CENTRAL BANK DIGITAL CURRENCY: RENOVATING THE INDIAN FINANCIAL SECTOR

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I. INTRODUCTION

With the exponential growth of cryptocurrencies and stablecoins, the central banks of various countries decided to launch their own virtual currencies. A CBDC would be the most secure digital asset accessible to the general public, with no associated credit or liquidity risk, as it is a liability of the Central Banks.[2] Such an attempt, with the aim of revolutionising the Indian economy, and after the whopping success of the Unified Payments Interface (UPI), the Reserve Bank of India, in October 2022, launched the proposal for Central Bank Digital Currency (CBDC).

Currently, 95% of the global economy is trying to incorporate digital currencies into their economy. About 11 countries have fully launched digital currencies, and about 20 are in the experimental phase, including India.[3] India has entered its pilot phase with the launch of CBDC for a closed group.

The CBDC is also in the ore-launching phase in the United States as the Federal Reserve Board tries to weigh the pros and cons of digital currency and build an infrastructure for its introduction in the U.S. markets.[4]

CBDC can widely be classified into two categories: Retail CBDC and Wholesale CBDC. This distinction is made based on the sector in which the two are used.[5] Retail CBCDs are intended for usage by consumers, homes, and businesses, whereas financial firms are designed to employ wholesale CBCDs and would be available to select financial institutions.

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[2] Stanley, Andrew. (2022) *The Ascent of CBDCs, IMF*. Available at: https://www.imf.org/en/Publications/fandd/issues/2022/09/Picture-this-The-ascent-of-CBDCs.

[3] *Central Bank Digital Currency tracker* (2022) *Atlantic Council*. Available at: https://www.atlanticcouncil.org/cbdctracker/.

[4] *Central Bank Digital Currency (CBDC)* (2022) *Federal Reserve Board - Central Bank Digital Currency (CBDC)*. Available at: https://www.federalreserve.gov/central-bank-digital-currency.htm.

[5] *Central Bank Digital Currency (CBDC) pilot launched by RBI in the retail segment has components based on Blockchain technology* (2022) *Press Information Bureau*. Available at: https://pib.gov.in/PressReleaseIframePage.aspx?PRID=1882883.

II. GLOBAL SCENARIO

The first digital currency launched in any significant economy, RBM, was launched in China.[6] China began testing the Digital Yuan-Digital Renminbi in May 2020.[7] An analysis of the CBDC rolled out in China indicates that digital currencies are the way to the future and have exponential scope for improving the country's economy.

Digital yuan transactions surpassed the $14 billion (100 billion yuan) mark on October 10, in contrast to the $12 billion (87.6 billion yuan) recorded by the People's Bank of China at the end of 2021.[8] In its recent attempt to boost the adoption of the digital yuan, the Chinese CBDC wallet has decided to introduce the traditional red envelopes. As a consequence of the rise in popularity of digital payments, well-known local services like WeChat Pay and Alipaynow provide virtual red envelopes.

Fabio Panetta, a member of the European Central Bank (ECB) executive board, has been a prominent proponent of central bank digital currency (CBDC) and a critic of cryptocurrencies.[9] He is attempting to promote digital money, which will preserve the public's confidence as they transition to risky cryptocurrencies out of a sense of not wantingto miss out.

The Kazakhstan government is also working towards incorporating digital currencies into its economy. According to the central bank of Kazakhstan, CBDC should be made accessible as early as 2023, with a progressive increase of capabilities and entry into commercial operation by the end of 2025.[10] President Kassym-Jomart Tokayev also applauded digital currency for being secure and reliant and asserted that it would be given recognition.

[6] Buchholz, K. (2021) *China becomes the first major economy to issue digital currency*, *The Wire*. Available at: https://thewire.in/world/china-becomes-first-major-economy-to-issue-digital-currency.

[7] Bansal, R. (2021) *China's Digital Yuan: An Alternative to the Dollar-Dominated Financial System*, *Carnegie Endowment For International Peace*. Available at: https://carnegieendowment.org/files/202108-Bansal_Singh_-_Chinas_Digital_Yuan.pdf.

[8] Srinivasan, K. (2022) Opening remarks at peer-learning series on Digital Money/Technology: Central Bank Digital Currency and the case of China, IMF. Available at: https://www.imf.org/en/News/Articles/2022/07/07/sp070722-central-bank-digital-currency-and-the-case-of-china.

[9] Andersen, D. (2023) *ECB official urges CBDC development for the good of cryptocurrency and consumers*, *Cointelegraph*. Available at: https://cointelegraph.com/news/ecb-official-urges-cbdc-development-for-the-good-of-cryptocurrency-and-consumers.

[10] Popowicz, J.E. (2022) *Kazakhstan explores crypto co-existence in Binance CBDC trials*, *Central Banking*. Available at: https://www.centralbanking.com/fintech/cbdc/7954054/kazakhstan-explores-crypto-co-existence-in-binance-cbdc-trials.

In order to grow CBDC over the next three years, the Kazakhstani government is concentrating on technological advancements, infrastructural preparation, creating an operational model, and establishing a regulatory framework.

III. INDIAN SCENARIO

Currently, CBDC is still in its research phase in India and is being tested in four cities through four banks. In the initial phase, the Central Bank will issue CBDC to these banks.

This step will boost the Indian market by expanding the digitalisation of currency and internationalisation. The amalgamation Of UPI and CBDC will boost cross-border transactions and, thus, the business. Other common reasons for introducing CBDC include fostering competition and resilience in the domestic payments market, which may need incentives to offer cheaper and better access to cash, improving payment efficiency and lowering transaction costs, developing programmable currency and enhancing money flow transparency, and facilitating the quick and straightforward flow of cash and lower transactional cost.[11]

Due to the on-chain settlement capabilities built into digital currencies, blockchain experts think a digital rupee running on UPI rails would guarantee 0% payment transaction failure. In places with patchy internet access, it will be a game-changer.

Until now, the Reserve Bank has recognised nine prominent banks to be a part of this pilot project. It includes the State Bank of India, Bank of Baroda, Union Bank of India, HDFC Bank, ICICI Bank, Kotak Mahindra Bank, Yes Bank, IDFC First Bank and HSBC.

The digital rupee would be a digital token for legal tender. It would be distributed in the same denominations that coins and paper currency are now issued. It can be sent or received in digital wallets and can be stored on mobile phones. Unlike UPI, which is linked to a bank account, it is independent of the account, and no money is deducted from the bank account to

[11] *Central Bank Digital Currency (CBDC) pilot launched by RBI in the retail segment has components based on Blockchain technology* (2022) *Press Information Bureau*. Available at: https://pib.gov.in/PressReleaseIframePage.aspx?PRID=1882883.

complete the transaction. The transaction can be from person to person(P2P) or person to merchant (P2M).[12]

The development of CBDC will boost the current government's Digital India mission, enabling more cashless transactions. It must be realised that the adoption of digital currency would be possible only when there is a high percentage of digital perforation[13] and digital know-how in the country.

IV. CBDC *vs* CRYPTOCURRENCY

The RBI forbade financial institutions from engaging with cryptocurrencies in 2018, which caused various sites to shut down. The judgement was overturned, nevertheless, by a Supreme Court ruling in March 2020 that permits cryptocurrency-related businesses in India to resume. With the decision to launch its own digital currency, many would believe that RBIhas taken a 180-degree turn in its stance, but it is not. This digital currency has a few similarities with cryptocurrencies; it differs greatly from it.

Similar to cryptocurrencies or bitcoins, the digital rupee is also based on blockchain technology. Although, unlike bitcoins, cryptocurrencies and stablecoins, which run on distributed ledger technology, are centrally monitored by central governments. Cryptocurrency is based on the principle of decentralisation, whereas the nations' central banks back CBDC and hence is more secure and promising.

Another distinction is that CBDCs utilise a private Blockchain network with prior authorisation, whereas cryptocurrencies use an open network that requires no permission.

Additionally, users remain anonymous when they transact on the web utilising bitcoins. CBDCs, on the other hand, will be connected to a person's bank account, which contains their personal information. In contrast to other virtual currencies, CBDC is not volatile, and its value equals the value of physical currencies.

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[12] *Central Bank Digital Currency (CBDC)* (2022) *Federal Reserve Board - Central Bank Digital Currency (CBDC)*. Available at: https://www.federalreserve.gov/central-bank-digital-currency.htm.

[13] Srinivasan, K. (2022) *Opening remarks at peer-learning series on Digital Money/Technology: Central Bank Digital Currency and the case of China*, *IMF*. Available at: https://www.imf.org/en/News/Articles/2022/07/07/sp070722-central-bank-digital-currency-and-the-case-of-china.

Cryptocurrencies and bitcoins are also seen as investment portfolios, whereas CBDC is a standard nationalised legal tender, which would not accrue any interest or profit over time. In the current scenario, where cryptocurrencies are being used for terror funding, money laundering and tax evasion, CBDC will create a more transparent cyberspace where these transactions can be prevented.

V. ADVANTAGES

The Reserve Bank of India plans to launch digital currency after much deliberation and discussion. The benefits posed by such digital currency include Real-time money transfer, easy currency tracking, difficulty in tax evasion, and reduction of money-related crimes such as money laundering. This would also help to bridge the gap between bank accounts and mobile phones, which still needs to be solved.

- Money transfers and payments may be made in real time from the payer to the payee without the need for intermediaries like banks.
- Simple currency tracking: By implementing CBDC, a country's central bank will be able to keep track of the precise position of every unit of money.
- Income Tax: It will be tough to evade or avoid paying taxes since techniques like offshore banking and unreported employment cannot be used to conceal financial activity from the central bank.
- Criminal activity such as money laundering and funding for terrorism may be quickly identified and put an end to.
- The introduction of CBDC will also reduce the printing, handling and transactional cost of physical currency.

VI. LOOPHOLES

Albeit its potential, CBDC possesses some serious questions which need to be answered before advancing to the next phase. The first question is about the adoption of the currency by the public, which is still largely dependent on the physical currency. Alternatively, extreme circumstances might lead people to collect vast amounts of CBDC, leading to a crisis.

One of the significant concerns, which was also highlighted by the Governor of RBI, Shaktikanta Das, is the cloning of digital rupees, which might lead to virtual inflation.[14] In the post-Covid world, controlling spiralling inflation is one of the biggest challenges all economies face. With the dwindling condition of Commercial banks in India, the greater adoption of CBDC might lead to the further breakdown of commercial banks.[15] This situation can be avoided by limiting the holding amount of CBDC for consumers.

The concept paper indicates that "banks and other service providers" will participate in the two-tier CBDC architecture. Clarifying the definition of service providers is required to determine if existing RBI-regulated firms will be included or whether emerging participants may be included. It will be necessary to consider the ramifications under the Banking Regulation Act of 1949 and the Payment and Settlement Systems Act of 2007, depending on the financial sector intermediaries participating in the CBDC infrastructure.

CBDC is vulnerable to cyber security issues and can become a target for cyber attacks. The implementation of CBDC also poses consumer protection, data privacy, and anti-money laundering complications. With CBDC, the governments can easily monitor the transactions between the parties, but the question is whether this is against the right to privacy.[16]All these questions still need to be answered in the current notification.[17] Proper legislation and

[14] Ghosh, K. (2023) *RBI approaching CBDC with extreme caution due to threat of cloning: RBI*, *Outlook*. Available at: https://www.outlookindia.com/business/rbi-approaching-cbdc-with-extreme-caution-due-to-threat-of-cloning-rbi-governor-das--news-251365.

[15] Pfister, C. (2017) *Monetary policy and digital currencies: Much ado about nothing? Banque De France*. Available at: https://www.banque-france.fr/sites/default/files/medias/documents/dt-642.pdf

[16] Justice K. S. Puttaswamy (Retd.) and Anr. v. Union Of India And Ors, AIR 2017 SC 4161.

[17] *Central Bank Digital Currency (CBDC) pilot launched by RBI in the retail segment has components based on Blockchain technology* (2022) *Press Information Bureau*. Available at: https://pib.gov.in/PressReleaseIframePage.aspx?PRID=1882883.

watchdog must be established to keep these issues at bay. Since the currency is supposed to run on internet platforms, it is susceptible to hacking and counterfeiting.

VII. LEGAL ANALYSIS

The emergence of Central Bank Digital Currency in India has sparked a flurry of legal analysis surrounding its implementation and potential implications. Legal scholars have delved into the intricacies of how such currency would be regulated, what laws it would adhere to, and how it may impact existing financial systems.

i. Currency *vs* Digital Currency

One key examination area is whether or not CBDC can be classified as a legal tender under India's current monetary policies. This consideration hinges on the definition of "currency" under Indian law[18], which may require amendments to accommodate digital currencies within its purview. Relevantly, the Reserve Bank of India Act, 1934 (RBI Act) was modified by the Finance Act, 2022, expanding the definition of "banknote" to include notes produced in digital form. In conjunction with Section 22 of the RBI Act, this change gives RBI the authority to print digital bank notes.

The question of whether the sovereign has unrestricted authority to grant a means of payment legal tender status through legislation or positive law arises in light of the potential legal tender status of CBDC with regard to natural law. It is reasonable to claim that the State may only legitimately provide legal tender status to a form of payment if the great majority of people can easily access it. In other words, it may be permissible to grant legal tender statusto a form of payment that the vast majority of people do not accept. However, doing so raises important issues, particularly those of equity and justice.

The designated group of creditors that are required to accept payment in the indicated means of payment must also make efforts to guarantee that payment may be received successfully. This is acknowledged by nations that have granted legal tender status to payment methods that are not currencies.

The legality of CBDCs depends on multiple factors, such as the regulatory framework and existing laws governing currency, payment systems, and banking operations. The Reserve

[18] Publish, N. (2022, November 1). *Legal tender*. iPleaders. https://blog.ipleaders.in/all-about-legal-tender/

Bank of India (RBI) must ensure that the CBDC complies with all financial regulations to prevent potentially illegal activities like money laundering or terrorist financing. Additionally, privacy concerns must be addressed through robust data protection measures to protect consumers' sensitive information from being compromised by hackers or other malicious actors.

ii. The Policy Changes in Implementing Central Bank Digital Currency in India

The legal framework for implementing CBDC in India is still in its infancy. The Reserve Bank of India (RBI) has set up a working group to explore the feasibility of issuing a central bank digital currency, however, concrete plans have yet to be announced. Secondly, the government needs to implement regulations for managing and using CBDC. These regulations will cover issues such as anti-money laundering and countering the financing of terrorism.

Thirdly, the RBI needs to develop a robust technological infrastructure for issuing and managing CBDC. This includes ensuring that CBDC can be easily integrated with existing payment systems and platforms. Fourthly, the RBI needs to consider the economic implications of issuing CBDC. For example, how will CBDC affect inflation? Will it replace cash or complement it? How will it impact interest rates?

Legal clarity on the regulation of intermediaries' companies must be defined if the entry of fresh players is permitted to offer technical or other value-added services. For instance, Nigeria envisions merchants as having the responsibility of offering e-Naira transaction choices. Merchants are described as fully accredited persons and non-individuals (corporates)authorised to conduct business in Nigeria.

It will be necessary to look at the structure of the Know-Your-Customer (KYC) framework and how the Prevention of Money Laundering Act, 2002 (PMLA) is used. Tiered KYC may be taken into consideration because the RBI suggests "managed anonymity" with anonymity for minor transactions and traceability for large-value transactions. Wallets may be allowedto have particular characteristics, such as caps on funds and restrictions, as well as the type of transactions, depending on the degree of KYC. CBDC Intermediaries must be subject to the PMLA Act's rules for "specified transactions".

The RBI needs to engage with all stakeholders – including commercial banks, fintech firms, regulators and consumers – to ensure that everyone is on board with the implementation of CBDC. Only then can India successfully launch its central bank digital currency.

Another critical point that must be considered in framing policies is whether the Indian government wants the currency to be pegged to the rupee or allowed to float freely. This decision will likely have significant monetary policy and financial stability implications.

iii. Data Privacy

The CBDC infrastructure will provide CBDC intermediaries access to a lot of private data. To understand who can collect, handle, and keep data, the objectives for which it will be used, and whether or not the data can be shared with other entities, including RBI and government entities for law enforcement, legal concerns pertaining to privacy and data governance must be considered. Furthermore, it could be necessary to look at the cross- border consequences of exchanging data outside of India. The Information Technology Act of 2000 and the Information Technology (Reasonable security practices and Procedures and sensitive personal data or Information) Rules of 2011 now address these concerns.

The Puttaswamy case[19] and other significant Supreme Court rulings highlighting India's lack of comprehensive data protection legislation make it essential to create robust data governance and privacy standards for safeguarding customer data. Significant problems with the definition of small-value transactions, the limit on such anonymised transactions, the potential for abuse of such anonymised transactions, and the legal safeguards for controlling such transactions come up when "managed anonymity" is implemented.

The Reserve Bank of India (RBI) has previously expressed concerns about cryptocurrencies and their impact on financial stability, prompting us to question whether or not a CBDC would face similar scrutiny. Additionally, questions about data privacy and security must be addressed to ensure that sensitive information remains protected within the proposed framework. A comprehensive legal analysis must consider these factors alongside other issues, such as anti-money laundering regulations and taxation policies related to digital currency transactions.

[19] KS Puttuswamy v. Union of India, AIR 2017 SC 4161.

Furthermore, the legal implications for commercial banks should also be considered as they may face competition from this new form of digital currency issued directly by RBI. As a result, central bank digital currencies can significantly impact monetary policy by giving RBIgreater control over the money supply while simultaneously reducing reliance on physical cash transactions. In conclusion, understanding the legal landscape surrounding central bank digital currencies is crucial before their implementation in any country's economic system. This requires extensive consultation with regulators and stakeholders to address any potential challenges that may arise from their use while maintaining transparency throughout this process. Ultimately successful integration into an economy will depend not only on technical feasibility but also on legal compliance within existing frameworks for finance and technology alike.