

Analysis of the Condition of the Development of Cryptocurrency in China

Donglin Liu^{1,a,*}

¹Beijing-Dublin International College, Beijing University of Technology, 100124, Beijing, China
a.donglin.liu@emails.bjut.edu.cn

*corresponding author

Abstract: This article discusses the reasons behind the Chinese government's conservative attitude toward cryptocurrencies, despite the rapid growth of the cryptocurrency market in China. Cryptocurrencies have become popular in finance because of their advantages in privacy, permanence, and scalability. However, they also pose challenges, such as regulatory uncertainties and security risks. China has banned financial institutions from facilitating bitcoin transactions and imposed restrictions on cryptocurrencies. The article suggests that China's attitude towards cryptocurrencies may be due to their defects. Clear regulations and laws are needed to normalize transactions and issuance and mitigate policy risks. The article also provides some possible solutions based on the defects of cryptocurrencies.

Keywords: cryptocurrency, Chinese government attitude, digital currency

1. Introduction

Cryptocurrencies have garnered significant attention in the global financial arena, with their related technologies advancing significantly in recent years. As of 2021, the total value of all cryptocurrencies had reached \$2 trillion [1]. The primary differences between cryptocurrencies and other currencies revolve around their privacy, permanence, and scalability advantages [2]. These benefits have prompted numerous countries to actively promote the application and research of cryptocurrencies worldwide. However, the attitude and regulations towards cryptocurrency are different, and the Chinese government performs a complete ban on it. This article aims to give an analysis of the reason why the Chinese government holds such a conservative attitude towards cryptocurrencies and provides some suggestions to the Chinese government.

2. Case Analysis

Encryption currency has become a hot topic in the global financial field. The related technique of cryptocurrencies has developed much compared to many years ago, and the scale and range of its application improved rapidly. The origin of encryption currency can be retrospected to the early 2000s, former child actor Brock Pierce and William Quigley who is the chief executive of Worldwide Asset eXchange created a platform to have transactions for in-game tokens, and the total amount of all encryption currency has reached to \$2 trillion at the end of 2021 [3]. According to the data from CoinMarketCap, the total cryptocurrency market cap was reach the top of nearly \$3 trillion at the end of 2022, which is 3 times as one years ago [1] and ten times more than that of \$250 billion.

Blockchain technology is the basement of cryptocurrencies, one of which named Bitcoin is the first cryptocurrency. Bitcoin was created in 2009, and it also gets rapid progress in the last ten years.

According to the statistic from Yahoo Finance [4], the price of Bitcoin dramatically increases near the start of 2021 (see Fig. 1).

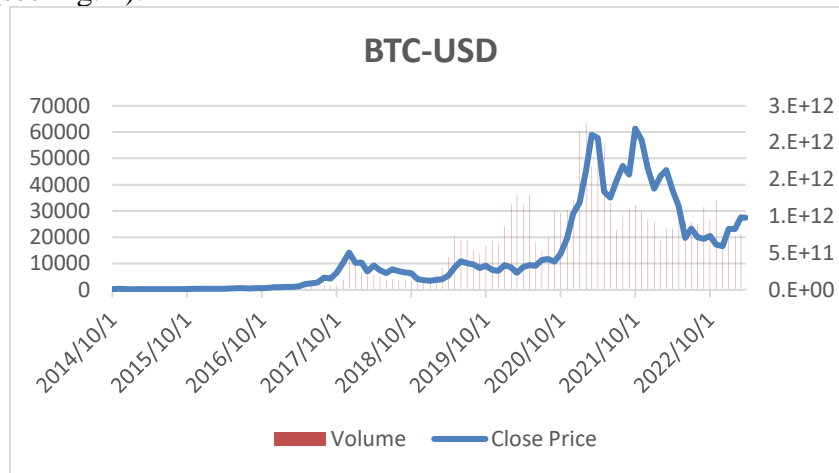


Figure 1: The price of BTC-USD from 2014 up to now.

The main differences between encryption currencies and other currencies are privacy, permanence, and scalability [2]. Privacy can be seen as the most important characteristic. Thanks to the blockchain technique, a cryptocurrency user can have transactions with another user without the participants of any financial intermediaries. Permanence means every transaction that happens on the blockchain will be sent to network nodes, which will verify this transaction and store it permanently. Therefore, nobody can change any transaction record using encryption currencies. Lastly, scalability means the blockchains have large storage which can store plenty of financial data.

Maybe it is because of the advantages of cryptocurrency mentioned above, many countries have begun actively promoting the application and research of cryptocurrencies worldwide. For example, Japan promulgated an act that defines Bitcoin and other virtual currencies as a kind of property value, and become the first country which commits cryptocurrencies as legal currency [5]. South Korea also promulgated a law to permit adult Korean to use accounts that have a real name in banks to transact Bitcoin, but the juvenile and foreigners still be forbidden [6]. Maciejasz-Swiatkiewicz and Poskart [7] conducted a study in Poland, the Russian Federation, and China to explore the concerning perception and use of encryption currency. The result shows that there was a huge difference between countries in the opinion and use of cryptocurrencies and seems to show that China is more willing to use cryptocurrencies.

In China, with the rapid development of the digital economy and financial technology, the cryptocurrency market has also grown rapidly. Recently, the scope of cryptocurrency applications in China is gradually expanding, including digital asset trading, investment, and financial management fields.

However, the Chinese government's attitude to cryptocurrency is still conservative, and some applications and transactions of cryptocurrency are still restricted. In 2014, the Chinese government forbade financial institutions to facilitate bitcoin transactions [8]. In 2018, the People's Bank of China announced to ban on all the Bitcoin mining industry in China. Such a law gives restrictions on the development and application of encryption currencies in China.

3. Analysis of the Problems

There are three kinds of countries based on their attitude to the application and development of cryptocurrencies, one kind for supporting the cryptocurrencies, another kind leaves them and the last kind prohibits their development of them. China's government belongs to the last category. The reason of

China government takes a such conservative attitude to the encryption currency can be analyzed from the defects of cryptocurrency. And these defects impede the development of encryption currency.

Firstly, uncertainty in law and regulations. Due to the unique characteristics of cryptocurrencies, it is hard for the government to regulate them, which will lead to uncertainties in the regulation and legislation of cryptocurrencies in some countries. Uncertain regulation will further bring policy risk, which is a crucial factor in the cryptocurrency market. As cryptocurrencies are a new financial tool, many countries lack corresponding laws and regulations to normalize transactions and issuance. This will increase uncertainty in the cryptocurrency market and poses risks to investors. For example, China has issued policies to ban ICOs and shut down cryptocurrency exchanges multiple times, which has had a significant impact on the cryptocurrency market. Cryptocurrency users may fear policy risks and stop using them.

Secondly, the security risk. Cryptocurrencies are built on blockchain technology, which is a decentralized and immutable ledger that records all transactions on the network. Though anonymity and its decentralized nature bring privacy and stability to cryptocurrencies, they also make cryptocurrency exchanges and wallets vulnerable to security risks. Cryptocurrency trading carries security risks because it takes place over the internet, and the real identities of the parties involved are unknown. For example, according to Irwin and Milad [9], Bitcoin, the most popular cryptocurrency provide a platform for terrorist groups to transmit illicit funds. Additionally, as cryptocurrency trading is decentralized, there is no central authority for regulation, making it susceptible to cyberattacks and theft. Incidents such as cryptocurrency exchange hacks and cyberattacks have caused losses for investors and raised doubts about the security of cryptocurrencies.

Thirdly, bubble risk. As the cryptocurrency market rapidly expands, investors are rushing to enter the market, but the volatility and instability of the market pose certain bubble risks. Incidents such as bitcoin price crashes have revealed instability and bubble risks in the cryptocurrency market. Because the cryptocurrency market is relatively small in size and influence, its prices are also susceptible to excessive fluctuations caused by speculators and media hype. Furthermore, the intrinsic value of cryptocurrencies is still a subject of debate, and it is difficult to accurately evaluate whether their prices are too high or too low, increasing the risk of market bubbles.

Fourthly, Cryptocurrencies are known for their extreme volatility, which makes them a popular target for speculators looking to profit from short-term market fluctuations. Speculative risk in cryptocurrency trading is primarily driven by the lack of regulation, which has led to a lack of oversight and transparency in the market. This has created an environment where market manipulation can occur more easily, which can cause price fluctuations that can be difficult to predict. In addition, many investors may be unaware of the risks involved in cryptocurrency trading or may lack proper investment knowledge. This can lead to blind following market trends or recommendations, which can result in significant losses. For example, cryptocurrencies are a decentralized digital currencies, every investor must keep their private key to access their property [10]. However, many investors suffer from financial loss because forget their private keys which cannot retrieve back. It is essential for investors to thoroughly research cryptocurrencies before investing and to have a sound understanding of the market and its risks. Investors engaging in cryptocurrency trading should exercise caution and carefully consider the risks involved. It is important to have a clear understanding of the market's volatility and to develop a sound investment strategy that takes into account these risks. It is also essential to stay up-to-date with market trends and to monitor news and regulatory developments that may impact the market.

Lastly, Cross-border transaction risk. One of the main challenges in the cross-border trading of cryptocurrencies is the lack of a uniform regulatory framework across countries. Different countries have taken different approaches to cryptocurrencies, and this has resulted in a patchwork of regulations that can be difficult to navigate. Some countries have outright banned cryptocurrencies, while

others have adopted more lenient regulations. For example, China banned all initial coin offerings (ICOs) in 2017 and cracked down on cryptocurrency exchanges in 2019, while countries like Japan have adopted a more welcoming approach, recognizing bitcoin as a legal currency and regulating cryptocurrency exchanges. The lack of a uniform regulatory framework for cryptocurrencies makes it challenging for investors to comply with regulations when trading across borders. They may have to navigate different laws, regulations, and reporting requirements in different countries. This can be a time-consuming and expensive process, and failure to comply with regulations can result in fines or legal action.

4. Discussion

Encryption currencies though have many defects and face difficulties in the process of promotion, the attitudes, and regulations towards them have changed a lot and may evolve shortly. Cryptocurrencies are newly developing techniques that are still not familiar to most people. Compared to other physical currencies, the virtuality of cryptocurrencies also discourages people who are serious about investing. It is also believed that young people are more likely to interact with encryption currencies such as Bitcoin and Ethereum than others. This is verified by Steinmetz, von Meduna [11], who conducted a representative online survey among 3864 Germans about the attitude and usage of cryptocurrencies. They found that the current owners of cryptocurrency are much younger than those who have never owned any. Therefore, as more and more young people grow up, and become financially independent, there will be more people who accept cryptocurrency and use it. In addition to that, Steinmetz, von Meduna [11] also found that there is a strong connection between high education level with owning cryptocurrency. They gave two possible reasons to explain this. Firstly, invest cryptocurrency needs high income and property, and greater educated people have more possibility to have them, which encourage them to accept and own cryptocurrency. What is more, highly educated people are easier to learn the knowledge of cryptocurrencies, find their advantage and defects and then invest in them. Therefore, if more people get high education, there may be more people trying to interact with cryptocurrencies.

Focus on the further development of cryptocurrency in China, there still needs more time to change the attitude of people and the environment of currencies markets. This paper tries to give some suggestions to the Chinese government to improve the current situation. The suggestions may solve the defects mentioned in the analysis part.

Encouraging the development of clear regulations and policies for cryptocurrencies. To address the issue of uncertainty in law and regulations, governments should work towards creating clear and comprehensive regulations for cryptocurrencies. This will provide greater certainty to investors, boost the confidence of the market, and facilitate its growth. Though the situation of the cryptocurrency market varied frequently, the Chinese government is supposed to accept it gradually instead of completely banning it. Actually, the complete crackdown on cryptocurrency in China also stimulated the development of the grey area to invest in digital financial assets [12]. Building a regular domestic cryptocurrency transaction environment can even further benefit the development of Web3 in China. Governments can take inspiration from countries like Japan, which have already established regulatory frameworks for cryptocurrencies.

Enhance security measures for cryptocurrencies. To address the security risks associated with cryptocurrencies, it is important to improve the security measures of cryptocurrency exchanges and wallets. This can be achieved by implementing advanced security technologies such as multi-factor authentication, encryption, and biometrics. Decentralized and immutable are two main characteristics of cryptocurrency, Government needs to improve security based on these two main characteristics.

Because many encryption currencies are based on the blockchain, so improve the robustness of contracts on the blockchain can be an essential solution. Governments can also provide support to cryptocurrency companies to help them enhance their security measures.

Increase awareness about the risks of investing in cryptocurrencies. Cryptocurrency is a newly developing technique, which appeals to many people to rush into the market. This blindness always brings the bubble risk and even causes more serious problems such as panic selling. Governments should educate the public about the risks involved in investing in cryptocurrencies, particularly the risk of market bubbles. This will help to reduce the number of people investing in cryptocurrencies without fully understanding the risks and the potential losses that they may face.

Develop innovative solutions to address the risks of cryptocurrencies. Because cryptocurrency is a newly developing technique, sometimes it is difficult to use basic or traditional methods to manage it. Using innovative techniques for assistance can be an ideal way to solve the encryption currency problem. Governments can work with the private sector to develop innovative solutions that can help to address the risks associated with cryptocurrencies. For example, blockchain technology can be used to improve the security and transparency of cryptocurrency transactions, while AI and machine learning can be used to identify and prevent fraudulent transactions.

Encourage international cooperation on cryptocurrency regulation. Given the global nature of cryptocurrencies, international cooperation is essential to effectively regulate the market. Chinese governments should work together to establish international standards and guidelines for the regulation of cryptocurrencies, which will help to ensure consistency and prevent regulatory arbitrage. It is helpful for the Chinese government to take inspiration from other countries.

5. Conclusion

In conclusion, cryptocurrencies have become a popular topic in the global financial field, and the total market cap reaching nearly \$3 trillion by the end of 2022. The main differences between cryptocurrencies and other currencies are privacy, permanence, and scalability, which bring unique advantages and defects to the cryptocurrency. However, the attitude of countries towards cryptocurrency varies, with some supporting, some leaving it alone, and others prohibiting its development such as China. China's conservative attitude can be attributed to the defects of cryptocurrency, including uncertainty in law and regulations, security risk, bubble risk, volatility risk, and cross-border transaction risk. While cryptocurrencies have many advantages, these defects have impeded their development and widespread adoption. It is crucial to address these issues to ensure the long-term sustainability and success of the cryptocurrency market.

Limitations of this article include a lack of detailed analysis of the attitude of Chinese people towards cryptocurrencies. Chinese people are the main part who participant in the cryptocurrency market, whose attitude also reflects the condition of the Chinese cryptocurrency market. Additionally, this article is based on an analysis of relevant literature in recent years. The limitation of this article is influenced by the result and conclusion of the reference literature.

Future research should focus on how to balance regulation and innovation in the cryptocurrency market to foster its development on the basis of mitigating the risks associated with it. Furthermore, more studies are supposed to explore how to address the concerns of investors and how to increase public awareness of cryptocurrencies.

References

- [1] CoinMarketCap, *Total Cryptocurrency Market Cap*. 2023.
- [2] Hashemi Joo, M., Y. Nishikawa, and K. Dandapani, *Cryptocurrency, a successful application of blockchain technology*. *Managerial Finance*, 2020. 46(6): p. 715-733.

- [3] Szalay, E. *History of cryptocurrency, from gaming tokens to a \$2tn market*. 2021; Available from: <https://www.ft.com/content/78431430-1afb-4712-bb75-424788c60583>.
- [4] Finance, Y., *Bitcoin USD (BTC-USD)*. 2023, Yahoo! finance.
- [5] Umeda, S. *Japan: Bitcoin to Be Regulated*. 2016.
- [6] Newar, B. *Amendment to Special Reporting Act Passes – Cryptocurrency Now Fully Legal in South Korea*. 2020; Available from: <https://thenews.asia/amendment-to-special-reporting-act-passes-cryptocurrency-trading-now-legal-in-south-korea/>.
- [7] Maciejasz-Swiatkiewicz, M. and R. Poskart, *Cryptocurrency Perception Within Countries: A Comparative Analysis*. *European research studies*, 2020. XXIII(Issue 2): p. 186-203.
- [8] Law Library of Congress (U.S.). *Global Legal Research Directorate, i.b. Regulation of cryptocurrency around the world : Albania, Algeria, Angola, Anguilla, Antigua and Barbuda, Argentina, Australia, Azerbaijan, Bahamas, Bahrain, Bangladesh, Belarus, Belgium*
- [9] Irwin, A.S.M. and G. Milad, *The use of crypto-currencies in funding violent jihad. Journal of money laundering control*, 2016. 19(4): p. 407-425.
- [10] Lee, D., *Handbook of digital currency: bitcoin, innovation, financial instruments, and big data*, ed. D. Lee Kuo Chuen and D. Lee. 2015, London;Amsterdam,: Elsevier/AP.
- [11] Steinmetz, F., et al., *Ownership, uses and perceptions of cryptocurrency: Results from a population survey. Technological Forecasting and Social Change*, 2021. 173: p. 1.
- [12] Alekseenko, A.P., *Ban of Cryptocurrencies in China and Judicial Practice of Chinese Courts. China and WTO Review*, 2022. 8(2): p. 361-384.