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Asset Tokenisation

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Introduction

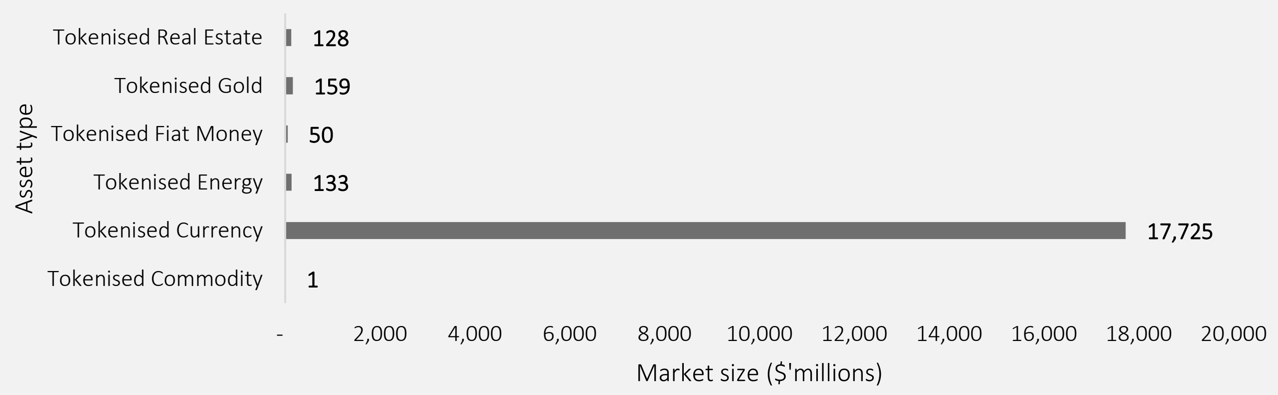
In recent years, the global economy and financial markets have experienced rapid changes as the adoption of technology in e-commerce and investments increases exponentially. This development has led to the creation of different payment solutions and virtual assets such as digital assets and currencies (commonly called cryptocurrencies). Digital assets are fast gaining prominence among retail investors due to the high volatility and lower returns on traditional assets despite uncertainty around crypto regulation in most countries. Some of the concerns of stakeholders include the use of digital assets for illegal activities such as money laundering, terrorism financing and purchase of illicit products among others, as well as standardisation concerns and regulatory framework in place.

However, given the benefits that can be derived from a digital economy, financial sector regulators are adopting flexible and innovative regulatory frameworks that will attract and promote investments via asset tokenisation. For instance, Switzerland recently amended its securities laws to allow for the issuance and trading of uncertificated securities that are represented on the blockchain also known as ledger-based securities. Also, the United States Securities and Exchange Commission, in December 2020, commenced a five-year trial to allow broker-dealers to hold digital asset securities for clients without violating the Customer Protection Rule. This is to, among others, allow the agency to gather more information on the evolution of digital assets and enable the industry to develop the necessary framework and infrastructure required for safe custody.

The enactment of enabling regulations has also spurred financial product innovation to meet investors demands. The United States recently saw the first registered closed-ended fund – Arca US Treasury Fund – to issue shares as digital asset securities through blockchain technology. Other countries where tokenised assets have been created to attract new investors include Slovenia, Spain, Iran, Germany, and Uruguay.

Despite these strides made, asset tokenisation is still a relatively nascent concept, compared to other traditional means of raising funds in the financial markets. According to data from Forkast and CoinMarketCap, as at Q4 2020, of the total global digital asset market size of approximately $350 billion, tokenised assets accounted for $18.1 billion (5.17%). Of the $18.1 billion tokenised asset market size, currency and real estate accounted for approximately 97% and 1% respectively.

Breakdown of global tokenised assets as at Q4 2020



Source: Forkast, CoinMarketCap

Asset tokenisation is gradually changing the way capital is raised and investment products are developed and distributed. It can also be leveraged in accelerating financial inclusion and inclusive growth through the capital market.

Nigeria is not left behind in this global digital revolution. The Central Bank of Nigeria (CBN) recently launched Nigeria's digital currency, the e-Naira. According to the CBN, e-Naira would be a legal tender for the entire country and would have a non-interest-bearing central bank digital currency (CBDC) status with a transaction and value-based limit for customers.

The Securities and Exchange Commission (SEC) has also classified offerings such as Digital Assets Token Offering (DATOs), Initial Coin Offerings (ICOs) and Security Token ICOs under its regulatory supervision.

This article focuses on the basic concept and benefits of asset tokenisation, and how the Nigerian capital market can leverage these benefits to stimulate capital formation and drive market penetration.

What is asset tokenisation?

To have a full grasp of what asset tokenisation is all about, we need to define "tokenisation". Tokenisation is a process of transforming sensitive information, with a unique symbol that preserves the critical data without compromising its security, into another simple form. It is a digital representation of an asset or currency that can be traded or exchanged with the use of a blockchain. Tokenisation can be in three major forms: utility, payment, and asset tokens.

Asset tokenisation is the process of transforming an underlying asset into another unit of a digitised or physical asset called tokens. Tokenisation helps to convert an asset into a digital unit that can be managed without a central intermediary through blockchain technology. Like derivatives or mutual funds, assets tokenised derive their value from another asset that generates cash flow or an economic value when sold or transferred. Asset tokenisation helps to break complex assets into a simple form or unit that can be easily exchanged for cash or assets. Asset tokenisation can help individuals to acquire smaller units of these large and complex assets (real or virtual) in a cost-efficient manner, which they may otherwise not be able to acquire, while enabling issuers raise more capital for project financing.

For example, in real estate, an asset tokenisation structure can be used to raise funds from a group of investors who are interested in buying luxury properties. These properties are then tokenised in a digital form for individual investors to hold as a unit of the luxury properties. Likewise, traditional assets like publicly traded equities and debts as well as other illiquid assets like private equity, commodities and venture capital can be tokenised with blockchain technology. This encourages fractional ownership – whereby investors can own small units of the overall underlying asset, all at low-costs (traditional fund-raising options such as IPOs involve significant costs – the relatively low costs with issuing tokens are manifested in potentially lower transaction costs for investors).

Asset tokenisation vs cryptocurrency

In the age of digitisation, people may be tempted to classify asset tokenisation as cryptocurrencies. However, it is important to differentiate the two concepts. While both are in digital forms which can be created, transferred (traded) or stored, there are some important differences between the two concepts.

Cryptocurrencies are digital currency or payment options from a blockchain such as Bitcoin or Dogecoin which are created in a decentralised way, whereas asset tokens are exclusively digital assets from an existing blockchain that derive their value from the underlying virtual or real assets. In essence, asset tokens are digital assets that are backed by the economic value of the underlying assets. Cryptocurrencies are also virtual like tokenised assets but do not necessarily derive value from underlying assets

Benefits of asset tokenisation to the capital market and the economy

Asset tokenisation has the potential to revolutionise the dynamics of the securities market, with a potentially huge impact on asset valuation and transaction settlement, when compared to traditional assets. Some of the potential benefits to the securities market include:

01 **Product innovation**: Asset tokenisation can aid the development of new hybrid financial products combining the characteristics of both traditional and digital assets. As an alternative asset class, asset tokenisation provides portfolio diversification options for investors in the capital market.

02 **Risk diversification and management**: Asset tokenisation can be used to manage the risk of uncertainty in the financial market. It can be used to spread risk among investors and to create new investment vehicles that combine risky assets with less risky ones to manage volatility.

03 **Market liquidity**: The ease of transferring tokenised assets will improve market liquidity. Through asset tokenisation, traditional instruments that are difficult to sell are easily converted to cash and this can enhance the volume and value of trading activities in the capital market.

04 **Market penetration**: New financial products created by asset tokenisation will boost the flow of capital into the capital market particularly from increased retail investor participation. Increased retail participation means lower-income investor groups also benefit greatly as they can participate in investment options that would ordinarily not appeal to them due to the size of capital required, market lot size, minimum order quantity, etc.

05 **Lower costs and transaction efficiency:** Asset tokenisation has relatively lower cost implications compared to other traditional means of raising funds from investors such as IPOs. Cost implications, as used here, not only refer to sunk costs of mobilising the funds, but include other costs such as trade settlement and clearing, registration, documentation and filing requirements etc.

06 **Transparency**: With blockchain technology, transactions on tokenised assets can easily be monitored by participants in real-time.

07 **Foreign capital inflow**: Investors across the globe will have access to tokenised assets issued through blockchain technology thereby improving foreign portfolio investments especially in frontier and emerging economies where there is a capital deficit.

08 **Trade settlement**: Blockchain technology will reduce the time and cost of settling trade of tokenised assets based on the decentralised nature and its efficient automation system. Assets tokenised with the use of blockchain technology will settle faster, reducing the turnaround time in trading activities. This will also limit the time between investment decision-making and execution to the barest minimum.

Status of asset tokenisation in other countries

Given that asset tokenisation is still at an early stage of development, its size among the global financial assets is largely negligible. However, as regulation and investor education improve, the size of tokenised assets is expected to increase significantly in the long run.

Overall, many countries are working on developing an appropriate regulatory framework for the digital economy. As such, the adoption of asset tokenisation is expected to increase as blockchain technology expands across the globe.

In Canada, asset tokenisation is expected to grow on the back of the Canadian Securities Exchange's launch of a blockchain clearing house. This should encourage the development of tokenisation of traditional assets in the country.

In the US, the adoption of blockchain technology has also supported asset tokenisation projects. For example, real estate assets have been tokenised with the use of blockchain technology. In addition, the recent Arca U.S. treasury fund also springs to mind. There are various platforms that may support the development of more tokenised assets in the U.S. such as CoinList, Coinbase and others.

La Tahona in Uruguay has also issued an asset-backed token to attract investors into real estate projects. The country is also working on legislation that will regulate digital assets. In 2018, Blocksquare company in Slovenia launched a tokenised garage parking in Tech Park Ljubljana. This project allowed investors from different continents to invest in real estate-backed tokenised assets.

Another country that has experienced asset tokenisation is Germany where "Brick Blocks" were used to restructure real estate assets. Holders of these Brick Blocks receive dividends from the underlying real estate assets.

Switzerland is one of the countries that have embarked upon various asset tokenisation projects. One of which is the SwissRealCoin (SRC). SRC is a real estate backed non-interest-bearing bond that is managed with the use of tokens. Similarly, the Schuldschein bond and Mt Pelerin shares are forms of tokenised assets in Switzerland. Furthermore, SIX Swiss Exchange is also working on tokenising traditional assets with the use of blockchain. The major driver of the adoption of asset tokenisation in Switzerland is the enactment of liberal laws which has set the pace for technological advancement in the country's financial markets.

Liechtenstein has also provided a solid platform for asset tokenisation to thrive with its comprehensive regulation and protection of key stakeholders' interests in the token economy.

Malta is another country that has opened its economy and financial market to asset tokenisation with the regulation of blockchain and asset tokens. Malta already has an official regulation for cryptocurrencies trading which helps digital securities to develop.

Key next steps for the Nigerian capital market stakeholders

The recent launch of the nation's digital currency by the CBN is a laudable development. The creation of a digital currency via blockchain should provide a solid platform for asset tokenisation to thrive in Nigeria, especially against the backdrop of the SEC pronouncement, in September 2020, on the regulation of digital assets, earlier mentioned above.

One of the issues that worry most investors about digital assets or currencies is the safety or security of their investment. Nigeria, through regulators of capital and money markets, can respond to this concern by deploying appropriate security structures and frameworks that have been adopted in countries where the digital economy is well regulated.

The asset tokenisation process can be used to dispose of some idle government assets to retail investors, it can also be used to commercialise some public organisations. This may help the government to raise funds that can be channelled to other growth-enhancing projects. Furthermore, given the huge capital deficit for infrastructural projects and limited investment instruments in the nation's capital market, Nigeria must develop appropriate technologies that will enable the use of asset tokenisation to channel funds from the surplus unit (local and foreign investors) to the deficit unit of the nation's economy. This may boost capital formation and drive sustainable growth in the long run.

The adoption of asset tokenisation is supported by the growing number of smartphones users in Nigeria. According to a report by the GSMA Intelligence, *Spotlight on Nigeria; Delivering a digital future*, Nigeria's smartphone adoption rate was 36% in 2018, at 53 million users, and projected to grow to 144 million users by 2025. The growth potential of the mobile technology space can be leveraged to stimulate development in asset tokenisation. The recent approval of the Fifth Generation Network, otherwise known as 5G, for the nation should enhance the speed and ease the use of digital technology and, by extension, asset tokenisation in the capital market.

Overall, capital market stakeholders should begin to explore the opportunities that asset tokenisation presents to Nigeria's capital market and the economy at large, drawing on learnings from other jurisdictions that have successfully integrated their capital market into the digital economy. It is also important to collaborate with experienced partners to help navigate the complexities of integrating the capital markets into the evolving digital financial market globally.

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