


# Chapter 4

## Assessing the Role of Public–Private Partnership in the Deployment of Central Bank Digital Currencies (CBDCs)

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### ABSTRACT

*As digitisation transforms the financial environment, central banks are introducing digital currencies. However, CBDC provision involves a wide range of complicated challenges, including technology developments, legal frameworks, and market dynamics. Public-private partnerships have emerged as a potential approach to provide CBDCs in this regard, using the capabilities of both sectors to achieve mutual goals. This chapter critically analyse public-private partnerships in CBDCs, providing a comprehensive understanding of CBDC partnerships by exploring various CBDCs models, their design and features, as well as the major problems in designing and implementing CBDCs. This study uses a mixed method approach of data collection and analysis to gather information on PPP in CBDC. The survey demonstrates that stakeholders across sectors agree on the significance of legal frameworks, security standards, and collaboration among government agencies, although there are slight differences in their focus on technological infrastructure, innovation, and public awareness.*

### INTRODUCTION

The recent development of digital technology has caused significant disruption in the financial sector. Central banks throughout the world are looking into Central Bank Digital Currencies (CBDCs) as a possible solution to this changing scenario (Kulasekhar & Reddy, 2023). CBDCs are digital tokens that represent a country's fiat currency and are issued and supported by the central bank (Zatti & Barresi 2024). CBDCs, unlike private cryptocurrencies, are legal tender and seek to provide a safe, efficient, and creative alternative in the digital payments market. The first mention of CBDCs dates back to when the governor of the People's Bank of China (PBoC) highlighted the need to investigate the potential of

DOI: 10.4018/979-8-3693-5588-6.ch004

creating a central bank digital currency (Li & Huang 2021). The Bank of England entered the debate in 2015, pushing research into the costs and advantages of a new type of central bank money that might be extended directly to firms and individuals (Bjerg, 2017). On October 25, 2021, the Central Bank of Nigeria (CBN) officially released the “eNaira,” a central bank digital currency (CBDC). This is the second CBDC totally accessible to the public, following the Bahamas. The Reserve Bank of India (RBI) has launched pilots for Central Bank Digital Currency (CBDC) in both the wholesale and retail sectors (Pachare, Umbarkar, & Jadhav, 2023). The Digital Rupee Wholesale (e -W) trial began on November 1, 2022, with the goal of improving interbank market efficiency by settling secondary market transactions with government securities. Users can conduct Person to Person (P2P) and Person to Merchant (P2M) transactions using e -R by using digital wallets provided by partner banks. e -R does not bear interest and may be exchanged for other currencies, including bank deposits, while providing the confidence, security, and finality of a cash settlement that come with actual currency.

Several research have compiled a set of definitions for CBDCs that give varying definitions based on probable design aspects (Lee, Yan, & Wang 2021; Ward, and Rochemont 2019). CBDCs, in a limited sense, are digital representations of sovereign currencies. CBDCs differ from currency, which is a tangible representation of a central bank's responsibility. In other words, they are on track to become central bank digital liabilities and a key component of national reserve money systems (Elsayed & Nasir, 2022). Meanwhile, in a larger sense, set design decisions can change the definition based on a variety of factors, such as extending CBDCs to retail use cases and including programmability capabilities. In addition to individual central banks exploring Central Bank Digital Currencies (CBDCs), the World Bank has actively researched and assessed the possible consequences of CBDCs on the global financial system. The World Bank facilitates collaboration among central banks, policymakers, and other stakeholders to share information and best practices for CBDC creation and implementation. Furthermore, the advent of CBDCs has prompted worldwide debate and collaboration among central banks and international organisations, like the worldwide Monetary Fund (IMF) and the Bank for International Settlements (BIS). These organizations facilitate dialogue and cooperation on issues related to monetary policy, financial stability, and cross-border payments, including the potential implications of CBDCs on the international monetary system.

The BIS was one of the first international financial organisations to establish guidelines for important design qualities (Bank for International Settlements, 2018). Several subsequent iterations followed a similar approach. In essence, alleged design decisions are theoretical, although the discussion over some aspects has gotten more complex in recent years. Since the early stages of CBDC design research, three major discussions have centred on design models. The first of these types is a CBDC distribution model, which can be retail or wholesale. A retail CBDC is a direct central bank obligation, like cash. At the same time, the wholesale model, by default, implies that the CBDC is dispersed through intermediaries. In survey the literature on the economics of retail CBDCs that study the implications of CBDCs on the financial system and policy-related issues (Kiff et al. 2020)

Collaboration between public and private organisations in the creation, distribution, and deployment of CBDCs is critical to their effective integration into the global financial system. The research gap is the lack of thorough studies that critically examine public-private collaborations in its development. Despite the growing interest in CBDCs, there is a scarcity of research that investigates the dynamic and possible advantages of these collaborations. This chapter critically analyse public-private partnerships in CBDCs, providing a comprehensive understanding of partnerships by exploring various CBDCs models, their design and features, as well as the major problems in its design and implementation.

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