phenomenon that happened between 2007 and 2008. And to date, the regulated financial markets still face consequences due to the nature and scope of shadow banking, which acts as a facilitator for individuals and generates new models of private credit packages.

Over the years, these activities have gained prominence in the global economy, with non-banking activities reaching \$36 trillion in 2014, showing a moderate increase in shadow banking.³⁵

For the purpose of this research, a narrow definition of shadow banking by the Financial Stability Board (FSB) is preferred. With respect to the narrow definition, McCulley³⁶ argues that shadow banking activities are outside of the banking sector, which raises systemic risk concerns and/or regulatory arbitrage concerns.³⁷ Consequently, this definition encompasses the sector's response to financial market innovation — the system is growing and functionally diverse. The four key aspects of credit intermediation that shadow banking operates are short-term funds for long-term asset investments, bond trading platforms, credit risk transfer, and unsecured credit to purchase fixed assets.

All the above activities create bank-like risks but raise short-term markets based on funding, which in return can create vulnerabilities during financial crises.³⁸ On the other hand, banks, with their strict system, demand deposits to fund the above activities. To a lesser

³² Sanches op cit note 31 at 8; Unger op cit note 27 at 6-7; Edward F. Greene and Elizabeth L. Broomfield 'Promoting risk mitigation, not migration: a comparative analysis of shadow banking reforms by the FSB, USA and EU' (2013) 8 *Capital Markets Law Journal* 1 at 10.

³³ R Du Randt 'An Empirical Study of Potential Risks of Shadow Banking in South Africa' (2014) at 7

³⁴ Kodres op cit note 4; See also Whalen R. Christopher 'Why Fixing the 'Shadow Banking' Sector Is Essential for the U.S. Housing Market' (2013). *Networks Financial Institute* Policy Brief No. 2013-PB-01; Payden & Rygel 'China's Financial System: Does a Crisis Lurk in the Shadows?' (2013) *IAFEI Quarterly* 22 (12) Available at http://www.iafei.org/quarterly/IAFEI_quarterly_22nd_issue.pdf, accessed on 24 January 2017

³⁵ Ibid. See also Furber op cit note 7 at 2; Valckx et al op cit note 5 at 73

³⁶ Paul McCulley 'The Shadow banking System and Hyman Minsky's Economic Journey' (2009) *CFA Institute* 5 at 257

³⁷ Anastasia Nesvetailova *Crisis of the Overcrowded Future: Shadow Banking and the Political Economy of Financial Innovation* (2014) 6; Financial Stability Board op cit note 14 at 12; Ingrid Goodspeed 'Out of the shadows: an overview of the shadow banking system' Available at <http://financialmarketsjournal.co.za/oldsite/14thedition/printedarticles/shadowbanking.htm>, accessed on 25 January 2017

³⁸ Sanches op cit note 31 at 9-10; Unger op cit note 27 at 2; Bankenverband op cit 26 note at 11

extent, this kind of market financing is a step aimed at reducing the risks of unsecured credit.³⁹

Shadow banking is completely dependent on market financing, and therefore creates a high risk for the public, even though it aims to offer short-term funding through liquid money in a more secure environment than regulated banks offer. In practice, shadow banking does not guarantee secure investment because many of the entities involved do not report to the government regulatory system.⁴⁰ This already shows that shadow banking poses serious risks to the financial system and the economy as a whole. There are no regulations on most of the financial products under shadow banking. Thus, the lack of transparency and standardisation on financial packages has the potential to attract obscure transactions.⁴¹ This situation can aggravate maturity mismatches, and put credit and liquidity transformations at risk due to the interconnectedness of shadow banking with the regular banking system.

It should be noted that the heavily structured regulation of the traditional banking system motivated the fast growth of shadow banking.⁴² Another aspect is that bank loans are generally expensive, and short-term loans under shadow banking tend to be more affordable. Intuitively, this produces an attraction to shadow banking as an alternative to the conventional, expensive and heavily regulated banking system. Furthermore, to reduce competition, banks in many countries have been prohibited from paying interest on demand deposits, which was advantageous for money market funds and repo markets because these could offer better returns.⁴³

Figure 1 below presents a comparison of the traditional banking system and shadow banking. Like traditional banks, shadow banks invest in long-term assets and transform these assets in short-term claims. There are also secondary markets to which shadow banks can sell their assets.

³⁹ Unger op cit note 27 at 4-5; Greene & Broomfield op cit note 32 at 12; Julian Kolm ‘Securitization, Shadow Banking, and Bank Regulation’ (2015) at 2-3

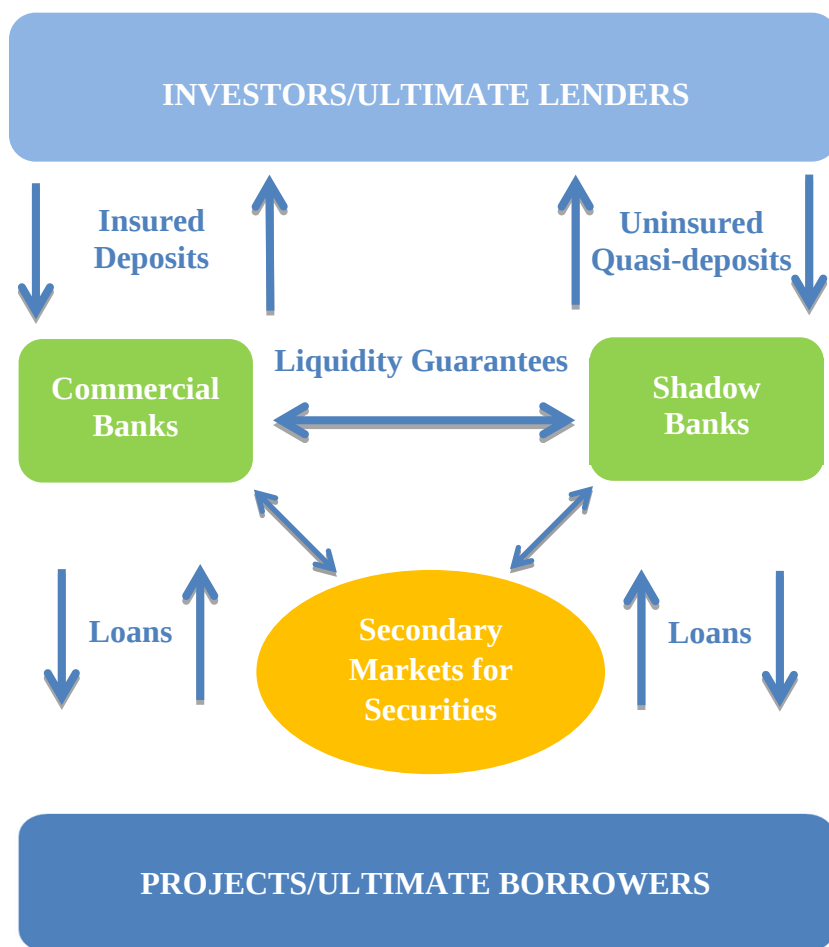
⁴⁰ Sanches op cit note 31 at 12-13; Schwarcz op cit note 1 at 621-627; Valckx et al op cit note 5 at 67-68.

⁴¹ 55. Roy Girasa ‘Shadow Banking: Nature, Regulation, and Developments’ (2016) 35 *Banking & Financial Services Policy Report* 12 at 5,6

⁴² Gary Gorton and Andrew Metrick ‘Regulating the Shadow Banking System’ (2010) *Brookings Institute* at 261

⁴³ Tobias Adrian, Adam B. Ashcraft and Nicola Cetorelli *Shadow Bank Monitoring* Staff Report No. 638 September (2013) 21; Adam J. Levitin ‘Safe Banking: Finance and Democracy’ (2015) 83 *The University of Chicago Law Review* 357 at 403; Gorton and Metrick op cit note 41 at 261, 269

Figure 1: COMPARISON OF TRADITIONAL BANKING AND SHADOW BANKING STRUCTURES⁴⁴



4. ECONOMIC FUNCTIONS OF SHADOW BANKING

Shadow banking has different functions in an economy — for instance, credit risks transfer, securities lending, repurchase transactions, deposit-like funding, and maturity and liquidity transformation, amongst many other functions, all fall under the scope of shadow banking.⁴⁵ However, not all activities can furnish information to the regulators, and as a consequence, measuring the scale of shadow banking is a not an easy task.⁴⁶ The functions of shadow banking are discussed further below.

⁴⁴ Stephan Luck and Paul Schempp 'Banks, Shadow Banking, and Fragility' (2014) *European Central Bank Working Paper Series* No 1726 at 15

⁴⁵ Noeth & Sengupta op cit note 29 at 10-11; Bankenverband op cit note 26 at 2; Unger op cit note 27 at 3

⁴⁶ Kodres op cit note 4

(a) Comparative analysis of credit intermediation in the regulated banking system with shadow banking activities

Credit intermediation, which is the process of receiving funds from depositors in order to provide debt financing to third parties, differs between the traditional banking system and the shadow banking sectors.⁴⁷ The former consists of long-term loans with short-term deposits. Intermediation between borrowers and lenders in the regulated banking system takes place within the walls of a single institution. The banks serve as an intermediary between the savers and borrowers. The limitation of lending is expanded to a multitude of loans through a pool of deposits, creating diversification at low cost. The savers also have immediate access to their funds without tying up their monetary funds into illiquid assets.⁴⁸

There are reduced risks and inefficiencies in the regulated banking sector.⁴⁹ For example, accurate information is captured on good creditors and bad creditors, the money is safeguarded, and overall services are offered with expertise in the field, thereby reducing costs and mitigating many risks found in direct finance.⁵⁰

Banks are involved in maturity, liquid and credit transformations.⁵¹ Each of these critical activities is discussed as follows:

1. **Maturity transformation** — occurs when banks collect short-term deposits and convert them into long-term loans to borrowers. Luttrell states that short-term deposits are a bank's liability and long-term loans are considered its assets, and this raises an inherent risk in maturity transformation.⁵² The mismatch between liabilities and assets creates risks,⁵³ thereby making interest rates applicable.
2. **Liquidity transformation** — because a bank's assets consist largely of long-term loans, the situation may arise where consumers want to withdraw their funds and the bank does not have sufficient short-term funds.⁵⁴ Therefore, banks keep reserve cash to cover any shortfalls in the flow of funds that may arise due to withdrawals. It

⁴⁷ Luck and Schempp op cit note 43 at 14; see also Kodres op cit note 4

⁴⁸ Bakare op cit note 29 at 7. See also Noeth & Sengupta op cit note 29 at 3-4; Unger op cit note 27 at 4-5; Kolm op cit note 39 at 10-11

⁴⁹ Kodres op cit note 4

⁵⁰ Ibid.

⁵¹ Luttrell, Rosenblum & Thies op cit note 30 at 3; Kodres op cit note 4; Zoltan Pozsar, Tobias Adrian, Adam Ashcraft and Hayley Boesky 'Shadow banking' (2013) 19 *Federal Reserve Bank of New York Economic Policy Review* 2, 1-16.

⁵² Ibid.

⁵³ Ibid.

⁵⁴ Luttrell, Rosenblum & Thies op cit note 30 at 3-4; Brian Kantor 'Banks and shadow banking: Out of the shadows' *Investec Monthly Review* June 2014, available at <https://www.investec.co.za/research-and-insights/newsletters/monthly-view/june-2014/banks-and-shadow-banking.html>, accessed on 25 January 2017; Noeth & Sengupta op cit note 29

should be noted that banks get support from central banks. Central banks give short-term credit advances which serve as a support or backup for banks. If all consumers were to decide to withdraw their funds, the assets would decline and liabilities would increase, and consequently banks would be insolvent and fail to meet the demands of their depositors.⁵⁵

3. **Credit transformation** — this type of activity allows banks to engage in credit risk. The banks generate returns by means of the credit discrepancy between liabilities and assets.⁵⁶ Banks obtain returns through trading strategies in credit transformation transactions. For instance, a bank may engage in credit transformation by giving a loan to AA business/singular person and issuing liabilities to AAA business.

It is clear from the above that banks are structured on the bedrock of central banks' strict regulatory systems, which reduces the risk of the consumers and businesses involved.

The shadow banking system offers similar activities but at a high risk.⁵⁷ With regard to maturity transformation, the short-term funding to finance long-term risky assets creates liquidity for the depositors but exposes intermediaries to rollover duration risks.⁵⁸ An intermediary cannot honour an immediate request for full cash withdrawals. The demand for sudden withdrawals by investors may force sales in stressed conditions by reducing the value of the market, since the pricing strategy is destroyed.

Liquidity transformation in shadow banking entails funding illiquid assets in cash-like liabilities.⁵⁹ It uses different techniques from maturity transformation but reaches the same objective.

The discrepancies between traditional banking and shadow banking on financial transformation can be clearly noted from the above. On the one hand, the financial packages involved are similar in nature. For instance, credit, liquidity and maturity transformation originate from the traditional banking system,⁶⁰ but these financial instruments have been adapted for the shadow banking system. However, the broader view of how funding works in both instances show inherent differences in the returns and systemic risks involved.

⁵⁵ Ibid.

⁵⁶ Ibid.

⁵⁷ Bakare op cit note 29 at 7. See also Noeth & Sengupta op cit note 29 at 11-12; Sanches op cit note 31 at 7; Brewer III & Klingenhagen op cit note 31 at 58

⁵⁸ Richard Comotto 'Shadow banking and repo' Compiled for ICMA's European Repo Council, (2012)7; Pozsar, Adrian, Ashcraft & Boesky op cit note 34 at 9; Adrian, Ashcraft & Cetorelli op cit note 42 at 17

⁵⁹ Ibid.

⁶⁰ Zoltan Pozsar, Tobias Adrian, Adam B Ashcraft, and Haley Boesky. Shadow banking. SSRN working paper, 2010 at 2

5. THE SHADOW BANKING SECTOR IN THE UNITED STATES

Financial instability at the global level is often directly related to the US dollar as a global currency due to its pre-eminent position as a global reserve currency, unit of trade, and conduit of financial liquidity.⁶¹ Shadow banking grew significantly in the US between 1990 and 2007, and created a negative impact on the US economy during the recent financial crisis. In 2008, shadow banking had approximately \$20 trillion in liabilities, while regulated banks had \$11 trillion.⁶² Included in the liabilities mentioned above are securitisation and short-term loans, and unsecured money markets.⁶³ Shadow banking in the US can complement regulated banking by expanding access to credit or by reinforcing market liquidity, maturity transformation, and risk sharing. Vincent cites several reasons to explain the growth of the shadow banking sector in the US in recent years: “Securitisation and the use of off-balance sheet vehicles may be motivated by the desire to reduce capital requirements while still maintaining risk exposure and high profits [...] but there are other reasons, such as regulatory arbitrage, which may have promoted the growth of the shadow banking system. More specifically, the emergence of specialised lenders can be attributed largely to keener competition and the need to make productivity gains.”⁶⁴

Many scholars argue that the credit boom experienced in the US during the mid-1980s was a result of shadow banking,⁶⁵ and also ignited the GFC.⁶⁶ During the 2007–2008 financial crisis, the shadow banking system generated a large number of financial assets

⁶¹ Jamie McGeever ‘Global financial instability a risk, with or without pre-eminent U.S. dollar: BIS’ *Reuters Business News* 10 May 2016, available at <http://www.reuters.com/article/us-markets-dollar-bis/global-financial-instability-a-risk-with-or-without-pre-eminent-u-s-dollar-bis-idUSKCN0Y10MC>, accessed on 15 October 2017

⁶² Luttrell, Rosenblum & Thies op cit note 30 at 6; Otaviano Canuto and Swati Ghosh *Dealing with the Challenges of Macro Financial Linkages in Emerging Markets* World Bank Publications (2013) 72. (They argue that short term shadow-banking liabilities rose from US\$10 trillion to US\$20 trillion between 2000 and 2007 compared with US\$5.5 trillion to US\$11 trillion in traditional bank liabilities). See also Viral V. Acharya ‘The Dodd Frank Act and Basel III: Intentions, Unintended Consequences, Transition Risks, and Lessons for India’ *International Growth Centre Working Paper* (2011) 20. (They restate the point by Otaviano Canuto and Swati Ghosh)

⁶³ Ibid.

⁶⁴ Jean-Philippe Vincent (ed) *The Shadow Banking System in the United States: Recent Developments and Economic Role* (2013) Trésor-Economics No. 113, Republic of France, Directorate General of the Treasury at 6 The Shadow Banking System in the United States: Recent Developments and Economic Role’; See also Bankenverband op cit note 26 at 10; Valckx et al op cit note 5 at 66

⁶⁵ Pozsar, Adrian, Ashcraft & Boesky op cit note 34 at 1-16. Other writers such as Borio and Disyatat and Brunnermeir also support the view; Unger op cit note 27 at 11; Photis Lysandrou and Anastasia Nesvetailova ‘The role of shadow banking entities in the financial crisis: a disaggregated view’ (2014) 22 *Review of International Political Economy* 2 at 20

⁶⁶ Franklin Allen & Elena Carletti ‘An Overview of the Crisis: Causes, Consequences, and Solutions’ (2010) 10 *International Review of Finance* 1 at 1-26; Lysandrou & Nesvetailova op cit note 63 at 20; Unger op cit note 27 at 11

which became congested, and hence, unsustainable.⁶⁷ It should also be noted that no monopoly was involved since there was no organised market.⁶⁸ However, shadow banking created various financial channels.

Because shadow banking is a fragile system, most financial activities were destroyed and surprisingly traditional banks' liabilities increased during the financial crisis, resulting in the regulated banks shifting their liquidity risks and credit risks off their balance sheets to shadow banking.⁶⁹ However, this step did not eliminate the risks from the financial markets.⁷⁰ What is notable is that prior to the financial crisis, the banks were the main suppliers of credit. But this has been changed by market-based institutions. Pozsar⁷¹ argues that traditional banks are the creators of the means of payments and deposits in the process of credit creation. On the other hand, shadow banking converts loans into securities, and not much information is offered to consumers regarding the origin of the loans.

Pozsar⁷² identifies three shadow banking subsystems in the US: the government-sponsored enterprise subsystem (GSE), the internal shadow banking subsystem, and the external shadow banking subsystem.

The external shadow banking subsystem largely contributed to the creation of the credit boom because it offered new loans to borrowers.⁷³ The GSE and internal shadow banking subsystems are dependent on the origination of loans by regulated banks for the initiation of securities.⁷⁴ In other words, they are funded by the traditional banks to support loans by crediting the borrower's account and creating a massive chain of funds. These subsystems transform the liabilities to the ultimate depositor, into shadow banking liability. One good example would be a money market mutual fund, which strengthens the chain to finance an existing credit claim against the ultimate borrower.

⁶⁷ Kodres op cit note 4

⁶⁸ Nesvetailova op cit note 37 at 1; Lysandrou & Nesvetailova op cit note 63 at 20; Unger op cit note 27 at 11

⁶⁹ Marshall D. Nickles and Jeffrey Schieberl 'Shadow Banking In The United States And China: What Are The Risks?' (2015) 19 International Journal of Management & Information Systems 3 at 102; Adrian & Ashcraft op cit note 26 at 2

⁷⁰ Nickles & Schieber op cit note 67 at 102; Adrian & Ashcraft op cit note 26 at 9

⁷¹ Pozsar, Adrian, Ashcraft & Boesky op cit note 34 at 1-16; Unger op cit note 27 at 11; See also Marina Stoop *Credit Creation and its Contribution to Financial Crises* (unpublished MSc in Management, Technology and Economics, Swiss Federal Institute of Technology Zurich, 2010)

⁷² Pozsar, Adrian, Ashcraft & Boesky op cit note 34 at 7; Niels Philipsen and Guangdong Xu *The Role of Law and Regulation in Sustaining Financial Markets* Routledge (2014); Unger op cit note 27 at 11

All the other writers refer to the categorization given by Pozsar.

⁷³ Luttrell, Rosenblum & Thies op cit note 30 at 4

⁷⁴ Pozsar, Adrian, Ashcraft & Boesky op cit note 34 at 14; Unger op cit note 27 at 1; Lesly M. M. Echarres *Introduction to the Shadow Banking System* (unpublished Master's thesis in Economics, University of Porto in Porto, 2012) at 39-41

In order to extend credit, the external shadow banking subsystem must acquire deposits with surplus means of payment or exchange for commercial paper upon which traditional banks can transfer deposits to the ultimate borrower's account, as per instructions received from shadow banking.⁷⁵ The borrower can then utilise the means of payment to purchase an asset. This subsystem, acting in its independent capacity, originates new loans with the ability to extend additional credit to ultimate borrowers.

All these subsystems differ from one another in terms of scope and length, but one common feature that all three share is that they are financed on wholesale markets.⁷⁶

(a) The four main functions of the shadow banking system

Shadow banking activities did not directly create the financial crisis in the US, but contributed to aggravating the effects of the crisis. Shadow banking can involve such diverse institutions and entities as specialised financial companies.⁷⁷ The four main functions and activities are securitisation, money market funds, repurchase agreements, and securities lending.⁷⁸

- **Securitisation and financial vulnerability** — This refers to a pool of loans and debt contracts which are re-packaged as per an investors demand and sold off to many other investors.⁷⁹ While this appears to be a simple and straightforward transaction with fast returns, it is not as simple as it presents itself. The risk structure is shaped with the aim of minimising or increasing the risks, and the final instruments are referred to as asset-backed securities, which include commercial papers, mortgage bonds, and credit card receivables.⁸⁰ In the event of bankruptcy on the part of the borrower, the investors will stop with their investments, thereby reducing cash flows and consequently resulting in no generation of returns. This can have negative effects on the economy. Securitisation allows diversification through exposure to a broad pool of obligations, and if a single loan defaults, it does not suffer high collision. Naturally, this process allows for the distribution of risks through the division of the

⁷⁵ Echarres op cit note 72 at 40

⁷⁶ Echarres op cit note 72 at 40; Unger op cit note 27 at 1; Pozsar, Adrian, Ashcraft & Boesky op cit note 34 at 14

⁷⁷ Noeth & Sengupta op cit note 29 at 7

⁷⁸ Gorton and Metrick op cit note 41 at 269-272

⁷⁹ J C. Stein 'Securitization, Shadow banking & Financial Fragility' (2010) 42; Andreas Jobst 'What Is Securitization?' *Finance & Development* (2008) 1; Pozsar, Adrian, Ashcraft & Boesky op cit note 34 at 3

⁸⁰ Ibid

mortgage pool into tranches, which are ranked in terms of priority of risks, with lower risks subordinated in priority of claims to the higher tranches or layers.⁸¹

- **Special purpose vehicle (SPV)** — This is a legal entity with the sole purpose of securitising assets which are exclusively asset-backed commercial paper (ABCP)⁸². The loans are securitised in an off-balance-sheet vehicle,⁸³ and in the case of bankruptcy by the sponsoring entity, the creditors have no claim on the SPV.⁸⁴ An SPV has two purposes: (i) to mitigate the capital requirement on the loans; and (ii) to securitise the loans with maturity transformation activity as discussed in (i) above. This leads to the provision of long-term assets with short-term loans. However, linkages between the borrower and the investors will reduce financial liquidity in the financial system, and this may consequently cause a financial crunch with adverse effects on the real economy.
- **Money market funds (MMF)** — These are defined by the International Organisation of Securities Commissions as “investment funds that have the objective to provide the investor with preservation of capital and daily liquidity, and that seek to achieve that objective by investing in a diversified portfolio of high-quality, low-duration, fixed-income instruments”.⁸⁵ MMFs are part of the shadow banking system since they perform maturity and liquidity transformation, and contribute considerably as a way

⁸¹ J C Stein states (42) that “a pool of ten loans of \$10 000 each all come due at the same time. Each borrower can either pay off his loan in its entirety, or default and pay nothing. One possible structure would divide the pool into ten layers, or tranches, each of which is owed \$10 000. The most junior or lowest priority tranche—call it T1—would recoup its money only if ten loans were repaid; if a single loan went bad, T1 would see its investment wiped out. Thus, T1 stands at the bottom of the pecking order and is a very risky security”.

⁸² Fitch Ratings Structured Finance November 8, 2001 at 1 available at: fitchratings.com accessed on 13 October 2017, ‘Asset-Backed Commercial paper explained’ defines: Structured Finance An asset-backed commercial paper (ABCP) program is composed of a bankruptcy-remote special purpose vehicle (SPV), or conduit, that issues commercial paper (CP) and uses the proceeds of such issuance primarily to obtain interests in various types of assets, either through asset purchase or secured lending transactions.

⁸³ ‘The next chapter Creating an understanding of Special Purpose Vehicle’ November 2011 at 14 defines: off-balance-sheet as being the business activities of a savings association that generally do not involve booking assets (loans) and taking deposits. Off-balance sheet activities normally generate fees, but produce liabilities or assets that are deferred or contingent and thus, under GAAP (Generally Accepted Accounting principles), do not appear on the institution’s balance sheet unless they become actual assets or liabilities with a value or cost that can be determined. Off-Balance Sheet Vehicle. This includes SPVs, SIVs, Conduits, etc. whose assets and liabilities are reported off-balance sheet

⁸⁴ Luttrell, Rosenblum & Thies op cit note 30 at 25; G. B. Gorton and N. S. Souleles ‘Special Purpose Vehicles and Securitization’ in Mark Carey and René M. Stulz (eds) *The Risks of Financial Institutions* University of Chicago Press (2007) 553; John A. Pearce and Ilya A. Lipin ‘Special purpose vehicles in bankruptcy litigation’ (2011) 40 *Hofstra Law Review* 177 at 195

⁸⁵ International Organisation of Securities Commissions (IOSCO) ‘Money Market Fund Systemic Risk Analysis and Reform Options’ Consultation Report 27 April 2012 at 1, available at <http://www.iosco.org/library/pubdocs/pdf/IOSCOPD379.pdf>, accessed on 21 January 2017;

See also Viktoria Baklanova ‘Money Market Funds: An Introduction to the Literature’ *University of Westminster Law School* (2010) 7; Luttrell, Rosenblum & Thies op cit note 30 at 32

of creating short-term funding. MMFs do not enjoy any kind of legal assistance and backstop facilities, and have no clear support from investors. The financial crisis of 2007–2008 focused on the fragility of MMFs, which suffered when shareholders prioritised redeeming their shares following the bankruptcy of Lehman Brothers (LB), which spread panic in the financial system. Strong redemptions took place from MMFs that held LB securities.⁸⁶ The devastating impact of the failure of LB on the financial market was the contraction of credit supply to consumers.

MMFs relate to the economy in general on many levels.⁸⁷ First, they provide short-term loans to the economy through investment in short-term debts such as government bonds. Regular banks' funding provides a guarantee and implicit support,⁸⁸ while high-profile companies make use of MMFs as an outsourced cash manager of their cash pool, which is an efficient way to invest their savings. In times of crisis, there is uncertainty regarding sponsors' funding, which may impact on the likelihood of returns, and this may affect all institutions involved in the process.

- **A repurchase agreement (repo)** — This is a process of borrowing money from the lender by selling his asset and with the guarantee of re-purchasing it at an established price on a date set by both parties. The assets are used as collateral, implying that they can be furnished in the form of bonds or asset-backed securities.⁸⁹ Afterwards, the cash investors can re-pledge collateral against it themselves, which further accumulates the leverage and increases the risk. For instance, if the asset-back drops, the value of the collateral downgrades. Consequently, the repo decreases and market liquidity is impacted. If the borrower fails to purchase the collateral back, the price reduces and the borrower suffers a financial loss. Since there are no policies governing asset-backed securities or leverage, it may run the risk of precipitating system failure.
- **Securities lending operations** — These entail lending securities to a borrower in exchange for collateral for cash. Simply explained, securities lending is the market

⁸⁶ IOSCO op cit note 83 at 5; Craig A. Zabala & Jeremy M. Josse 'Shadow credit and the private, middle market Pre-crisis and post-crisis developments, data trends and two examples of private, non-bank lending' (2014) 15 *The Journal of Risk Finance* 3 at 218; Adrian & Ashcraft op cit note 26 at 25

⁸⁷ Gorton and Metrick op cit note 41 at 269-270

⁸⁸ IOSCO op cit note 83 at 8; Adrian & Ashcraft op cit note 26 at 8

⁸⁹ Viktoria Baklanova, Adam Copeland and Rebecca McCaughrin, *Reference Guide to U.S. Repo and Securities Lending Markets* (2015) 4. The securities are used as collateral to protect the cash investor against the risk that the collateral provider is unable to repurchase the securities at the later date (the repurchase date), as initially agreed.

See also D Kent (2010, May 13). *Securitized Banking and the Run on Repo* Gary Gorton and Andrew Metrick (Discussion), NYU/Moody's Credit Conference at 12; Luttrell, Rosenblum & Thies op cit note 30 at 44

practice by which a short-period transfer of securities takes place from a security lender to a security borrower for cash, a letter of credit, or another form of financial commitment.⁹⁰ The interconnectedness between shadow banking and regulated banking in the process of securities lending activities is needed to measure the negative influence. In this case, traditional bank intervention is necessary. It should be highlighted that shadow banking makes a positive contribution to the economy and traditional banks will assist in mitigating the risk factors involved in their operation, which will contribute to the growth of the sector.

- **Security lending and repo** — These are two short-term financial operations with the objective of borrowing cash or securities. For instance, under security lending, pension funds agreements fall within this operation. At the same time, the providers use repo contracts to acquire financing. It should be noted that during the period of the US financial crisis, the Securities and Exchange Commission emergency policies were implemented to restrict borrowing requirements for shares in high-profile companies with the aim of avoiding variation in securities prices as well as to control the market imbalances.⁹¹ This step discouraged many lenders outside the banking sector from investing, for fear of financial loss.

(b) Shadow banking and the US financial crisis

The US is the largest economy in the world⁹² and has the largest shadow banking sector.⁹³ The financial crisis in the US was a result of many risky inter-bank activities that destabilised the global financial economy and financial markets, and caused major banks in the US — such as IndyMac Bank and Lehman Brothers Holdings, an investment bank — to suffer major financial failures.⁹⁴

The motivation behind the rise of shadow banking lies in the attractive financial packages for investors as well as the incentives for financial institutions offered by the avoidance of the strict regulations placed on regular banks.⁹⁵ Shadow banking offers the same

⁹⁰ Baklanova op cit. note 83 at 21; Luttrell, Rosenblum & Thies op cit note 30 at 44; Hester Peirce ‘Securities lending and the untold story in the collapse of AIG’ (2014) Working Paper No. 14-12 *Mercatus Center at George Mason University* at 16-17

⁹¹ Ibid at 23

⁹² Gray op cit note 16

⁹³ Kodres op cit note 4

⁹⁴ Brewer III & Klingenhagen op cit note 31 at 59-60; Zabala & Josse op cit note 84 at 216; Simon H. Kwan ‘Financial Crisis and Bank Lending’ (2010) Federal Reserve Bank of San Francisco Working Paper 2010-11 at 11-12

⁹⁵ Zabala & Josse op cit note 84 at 215-216; Bakare op cit note 29 at 2; Unger op cit note 27 at 2-3

financial packages as traditional banks, but with the inclusion of idiosyncratic elements of fragmentation and lack of strict control in the intermediary chain.⁹⁶ The fragmentation of the shadow banking regulatory system was due to the use of loopholes and lack of clarity on enforcement actions. It should be noted that deregulation and regulatory failure were the causes of the financial depression, as non-bank activities involved in financial derivatives escaped from strict banking regulations. Regulatory authorities also failed to implement flexible approaches during President Bush's administration, which compelled Americans to take risky investments.⁹⁷

The US crisis was the consequence of several factors. But it should be noted that shadow banking exacerbated the effects of the crisis⁹⁸ by satisfying clients' demand for financial products that gave attractive yields to investors with low-risk forecasts. However, these products were not well studied by the credit rating agencies. As such, mispricing on the part of banks and investors resulted in high risk-taking, and the complexity in the financial packages resulted in investors neglecting risk factors, thereby allowing the accumulation of systemic risk.⁹⁹

After the US financial crisis, and in response to it, the Dodd-Frank Act (DFA)¹⁰⁰ and the Consumer Protection Act (CPA)¹⁰¹ applied drastic changes to the rules governing financial providers and products, with complex implementation processes and rules that, in practice, may take many years to fully implement. The DFA and CPA were designed with the aim of enforcing prudent regulations on the shadow banking system.¹⁰² The DFA's main objectives are to regulate large risky investments and mitigate financial damages before a financial institution collapses. For instance, it prescribes an intense regulatory system for large banks, and on non-bank activities.¹⁰³ Some of DFA's main elements are:¹⁰⁴

⁹⁶ Vincent op cit note 62 at 1; Valckx et al op cit note 5 at 65-66; Zabala & Josse op cit note 84 at 214

⁹⁷ Karim Pakravan 'Global financial architecture, global imbalances and the future of the dollar in a post-crisis world' (2011) 19 *Journal of Financial Regulation and Compliance* 1 at 25. It states further 'whether by sins of omission or commission, the regulators did not do their job. Several elements of failure to prevent the banks from gaming Basel-II[5] and the decision to allow the Government-Sponsored Enterprises to take on lower quality assets. These factors led to explosion in sub-prime mortgages in 2005 and 2006.'

⁹⁸ Constâncio, V. (2012, April 27). *Shadow banking - the ECB perspective* (Speech). Available at: <http://www.ecb.europa.eu/press/key/date/2012/html/sp120427.en.html>, accessed on 22 January 2017; Lysandrou & Nesvetailova op cit note 63 at 20; Unger op cit note 27 at 11

⁹⁹ Brewer III & Klingenhagen op cit note 31 at 58

¹⁰⁰ The Dodd-Frank Wall Street Reform Act of 2010

¹⁰¹ Dodd-Frank Wall Street Reform Act available at <http://www.cftc.gov/LawRegulation/DoddFrankAct/index.htm> accessed on 03 February 2017. The DFA provides better consumer protection and specific provisions designed for shadow banking.

¹⁰² Governor Daniel K. Tarullo 'Shadow Banking and Systemic Risk Regulation' Washington, D.C. 22 November 2013, available at <https://www.federalreserve.gov/newsevents/speech/tarullo20131122a.htm>

¹⁰³ Suk Hi Kim & Connor Muldoon, University of Detroit Mercy The Dodd-Frank Wall Street Reform and Consumer Protection Act :Accomplishments and Shortcomings (2015) *Journal of Applied Business and*

1. The creation of a Financial Stability Oversight Council (FSOC) with the aim of performing an oversight function for any risky investment that may create risks for the US economy.
2. The creation of a Financial Reserve System responsible for supervising non-banking financial activities that could endanger the entire economy.
3. The authority to oversee size and risk-based capital, including ensuring that bank holding companies have convertible equity.
4. Authority for the newly created FSOC to require non-bank activities at large and interconnected traditional banks to have resolution plans in the event of financial distress or insolvency.
5. Non-bank activities supervised by the FSOC may impose restrictions on proprietary trading, hedge funds and private equity investments.

Due to shadow banking's complexity in scope, the DFA may be limited in its ability to tackle all the issues connected to it.¹⁰⁵ This is because the DFA gives special attention to dominant financial institutions designed by the new FSOC which are unlikely to collapse and neglects other financial institutions, creating unfair competition. A question one may ask is, if the DFA is so complex and shadow banking is also complex, then is it necessary to standardise the reforms of the DFA? Schwarcz¹⁰⁶ states that if financial markets are very complex in nature then the investors are unable to measure the consequences and this can pave the way for creating a space for fraud and market imbalances. One of the possible reasons for the expansion of shadow banking is that statutory and regulatory requirements are

Economics Vol. 17(3) at 96-97 states further that `` The Act puts a special emphasis on banks, bank holding companies, and nonbank financial institutions with at least \$50 billion in assets that a new Financial Stability Oversight Council deems to be systematically important. A total of large 34 banks (i.e., Citigroup and Bank of America), and a number of bank holding companies, with more than one commercial bank somewhere in the network (i.e., Goldman Sachs and Morgan Stanley) automatically qualify for such intensive regulation. In addition, insurance companies such as AIG will be included only if the Council identifies them as systematically important. The Act instructs the regulators to require that these systematically important companies keep a larger buffer of capital than ordinary financial institutions, to reduce the danger that they will fail.``

¹⁰⁴ Suk Hi Kim & Connor Muldoon, University of Detroit Mercy The Dodd-Frank Wall Street Reform and Consumer Protection Act :Accomplishments and Shortcomings (2015) *Journal of Applied Business and Economics* Vol. 17(3) at 96

¹⁰⁵ Schwarcz op cit note 1 at 632; M Barr 'The Dodd-Frank Act, One Year On' in Viral Acharya et al. (eds) *Dodd-Frank: One Year On* Centre for Economic Policy Research (2011) 2; Morgan Ricks 'A Simpler Approach to Financial Reform' (August 1, 2013). *Vanderbilt Public Law Research Working Paper* No. 13-42. Available at SSRN: <https://ssrn.com/abstract=2316900> or <http://dx.doi.org/10.2139/ssrn.2316900>, accessed 03 February 2017

¹⁰⁶ Steven L. Schwarcz *Regulating Complexity in Financial Markets* (2009) 87 (2) 220; Barr op cit note 100 at 1-3; Saule T. Omarova 'The Dodd-Frank Act: A New Deal for a New Age?' (2011) *Cornell Law Faculty Publications* (1023) 86, available at <http://scholarship.law.cornell.edu/facpub/1023>, accessed 03 February 2017

too onerous, creating greater harm in the financial stability of the US. The DFA requires a thorough amendment to regulate non-bank activities.¹⁰⁷ It can, therefore, be seen that the financial crisis of 2008 serves as a lesson to policy makers to create flexible regulations using plain language in order to prevent future market depressions.

In South Africa, to avoid financial collapse in 2010, the South African Reserve Bank Act was also amended to give stability to the financial sector. In accordance with these amendments, the South African Reserve Bank (SARB) must submit reports on shadow banking activities to the FSB.¹⁰⁸ It is highlighted that the risks linked to shadow banking have not been researched in depth in South Africa. Therefore, in practice it is hard to weigh up how risky shadow activities are, and what preventive measures should be taken in the event of a collapse of the economy as a result of shadow investments.

6. THE HISTORY OF THE FINANCIAL SYSTEM IN CHINA SINCE THE 1980s

The rapid development of the non-traditional banking activity sector in China became a serious concern at international level after the 2007–2008 financial crisis in the US.¹⁰⁹ The researcher's personal observation is that China's core objective is to become a dominant economy at the global level, driven by market opportunity and by offering low-cost labour. It is a very dynamic strategy indeed. Chinese banks play a proactive role in the South African economy. For example, last year Standard Bank announced that it would assist its strategic partner, the Industrial and Commercial Bank of China (ICBC), to raise R10bn to support the development of South Africa's power-generation infrastructure. According to Standard Bank group CEO Sim Tshabalala, "Standard Bank, acting as arranging and structuring adviser, will assist ICBC in raising up to R10bn from the financial markets over a five-year period".¹¹⁰ As

¹⁰⁷ Roy Girasa 'Shadow Banking: Nature, Regulation, and Developments' (2016) 35 *Banking & Financial Services Policy Report* 12 at 16; Vincent op cit note 62 at 1

¹⁰⁸ R Du Randt An Empirical Study of Potential Risks of Shadow Banking in South Africa (2014) at 8. The author further states that "Reference on shadow banking was made for the first time by the South African Reserve Bank (SARB) in 2011 in its Bank Supervision Annual Report. Since 2013, the SARB also submitted information on the topic for publication in the bi-annual Financial Stability Review of the FSB."

¹⁰⁹ Dexter Roberts 'China's Next Crisis Lurks in Shadow' *Bloomberg* 16 May 2013, available at <https://www.bloomberg.com/news/articles/2013-05-16/chinas-next-crisis-lurks-in-shadow-banking>, accessed on 14 October 2017; Sanches op cit note 31.

¹¹⁰ Carin Smith 'Standard Bank joins Chinese bank to boost SA power generation' *Fin24* 06 December 2015, available at <http://www.fin24.com/Economy/standard-bank-joins-chinese-bank-to-boost-sa-power-generation-20151204>, accessed on 13 October 2017; Standard Bank will assist its strategic partner, the Industrial and Commercial Bank of China (ICBC) to raise R10bn to support the development of South Africa's power generation infrastructure, according to Standard Bank group CEO Sim Tshabalala. Standard Bank, acting as arranging and structuring adviser, will assist ICBC in raising up to R10bn from the financial markets over a five-year period. Accessed on 13 October 2017.

a consequence of these sorts of partnerships, China has become South Africa's largest trading partner.¹¹¹

Approximately three decades ago, the Chinese economy was very poor — stagnant, centralised, unproductive and isolated from the rest of the world economies. With the 1979 implementation of free-market reform policies and foreign trade, China has become the fastest growing economy in the world.¹¹² The annual GDP growth is approximately 9.7%, making China one of the world's economic powers.¹¹³

The financial system in China is divided into formal and informal sectors. It is also noted that there is excessive pressure on commercial banks, which have lowered their balance sheets to the point of extending their incapacity to provide loans to high-profile companies with strong potential growth.¹¹⁴ It is a well-known fact that unbalanced financial sectors often delay the ability of fund allocation.

China's formal financial sector has suffered three stages of major reforms.¹¹⁵ The first stage of policy reform was to initiate various kinds of banks by changing from a mono-banking system to a plural banking system with a central bank and diversified financial institutions.¹¹⁶ Four major state-owned banks (SOBs) were created and separated from the People's Bank of China (PBOC), each of which was assigned a special task:

- the Industrial and Commercial Bank of China (ICBC), whose special function is to finance the business activities of the state-owned enterprises (SOEs);
- the Construction Bank of China (CBC), whose special function is to finance construction and fixed-asset investments;

¹¹¹ Gaye Davis 'China has become SA's biggest trading partner' available at <http://ewn.co.za/2015/11/05/China-has-become-SAs-biggest-trading-partner>, accessed on 13 October 2017. Ernie Lai King 'How China perceives SA as an investor destination (and it is not a rosy picture)' *Business Day* 04 January 2017, <https://www.businesslive.co.za/bd/opinion/2017-01-04-how-china-perceives-sa-as-an-investor-destination-and-it-is-not-a-rosy-picture/>, accessed on 14 October 2017. In April 2015, the People's Bank of China and the South African Reserve Bank signed a 30-billion renminbi/R54bn bilateral currency swap agreement for a three-year period with an option to renew, for the purpose of facilitating bilateral trade and investment and maintaining regional financial stability.

¹¹² Gil Lan 'Insights from China for the United States: Shadow Banking, Economic Development, and Financial Systems' (2015) 12 *Berkeley Business Law* 1 at 144; Wayne M. Morrison 'China's Economic Rise: History, Trends, Challenges, and Implications for the United States' (2015) *Congressional Research Service* at 1; Michel-Henry Bouchet *Overcoming the Challenges – Globalization* Lulu Press, Inc. (2015) 4

¹¹³ Ibid.

¹¹⁴ Nickles & Schieber op cit note 67 at 105; Xiangmin Liu 'Shadow banking in China' *Banking and Finance Law Review* at 127; Robin H. Huang 'The Regulation of Shadow Banking in China: International and Comparative Perspectives' (2015) 30 *Banking and Finance Law Review* 481 at 484.

¹¹⁵ Yoon Je Cho, *The Banking System of the People's Republic of China*, A study of financial markets (1999) 39; Kumiko Okazaki 'Banking System Reform in China: The Challenges of Moving Toward a Market-Oriented Economy' (Occasional Paper) *Rand's National Security Research Division* (2007) 9; Weitseng Chen 'WTO: Time's Up for Chinese Banks -- China's Banking Reform and Non-Performing Loan Disposal' (2006) 7 *Chicago Journal of International Law* 1, 244-249

¹¹⁶ Jose C.V Davila 'China's banking industry' (2012) 5-7

- the Bank of China (BOC), whose special function is to finance foreign trade and investment; and
- the Agricultural Bank of China (ABC), whose special function is to finance the rural and agricultural sector.

The above financial institutions took over the business tasks initially undertaken by the PBOC with a view to breaking the mono-banking system.¹¹⁷ Chinese banks are still controlled by local and regional government, whose internal techniques to continue financing companies with existing loans create a conflict with banks.¹¹⁸

The PBOC did not gain autonomy from the government because it became part of the State Council and started operating as the central bank of China. It has successfully implemented many policies to improve the banking system,¹¹⁹ among them, better supervision and policies concerning foreign exchange control over current accounts. The shadow banking system, however, is fragmented in China because the necessary responsibilities to oversee the system are shared by many institutions.¹²⁰ Due to this fragmented system, lack of coordination may result in gaps in policy and unproductive actions.

The commercial banks were given the autonomy to take over commercial banking transactions which previously had been under the control of the PBOC.¹²¹ As alluded to earlier, the banking system was previously a fully state-owned (SOBs) or mono-banking system. But it has experienced market-based reforms. SOBs were unable to fulfil expanding financial system demands in the private sector and accrued large non-performing loans (NPLs), which were calculated to be insolvent.¹²²

¹¹⁷ Davila op cit note 110 at 7

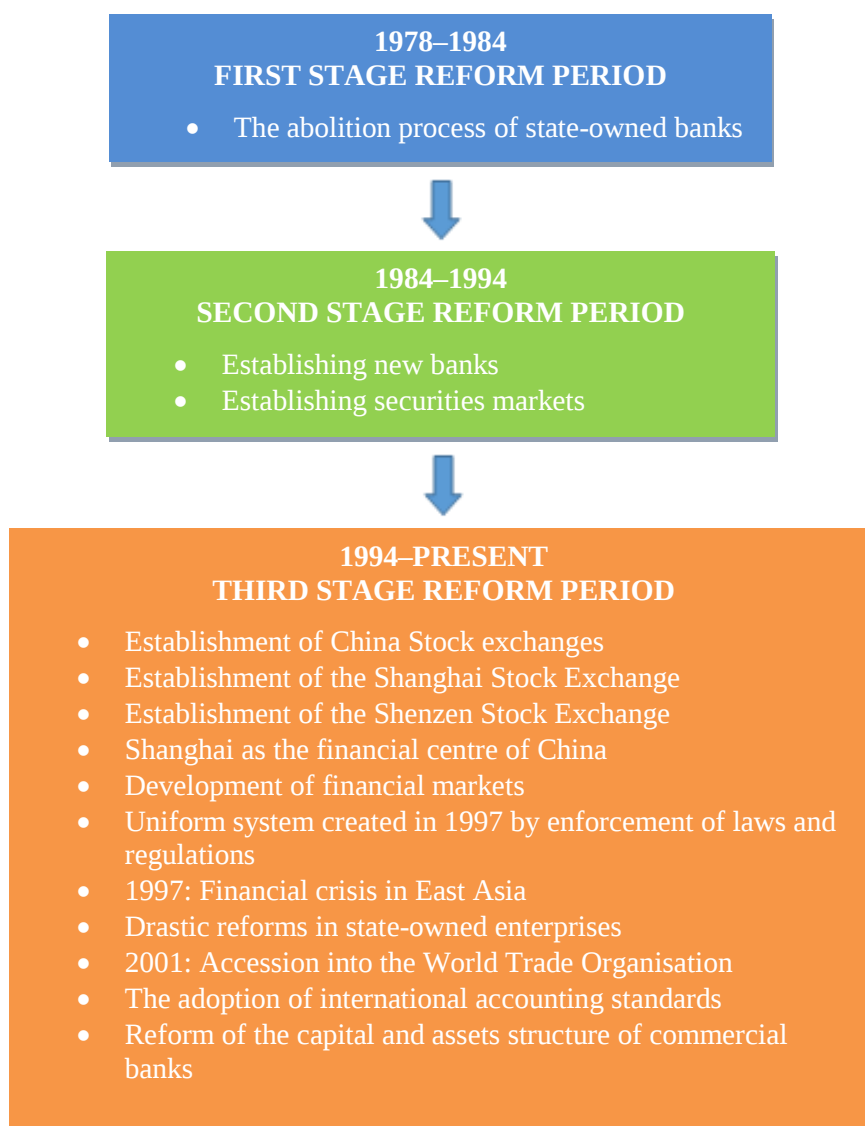
¹¹⁸ Douglas Elliott, Arthur Kroeber and Yu Qiao Shadow banking in China: A primer (2015) 9 The Brookings Institution at 5.

¹¹⁹ Cho op cit note 109 at 36; Chen op cit note 109 at 245-249; Yiping Huang, Xun Wang, Bijun Wang and Nian Lin, *Financial Reform in China: Progresses and Challenges China First* (29 November 2011) 18, China Macroeconomic Research Center, Peking University.

¹²⁰ Huang op cit note 108 at 486-487; Liu op cit note 108 at 132-134 Elliott, Kroeber & Qiao op cit note 11 at 1

¹²¹ Ibid.

¹²² Ibid.

Figure 2: OUTLINE OF BANKING SECTOR REFORMS IN CHINA¹²³

The second stage of reform consisted of the implementation of market-oriented policies, such as rediscount business, a deposit reserve, open-market operations, and the interest rate.¹²⁴ To promote industrial development in China, with the objective of opening an independent state-bank-dominated financial system, three policy banks¹²⁵ were implemented to supervise bank performance, including large-scale NPLs. Due to their size and complexity, NPLs are calculated as losses for SOEs. For instance, the specialised banks are obliged to furnish loans to stimulate regional economic growth according to local demand, without

¹²³ Davila op cit note 110 at 5-7; Okazaki op cit note 109 at 9; Chen op cit note 109 at 245-249

¹²⁴ Huang et al. op cit note 112 at 18; Chen op cit note 109 at 245-249; Cho op cit note 109 at 36

¹²⁵ Cho op cit note 109 at 40; Huang et al op cit note 112 at 18; Chen op cit note 109 at 245-249

careful studies of credit risk, resulting in NPLs.¹²⁶ Also, since the PBOC was not independent, it did not have the efficiency to control total money supply, and was directed by local governments to finance major banks' preferential lending for construction purposes.¹²⁷

Many rural banks were abolished due to poor performance and lack of management skills.¹²⁸ Other banks were restructured or combined for efficiency development purposes. As the financial markets developed at a rapid pace, policies were implemented to unify foreign exchange transactions through a digital system.

The third stage of reform occurred when China was aiming to join the World Trade Organisation (WTO)¹²⁹ and therefore agreed to open its financial markets to foreign markets. This had a tremendous impact on the entire banking sector and the reforms took place at a fast pace. The Financial Regulatory Commission was established for strict supervision and regulatory measures. In addition, the credit plan system was abolished, but with the intervention of the central bank as the last decision maker on matters concerning lending management.¹³⁰ Government capital injections were implemented to clean up the deteriorated balance sheets with a view to reducing NPLs.¹³¹ The establishment of Asset Management Companies (AMC) with the objective of removing NPLs from the books of the banks also took place. Another strategic move was to transfer the NPLs from liability to income-generating products, as more policies to protect loans from losses were implemented. Additionally, an accounting system was implemented to achieve transparency in the operation and management of banks.

The reforms of the banking system that took place in China brought great improvements.¹³² Tax exemptions, capital injections, the enhancement of disclosure rules, and other types of reform made those banks more efficient and aggressively business driven. Although most large and medium-sized banks implemented reforms to improve their business capacity, the medium-sized banks suffered a negative impact on their balance sheets. This

¹²⁶ Davila op cit note 110 at 40; Chen op cit note 109 at 250; Huang et al op cit note 112 at 18

¹²⁷ Ibid.

¹²⁸ Davila op cit note 110 at 9; Chen op cit note 109 at 245-249; Cho op cit note 109 at 36

¹²⁹ World Trade Organization 'China and the WTO' Available at https://www.wto.org/english/thewto_e/countries_e/china_e.htm, accessed on 4 February 2017; Chen op cit note 109 at 245-249; Cho op cit note 109 at 36

¹³⁰ Chen op cit note 109 at 245

¹³¹ Huang op cit note 108 at 9-11; Andrew Sheng and Ng Chow (eds) 'Bringing Shadow Banking into the Light: Opportunity for Financial Reform in China' (2015) *Fung Global Institute Report* at 108-109; Don Weinland and Gabriel Wildau 'China's shadow banking crackdown shakes markets' *Financial Times* 30 May 2017, available at <https://www.ft.com/content/35d4a832-3c50-11e7-821a-6027b8a20f23>, accessed on 21 August 2017.

¹³² Davila op cit note 110 at 40

result shows that the banking system in China is unstable.¹³³ The lack of consistency is due to business profitability, asset quality, and variation of their services. All these problems were created due to a loss of credit culture and broad disregard for the rule of law.¹³⁴ The reforms were notable, but a lack of initiative on the part of modern financial institutions which would have assisted in sustaining the economic growth provoked financial instability.

Shadow banking activities in China as per Elliot¹³⁵ comprise of: (i) loans and leases by trust companies, which are financial firms that are a combination of banks and asset managers; (ii) entrusted loans, which are intermediary transactions where loans are made on behalf of large enterprises; (iii) banker's acceptances, which consist of promissory notes issued by banks with the promise to pay a certain amount for a good or other form of loan; (iv) microfinance companies, which are regulated financial firms with the objective of lending to small and rural borrowers; (v) guarantees, which are designed to facilitate shadow banking activities; (vi) pawn shops and other informal lenders, which are important for facilitating loans for households and small ventures; and (vii) trust beneficiary rights (TBRs), which are derivative transactions. The TBR collects all returns accruing to a trust. When banks are involved in transforming such transactions, they become complex in nature. Other shadow banking activities are wealth management products, which give returns based on the performance of a pool of assets or loans, and lastly, inter-bank market activities, which entail investing in high-profile business ventures using financial companies to substitute for a formal deposit system by using inter-bank activities, and thereby avoiding high costs in formal deposits which are mandated by the regulations.

7. SHADOW BANKING IN CHINA

The shadow banking sector has been growing fast¹³⁶ in China compared to the US post-financial crisis era.¹³⁷ This poses a threat to the economies linked to China in trade,

¹³³ Douglas J. Elliott and Kai Yan 'The Chinese Financial System: An Introduction and Overview' (2013) *The Brookling Institute John L. Thornton China Center*, Monograph Series No. 6 at 3

¹³⁴ Chao, Ee and Zhang op cit note 13 at 2

¹³⁵ Elliott, Kroeber & Qiao op cit note 11 at 1-2; Lan op cit note 106 at 147; Jianjun Li 'The Credit Size and Structure of Shadow Banking in China' (2013) 6-7 *School of Finance CUFE*

¹³⁶ Huang op cit note 108 at 481; Valckx et al op cit note 5 at 77; Jones op cit note 5.

¹³⁷ Chao, Ee and Zhang op cit note 13 at 5. See also Elliott, Kroeber & Qiao op cit note 11 at 21-22. The authors state that "In its present form, therefore, China's shadow banking sector presents relatively low risk of triggering a panic or financial crisis similar to those experienced by the U.S. in 2008, or by other Asian economies and Russia in 1998. The fundamental reason for this is that liquidity is abundant, due to the high levels of deposits from households and businesses, and reliance on fragile wholesale funding sources is minimal. Bad events such as a property market crash, a dramatic heavy-industry slowdown, or defaults in the trust companies would certainly increase banks' non-performing assets, but they would not imperil banks' funding. The bigger

investment, and other financial relationships. Chen¹³⁸ states that international orders have decreased considerably, combined with an increase in costs in terms of raw fabrics and labour, creating a profit margin crush. Consequently, in order to reduce inflation, the banks have limited credit facilities with complex regulations. As a result, small businesses are forced to turn to alternative funding sources (shadow banking), informal funding systems that enable small businesses to meet their financial needs. The financial packages comprise, among others, trust loans, credit guarantees, and private lending.¹³⁹ At first glance, the informal system offers attractive quasi-legal financial packages, but the systemic risks are very palpable. Traditional banks in China tend to discriminate against small businesses, since they do not offer collateral security or stability.¹⁴⁰ It is obvious that the state monopoly, with its obsessive favouring of SOEs, is the cause of this disaster. As such, the private sector is left behind. Although encouraging announcements¹⁴¹ have been made to small enterprises, with the promise of curtailing pyramid investments and many other packages offered within the non-banking sector, in practice the measures will take a long time to implement.

China has a history of political constraints and historical legacies that have resulted in no formal financial system being available to investors, who therefore rely on informal financial systems to fund private businesses that provide a massive contribution to the Chinese economy.¹⁴² The reason for informal finance, as opposed to traditional banks, is because of socio-political influence. Shadow banking's growth has created serious concerns in China in terms of the challenges that the country faces. For example, the massive expansion of Internet money market funds, such as Alibaba's Yu'e Bao fund, has created

financial system risk in China is not crisis but sclerosis: if an ever greater share of lending (whether by banks or shadow entities) goes to unproductive projects, then economic growth will continue to decelerate.

¹³⁸ Vinicy Chan 'The perils of shadow banking's expansion' (2011) 22 *Asiamoney* 10, 1-2; Alasdair Pal 'China fund managers dump banks as credit crunch fears punish investors' *Investment Week* 01 July 2013 at 1, available at <https://www.investmentweek.co.uk/investment-week/news/2278319/china-managers-dump-banks-as-credit-crunch-fears-punish-investors>, accessed on 11 June 2017; Chris Wright 'Asia banking: China's shadow monster can't be stopped' *Euromoney* 06 October 2016, available at <http://www.euromoney.com/Article/3591657/Asia-banking-Chinas-shadow-monster-cant-be-stopped.html>, accessed on 11 June 2017.

¹³⁹ Chan op cit note 131 at 2; Huang op cit note 108 at 485-486

¹⁴⁰ Chan op cit note 131 at 2; Allen T. Cheng 'China's Shadow Banking Sector Poses Growing Risks to Economy' *Euromoney Institutional Investor* 07 March 2014 at 1, available at <http://www.institutionalinvestor.com/article/3317208/banking-and-capital-markets-banking/chinas-shadow-banking-sector-poses-growing-risks-to-economy.html?ArticleId=3317208#.WT7fHYVOLcc>, accessed on 11 June 2017; Elliott, Kroeber & Qiao op cit note 11 at 6

¹⁴¹ Chan op cit note 131 at 6; Elliott, Kroeber & Qiao op cit note 11 at 7

¹⁴² Kellee S. Tsai 'The Political Economy of State Capitalism and Shadow Banking in China' (2015) *HKUST IEMS Working Paper No.* 2015-25 at 10; Lerong Lu 'Private Banks in China: Origin, Challenges and Regulatory Implications' 2016) 31 *Banking and Finance Law Review* 3 at 585; Tiziana Barghini 'Shadow Banking: The Future of Banking?' *Global Finance Magazine* 6 April 2015, available at <https://www.gfmag.com/magazine/april-2015/shadow-banking-are-nonbanks-future-banking-cover-story?page=3>, accessed on 30 May 2017

regulatory challenges in terms of monitoring and assessing the risks involved.¹⁴³ Therefore, attempts have been made to respond through policy and regulation to control the risks that shadow banking poses. Due to the complexity of the Chinese political system, with the Communist Party on one side and the Socialist Party on the other, it proves challenging to follow the laws governing legal origins, such as civil codes and common laws which can assist in measuring the level of protection by means of which the investors may be covered.

China was the major exporter of goods to the US¹⁴⁴ and when the financial crisis hit the US in 2008, China also suffered the consequences. Their global exports reduced drastically after the crisis and there was a rise in local production.¹⁴⁵ Co-dependency¹⁴⁶ between these two countries was created — this dependency was based on China's external demand to supply its goods and the US needing China as a provider of low-cost goods for US consumers.¹⁴⁷ As per US trade data, the total trade between these two countries from 1980–2014 rose from \$5 billion to \$592 billion.¹⁴⁸

In 2013, shadow banking in China increased by 34 percent as compared to the global average of 7 percent, suggesting that their reliance on the US has the potential to create negative turnover for both countries.¹⁴⁹ In view of the welfare of both countries,¹⁵⁰ China must reduce their off-balance sheet credit. Wealth management products, alternative products to bank deposits, were initially offered by traditional banks with market returns. Such products have been absorbed into shadow banking activities, with higher scant returns than banks.¹⁵¹ It is important to strengthen the strict regulation of risky shadow banking activities which could destroy the interconnectedness of formal and informal markets. This step would improve control of transactions and exchange of assets, and hidden assets would eventually

¹⁴³ Cindy Li 'The changing face of shadow banking in China,' Federal Reserve Bank of San Francisco December 2016 at 6

¹⁴⁴ Lan op cit note 106 at 146; United States Trade Representative (USTR) 'The People's Republic of China' available at <https://ustr.gov/countries-regions/china-mongolia-taiwan/peoples-republic-china>, accessed on 3 February 2017; World Trade Organization 'WTO Country Profile-United States' available at <http://stat.wto.org/CountryProfile/WSDBCountryPFView.aspx?Language=E&Country=US>, accessed on 3 February 2017

¹⁴⁵ U.S.-China Economic and Security Review Commission 'U.S.-China economic and trade relations section 1: year in review: economics and trade' available at http://www.uscc.gov/Annual_Reports/2015-annual-report-congress, accessed on 15 January 2017; WTO Trade Database available at <https://wto.org>, accessed 3 February 2017; Lu Bai *Effects of global financial crisis on Chinese export: A gravity model study* (unpublished MA thesis in International Financial Analysis, Jönköping University in Jönköping, 2012)

¹⁴⁶ Lan op cit note 106 at 146

¹⁴⁷ Gil Lan 'Insights from China for the United States: Shadow Banking, Economic Development, and Financial Systems' (2015) 12 Berkeley Business Law 1 at 146

¹⁴⁸ Wayne M. Morrison 'China's Economic Rise: History, Trends, Challenges, and Implications for the United States' (2015) Congressional Research Service at 27

¹⁴⁹ Elliott, Kroeber & Qiao op cit note 11 at 17

¹⁵⁰ Lan op cit note 106 at 148

¹⁵¹ Elliott, Kroeber & Qiao op cit note 11 at 2

be reduced. The rise of shadow banking in China is largely due to the lower interest rates offered in traditional banks as compared to the shadow institutions.¹⁵² The maximum limit on interest rates is normally quite low.¹⁵³ This is a disincentive for investors, who are attracted to shadow banking activities due to the higher possible returns. This is because of the policies that are implemented in traditional banks to discourage investors in certain industries.¹⁵⁴ Non-bank activities have therefore become key factors in encouraging the economy,¹⁵⁵ a situation which has global implications.

Informal finance is characterised by activities which are illegal or suspected to be illegal.¹⁵⁶ Shadow banking overlaps with informal finance in certain ways, and both activities fall outside of regulated banking.¹⁵⁷ However, certain functions of shadow banking are linked to traditional banks, such as when regulated banks move liabilities off-balance sheet via intermediaries.¹⁵⁸ In addition, monetary interest in shadow banking involves larger segments than with informal finance. Shadow banking activities, being dodgy in nature, are exposed to higher risks than informal finance. A large number of loans are originated from bank transactions under shadow banking in China, so as to save banks from the strict banking regulations and high costs.¹⁵⁹ Shadow activities have more benefits¹⁶⁰ than traditional banking activities, and the rise of shadow activities is a consequence of these advantages. Because China is one of the most powerful economies in the world, a financial crisis in China may have a seriously negative impact on the global economy. The 2013 US Report to Congress¹⁶¹ confirms that international economies are threatened by China's poorly regulated credit system. Hess states that "with China as one of the world's most important economic engines, the growth shock would be felt globally via three transmission channels: direct and

¹⁵² Lu op cit note 135 at 585; Barghini op cit note 135

¹⁵³ Lan op cit note 106 at 171

¹⁵⁴ Elliott, Kroeber & Qiao op cit note 11 at 1; Cho op cit note 109 at 36; Morrison op cit note 106 at 27

¹⁵⁵ Wee & Guo op cit note 15 at 1; Chan op cit note 131 at 4; Cheng op cit note 133

¹⁵⁶ Lan op cit note 106 at 165. ``Kellee Tsai has categorized the most common forms in China broadly as (1) legal (interpersonal lending, trade credit, rotating credit associations (in some areas), pawnshops (in some areas)); (2) quasi-legal (rural cooperative associations (until 1999), fake collectives, red hats and hangon enterprises, mutual assistance societies or cooperative savings foundations, and pawnshops (in some areas)); and (3) illegal (professional brokers and money lenders (loan sharks), private money houses, rotating credit associations (in some areas), and pyramid investment associations (Ponzi schemes))``.

¹⁵⁷ Financial Stability Board op cit note 3 at iv.

¹⁵⁸ Huang op cit note 108 at 484; Liu op cit note 108 at 132; Elliott, Kroeber & Qiao op cit note 11 at 2

¹⁵⁹ Elliott, Kroeber & Qiao op cit note 11 at 1; Lan op cit note 106 at 147-148; Morrison op cit note 106 at 27-28

¹⁶⁰ Schwarcz op cit note 1 at 624

¹⁶¹ U.S.-China Economic and Security Review Commission 'Report to congress of the U.S.-China Economic and Security Review Commission (2013) 142 Available at <http://www.uscc.gov>, accessed on 05 February 2017. The report states that "The shadow banking system that Beijing has allowed to step into this credit gap is insufficiently regulated and, if left unchecked, will pose an increasingly serious threat to Chinese and global economic stability." See also Morrison op cit note 106 at 2-3; and Lan op cit note 106 at 148

indirect trade effects, business confidence effects, and lower commodity prices resulting from lower commodity demand”.¹⁶²

The checks and accounts in China do not offer much transparency¹⁶³ and this creates a clash with the strict US regulations.¹⁶⁴ The lack of transparency negatively affects Chinese investors trading on US exchanges and also poses a danger to US companies who have shares in Chinese markets. The US companies may cancel their agreements with Chinese companies. This chain of consequences may speed a recession at global level. Therefore, it is in the best interests of all economies that China improves its regulatory transparency in shadow banking to curtail the risk and revocation to access the US financial markets. To have effective macroeconomic stability, the development of the financial sector is a key factor for sustainable long-term growth.

Experts in the field of shadow banking have measured the scale of such functions in China.¹⁶⁵ Dr Yu “estimated the size at 25 trillion Chinese Renminbi (RMB), or 43 percent of GDP, in 2013. This compares to an estimate from the FSB that global shadow banking assets were equivalent to 120 percent of GDP”. Shadow banking in China operates at a smaller scale than in the US, where shadow activities constitute 150 percent of traditional banking activities.¹⁶⁶ However, this sector is large in China compared with other developing countries. Coupled with fast growth, these are solid reasons for serious concern.

In 2017, due to loose regulations on shadow banking in China, the sector attracted the growing risk in wealth management products, where investors transform their savings into financial products with promises of healthy returns.¹⁶⁷ However, the Chinese news media¹⁶⁸ reported that more than \$400 million of investment money had vanished. This is concerning news. The alluring wealth products often seem to be nothing more than forged products whose intention is to collect funds but provide no returns whatsoever.

¹⁶² Patrick Hess ‘How likely is a financial crisis in China? *The Diplomat* 17 November 2015, available at <https://thediplomat.com/2015/11/how-likely-is-a-financial-crisis-in-china/> / accessed on 24 November 2018

¹⁶³ Elliott, Kroeber & Qiao op cit note 11 at 22

¹⁶⁴ Lan op cit note 106 at 192

¹⁶⁵ Elliott, Kroeber & Qiao op cit note 11 at 2; Lan op cit note 106 at 148; Li op cit not 107 at 13

¹⁶⁶ Elliott, Kroeber & Qiao op cit note 11 at 1-2; Lan op cit note 106 at 185; Nickles & Schieber op cit note 67 at 101

¹⁶⁷ Don Weinland and Gabriel Wildau ‘Don Weinland in Hong Kong and Gabriel Wildau’ *Financial Times* 30 May 2017, available at <https://www.ft.com/content/35d4a832-3c50-11e7-821a-6027b8a20f23?mhq5j=e5>, accessed on 15 October 2017

¹⁶⁸ Wee & Guo op cit note 15 at 1

Political influence is strongly evident in China,¹⁶⁹ and transparency and more practical, constructive and user-friendly regulations are considered merely good intentions, which in practice produce challenges and fail to achieve an effective resolution.

8. THE ENVIRONMENT FOR SHADOW BANKING IN SOUTH AFRICA

In South Africa, the use of cash remains one of the main methods of payment, in spite of the electronic facilities available to make a financial transaction smooth and less risky. Another problem is the use of non-banking activities.¹⁷⁰ South Africa has one of the best banking systems in the world, but most of the population is under-banked and shadow banking dominates in offering credit intermediation to this segment of population. Deloitte¹⁷¹ further states that “what is of concern is that although there are more than 4 000 credit providers registered with the NCR, it was recently found by the body that in the troubled Marikana area, 10 of the 12 credit providers were not operating strictly within the regulations of the National Credit Act (NCA). In many cases practices that verged on ‘reckless lending’ were noted by the Department of Trade and Industry.”

However, one must not ignore the fact that shadow banking also assists poorer people in obtaining credit facilities and at the same time brings healthy competition to the regulated banking sector — a strong driver of economic activity. But the non-bank activities pose systemic risks if they are not monitored correctly.

South African traditional banks dominate asset-based finance.¹⁷² One may observe that other assets are controlled by other financial intermediaries (OFIs). OFIs are considered shadow activities which lead to systemic risk because they operate outside of traditional banking regulations. Nevertheless, it should be highlighted that shadow banking can attenuate challenges by creating affordable credit for low-income consumers and inducing competition to highly concentrated industries. By implication, shadow banking activities play a prominent

¹⁶⁹ Wee & Guo op cit note 15 at 2

¹⁷⁰ Lafferty Ltd ‘Banking the unbanked takes top priority’ (2005) Retail Banker International, London ed. at 2; Lisa Steyn ‘Banks get unreserved backing’ *Mail & Guardian* 31 October 2014 at 2, available at <https://mg.co.za/article/2014-10-31-banks-get-unreserved-backing>, accessed on 12 June 2017; Donnelly op cit note 15 at 1-2

¹⁷¹ Deloitte ‘Shadow banking brings opportunities for financial intermediaries in the marketplace,’ available at <http://www.deloitteblog.co.za/shadow-banking-brings-opportunities-for-financial-intermediaries-in-the-marketplace/>, accessed on 24 November 2018.

¹⁷² South African Reserve Bank op cit note 12 at 13

role in expanding financial inclusion by furnishing credit to the unbanked, and providing access to credit and savings packages.¹⁷³

According to the SARB, there was slow growth in shadow activities between 2008 and 2014.¹⁷⁴ In comparison with the US and China, this gives a good indication that the shadow banking sector in South Africa is to some extent well controlled. On the other hand, it could also be due to the fact that the South African economy is not as highly financed as the US and China. The review confirmed that bank assets and shadow banking remained constant with no major increase.¹⁷⁵

As per the SARB, shadow banking comprises “money market funds, the non-equity portion of multi-asset funds, hedge funds, fixed-income funds, finance companies and securitisation activities. Credit insurance activities by insurance companies are also included in the shadow banking measure”.¹⁷⁶ However, not much research on the shadow banking sector in South Africa has been done to evaluate the potential risks associated with this sector.

Since the GFC, regulators in most countries, including South Africa, have implemented a strict and intensive approach to the supervision of financial markets. South Africa has implemented effective measures that bring it in line with developed countries with regard to the regulation of shadow banking activities.¹⁷⁷ But regulations require a balanced approach and implementation, in order to increase financial inclusion and ameliorate competition, as well as to avoid stagnant financial innovation.

The provisions of the banking sector regulations on non-bank activities are becoming more evident¹⁷⁸ — regulatory measures are necessary to control these activities, since the shadow banking sector can pose systemic risks to the financial sector. Furthermore, regulatory measures will promote investors’ confidence and maintain market conduct. The negative impact of the GFC did not severely affect the South African financial sector,

¹⁷³ Donnelly op cit note 15; Joseph Booysen ‘Debt shadows banking sector; Credit providers: A role to play in the economy’ Independent Newspapers 20 September 2013, available at <https://www.pressreader.com/south-africa/cape-argus/20130920/281998965149979>, accessed on 29 May 2017

¹⁷⁴ South African Reserve Bank op cit note 12

¹⁷⁵ Ibid at 20

¹⁷⁶ Ibid. See also Jones op cit note 5.

¹⁷⁷ Deloitte SA ‘Shadow banking brings opportunities for financial intermediaries in the marketplace’ (2013) Available at <http://www.deloitteblog.co.za/shadow-banking-brings-opportunities-for-financial-intermediaries-in-the-marketplace/>, accessed on 19 August 2017; Donnelly op cit note 15; South African Reserve Bank op cit note 12 at 13

¹⁷⁸ Republic of South Africa *A safer Financial sector to serve South Africa better* (2011) 24 National Treasury Policy Document

specifically shadow banking. But South Africa suffered in its real sector with job losses close to 1 million.¹⁷⁹

The World Bank Financial Inclusion Data for 2014 (Findex, 2014)¹⁸⁰ showed that South Africans borrowed largely from the informal financial sector. This scenario creates a potential financial threat if insolvency rates become considerable. It is noted that weak economic performance and tensions in the labour market threaten the outlook for South Africa's credit sector, which may trigger a strong disincentive on the part of investors.

In 2016 Barclays Plc announced its intention to reduce its shareholding in Barclays Africa Group Limited (BAGL) from 62.3 percent to 20 percent over a period of 3 years.¹⁸¹ The main reason was to respond to international regulatory pressures, and also to reduce potential risks resulting from transactions.¹⁸² This point may not directly be related to shadow banking, but it shows how the international regulatory banking system has become very alert and how hard rules are enforced concerning systemic risks.

International initiatives were created to strengthen the oversight and regulation of shadow banking through the G20,¹⁸³ of which South Africa is a member and whose regulations are adhered to by the National Treasury. South Africa is committed to global financial regulatory reform in the following areas: effective supervision, crisis resolution, addressing systemic issues, international assessment, and peer review.¹⁸⁴ In response to the GFC, and as part of the G20, South Africa has set four objectives:¹⁸⁵

1. The first objective is to set up a financial stability oversight committee, which entails the appointment of the SARB and the National Treasury to oversee the financial sector.¹⁸⁶ Consequently, the Minister of Finance and the Governor of the Reserve

¹⁷⁹ Ibid at 4. See also Jones op cit note 5.

¹⁸⁰ Asli Demirguc-Kunt, Leora Klapper, Dorothe Singer and Peter Van Oudheusden 'The Global Findex Database: Measuring Financial Inclusion around the World' (2014) 49 *World Bank Policy Research Working Papers*

¹⁸¹ South African Reserve Bank op cit note 12 at 26.

¹⁸² London Stock Exchange 'Proposed placing of Shares in Barclays Africa' available at <http://www.londonstockexchange.com/exchange/news/market-news/market-news-detail/BARC/12803801.html>, accessed on 30 May 2017; Barclays 'Frequently asked questions about Barclays PLC sell-down' (2016) available at <https://www.barclaysafrica.com/about-us/who-we-are/plc-sell-down/>, accessed on 19 August 2017; Business Day 'Politicians furious about sale of Barclays Bank Zimbabwe to Malawi' 19 June 2017 available at <https://www.businesslive.co.za/bd/companies/financial-services/2017-06-19-politicians-furious-about-sale-of-barclays-bank-zimbabwe-to-malawi/>, last accessed on 19 August 2017

¹⁸³ G20 Available at:

https://www.g20.org/Webs/G20/EN/G20/Participants/participants_node.html;jsessionid=1367FC27720EF19179F63F3DC58FB6EB.s2t1, accessed on 12 February 2017.

¹⁸⁴ Republic of South Africa op cit note 164 at 4

¹⁸⁵ Ibid.

¹⁸⁶ Ibid

Bank have a joint task to supervise and regulate market conduct. Within the same objective, three initiatives¹⁸⁷ were set:

- a) The Council of Financial Regulators¹⁸⁸ was established to coordinate regulatory provisions, to provide enforcement, and to appoint an Independent Board of Auditors.
 - b) Improved banking and financial crisis resolution¹⁸⁹ frameworks were set up, which entails improved inter-agency coordination and setting contingency strategies in the crisis management structure.
 - c) International Peer Review¹⁹⁰ involves reviewing South Africa's compliance with international regulations concerning banking, insurance and securities regulation. The assessment was performed in 2010 by the international regulations committee, which confirmed that South Africa's compliance with the said policies is very positive.
2. The second objective¹⁹¹ set by South Africa was consumer protection and market conduct, whose aim, among others, is to regulate unfair treatment of consumers in general. The Competition Commission was appointed to regulate banks' fees, which are extremely high, to expand the savings tools for savers, and to facilitate credit lines to small and medium entrepreneurs. The National Credit Regulator (NCR) will work closely with the Competition Commission on the expansion of credit lines.
 3. The third objective¹⁹² focuses on expanding access to finance through financial inclusion, with the aim of developing credit lines for low-income consumers, including consumers based in rural communities, but with firm initiatives so as not to implement reckless credit.
 4. The fourth and fifth objectives¹⁹³ were created with a view to combatting financial crimes, and managing policy trade-offs and competing objectives. These objectives will not be discussed in detail in this research. However, it is noted that shadow banking is regulated by the NCR, with strict rules prohibiting excessive lending and to protect South African financial stability. As per the NCR, all entities aiming to

¹⁸⁷ Republic of South Africa op cit note 164 at 5

¹⁸⁸ Ibid.

¹⁸⁹ Republic of South Africa op cit note 164 at 6

¹⁹⁰ Ibid.

¹⁹¹ Ibid.

¹⁹² Republic of South Africa op cit note 164 at 7

¹⁹³ Ibid.

provide loans to single persons and legal entities are required to register with the NCR of South Africa.¹⁹⁴

Although setting up a regulatory environment for shadow banking that complies with international standards is highly important, overregulation may also bring unintended consequences. For instance, South Africans may look for products outside the traditional banking system. Less regulation and more transparency is needed in the current financial market. Transparency is required so that potential investors may get a fair price based on the risks involved. The first step towards transparency would be to trace all shadow banks that are not listed but that furnish credit activities, and this is a very challenging task. The second step would be rigorous supervision of non-bank activities with the relevant authorities' support.

It should be noted that even though South Africa is part of the G20, international regulations may not meet with the economic needs of the country. It is, therefore, necessary to promote awareness to unbanked consumers to open bank accounts and understand the advantages of using such services. South Africa's shadow banking system has expanded, growing from approximately 13 percent of financial assets of all financial intermediaries to 18 percent by the end of 2014.¹⁹⁵

9. PROPOSALS FOR SHADOW BANKING REFORM IN SOUTH AFRICA BASED ON THE EXPERIENCE OF THE US AND CHINA

In this research, the author has discussed how shadow banking operates in the US and China, and how the system shows vulnerability during periods of financial crisis. A great deal of focus has been directed towards flaws detected in the regulatory frameworks of these countries. In China, the socio-political system was born out of a mixture of socialist thought and Chinese culture and history. If China attempts to adopt the US shadow banking system, it may not work well due to China's socioeconomic context. A common problem experienced by these two countries is the degree of support that their governments are prepared to offer to the economic sectors that are important. For instance, during the GFC, the US automotive industry was failing and the government had to disburse \$79.7 billion in bailout funds to

¹⁹⁴ National Treasury "Treating Bank Customers More Fairly: Invitation to comment on the South Africa Retail Banking Diagnostic" at 3

¹⁹⁵ "Changing patterns of financial intermediation: Implications for central bank policy" South African Reserve Bank BIS Papers No 83 at 348

ensure its survival.¹⁹⁶ China faced a similar experience during the GFC and monetary stimulus packages were implemented to prevent a complete melt-down of the financial markets.¹⁹⁷

In the US, the DFA is so complex and difficult to understand that even regulators are facing challenges in implementing hard rules, as mentioned in section 5, which discusses some of the main elements of this Act. However, in the event of a similar future financial collapse, the implementation of the DFA offers more systemic stability when large shadow transactions may take place.

In South Africa, banks should offer affordable lending packages that are less onerous for compliant consumers, and should allow small and medium entities to expand in the financial markets. Awareness is also necessary on the part of unbanked consumers when investing in financial markets outside of regulated banks. It is emphasised that shadow banking directly funds the economy. However, unsecured debts pose a high risk for the economy, and therefore monitoring exercises should be conducted on shadow banking. The NCA made the right move to control over-indebtedness by offering measures to reconstruct debts. Other than shadow banks being regulated through the NCA, transparency is needed to strengthen the regulation on these activities and to transform this system into a resilient financial market. On the other hand, it should always be taken into account that over-regulation may also impede the growth of the economy.

A coordinated global effort has been made to develop instruments for substantial system reform, and South Africa has cooperated with this effort. After the GFC of 2007–2008, regulators at global level became more stringent in terms of oversight. South Africa, being a member of several multilateral institutions, such as the Basel Committee on Bank Supervision,¹⁹⁸ has committed to implementing the stricter global regulations to ensure a safer banking environment. Such coordinated action is necessary to prevent a melt-down of the national and global financial system, and to oversee and build stronger financial sector regulations. The stricter global regulations that South Africa is committed to enforcing include the involvement of central banks and regulatory agencies, engagement with foreign

¹⁹⁶ U.S. Department of the Treasury, Office of Financial Stability ‘Financial Report for Troubled Asset Relief Program — Fiscal Year 2014’ at 6-7 Available at <http://www.treasury.gov/initiatives/financialstability/reports/Documents/FY2014%20OFS%20AFR%20FINAL%20-%20Nov%206%202014.pdf> accessed on 12 February 2017

¹⁹⁷ Linda Yueh ‘China’s Strategy towards the Financial Crisis and Economic Reform’ (2012) 38. Available at indayueh.com, accessed on 12 February 2017.

¹⁹⁸ National Treasury ‘Implementing a Twin Peaks model of financial regulation in south Africa’ Financial Regulatory Reform Steering Committee, 1 February 2013 at 2.

governments, and cooperation with finance ministers — all working with the objective of securing a healthy global finance sector.

In April 2009, the FSB was created with the objective of coordinating the development and promotion of effective regulations in compliance with international laws.¹⁹⁹ In addition, this body has the task of supervising and regulating shadow banking, as well as creating and implementing strategies for crisis management and to provide resolutions for financial institutions. Global reforms were created, with consideration of domestic reforms. Each G20 country has already started the implementation of these international laws by enacting supportive domestic laws.²⁰⁰

In August 2016, the FSB²⁰¹ stated that the key lies in “transforming shadow banking into resilient market-based finance through strengthening oversight and regulation of the shadow banking system.” It should be noted that domestic policies are more likely to succeed, considering the backlash against future trade agreements and further global markets, and the fact that global reforms can be difficult to implement fully. Certain steps need to be taken to ensure that shadow activities are regulated as per their risk profile. According to the FSB,²⁰² in order to curb the risks linked to shadow banking, South Africa must:

1. mitigate the spill-over effects between the regular banking system and the shadow banking system;
2. reduce the susceptibility of money market funds (MMFs) to “runs”;
3. assess and align the incentives associated with securitisation;
4. dampen risks and pro-cyclical incentives associated with securities financing transactions, such as repos and securities lending that may exacerbate funding strains in times of market stress; and
5. assess and mitigate systemic risks posed by other shadow banking entities and activities.

¹⁹⁹ Financial Stability Board ‘About the FSB’ Available at <http://www.fsb.org/about/history/>, accessed on 12 February 2017.

²⁰⁰ Financial Stability Board publications, available at <http://www.fsb.org/publications/g20-reports/>, accessed on 12 February 2017.

²⁰¹ Financial Stability Board ‘Implementation and Effects of the G20 Financial Regulatory Reforms’ available at <http://www.fsb.org/2016/08/fsb-reports-to-g20-leaders-on-financial-regulatory-reforms/> accessed on 12 February 2017.

²⁰² Financial Stability Board ‘Transforming Shadow Banking into Resilient Market-Based Finance – Implementation’ available at: <http://www.fsb.org/what-we-do/implementation-monitoring/monitoring-of-priority-areas/transforming-shadow-banking/> accessed on 25 November 2018

In South Africa, the regulation is extended to the point of unofficial financial activities and credit-rating agencies, including over-the-counter derivative markets.²⁰³ However, in spite of all the regulations implemented, the South African economy is mainly cash-based, because of the large informal sector. As such, suspicious transactions are bound to happen through unregulated investment vehicles. This makes security markets vulnerable to unregulated activities, and therefore calls for adequate due diligence in banks' activities.

South Africa is an active participant in the FSB shadow-banking project, which is a yearly monitoring exercise. Due to systemic risk, it is generally agreed that all bank-like activities outside the traditional banking sector should be adequately regulated in line with the risk that they pose to the financial system and also to promote a level playing field.²⁰⁴ South Africa has made strides in ensuring that risks are mitigated through tight regulations to the banking sector as well as shadow banking activities. However, it is also true that the tight regulation of banks and shadow banking activities may result in disintermediation, which can stifle the growth of the financial sector and the economy as a whole. It is therefore essential to implement smart regulatory reforms that minimise risks but facilitate growth. These reforms are as follows:

- a) Firstly, there is a need to formulate a commonly agreed definition of shadow banking based on the credit provision measures and maturity transformation outside the traditional banking sector, while referring to the resulting risk exposure. This will help identify which shadow banking activities should be included in the regulations and which ones should not.
- b) Secondly, while there is a need for enhanced regulatory supervision, there is also a need to review the regulatory requirements to ensure that they are in line with the risk profiles and capacities of the various firms involved in shadow banking activities. As it stands, many entities are not in a position to afford the risk management infrastructure or the capital requirements imposed by the regulators. However, categories can be created once a common definition has been agreed on. On the other hand, tighter regulation can detrimentally affect entities conducting sound and well-regulated operations. It is important to highlight that when regulations linked to shadow banking are overly burdensome, small enterprises will not be able to comply with complex regulations, which will cause a contraction in the financial system.

²⁰³ Republic of South Africa op cit note 164 at 21

²⁰⁴ Sanches op cit note 31 at 7-8; Noeth & Sengupta op cit note 29 at 8; Unger op cit note 27 at 6

Transparency is needed, rather than strict regulation, as stated by N. Visser, deputy chairperson of the CFA society of South Africa.²⁰⁵

- c) Thirdly, it is important for the regulators to apply smart regulation and ensure oversight over financial activities. It should be noted that the scope of shadow banking is broad and may have far-reaching implications, especially for lending and credit provision transactions outside the traditional banking system that are funded by short-term liabilities. One of the significant challenges is the ability to identify all firms providing such credit. Additionally, there has not been sufficient regulation on the access to the funding profiles of such entities.
- d) Lastly, despite some corrective measures having been taken to improve the regulations on shadow activities, this system is largely unregulated. There remains a strong possibility of avoiding the levies on financial deals, affecting the profitability of financial institutions. In other words, the systemic risks of shadow banking still pose a global threat.

10. CONCLUSION

This paper has discussed how shadow banking operates in the US, China, and South Africa. It is clear that co-dependency between China and the US has brought worldwide attention to the practices of shadow banking. The GFC caused a meltdown of the US markets, and the uncontrollable spread of shadow banking in China has the potential to cause hazardous repercussions on the Chinese economy, the US and the rest of the world if reforms are not implemented efficiently to control shadow activities. Many writers in this field support the regulation of shadow banking in order to protect global economic growth. However, the proliferation of informal markets and certain socio-political issues create barriers to implementing stringent regulations in China.

A good example of US reforms is the DFA. However, in the US, fine-tuning the legislation and policies that prevent the threat posed by shadow banking will be a difficult task due to the DFA's complex regulations that push investors to look for less onerous financial packages. Shadow banking in the US has contributed meaningfully to the economy,

²⁰⁵ Donnelly op cit note 15. Visser warned that: More regulation does not guarantee that "shenanigans don't take place. That is part of the dilemma that we face. You can't regulate for ethical behaviour. If anything, overregulation risked making it more onerous for the compliant market participants, but failed to stop those that operate unlawfully, she said. The realm of microfinance was an example. "You are closing the door to smaller enterprises ... that want to innovative and expand the broadness of out-financial market but they can't afford to be compliant".

but ultimately a financial bailout was needed to preserve the existence of key industries. However, the overzealous approach by the US may slow productivity.

US president Donald Trump recently announced the planned repeal in full of the DFA or the rolling back of major portions of the law.²⁰⁶ In addition, Trump has directed the US Treasury secretary to review the Act with the objective of bringing positive improvements to the banking sector.²⁰⁷ It is going to be a difficult task because financial institutions in the US are regulated by different agencies.²⁰⁸ It is also not clear what such actions will do to the financial system.

South Africa follows international banking laws to mitigate the risks emanating from shadow activities. Despite this compliance, the activities of the informal sector cause irregular transactions that have a negative impact on the financial sector.²⁰⁹

It should, however, be noted that major progress has been made. Global awareness and mitigation of the threat posed by shadow banking has produced various reforms for the improvement of the global finance sector. The authorities acknowledge that banking systems must be reformed in order to become more resilient. What remains is for South Africa to implement reforms that would result in smart regulation of the financial sector, where there is proactive oversight that does not stifle the growth of alternative sources of finance.

²⁰⁶ Ben Protessjan 'Republicans' Paths to Unraveling the Dodd-Frank Act' *New York Times* 30 January 2017, available at https://www.nytimes.com/2017/01/30/business/dealbook/republicans-unravel-dodd-frank-act.html?_r=0, accessed on 02 June 2017; Aaron Klein 'Trump's executive order on Dodd-Frank' *Brookings* March 20, 2017, available at <https://www.brookings.edu/blog/unpacked/2017/03/20/trumps-executive-order-on-dodd-frank/>, accessed on 02 June 2017; Bob Bryan 'Trump is expected to sign executive orders that would repeal 2 huge Wall Street regulations' *Business Insider* 03 February 2017, available at <http://www.businessinsider.com/trump-executive-order-repeal-dodd-frank-fiduciary-rule-2017-2>, accessed on 02 June 2017

²⁰⁷ Ibid

²⁰⁸ Forbes available at www.forbes.com accessed on 12 February 2017; John Cox 'Why it won't be easy for Trump to repeal Dodd-Frank' *CNBC* 21 Nov 2016, available at <http://www.cnbc.com/2016/11/21/repeal-dodd-frank-it-wont-be-easy-for-donald-trump-to-end-the-rule.html>, accessed on 02 June 2017; Robert Schmidt, Jesse Hamilton & Elizabeth Dexheimer 'Dodd-Frank's Tentacles Go Deep. They Won't Be Cut Fast or Easily' *Bloomberg* 06 February 2017, available at <https://www.bloomberg.com/politics/articles/2017-02-06/dodd-frank-s-tentacles-go-deep-they-won-t-be-cut-fast-or-easily>, accessed on 02 June 2017

²⁰⁹ Jones op cit note 5

BIBLIOGRAPHY

1. Adam J. Levitin 'Safe Banking: Finance and Democracy' (2015) 83 *The University of Chicago Law Review* 357
2. Allen, F. and E. Carletti. 'An Overview of the Crisis: Causes, Consequences, and Solutions' (2010) 10 *International Review of Finance* 1
3. Anastasia Nesvetailova 'Crisis of the Overcrowded Future: Shadow Banking and the Political Economy of Financial Innovation' (2014) 20 *New Political Economy* 3
4. Andreas Jobst 'What Is Securitization?' *Finance & Development* (2008)
5. Andrew Sheng and Ng Chow (eds) 'Bringing Shadow Banking into the Light: Opportunity for Financial Reform in China' (2015) *Fung Global Institute Report*
6. Asli Demirguc-Kunt, Leora Klapper, Dorothe Singer and Peter Van Oudheusden 'The Global Findex Database: Measuring Financial Inclusion around the World' (2014) *World Bank Policy Research Working Papers*
7. Bankenverband 'Regulation of shadow banking' *Association of German Banks*
8. Chi-Chur Chao, Mong Shan Ee and Jing Zhang 'Shadow Banking and Economic Development in Developing Countries: Evidence from China' *European Financial Management Association*
9. Cindy Li 'The changing face of shadow banking in China' Federal Reserve Bank of San Francisco December 2016 at 6
10. Claudio Borio & Piti Disyatat 'Global imbalances and the Financial Crisis: Link or no link?' (2011) 346 *BIS*.
11. Craig A. Zabala & Jeremy M. Josse 'Shadow credit and the private, middle market Pre-crisis and post-crisis developments, data trends and two examples of private, non-bank lending' (2014) 15 *The Journal of Risk Finance* 3 at 214-233
12. Daniel Sanches 'Shadow Banking and the Crisis of 2007-08' (2014) 7 *Business Review*
13. David Luttrell, Harvey Rosenblum & Jackson Thies 'Understanding the Risks Inherent in Shadow Banking: A Primer and Practical Lessons Learned' (2012) *Dallas FED* 18
14. Douglas Elliott, Arthur Kroeber and Yu Qiao *Shadow banking in China: A primer* (2015) The Brookings Institution
15. Douglas J. Elliott and Kai Yan 'The Chinese Financial System: An Introduction and Overview' (2013) *The Brookling Institute John L. Thornton China Center, Monograph Series No. 6*

16. Edward F. Greene and Elizabeth L. Broomfield ‘Promoting risk mitigation, not migration: a comparative analysis of shadow banking reforms by the FSB, USA and EU’ (2013) 8 *Capital Markets Law Journal* 1
17. Elijah Brewer III & Ann Marie Klingenhagen ‘Be careful what you wish for: The Stock Market Reactions to Bailing out Large Financial Institutions’ (2010) 18 *Journal of Financial Regulation and Compliance* 1 at 56-69.
18. Financial Stability Board ‘Shadow Banking: Strengthening Oversight and Regulation Recommendations of the Financial Stability Board’ (2011)
19. Financial Stability Board ‘Strengthening Oversight and Regulation of Shadow Banking An Overview of Policy Recommendations’ (2013)
20. Franklin Allen & Elena Carletti ‘An Overview of the Crisis: Causes, Consequences, and Solutions’ (2010) 10 *International Review of Finance* 1 at 1-26
21. Gary Gorton and Andrew Metrick ‘Regulating the Shadow Banking System’ (2010) *Brookings Institute* at 261, 269
22. G. B. Gorton and N. S. Souleles ‘Special Purpose Vehicles and Securitization’ in Mark Carey and René M. Stulz (eds) *The Risks of Financial Institutions* University of Chicago Press (2007)
23. Gil Lan ‘Insights from China for the United States: Shadow Banking, Economic Development, and Financial Systems’ (2015) 12 *Berkeley Business Law Journal* 1 (144)
24. Hester Peirce ‘Securities lending and the untold story in the collapse of AIG’ (2014) Working Paper No. 14-12 *Mercatus Center* at George Mason University
25. Jean-Philippe Vincent (ed) *The Shadow Banking System in the United States: Recent Developments and Economic Role* (2013) Trésor-Economics No. 113, Republic of France, Directorate General of the Treasury
26. Jeremy C. Stein ‘Securitization, Shadow banking & Financial Fragility’ (2010) 139 *Daedalus* 4
27. Jianjun Li ‘The Credit Size and Structure of Shadow Banking in China’ (2013) 6-7 *School of Finance CUFE*
28. John A. Pearce and Ilya A. Lipin ‘Special purpose vehicles in bankruptcy litigation’ (2011) 40 *Hofstra Law Review* 177
29. Jose C.V Davila ‘China’s banking industry’ (2012)
30. Julian Kolm ‘Securitization, Shadow Banking, and Bank Regulation’ (2015)

31. Karim Pakravan ‘Global financial architecture, global imbalances and the future of the dollar in a post-crisis world’ (2011) 19 *Journal of Financial Regulation and Compliance* 1, 18-32
32. Kellee S. Tsai ‘The Political Economy of State Capitalism and Shadow Banking in China’ (2015) *HKUST IEMS Working Paper No.* 2015-25
33. Kent, D. (2010, May 13). Securitized Banking and the Run on Repo Gary Gorton and Andrew Metrick (Discussion), NYU/Moody’s Credit Conference at 12
34. Kumiko Okazaki ‘Banking System Reform in China: The Challenges of Moving Toward a Market-Oriented Economy’ (Occasional Paper) *Rand's National Security Research Division* (2007)
35. Lafferty Ltd ‘Banking the unbanked takes top priority’ (2005) *Retail Banker International*
36. Lerong Lu ‘Private Banks in China: Origin, Challenges and Regulatory Implications’ (2016) 31 *Banking and Finance Law Review* 3, 585-599
37. Lesly M. M. Echarres *Introduction to the Shadow Banking System* (unpublished Master’s thesis in Economics, University of Porto in Porto, 2012)
38. Lu Bai *Effects of global financial crisis on Chinese export: A gravity model study* (unpublished MA thesis in International Financial Analysis, Jönköping University in Jönköping, 2012)
39. Małgorzata Solarz ‘The Importance of Shadow Banking Sector entities for population affected by credit exclusion’ (2013) 2 *Copernican Journal of Finance & Accounting* 2.
40. Marina Stoop *Credit Creation and its Contribution to Financial Crises* (unpublished MSc in Management, Technology, and Economics, Swiss Federal Institute of Technology Zurich, 2010)
41. Marshall D. Nickles and Jeffrey Schiebel ‘Shadow Banking In The United States And China: What Are The Risks?’ (2015) 19 *International Journal of Management & Information Systems* 3
42. Markus K. Brunnermeier ‘Deciphering the Liquidity and Credit Crunch 2007-2008’ (2009) 23 *Journal of Economic Perspectives* 1 at 77-100.
43. M Barr ‘The Dodd-Frank Act, One Year On’ in Viral Acharya et al. (eds) *Dodd-Frank: One Year On* Centre for Economic Policy Research (2011)

44. Mehmet F. Dicle and John Leventis ‘The impact of technological improvements on developing financial markets: The case of the Johannesburg Stock Exchange’ (2013) 3 *Review of Development Finance* 4 at 204-213
45. Michaela Dovicova *The Rise of Shadow Banking* (unpublished MA thesis in Economics, Charles University in Prague, 2014)
46. Michel-Henry Bouchet *Overcoming the Challenges – Globalization* Lulu Press, Inc. (2015)
47. National Treasury ‘Implementing a Twin Peaks model of financial regulation in south Africa’ Financial Regulatory Reform Steering Committee, 1 February 2013 at 2.
48. National Treasury ‘Treating Bank Customers More Fairly: Invitation to comment on the South Africa Retail Banking Diagnostic’ at 3
49. Nicholas Economides ‘The impact of the internet on financial markets’ (2001) 1 *Journal of Financial Transformation* 8.
50. Niels Philipsen and Guangdong Xu *The Role of Law and Regulation in Sustaining Financial Markets* Routledge (2014)
51. N Valckx et al ‘Shadow Banking around the Globe: How large, and how risky’ in International Monetary Fund *Global Financial Stability Report—Risk Taking, Liquidity, and Shadow Banking: Curbing Excess while Promoting Growth* (2014)
52. Otaviano Canuto and Swati Ghosh *Dealing with the Challenges of Macro Financial Linkages in Emerging Markets* World Bank Publications (2013)
53. Paul McCulley ‘The Shadow banking System and Hyman Minsky’s Economic Journey’ (2009) *CFA Institute* 5
54. Photis Lysandrou and Anastasia Nesvetailova ‘The role of shadow banking entities in the financial crisis: a disaggregated view’ (2014) 22 *Review of International Political Economy* 2
55. Republic of South Africa *A safer Financial sector to serve South Africa better* (2011) National Treasury Policy Document
56. Robert Unger ‘Traditional banks, shadow banks and the US credit boom – credit origination versus financing’ Deutsche Bundesbank Discussion Paper (2016) 11
57. Robin H. Huang ‘The Regulation of Shadow Banking in China: International and Comparative Perspectives’ (2015) 30 *Banking and Finance Law Review* 481
58. Roy Girasa ‘Shadow Banking: Nature, Regulation, and Developments’ (2016) 35 *Banking & Financial Services Policy Report* 12 at 5,6 and 16

59. R Du Randt 'An Empirical Study of Potential Risks of Shadow Banking in South Africa' (2014) at 7
60. Sali Bakare 'Banking, Mortgage and the Credit Industry in the USA' (2016) 21 *Journal of Internet Banking and Commerce* 1
61. Simon H. Kwan 'Financial Crisis and Bank Lending' (2010) Federal Reserve Bank of San Francisco Working Paper 2010-11
62. Stephan Luck and Paul Schempp 'Banks, Shadow Banking, and Fragility' (2014) *European Central Bank Working Paper Series* No 1726
63. Steven L. Schwarcz, Regulating Complexity in Financial Markets, 87 *Washington University Law Review* 211-268 (2009)
64. Steven L. Schwarcz, Regulating Shadow Banking, 31 *Review of Banking & Financial Law* 619-642 (2012)
65. South African Reserve Bank *Financial Stability Review* 1 ed (2016)
66. Suk Hi Kim & Connor Muldoon, University of Detroit Mercy The Dodd–Frank Wall Street Reform and Consumer Protection Act :Accomplishments and Shortcomings *Journal of Applied Business and Economics* Vol. 17(3) 2015
67. T Adrian & A B. Ashcraft 'Shadow Banking: A Review of the Literature' in Garrett Jones (ed) *Banking Crises: Perspectives from The New Palgrave Dictionary* (2016) 282-315
68. Tobias Adrian, Adam B. Ashcraft and Nicola Cetorelli *Shadow Bank Monitoring* Staff Report No. 638 September (2013)
69. Viktoria Baklanova 'Money Market Funds: An Introduction to the Literature' *University of Westminster Law School* (2010)
70. Viktoria Baklanova, Adam Copeland & Rebecca McCaughrin 'Reference Guide to U.S. Repo and Securities Lending Markets' (2015) 740 *New York FED*
71. Vinicy Chan 'The perils of shadow banking's expansion' (2011) 22 *Asiamoney* 10, 1-2
72. Viral V. Acharya 'The Dodd-Frank Act and Basel III: Intentions, Unintended Consequences, Transition Risks, and Lessons for India' *International Growth Centre Working Paper* (2011) 20
73. Wayne M. Morrison 'China's Economic Rise: History, Trends, Challenges, and Implications for the United States' (2015) *Congressional Research Service*
74. Weitseng Chen 'WTO: Time's Up for Chinese Banks -- China's Banking Reform and Non-Performing Loan Disposal' (2006) 7 *Chicago Journal of International Law* 7 (1)

75. Whalen R. Christopher ‘Why Fixing the ‘Shadow Banking’ Sector Is Essential for the U.S. Housing Market’ (2013). *Networks Financial Institute Policy Brief* No. 2013-PB-01
76. Xiangmin Liu ‘Shadow banking in China’ *Banking and Finance Law Review*
77. Yiping Huang *et al.* ‘Financial Reform in China: Progresses and Challenges China’ (2010) *China Macroeconomic Research Center*, Peking University
78. Zoltan Pozsar and Manmohan Singh ‘The nonbank-bank nexus and the shadow banking system’ (2011) *IMF Working Paper* 289
79. Zoltan Pozsar, Tobias Adrian, Adam Ashcraft and Hayley Boesky ‘Shadow banking’ (2013) 19 *Federal Reserve Bank of New York Economic Policy Review* 2, 1-16.

INTERNET SOURCES:

1. Aaron Klein ‘Trump’s executive order on Dodd-Frank’ *Brookings* March 20, 2017, available at <https://www.brookings.edu/blog/unpacked/2017/03/20/trumps-executive-order-on-dodd-frank/>, accessed on 02 June 2017
2. Alan Moreira ‘Is shadow banking good for the economy?’ *World Economic Forum* 18 September 2014, available at <https://www.weforum.org/agenda/2014/09/shadow-banking-economy-regulation/>, accessed on 18 August 2017.
3. Alan Moreira and Alexi Savov ‘Shadow banking and the economy’ *Vox* 16 September 2014 available at <http://voxeu.org/article/shadow-banking-and-economy>, accessed on 18 August 2017
4. Alasdair Pal ‘China fund managers dump banks as credit crunch fears punish investors’ *Investment Week* 01 July 2013 at 1, available at <https://www.investmentweek.co.uk/investment-week/news/2278319/china-managers-dump-banks-as-credit-crunch-fears-punish-investors>, accessed on 11 June 2017.
5. Alex Gray ‘The world’s 10 biggest economies in 2017’ *World Economic Forum* 09 March 2017, available at <https://www.weforum.org/agenda/2017/03/worlds-biggest-economies-in-2017/>, accessed on 15 October 2017
6. Allen T. Cheng ‘China’s Shadow Banking Sector Poses Growing Risks to Economy’ *Euromoney Institutional Investor* 07 March 2014 at 1, available at <http://www.institutionalinvestor.com/article/3317208/banking-and-capital-markets-banking/chinas-shadow-banking-sector-poses-growing-risks-to-economy.html?ArticleId=3317208#.WT7fHYVOLcc>, accessed on 11 June 2017

7. Barclays 'Frequently asked questions about Barclays PLC sell-down'(2016) available at <https://www.barclaysafrica.com/about-us/who-we-are/plc-sell-down/>, accessed on 19 August 2017
8. Ben Protessjan 'Republicans' Paths to Unraveling the Dodd-Frank Act' *New York Times* 30 January 2017, available at https://www.nytimes.com/2017/01/30/business/dealbook/republicans-unravel-dodd-frank-act.html?_r=0, accessed on 02 June 2017
9. Bob Bryan 'Trump is expected to sign executive orders that would repeal 2 huge Wall Street regulations' *Business Insider* 03 February 2017, available at <http://www.businessinsider.com/trump-executive-order-repeal-dodd-frank-fiduciary-rule-2017-2>, accessed on 02 June 2017
10. Brian Kantor 'Banks and shadow banking: Out of the shadows' *Investec Monthly Review* June 2014, available at <https://www.investec.co.za/research-and-insights/newsletters/monthly-view/june-2014/banks-and-shadow-banking.html>, accessed on 25 January 2017
11. Bryan J. Noeth and Rajdeep Sengupta 'Is Shadow Banking Really Banking?' October 2011 *Federal Reserve Bank of St. Louis*, available at <https://www.stlouisfed.org/publications/regional-economist/october-2011/is-shadow-banking-really-banking>, accessed on 25 January 2017
12. Business Day 'Politicians furious about sale of Barclays Bank Zimbabwe to Malawi' 19 June 2017 available at <https://www.businesslive.co.za/bd/companies/financial-services/2017-06-19-politicians-furious-about-sale-of-barclays-bank-zimbabwe-to-malawi/>, last accessed on 19 August 2017
13. Carin Smith 'Standard Bank joins Chinese bank to boost SA power generation' *Fin24* 06 December 2015, available at <http://www.fin24.com/Economy/standard-bank-joins-chinese-bank-to-boost-sa-power-generation-20151204>, accessed on 13 October 2017
14. Chris Wright 'Asia banking: China's shadow monster can't be stopped' *Euromoney* 06 October 2016, available at <http://www.euromoney.com/Article/3591657/Asia-banking-Chinas-shadow-monster-cant-be-stopped.html>, accessed on 11 June 2017.
15. Deloitte SA 'Shadow banking brings opportunities for financial intermediaries in the marketplace' (2013) Available at <http://www.deloitteblog.co.za/shadow-banking-brings-opportunities-for-financial-intermediaries-in-the-marketplace/>, accessed on 19 August 2017

16. Dexter Roberts 'China's Next Crisis Lurks in Shadow' *Bloomberg* 16 May 2013, available at <https://www.bloomberg.com/news/articles/2013-05-16/chinas-next-crisis-lurks-in-shadow-banking>, accessed on 14 October 2017
17. Dodd-Frank Wall Street Reform available at <http://www.cftc.gov/LawRegulation/DoddFrankAct/index.htm>, accessed on 03 February 2017.
18. Don Weinland and Gabriel Wildau 'Don Weinland in Hong Kong and Gabriel Wildau' *Financial Times* 30 May 2017, available at <https://www.ft.com/content/35d4a832-3c50-11e7-821a-6027b8a20f23?mhq5j=e5>, accessed on 15 October 2017
19. Don Weinland and Gabriel Wildau 'China's shadow banking crackdown shakes markets' *Financial Times* 30 May 2017, available at <https://www.ft.com/content/35d4a832-3c50-11e7-821a-6027b8a20f23>, accessed on 21 August 2017.
20. Dudley W. C 'Proceedings from the Center for Economic Policy Studies (CEPS) Symposium 2009: More lessons from the crisis' (2009) available at <https://www.bis.org/review/r091117a.pdf>, accessed on 18 August 2017
21. Ernie Lai King 'How China perceives SA as an investor destination (and it is not a rosy picture)' *Business Day* 04 January 2017, <https://www.businesslive.co.za/bd/opinion/2017-01-04-how-china-perceives-sa-as-an-investor-destination-and-it-is-not-a-rosy-picture/>, accessed on 14 October 2017
22. European Central Bank 'How could new technology transform financial markets?' available at https://www.ecb.europa.eu/explainers/tell-me-more/html/distributed_ledger_technology.en.html, accessed on 18 August 2017.
23. Financial Stability Board 'About the FSB' Available at <http://www.fsb.org/about/history/>, accessed on 12 February 2017.
24. Financial Stability Board 'Global Shadow Banking Monitoring Report 2013' available at http://www.fsb.org/wp-content/uploads/r_131114.pdf?page_moved=1, accessed on 21 January 2017
25. Financial Stability Board 'Global Shadow Banking Monitoring Report 2015' available at <http://www.fsb.org/wp-content/uploads/global-shadow-banking-monitoring-report-2015.pdf>, accessed on 12 January 2017

26. Financial Stability Board ‘Global Shadow Banking Monitoring Report 2016’ available at <http://www.fsb.org/wp-content/uploads/global-shadow-banking-monitoring-report-2016.pdf>, accessed on 27 May 2017
27. Financial Stability Board ‘Implementation and Effects of the G20 Financial Regulatory Reforms’ available at <http://www.fsb.org/2016/08/fsb-reports-to-g20-leaders-on-financial-regulatory-reforms/> accessed on 12 February 2017.
28. Financial Stability Board publications, available at <http://www.fsb.org/publications/g20-reports/>, accessed on 12 February 2017.
29. Financial Stability Board ‘Shadow Banking: Scoping the Issues’ A Background Note of the Financial Stability Board (2011), Available at http://www.fsb.org/wp-content/uploads/r_110412a.pdf, accessed on 25 January 2017
30. Financial Stability Board ‘Transforming Shadow Banking into Resilient Market-Based Finance – Implementation’ available at: <http://www.fsb.org/what-we-do/implementation-monitoring/monitoring-of-priority-areas/transforming-shadow-banking/> accessed on 25 November 2018
31. Forbes available at www.forbes.com accessed on 12 February 2017
32. G20 Available at: https://www.g20.org/Webs/G20/EN/G20/Participants/participants_node.html;jsessionid=1367FC27720EF19179F63F3DC58FB6EB.s2t1, accessed on 12 February 2017.
33. Gaston Gelos and Nico Valckx ‘The Growth of Shadow Banking’ *IMFBlog* 3 October 2014, available at <https://blogs.imf.org/2014/10/03/the-growth-of-shadow-banking/>, accessed on 18 August 2017.
34. Gaye Davis ‘China has become SA’s biggest trading partner’ available at <http://ewn.co.za/2015/11/05/China-has-become-SAs-biggest-trading-partner>, accessed on 13 October 2017.
35. Gillian Jones ‘Shadow banking 'not a risk to stability'’ *Business Day* 25 April 2014, available at <https://www.businesslive.co.za/bd/companies/financial-services/2014-04-25-shadow-banking-not-a-risk-to-stability/>, accessed on 26 May 2017
36. Governor Daniel K. Tarullo ‘Shadow Banking and Systemic Risk Regulation’ Washington, D.C. 22 November 2013, available at <https://www.federalreserve.gov/newsevents/speech/tarullo20131122a.htm>, accessed on 21 November 2018.
37. Ingrid Goodspeed ‘Out of the shadows: an overview of the shadow banking system’ Available at

- <http://financialmarketsjournal.co.za/oldsite/14thedition/printedarticles/shadowbanking.htm>, accessed on 25 January 2017
38. International Organisation of Securities Commissions 'Money Market Fund Systemic Risk Analysis and Reform Options' Consultation Report 27 April 2012, available at <http://www.iosco.org/library/pubdocs/pdf/IOSCOPD379.pdf>, accessed on 21 January 2017
 39. Jamie McGeever 'Global financial instability a risk, with or without pre-eminent U.S. dollar: BIS' *Reuters Business News* 10 May 2016, available at <http://www.reuters.com/article/us-markets-dollar-bis/global-financial-instability-a-risk-with-or-without-pre-eminent-u-s-dollar-bis-idUSKCN0Y10MC>, accessed on 15 October 2017
 40. Jealous Chishamba 'The Rising Dominance of Shadow Banking' *The Zimbabwe Independent* 24 October 2014, available at <https://www.theindependent.co.zw/2014/10/24/rising-dominance-shadow-banking/>, accessed on 26 May 2017
 41. John Cox 'Why it won't be easy for Trump to repeal Dodd-Frank' *CNBC* 21 Nov 2016, available at <http://www.cnbc.com/2016/11/21/repeal-dodd-frank-it-wont-be-easy-for-donald-trump-to-end-the-rule.html>, accessed on 02 June 2017
 42. Joseph Booysen 'Debt shadows banking sector; Credit providers: A role to play in the economy' *Independent Newspapers* 20 September 2013, available at <https://www.pressreader.com/south-africa/cape-argus/20130920/281998965149979>, accessed on 29 May 2017
 43. Laura E Kodres 'What Is Shadow Banking?' (2013) 50 *Finance & Development* 2, available at <http://www.imf.org/external/pubs/ft/fandd/2013/06/basics.htm>, accessed on 24 January 2017
 44. Linda Yueh 'China's Strategy towards the Financial Crisis and Economic Reform' (2012). Available at www.lindayueh.com, accessed on 12 February 2017.
 45. Lisa Steyn 'Banks get unreserved backing' *Mail & Guardian* 31 October 2014 at 2, available at <https://mg.co.za/article/2014-10-31-banks-get-unreserved-backing>, accessed on 12 June 2017
 46. London Stock Exchange 'Proposed placing of Shares in Barclays Africa' available at <http://www.londonstockexchange.com/exchange/news/market-news/market-news-detail/BARC/12803801.html>, accessed on 30 May 2017

47. Lynley Donnelly 'Bring shadow banks into the light' *Mail & Guardian* 10 July 2015, available at <https://mg.co.za/article/2015-07-10-bring-shadow-banks-into-the-light>, accessed on 27 May 2017
48. Morgan Ricks 'A Simpler Approach to Financial Reform' (August 1, 2013). *Vanderbilt Public Law Research Working Paper* No. 13-42. Available at SSRN: <https://ssrn.com/abstract=2316900> or <http://dx.doi.org/10.2139/ssrn.2316900>, accessed 03 February 2017
49. Muhamad A. Mohd-Farid 'Monitoring shadow banking and its challenges: the Malaysian experience' (2012). Available at <http://www.bis.org/ifc/events/6ifcconf/mohdfarid.pdf>, accessed on 12 February 2017.
50. Patrick Hess 'How likely is a financial crisis in China? The Diplomat' 17 November 2015, available at <https://thediplomat.com/2015/11/how-likely-is-a-financial-crisis-in-china/> / accessed on 24 November 2018
51. Payden & Rygel 'China's Financial System: Does a Crisis Lurk in the Shadows?' (2013) *IAFEI Quarterly* 22 http://www.iafei.org/quarterly/IAFEI_quarterly_22nd_issue.pdf, accessed on 24 January 2017
52. Richard Comotto 'Shadow banking and repo' Compiled for *ICMA's European Repo Council* 20 March 2012, available at <http://www.icmagroup.org/Regulatory-Policy-and-Market-Practice/repo-and-collateral-markets/ercc-publications/icma-ercc-reports/shadow-banking-and-repo/>, accessed on 18 January 2017
53. Robert Schmidt, Jesse Hamilton & Elizabeth Dexheimer 'Dodd-Frank's Tentacles Go Deep. They Won't Be Cut Fast or Easily' *Bloomberg* 06 February 2017, available at <https://www.bloomberg.com/politics/articles/2017-02-06/dodd-frank-s-tentacles-go-deep-they-won-t-be-cut-fast-or-easily>, accessed on 02 June 2017
54. Saule T. Omarova 'The Dodd-Frank Act: A New Deal for a New Age?' (2011) *Cornell Law Faculty Publications* (1023), available at <http://scholarship.law.cornell.edu/facpub/1023>, accessed 03 February 2017
55. Sophia Furber 'Shadow Banking hits 150% of GDP' *S&P Global Market Intelligence* 10 May 2017, available at <http://marketintelligence.spglobal.com/our-thinking/news/shadow-banking-assets-hit-record-150-of-gdp-financial-stability-board-says>, accessed on 27 May 2017
56. Sui-Lee Wee & Owen Guo 'Chinese Investment Scandal Highlights 'Shadow Banking' Risks' *New York Times* 19 April 2017, available at

https://www.nytimes.com/2017/04/19/business/china-minsheng-shadow-banking.html?_r=0, accessed on 27 May 2017

57. Swati Ghosh, Ines Gonzalez del Mazo and İnci Ötker-Robe ‘Chasing the Shadows: How Significant is Shadow Banking in Emerging Markets?’ (2012). 88 World Bank Economic Premise, available at <https://openknowledge.worldbank.org/handle/10986/17088>, accessed on 15 October 2017
58. Szu Ping Chan ‘The \$75 trillion shadow hanging over the world’ *The Telegraph* 30 October 2014, available at <http://www.telegraph.co.uk/finance/newsbysector/banksandfinance/11198457/The-75-trillion-shadow-hanging-over-the-world.html>, accessed on 27 May 2017
59. Tiziana Barghini ‘Shadow Banking: The Future of Banking?’ *Global Finance Magazine* 6 April 2015, available at <https://www.gfmag.com/magazine/april-2015/shadow-banking-are-nonbanks-future-banking-cover-story?page=3>, accessed on 30 May 2017
60. United States Trade Representative (USTR) ‘The People’s Republic of China’ available at <https://ustr.gov/countries-regions/china-mongolia-taiwan/peoples-republic-china>, accessed on 03 February 2017
61. U.S.-China Economic and Security Review Commission ‘U.S.-China economic and trade relations section 1: year in review: economics and trade’ available at http://www.uscc.gov/Annual_Reports/2015-annual-report-congress, accessed on 15 January 2017
62. U.S.-China Economic and Security Review Commission ‘Report to congress of the U.S.-China Economic and Security Review Commission (2013) Available at <http://www.uscc.gov>, accessed on 05 February 2017
63. U.S. Department of the Treasury, Office of Financial Stability ‘Financial Report for Troubled Asset Relief Program — Fiscal Year 2014’ Available at <http://www.treasury.gov/initiatives/financialstability/reports/Documents/FY2014%20OFS%20AFR%20FINAL%20-%20Nov%206%202014.pdf> accessed on 12 February 2017
64. World Trade Organization ‘China and the WTO’ Available at https://www.wto.org/english/thewto_e/countries_e/china_e.htm, accessed on 04 February 2017

65. World Trade Organization ‘WTO Country Profile-United States’ available at
<http://stat.wto.org/CountryProfile/WSDBCountryPFView.aspx?Language=E&Country=US>, accessed on 03 February 2017
66. Vitor Constâncio ‘Shadow banking - the ECB perspective’ (Speech). available at
<http://www.ecb.europa.eu/press/key/date/2012/html/sp120427.en.html>, accessed on 17 January 2017
67. Yoon Je Cho ‘The Banking System of the People’s Republic of China’ A study of financial markets. Available at
https://aric.adb.org/pdf/aem/external/financial_market/Republic_of_China/china_bnk.pdf, accessed on 29 January 2017
68. Zoltan Pozsar ‘Can shadow banking be addressed without the balance sheet of the sovereign?’ *Center for Economic Policy Research*, available at
<http://voxeu.org/article/shadow-banking-what-do>, accessed 25 January 2017