

CBDCs and the More Proactive Roles of International Organizations

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ABSTRACT

With the rise of cryptocurrency, along with the downward trend of physical currency usage, which was especially accelerated during the COVID-19 pandemic, many national governments are exploring the idea of implementing central bank digital currencies (CBDCs). While CBDCs are like cryptocurrency in that they are digital, their overarching concept is different. They are issued by a country's central bank or monetary authority under government control, so they are centralized and equal in value to the nation's fiat currency. This article aims to provide a succinct summary of what CBDC implementation could mean for nations and their citizens, with a focus on the possible routes in and impacts on developing countries in light of the potential that CBDCs could provide them. Section 1 explores the rise of CBDCs, namely, the recent surge in developing nations' interest in them worldwide. Section 2 discusses the benefits of CBDCs, partitioning the potential upsides into four major points—greater accessibility, easier domestic and cross-border transactions, cost-efficient management, and more transparent foreign aid—with a focus on developing countries. Section 3 provides a list of the challenges accompanying CBDC implementation, such as an exhaustive complex framework, questionable financial stability, and technological infrastructure. Section 4 presents the roles that international organizations, such as the IMF and the BIS, could play in the entire process writ large, ranging from setting international standards, intervening during financial crises, and providing infrastructural support to incentivizing CBDC adoption. Section 5 concludes the article.

Section 1: Rise of CBDCs

Although the recent cryptocurrency boom has been rooted in the very hope that digital currencies can be decentralized, governments and central banks have found an opportunity to centralize digital currencies. This is called the central bank digital currency (CBDC). Although the concept of CBDCs was inspired by blockchain-based cryptocurrencies, such as Bitcoin, they vary from private cryptocurrencies, as they were originally designed as legal tenders in the issuing central bank's jurisdiction. Governments' and central banks' interest in CBDCs has increased around the world, even if these are still in a hypothetical stage. A 2021 Bank for International Settlements (BIS) survey found that 86% of central banks are actively researching the potential for CBDCs. Fourteen countries have already been conducting CBDC pilots (Kene-Okafor, 2021).

This article will first explore the benefits of CBDCs and explain why developing countries, in particular, are focusing on them. This essay will then illustrate the possible obstacles that financial entities may confront and will highlight the role of international organizations in facilitating and safeguarding the adoption of CBDCs.

Section 2: Benefits of CBDCs

Compared with traditional currencies, CBDCs provide significant benefits, such as greater financial inclusion and time and cost savings, as well as increased transparency. First, CBDCs contribute to improving the accessibility of

financial services for people in developing countries who currently do not have access to conventional banking systems. Globally, approximately 1.7 billion adults are unbanked without accounts at financial institutions (Demirgüc-Kunt et al., 2021). It is worth noting that in developing countries, more people have access to mobile phones than to financial services. As CBDCs could be used directly via mobile phones, they provide the unbanked population with the ability to access financial services and conduct financial transactions. This also implies that developing countries can skip the costly and time-consuming development of the legacy banking system and increase financial inclusion rapidly at scale, much the same way China did with mobile payments.

Second, the most prominent and direct benefit of CBDCs is faster and cheaper payments domestically and internationally. Currently, cross-border remittances account for up to 40% of external capital sources in developing countries and are essential for supporting families and local businesses (Ersek, 2021). However, they remain slow and expensive. According to a BIS Innovation Hub study, remittances take three to five business days, on average, and approximately 1% to 5% of their value is taken up in transaction costs (Innovation Hub Other, 2021; Ree, 2021). According to a PricewaterhouseCoopers estimate, CBDCs can reduce the cross-border transaction time from several days to seconds and cut costs by 50% (Innovation Hub Other, 2021). As such, payment system interoperability will become one of the most critical components of CBDCs.

Third, CBDCs present substantial cost savings to developing countries. Cash is a costly business for all economic agents, and CBDCs will help reduce the costs of cash management significantly. By adopting CBDCs, governments will save costs in the distribution, maintenance, and processing of the physical currency, which are estimated to be between 0.5% and 1% of the gross domestic product (Bordo, 2021). For businesses, CBDCs will save cash handling and managing costs, as well as the risk of theft. For households, CBDCs will reduce the opportunity costs associated with accessing and holding cash. All these savings can be re-allocated to other crucial areas.

Finally, CBDCs will also promote foreign aid with enhanced transparency and traceability. Because of wide-spread corruption in governments and individuals in developing countries, foreign aid is lost or does not reach the right people in need. According to former UN Secretary-General Ban Ki-Moon, "30 percent of all U.N. development assistance was lost to corruption" (Suliman, 2017). In this regard, CBDCs can become an immediate and effective solution, as digital currencies will greatly improve the transparency and efficiency of foreign aid. Beneficiaries in developing countries who have been designated to receive foreign aid can be provided with CBDC wallets. With these, making CBDC transfers directly to recipients will become possible (nChain, 2021). Meanwhile, it is notable that the direct transfer of foreign aid through CBDCs does not require the local presence of international organizations in conflict areas and thus will improve the efficiency and impact of aid for people in dire need of humanitarian assistance.

Section 3: Challenges of Adopting CBDCs

As a CBDC is a complex digital framework, the challenges that central banks and governments in developing countries face in launching CBDCs are vast and daunting. The establishment of CBDCs will require a comprehensive institutional and legal framework on data privacy, robust technology, and infrastructure, which most developing countries lack. The implementation of CBDCs may also challenge the conventional financial systems of these countries. As the power of a currency comes from its trustworthiness, the weak cybersecurity of developing countries will be a concern, as security threats will undermine the reliability of the entire CBDC system.

Next, the financial stability implication of CBDCs is an issue, particularly in developing countries; CBDCs can become easily available instruments for capital flight away from developing countries in the wake of a financial crisis (Arauz, 2021). This would magnify the international spread of financial shocks. Furthermore, the rapid rebalancing of global portfolios will lead to increased foreign exchange rate volatility (Ferrari et al., 2021).

Finally, internet-dependent CBDCs require adequate infrastructure, such as universal internet connectivity, a stable electrical supply, and reliable cell towers. As CBDC transactions take place online, internet access is essential to ensure access to CBDCs. In terms of physical internet access, developing countries still average around 40%–42%,



representing less than half of the access in developed countries (International Telecommunication Union, 2018). Even with internet coverage, developing countries are more vulnerable to cyberattacks, which can undermine the credibility of CBDCs and negate their existence.

Section 4: Role of International Organizations

Considering these challenges, international organizations play key roles in the success of CBDCs in developing countries. First, international financial institutions, such as the World Bank, the International Monetary Fund (IMF), and the BIS, can help establish international standards for issuing and regulating CBDCs. In fact, the Group of Twenty (G20) announced that it is working with the IMF, the World Bank, and the BIS to develop a regulatory framework and technical capabilities for facilitating CBDC transactions by 2025 (Hui, 2020). Moreover, international financial institutions should collaborate to establish interoperable protocols, which are crucial to cross-border payments. The BIS is well positioned to lead such efforts. As an exchange platform for international monetary and financial systems, the BIS can play a key role in developing a shared platform for cross-border transactions using multiple CBDCs.

Second, international financial institutions can work together to reinforce the financial stability of developing countries and protect their currency sovereignty. The aforementioned capital flight from a weaker to a stronger currency is driven by the high transactability of CBDs. As such, if international organizations facilitate an international agreement on temporary restrictions regarding private cross-border CBDC transfers in times of financial crises, capital flights can be reduced. The BIS can also set a new reserve requirement rate specific to CBDCs so that they will not amplify economic crises.

Third, international organizations can provide the necessary infrastructural support to create a stable environment for CBDCs. International figures, such as Elon Musk and Bill Gates, are leading private projects aiming to expand internet access in developing countries, and these projects will benefit CBDCs. NGOs, private humanitarian projects, and international financial organizations can collaborate to advance internet access in developing countries. With adequate support and attention from both international bodies and private sector organizations, developing countries can overcome the challenges related to CBDCs.

Finally, it is worth noting that international relief organizations can provide an incentive for developing countries to adopt CBDCs by distributing part of the aid money in CBDCs. This will encourage other countries in need to institute CBDCs.

Conclusion

Central bank digital currencies will help developing countries increase financial inclusion, save substantial time and costs, and enhance transparency to encourage more foreign aid. The challenges arising from a lack of expertise and adequate infrastructure must be addressed to instantiate CBDCs in developing countries. International organizations can help solve these challenges by providing a CBDC framework that includes regulatory standards and financial protocols to drive the faster adoption of CBDCs while helping reduce the risk of financial system failure.

Nevertheless, CDBCs are not panaceas that will magically solve all of the world's economic problems at once. Their benefits, though, far outweigh their potential negative effects, which can also be addressed with global attention and cooperation. International organizations must proactively collaborate to recognize the vast benefits of CBDCs and mitigate risks so that CBDCs can act as effective solutions to developing countries' current economic problems.

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Limitations

The biggest Achilles tendon in substantiating our predictions was real-life examples. As only 14 countries have conducted CBDC pilots to date, actual case studies have not been used to support our claims. If extensive CBDC implementation had occurred prior to the writing of this paper, a more in-depth analysis could have been carried out.

Additionally, this paper was written largely with the premise that CBDCs interact with other forms of currency at a dispensable rate. If these secondary currency-related factors were considered, the network effects of CBDCs could prove different from those if they were isolated in their own system.

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