

## PERSPECTIVES OF THE SHADOW BANKING IN THE GLOBAL FINANCIAL ARCHITECTURE - REVIEW OF THE CASE WITH CHINA

**Abstract:** Existence of a parallel banking system along with the traditional banking system has been pointed out as one of the factors which caused the last financial crisis. This parallel system has been criticized because it offered financial products and services, which have been traditionally offered by the banks, in unregulated environment, meaning that the institutions conducting activities in the shadow banking should not adhere to the banking rules and regulations.

Because of lack of formal oversight and control, this system is considered to pose a threat for the financial stability as well as economic stability. Nevertheless, Chinese economy has considerably large shadow banking system, which is marked with constant growth. The size of the shadow banking system in China is created because this system is able to cover the financing gap which exists in the economy. It has been suggested that shadow banking system in China is directly creating portion of the economic growth.

Thus, policy makers should make an effort to develop a strategy for limiting the potential negative effects from shadow banking, and put emphasis on the positive effects which are brought by this sector.

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#### Keywords:

Shadow banking system, banks, credit,  
financing gap, economic development, China

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### 1. Introduction

The shadow banking system has been subject to substantial critics in the post crisis period and has been pointed out as one of the most important factors behind the occurrence of the last financial crisis. It has been argued that the existence of a financial system outside of the regulated banking system has contributed toward the increased promotion of high-risk financial products, which, in turn, negatively impacted the liquidity of the traditional banking system. Regardless of the criticism of shadow banking system, it should be argued whether this system has negative effect in all economies, or some of the economies will use this system to support their own growth.

The developments in the world economy, in the recent years, suggest shifts in the traditional positions of old and new economic powers. Recent developments with the announcement of a trade war between the United States and China as the world's two most powerful economies are just a culmination in the systemic approach of the Chinese state in conquering new markets and new economic player. The entrance of new economic player is evident through the Chinese investments in US bonds. Also, the economic presence through the financing of large infrastructure projects in several countries in Asia, Europe and Africa, is showing the expansion of China in new markets. This expansion of the Chinese

economy attracted interest considering some aspects of the Chinese economic system to better understand the opportunities and threats which are brought by growing presence of Chinese capital in the region. That's why there is an overview of the shadow banking system in China, its emergence characteristics, and its impact in one state with two systems. Thus, it is necessary to evaluate the real need for shadow banking and whether this system is jeopardizing the economic development or it supports the economic development.

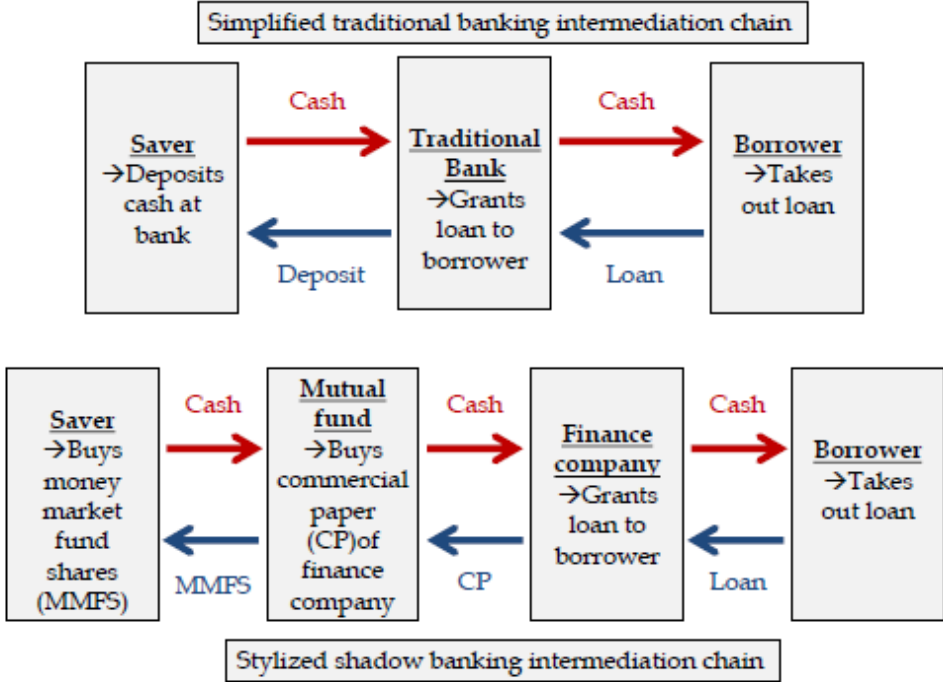
**2. Literature review**

**2.1 Defining the Shadow banking**

Shadow banking gained its popularity as result of the last financial crisis. The term shadow banking is representing all financial activities which are performed outside the formal banking system. More precisely, it refers to all entities and activities offering and using financial products similar to the products offered by the formal banking system (Lyman, Shrader, and Tomilova, 2015). According to the Financial Stability Board (FSB) shadow banking sector is defined as “credit intermediation involving entities and activities outside the regular banking system” (FSB 2011).

Figure 1 provides comparison regarding the functioning of the traditional banking system and shadow banking system.

Figure 1: Stylized credit intermediation chains



Source: Robert Unger (2016) *Traditional banks, shadow banks and the US credit boom – credit origination versus financing*, Deutsche Bundesbank, Discussion Paper No.16, pp.3

According to this presentation, it can be noticed that the flow of funds from savers towards borrowers is through an intermediation chain for both traditional and shadow banking systems. The main difference can be found in the flow of funds and the number of participants in the intermediation process. Namely, in the traditional banking system, the funds flow from the savers through the banks (intermediary) to the borrowers. While in the shadow banking system, the funds flow from the savers towards mutual funds which provide funds to the financial intermediaries which approves loans to the borrowers.

Aside of the difference in the intermediation chain there are other differences between the two systems as well. The traditional banks are under tight regulations and operate in heavily regulated environment. They are subject of regulatory requirements to maintain reserves as a protection against possible losses known as Tier1 and Tier2. Thus, these regulations are increasing the burden on bank's bottom line. Unlike traditional banking environment, shadow banking system is not regulated. Hence, financial intermediaries operating in the shadow banking system are not obliged to hold any reserves and they are not faced with high compliance costs and regulatory burden. As result of regulatory environment, the traditional banking system has the protection from the central bank which acts as lender of last resorts. Financial institutions in the shadow banking system do not have this option. Thus, in case of short-term liquidity problems, traditional banks have higher level of protection.

Another form of protection can be the protection of savers. The traditional banking system through Deposit protection schemes is providing certain protection of depositor's in case of bank runs, on the other side the savers in the shadow banking system don't enjoy this protection.

### 2.1. Reasons for shadow banking growth in China

Shadow banking in China has some differences when compared with the shadow banking system in developed economies. Namely, shadow banking system in developed economies is characterized with complex financial products. The shadow banking in China is offering much simpler financial products to its clients. But although simple financial products are offered, they are high-yield products. These high yield products have attracted large number of clients away from the regular banking system and into the shadow banking system. The shadow banking system in China is characterized with rapid growth in the last decade.

The shadow banking system in China could be categorized in three levels as defined in Table 1. The categorization has been introduced from its narrowest sense to its broad sense of shadow banking.

**Table 1: The Three Levels of China's Shadow Banking System**

	Characteristics	Non-traditional credit financing activities involved	Estimated scale (¥ trillion)
The narrowest sense	Unregulated or unlicensed	Private lending, third-party money management, online credit financing, unregistered private equity funds	6
The narrow sense	Credit intermediation outside the banking system, including the narrowest items	Products involved in the narrowest sense of shadow banking, plus, money management, trust, finance companies, MMFs, asset management for clients, financing business of funds and insurance subsidiaries, asset securitization, etc.	21
The broad sense	Non-traditional credit financing within the banking system, plus the narrow sense items	Inter-bank business for credit expansion, and a small portion of letter-of-credit drafts, and payment services	27

*Source: Zheng Liansheng (2015) The Shadow Banking System of China and International Regulatory Cooperation, Centre for International Governance Innovation, New thinking and the new G20: Paper no.6, pp. 2-7.*

It is evident from Table 1 that the shadow banking system in China coexists separately from the traditional banking system. But in the broad sense the shadow banking system and the traditional

banking system have certain overlapping when offering credit to the economic entities. The reasons for rapid growth of shadow banking system can be found in the coexistence of both banking systems. Namely, because the two systems coexist as a parallel system to the traditional banking, the reason for growth of shadow banking can be grouped into two categories.

Namely, there are bank-related reasons as well as borrowers'-related reasons. The first category is taking into account possible reasons which forced the creation of institutions in the shadow banking industry. Also, this category explains the reasons because of which banks have entered the shadow banking sector through their off-balance sheet activities. Second category is taking into account entities in need of credit, meaning that new regulations imposed on the banking sector have limited the access to finance for certain entities.

- Bank related reasons for growth of shadow banking system (supply side)

The last financial crisis has raised the question regarding the capability of Basel II standards to regulate the banking sector. Thus, after the financial crisis a new set of rules have been introduced, and these new regulations served the purpose to eliminate any identified weaknesses in the Basel II framework. The new regulation known as Basel III framework should limit bank operations regarding the undertaking of high-risk financial activities (Pedro Hemsley and Rafael Morais, 2016). The new framework also imposed new set of capital requirements and these requirements were deemed as costly for the banks. It should be noted that the new regulations are not imposed on the shadow banking sector. Thus, the tight regulations and the high cost for compliance have created an environment for establishing financial institutions outside the regular banking system.

In addition, being faced with high compliance costs, banks have partly turned towards the shadow banking system in the desire to increase their profits. Banks have entered the shadow banking system through some form of cooperation with institutions operating in the shadow banking. In addition, banks have been able to perform such actions through the off-balance sheet activities. They use wealth management products to bypass some of the biggest obstacles such as the loan-deposit rates and loan quotas (Shalendra D. Sharma, 2014). The justification for the banks to offer wealth management products (WMP) is that they are able to enter the shadow banking system and earn high fees for different transactions. The regular banking sector is in desperate need to earn an income especially considering regulatory limitations on loan-to-deposit ratios cap. Meaning that regulation imposing a 75% loan-to-deposit ratios can be considered as one of the factors which led toward the need for regular banks to participate in shadow banking system (Kinda Hachem and Zheng Michael Song, 2015).

Aside of the aforementioned reasons responsible for the growth of shadow banking system, changes in the regulation could additionally support this growth. Some of the changes which could increase shadow banking activity are related to the possibility for increasing the profits in this sector. One such change could be in relation to capital and liquidity standards imposed on the regular banking system (Zoltan Pozsar, et al., 2003)

- Client related reasons for growth of shadow banking system (demand side)

Small and medium size enterprises demand for financial products from the shadow banking institutions have augmented the development of this system (Shen Zhang and Jing Wan, 2017). Another client related factor contributing toward growing shadow banking system is informal destimulation imposed by regulators when traditional banking sector lends funds to some industries (Douglas J. Elliott and YuQiao, 2015). These industries turn toward the shadow banking system to satisfy their need for credit. Thus, there is an additional increase in the demand for shadow banking products due to the inability of these industries to obtain finances in the formal financial markets. It could be said that the regulators are pushing entities in need of credit toward the shadow banking system

## 2.2. Risks and benefits of shadow banking

One of the biggest criticisms of shadow banking system is that it can adversely impact the country's financial system. Thus, any discussion regarding the shadow banking system is imposing the need for consideration of potential risks as well as benefits. Before, risks associated with shadow banking system are presented, the risk profiles of Chinese shadow banking should be presented. Table 2 serves the purpose to provide overview of the shadow banking system risk profiles in the Chinese economy.

**Table 2: Breakdown of China's shadow banking risk profiles**

	<b>Renminbi (trillion)</b>	<b>Percent of total shadow banking assets</b>	<b>Percent of GDP</b>
<b>The good risk</b>			
Entrusted loans	5.5		
Micro/private lending	4.0		
Bank acceptance bills	5.6		
Sub-total	15.1	58.5%	28.9%
<b>The bad risk</b>			
Wealth management products (40 percent of total, with rollover risk)	3.0		
Trust loans to local governments	1.3		
Sub-total	4.3	16.7%	8.2%
<b>The ugly risk</b>			
Wealth management products with dodgy assets	1.9		
Sub-total	1.9	7.4%	3.6%
<b>High risk (the bad plus the ugly)</b>	6.2	24.0%	11.9%
1) The good+the bad+the ugly	21.3		
2) Wealth management products (60 percent of total, in safe assets)	4.5		
<b>Estimated total shadow banking size (1+2)</b>	<b>25.8</b>		<b>49.3%</b>

*Source: Chi Lo (2013) What Ponzi Scheme, The International Economy, International Economy Publications Inc. pp. 33; 66-67.*

The shadow banking system in China can be break down into three risk profiles. It can be seen that the risk increases when shadow banking system increases as it incorporates complex financial products such as the wealth management products. But it should be pointed out that the good risk profile represents 58.5% of the total shadow banking assets, which is nearly 29% of GDP. The sheersize of the good risk could be an indicator that the entire shadow banking system does not pose risk for the financial system. Instead, risks associated with certain wealth management products should be perceived as risky activities.

Nevertheless, there are certain risks associated with shadow banking system. The major disapproval of shadow banking is that it may cause systemic risk, which will adversely impact economic growth. Hence, there is the risk of spillover effect to the banking sector because of the connection of regular banking sector with the shadow banking system (Zheng Liansheng, 2015). Thus, potential crisis or problems in the shadow banking system could spill over to the banking system. This could mean that the banking system might be faced with liquidity problems.

Shadow banking system is providing numerous benefits for the economy and the economic entities. For instance, shadow banking system offers the possibility for liquidity and specialization. Stated differently, through securitization, this sector allows for illiquid assets to be transformed into liquid securities, thus increasing the overall liquidity of the financial system (Karel Kabelík, 2014). In

addition, due to its decentralized nature, shadow banking can offer the possibility for specialization of financial institutions, unlike the regular banking where everything is performed in one bank (Karel Kabelík, 2014).

Another benefit would be that shadow banking is providing additional financial resources to the economy. Stated differently, funds which may be otherwise kept under the mattress are being injected into the economy through lending activities to small and medium enterprises.

### **3. The need for shadow banking**

The Chinese shadow banking system has been created on the bases of market forces. Its development is not a result of something being imposed in the economy, instead it is something which has been developed on the basis of increased demand for these financial products. In other words, the shadow banking system growth is related to the increased supply of funds flowing into the shadow banking system. Consequently, the need for shadow banking in China can be on the basis of:

- Credit availability – credit constrains;
- Eliminating barriers obstructing the access to finance;
- Reducing the cost of capital;
- Effect on the business cycle;
- Enabling diversification opportunities;

Justification behind the need for shadow banking can be found in the increased credit availability for economic entities (Sheila Judd, 2017). The increased credit availability could produce increased liquidity and eventually support economic development. Thus, it could be said that shadow banking in China has influenced the credit expansion causing credit-driven growth (Yan Liang, 2016a). It has been found that 1% increase in shadow banking could bring about 0,48% increase in real per capita GDP growth in the short run (Chi-Chur Chao, et al., 2017).

The need for shadow banking is additionally evident from the need for elimination of obstacles faced by small and medium enterprises access to finance (Chi Lo, 2013). Namely, SMEs are able to obtain funds through the shadow banking system, when the traditional banks reject them. Moreover, because shadow banking is increasing the credit availability in the economy, it can also have positive impact on the business cycle (Arkadiusz Sieroń, 2016).

The cost of capital has major impact on companies' ability to accumulate investment capital and conduct their everyday activities. Thus, the need for shadow banking can be seen in terms of its impact on companies cost of capital. Since shadow banking is increasing the credit availability, it can have positive impact on the capital cost for users (Chi-Chur Chao, et al., 2017). Stated differently, the shadow banking can decrease the cost of capital for the end users. Since shadow banking is offering the possibility for disintermediation and decentralization, it can positively impact the economic efficiency (Steven L. Schwarcz, 2016). Increase in economic efficiency occurs as a consequence from the lower cost of capital for companies. The shadow banking is enabling a diversification in the credit market and opens the access to finance for entities which are excluded from the regular banking system (Tri Vi Dang, et al., 2015).

For instance, the size of the shadow banking system in China could be an indicator about the demand for funds from the private sector not covered (served) by the formal banking sector. Thus, it should be noted that future methods for coping with the shadow banking “problem” should be directed towards satisfying this demand for money before any attempt to eliminate the existence of shadow banking.

Banks may be willing to take the risk to operate in the shadow banking sector because potential financial losses arising from the associated risk may be lower than the cost to comply with the strict regulatory framework.

#### **4. Conclusion and recommendations**

It is inevitable to say that shadow banking can pose a risk as well as an opportunity for the economic development. The direction of the effects arising from the shadow banking system could be in the hands of policy makers. The existence of a parallel unregulated banking system is considered to be one of the main reasons behind the financial crisis in 2008. Nevertheless, certain portion of the achieved economic development in China is attributed to this parallel banking system. The shadow banking system has satisfied the demand for credit for entities who were faced with limited access to finance from the traditional banking system. Economic participants were able to finance their activities because they were able to borrow money from the shadow banking system, which in turn produced increased economic activity.

For the purpose of grasping the benefits and elimination of adverse effects arising from shadow banking policy makers should develop adequate policies. These policies should not be towards the elimination of this system, instead they should intensify the positive effect arising from this parallel system.

Thus, policy makers should create a strategy serving the purpose of controlling the activities performed in the shadow banking system. By doing this, the problem of increased financing gap will be eliminated or at least limited, which in turn, will not have any major adverse effects on the development of private sector and economic growth accordingly.

#### **References:**

1. Arkadiusz Sieroń (2016) The Role of Shadow Banking in the Business Cycle, *The Quarterly Journal of Austrian Economics* 19, No. 4, pp. 309-329.
2. Chi-Chur Chao, et al., (2017) Shadow Banking and Economic Development in Developing Countries: Evidence from China The 2017 Symposium of Development and Institutional Economics pp. 2-10
3. Chi Lo (2013) What Ponzi Scheme, *The International Economy*, International Economy Publications Inc. pp. 33; 66-67.
4. Douglas J. Elliott and Yu Qiao (2015) Reforming Shadow Banking in China, *Economic Studies - Brookings*, pp. 2-4.
5. FSB (2011) Shadow Banking: Strengthening Oversight and Regulation, Recommendations of the Financial Stability Board, Financial Stability Board, pp. 1 – 5.
6. Karel Kabelík (2014) Shadow Banking, *Czech banking Association*, pp. 7-8.
7. Kinda Hachem and Zheng Michael Song (2015) The Rise of China's Shadow Banking System, *Society for Economic Dynamics*, pp. 2-5.
8. Pedro Hemsley and Rafael Morais (2016) Competing Banks in the Presence of an Unregulated Fringe, *Business Management Dynamics*, Vol.6, No.5, November, pp.30-36.
9. Robert Unger (2016) Traditional banks, shadow banks and the US credit boom – credit origination versus financing, *Deutsche Bundesbank, Discussion Paper No.16*, pp.3
10. Shalendra D. Sharma (2014) Shadow banking, Chinese style, *Economic Affairs*, Vol. 34, No. 3, pp. 340-352.
11. Shen Zhang and Jing Wan (2017) Do China's Shadow Banking Interest Rates Capture Its Monetary Policy Stance?, *Emerging Markets Finance & Trade*, Vol. 53, pp. 2686–2695.

12. Sheila Judd (2017) Shadow Banking: Non-bank Credit Intermediation Heightens Risks for the Global Financial System, Global Risk Institute, pp. 1-5.
13. Steven L. Schwarcz (2016) Shadow Banking and Regulation in China and Other Developing Countries, Duke Law School Public Law & Legal Theory Series, pp. 2-15.
14. Tri Vi Dang, et al., (2015) Shadow Banking Modes: The Chinese versus US System, Working Paper, Department of Economics, Columbia University., pp. 22-24.
15. Timothy Lyman, Leesa Shrader, and Olga Tomilova (2015) Inclusive Finance and Shadow Banking: Worlds Apart or Worlds Converging?, CGAP Brief, September, pp.1-2.
16. Yan Liang (2016a) Inside Shadow Banking in China: Credit Driven Growth vs. Financial Stability, Journal of Economic Issues, Vol. L No. 2 June, pp. 461-470
17. Zheng Liansheng (2015) The Shadow Banking System of China and International Regulatory Cooperation, Centre for International Governance Innovation, New thinking and the new G20: Paper no. 6, pp. 2-7
18. Zoltan Pozsar, et al., (2003) Shadow Banking, FRBNY Economic Policy Review, pp. 12-14.