OPEN ACCESS

MULUNGUSHI UNIVERSITY MULTIDISCIPLINARY JOURNAL (MUMJ)

Mulungushi University Multidisciplinary Journal
ISSN: 2958-3926
Vol. 4 No. 1

https://research.mu.ac.zm/research/index.php/mu

A systematic literature review on the adoption of cryptocurrency as an investment option

Umar Kasamba[1], Kelly Chungu[1*]

[1] Cashnest Solutions, Department of microfinance, Lusaka, Zambia; Email: kasambaumar@gmail.com
[1] Mulungushi University, School of Business studies, Department of Business, Kabwe, Zambia; Email: kchungu@mu.ac.zm

*Correspondence: Kelly Chungu, Email: kchungu@mu.ac.zm

ARTICLE HISTORY: Received 18 May 2023; Accepted 1 September 2023

ABSTRACT

This systematic literature review examines the adoption of cryptocurrency as an investment option by analyzing twenty relevant journal articles. A rigorous methodology was followed involving a comprehensive academic journal search and purposive article selection. The findings reveal several demographic, economic, and social factors influence cryptocurrency adoption. Specifically, age, income, education, internet access, financial knowledge, risk attitudes, and regulatory support impact adoption. Furthermore, perceived usefulness, ease of use, trust, expected returns, and perceived risks are significant drivers of investment intentions. In emerging economies, investment motives, economic and financial factors, and socio-demographic characteristics predict cryptocurrency adoption. Regarding Bitcoin, user characteristics, technology factors, and institutional conditions determine adoption, with crypto automated teller machine availability and legal status being influential. The reviewed literature highlights unique cryptocurrency features like decentralization, limited supply, and profit potential that attract institutional investors. However, risks including volatility, lack of regulation, and cybersecurity exist. In conclusion, understanding what shapes cryptocurrency investment adoption is critical for individuals and institutions interested in this expanding asset class. While current knowledge has limitations, this review provides a comprehensive overview and future research directions to elucidate this timely, complex phenomenon.

Keywords: Cryptocurrency, investment, digital currency, adoption, risk tolerance

INTRODUCTION

Investing money with the aim of achieving long-term appreciation is a fundamental element of personal finance and wealth accumulation. In this pursuit, individuals and institutions have a diverse array of investment instruments at their disposal, each carrying distinct risk-return profiles. Traditionally, common investment assets have encompassed stocks, bonds, real estate, and cash equivalents (Cunningham, 2022).

However, the landscape of investment has witnessed significant changes in recent years with the emergence of cryptocurrencies as a novel alternative investment vehicle (Corbet, 2019). Despite being relatively new and characterized by volatility, cryptocurrencies have garnered considerable attention from investors seeking portfolio diversification and the potential gains offered by this nascent financial technology (Chuen, 2018).

Stocks represent ownership in publicly listed companies and their value fluctuates based on

business performance and investor sentiment. Although stocks entail higher risk, historical data indicates that they have generated the highest average returns compared to other major asset classes (Siegel, 2022). Bonds, on the other hand, are debt instruments issued by governments and corporations that offer fixed coupon payments and return of principal at maturity. Considered safer investments, bonds generally yield more stable but lower returns compared to stocks (Cunningham, 2022). Real estate investments involve ownership of physical properties like houses, buildings, or land. Over time, real estate tends to appreciate and generate rental income, albeit being relatively less liquid (Goetzmann, 2022). Cash equivalents, such as money market accounts, offer high accessibility and principal protection but yield very low returns (Siegel, 2022). In traditional investments, longer time horizons are known to mitigate risk and enhance potential earnings (Damodaran, 2022).

Despite the enduring prominence of conventional assets, alternative investments like cryptocurrencies have risen to prominence, driven by advancements in technology and their impact on the financial landscape (Corbet, 2019). Cryptocurrencies are digital currencies secured through encryption and operate independently of central banks or government authorities. The first and most widely recognized cryptocurrency, Bitcoin, was introduced in 2009 in the aftermath of the global financial crisis (Nakamoto, 2008). Early cryptocurrencies, including Bitcoin, facilitated peer-to-peer electronic transactions without the involvement of intermediaries (Harwick, 2016). The underlying foundation of cryptocurrencies lies in blockchain technology, a decentralized distributed ledger that ensures immutable records of transaction history (Tapscott, 2016).

In recent times, cryptocurrencies have made a transition from being a niche curiosity to a tangible and investable asset class, attracting extensive interest from researchers and investors alike (Corbet, 2019). This increased adoption has been mirrored by rising prices and trading volumes, with Bitcoin, for instance, experiencing a remarkable ascent from under $1 in 2010 to nearly $20,000 at its peak in 2017 (Phillips, 2018). Cryptocurrencies tend to exhibit higher volatility when compared to traditional assets like stocks and bonds. However, their relative novelty, technological foundations, and decentralized nature render them attractive and unique to investors (Hayes, 2021).

Numerous factors contribute to the growing appeal of cryptocurrencies among investors. Firstly, the fixed supply schedule of coins like Bitcoin creates scarcity value akin to precious metals (Pagliery, 2014). Secondly, cryptocurrencies enable borderless and low-fee global transactions through blockchain technology, opening new avenues for use cases such as international remittance (Taylor, 2019).

Thirdly, the development of decentralized finance applications on blockchain holds the potential to revolutionize financial services (Wang, 2019). Fourthly, some investors perceive cryptocurrencies as a hedge against inflation and political risks, akin to gold (Bouri, 2022). Lastly, the underlying blockchain technology exhibits promise in reshaping digital economies across various industries (Tapscott, 2016).

However, while cryptocurrencies present diversification opportunities and a lack of correlation to broader markets, they also entail inherent risks concerning volatility, regulation, and adoption (Klein, 2022). Studies have shown that including a modest allocation of cryptocurrencies, typically ranging from 1% to 5% of a portfolio, can enhance portfolio returns and reduce volatility when combined with traditional assets, assuming appropriate risk management (Trimborn, 2019). Nevertheless, it is essential to acknowledge that cryptocurrencies remain experimental assets, necessitating cautious and informed decision-making by individual investors. The potential risks associated with the nascent nature of the cryptocurrency market warrant prudent investment practices (Hayes, 2021).

The realm of investment options spans from traditional stocks and bonds to real estate and cash equivalents. The recent emergence of cryptocurrencies as an alternative digital asset class has gained prominence due to its potential for portfolio diversification (Corbet, 2019). Given the increasing relevance of cryptocurrencies for investors, further research is imperative to comprehend these novel financial instruments and guide responsible investment practices. This review seeks to systematically examine existing literature on cryptocurrency adoption as an investment vehicle, analysing the merits and risks involved in cryptocurrencies for investors,

and offering perspectives on prudent approaches to incorporating cryptocurrencies into investment portfolios. The insights gained from this review will contribute valuable knowledge during this critical phase in the evolution of cryptocurrencies.

LITERATURE REVIEW

A systematic review of the literature on cryptocurrency adoption as an investment reveals several factors that have been analysed extensively, though some gaps in knowledge remain. Many studies have focused on the financial performance of cryptocurrencies, employing quantitative methodologies like statistical modelling of historical returns (Corbet, 2019). This research overwhelmingly uses timeseries price data to examine risk and return parameters as well as relationships with traditional asset performance (Dyhrberg, 2016). While insightful, overemphasizing quantitative finance risks overlooking human dimensions. Qualitative and mixed method studies exploring investor psychology and decision-making appear underrepresented in the research thus far (Wang, 2021).

In terms of context, cryptocurrency investment research accelerated after 2017, likely driven by Bitcoin's meteoric price surge that year and increasing mainstream awareness (Corbet, 2019). However, the majority of studies focus on American or European investors (Wang, 2021). Greater geographic diversity considering Asian, Middle Eastern, African, and Latin American investor perspectives could enrich the literature. Furthermore, research tends to concentrate on Bitcoin, with less attention to other major cryptocurrencies (Dyhrberg, 2016). Broader analysis across the growing universe of cryptocurrencies and blockchain technologies is warranted.

Turning to examined factors, risk and return characteristics have been thoroughly investigated from multiple angles, consistently showing heightened volatility and potential portfolio diversification benefits with modest cryptocurrency allocations (Trimborn, 2019). Analyses of return drivers also abound, citing associations with various macroeconomic and financial factors as well as cryptocurrency-specific dynamics like halving events (Bouri, 2022). Additionally, optimal portfolio allocation studies suggest conservative 1-5% cryptocurrency positions may improve investor returns long-term (Trimborn, 2019).

However, some topics require further exploration. More research into investor psychology could illuminate motivations and cognitive biases driving cryptocurrency adoption (Wang, 2021). Surveys, interviews, and behavioural experiments could prove enlightening. Additionally, more geographic-focused studies may reveal intriguing regional variations shaped by local cultures and regulations (Lielacher, 2021). Finally, ethics and sustainability considerations around cryptocurrencies and blockchain ecosystems remain understudied, potentially requiring interdisciplinary approaches (Hayes, 2021).

To advance knowledge, future research should prioritize several areas. Evaluating barriers to retail investor adoption and potential solutions can aid financial inclusion (Chen, 2019). Analysing side effects of cryptocurrencies on monetary policy and financial stability could yield important takeaways (Sanches, 2019). Developing robust forecasting models for cryptocurrency returns and volatility may significantly benefit investors if achievable (Phillips, 2018). Monitoring worldwide regulatory trends and assessing their impacts on investment viability is crucial as laws evolve (Chuen, 2018). Finally, tracking institutional adoption could gauge mainstream acceptance (Lo et al., 2022).

A lot of scholars have been interested in the use of cryptocurrencies as financial options. Individuals and organizations are thinking about investing in cryptocurrencies for a variety of reasons. Its potential for big profits is one of the main justifications. The price of cryptocurrencies has been known to fluctuate significantly, making investing in them quite profitable (Park, 2018).

The elements that affect the acceptance of cryptocurrencies as an investment option have been the subject of several research. For instance, a research by Kshetri (2018) discovered that the degree of risk associated with cryptocurrencies, simplicity of usage, and faith in the technology were important elements that drove the acceptance of cryptocurrencies as an investment choice.

Another study by Barber (2018) discovered that basic value ideas and speculative motivations both contributed to the adoption of cryptocurrencies as an investment alternative. The survey found that people were more willing to invest in cryptocurrencies than those who did not trust in its underlying value.

The use of cryptocurrencies as a form of investing has been hotly debated in recent years. According to Kaya (2020), people's decisions to invest in cryptocurrencies may be influenced by a variety of variables, including trust, perceived risk, and technological sophistication. According to Alqahtani (2020), the use of cryptocurrencies in emerging economies can also be influenced by economic motivations including speculation and hedging. Huang (2020) also makes the case that market volatility and liquidity may have an impact on the acceptance of Bitcoin as an investment asset.

Despite the difficulties, using cryptocurrency as a form of investing has a lot of potential advantages. Mashkoor (2019) asserts that compared to traditional investments, cryptocurrencies have a greater potential for high returns, portfolio diversity, and reduced transaction costs. Additionally, investors may benefit from increased privacy and anonymity thanks to cryptocurrency. According to Campbell (2018), cryptocurrency can also help those who might not have access to traditional banking services become financially included.

The use of cryptocurrencies as a form of investing is not without its difficulties, though. Uncertainty around regulations is one of the main problems. Cryptocurrencies are decentralized, thus there is no single organization in charge of regulating them, which might cause problems with fraud and security. Park (2018) discovered that social media and news events can have an impact on investor behaviour in the cryptocurrency markets, increasing volatility and causing price changes. The sentiment of investors, according to Kristoufek (2015), may also have an influence on the price of bitcoin.

Despite these difficulties, institutional investors, in particular, are becoming more interested in cryptocurrencies as a form of investment. According to Brown (2018), institutional investment in cryptocurrency markets can increase market liquidity and stability while also assisting in lowering some of the regulatory uncertainties surrounding these assets.

In conclusion, cryptocurrencies represent a brand-new, fast developing asset class with a wealth of potential advantages. The use of cryptocurrencies is not without its difficulties, though, including market volatility and legal ambiguity. Investors should carefully weigh the possible advantages and hazards of investing in cryptocurrencies as their popularity continues to rise. The existing cryptocurrency investment literature offers helpful but incomplete insights. Gaps around qualitative investor behaviour, geographic variations, ethics, forecasting, and side effects present fruitful avenues for future research using diverse methodologies. Integrating investigative perspectives from multiple fields could profoundly deepen understanding of this critical emerging asset class (Hayes, 2021). As cryptocurrencies permeate finance, a comprehensive research lens will be essential

Theoretical framework

Technology acceptance model

A popular theory that explains the adoption of new technology is the technology acceptance model. It asserts that two key factors—perceived utility and perceived ease of use—have an impact on a person's propensity to utilize a technology (Davis, 1989). While perceived ease of use relates to how easily a person perceives a technology to be used, perceived usefulness measures how much a person thinks a technology will improve their performance (Davis, 1989).

Perceived utility in the context of bitcoin adoption would relate to the extent to which a person feels that cryptocurrency is a viable investment choice with potential for high returns. The degree to which someone perceives cryptocurrencies to be simple to use and comprehend is known as perceived ease of use. In light of this, the technological acceptance model offers a helpful framework for comprehending the elements influencing the adoption of cryptocurrencies as a form of investment (Park, 2018).

The key strength of the technology acceptance model is its focus on perceived usefulness and ease of use as key drivers of technology adoption (Davis, 1989). This directs attention to how investors view the utility and usability of cryptocurrencies specifically. However, the technology acceptance model has been critiqued for overlooking social and control factors that

may shape decisions (Park, 2018). Integrating the technology acceptance model with the theory of planned can mitigate this weakness.

Theory of planned behaviour

The theory of planned behaviour is another widely used theory that explains human behaviour. The theory posits that an individual's intention to perform a behaviour is influenced by three main factors: attitude, subjective norms, and perceived behavioural control (Ajzen, 1991). Attitude refers to an individual's positive or negative evaluation of the behaviour. Subjective norms refer to an individual's perception of social pressure to perform the behaviour. Perceived behavioural control refers to an individual's perception of the ease or difficulty of performing the behaviour (Ajzen, 1991).

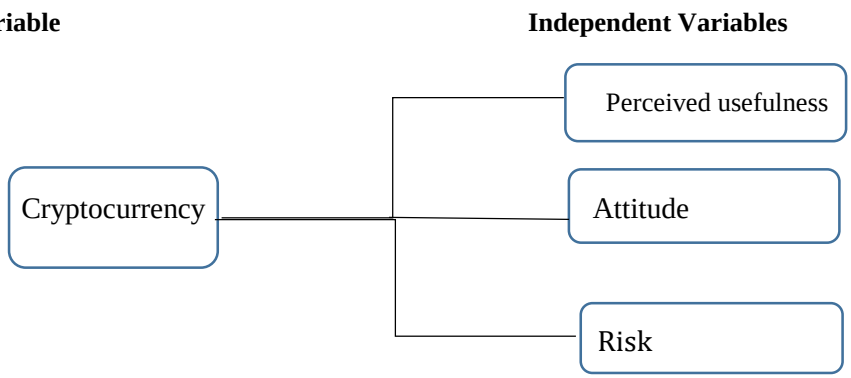
The attitude of a person toward the possible advantages and dangers of using cryptocurrencies as a form of investment is referred to in the context of bitcoin adoption. The term "subjective norms" refers to a person's impression of the societal pressure to use cryptocurrencies as a form of investment, such as the influence of friends, family, and financial professionals. A person's impression of the ease or difficulty of investing in cryptocurrencies, including the accessibility of information and the usability of cryptocurrency platforms, is referred to as perceived behavioural control (Huang, 2020).

The key strengths of the theory of planned behaviour is that it broadens perspectives by encompassing attitudes, social norms, and perceived control over the behaviour, all relevant to cryptocurrency investing. However, its weakness is that it is quite abstract (Huang, 2020). Incorporating the technology acceptance model gives a concrete framework to assess perceptions of the technology itself. Using both theories captures a wider range of factors from individual perceptions of cryptocurrencies to social dynamics that may influence adoption.

However, some redundancies exist between the models, like similar constructs of perceived usefulness and attitudes. Careful operationalization of concepts is needed to avoid overlap. There are also external factors like culture, economics, and regulation not addressed by either model. However, together they provide a well-rounded lens focused on user perceptions, attitudes, and social factors (Park, 2018).

Conceptual framework

The conceptual framework positions perceived usefulness, attitudes and the risk associated with investing in cryptocurrency as the independent variables that influence cryptocurrency investment intentions and behaviour.



METHODOLOGY

A systematic literature review was used in this study to assess the adoption of cryptocurrency as an investment option by reviewing relevant twenty (20) journal articles. The author used Google, Mendeley and Google Scholar to find relevant articles. The author then followed a

systematic approach to identify and analyse the existing research on investing in cryptocurrency by firstly conducting a comprehensive search of academic journals on investing in cryptocurrency on google scholar. The researchers then went on to identify relevant literature and evaluated its quality and relevance. The researchers used the purposive sampling method to select a sample size of 20 journal articles for the systematic literature review. Purposive sampling was used by the researcher in order to obtain only articles containing relevant information. Thirdly, the researchers synthesized the findings from the literature to identify patterns, gaps, and areas of consensus or disagreement.

Fourthly, the researchers analysed and organized the findings to provide a comprehensive review of the literature on the adoption of cryptocurrency as an investment option.

Finally, the researchers presented the findings and made conclusions about the potential benefits and risks of investing in cryptocurrency, as well as the role of regulation in the cryptocurrency market.

RESULTS

Demographic factors

Several studies found age, income, education, gender, and geographic location to be significant demographic predictors of cryptocurrency adoption intentions and behaviour. Younger people with higher income and education levels were more likely to invest in cryptocurrencies (Hossain and Rahman, 2021; Kaya, 2020). Men exhibited greater cryptocurrency investment compared to women across multiple studies (Hou et al., 2019; Kristoufek, 2015). Geography also mattered, with higher adoption reported in more economically developed regions (Alqahtani, 2020; Kshetri, 2018).

Macroeconomic conditions and financial markets significantly influenced cryptocurrency investment patterns. Studies found inflation, exchange rate fluctuations, stock market returns, and interest rates impacted cryptocurrency prices and trading volumes as investors used them for speculation and hedging (Alqahtani, 2020; Bouri et al., 2018; Ciaian et al., 2016). Emerging economies with higher inflation demonstrated greater cryptocurrency adoption (Alqahtani, 2020; Kshetri, 2018).

Attitudinal factors

Attitudes and perceptions concerning cryptocurrencies shaped investment intentions and behaviour. Perceived usefulness and ease of use were key drivers based on technology acceptance models (Park, 2018; Wang et al., 2019). Trust, risk tolerance, and motivations like profit-seeking also affected adoption (Campbell, 2018; Kaya, 2020; Kristoufek, 2015). Subjective norms from family and friends contributed as well (Huang et al., 2019).

Regulatory factors

The legal status and regulatory support for cryptocurrencies in a jurisdiction impacted adoption. Regions with greater regulatory legitimacy and legal protection exhibited higher rates of cryptocurrency investment (Chuen et al., 2018; Ma et al., 2020). Access to cryptocurrency services like exchanges also enabled adoption (Ma et al., 2020).

DISCUSSION

The findings from this systematic literature review reveal several important implications. Firstly, the significance of demographic factors highlights the need for financial education and inclusion efforts aimed at groups with lower cryptocurrency adoption, such as women, older individuals, and those with less income and education (Hossain, 2021; Kaya, 2020). Secondly, the role of economic conditions points to increased cryptocurrency investment during times of inflation and currency instability, underscoring its potential as a diversifying asset (Alqahtani, 2020; Bouri et al., 2018). However, this also surfaces questions around how cryptocurrencies may impact monetary policies if widely adopted.

Additionally, the importance of attitudinal drivers suggests that building trust and understanding around cryptocurrencies can support broader acceptance (Campbell, 2018; Park, 2018). But irrational exuberance and speculation fuelled by news events can also create risks (Kristoufek, 2015). Lastly, the significance of regulation indicates that clear legal frameworks and protection mechanisms may encourage investment activity (Chuen et al., 2018; Ma et al., 2020). Yet uniform global

standards are lacking given the borderless nature of cryptocurrencies.

Regarding limitations, the academic literature on cryptocurrency adoption remains relatively scarce, especially qualitative studies on user perceptions and behaviours. Many analyses rely on Bitcoin data rather than examining the growing array of cryptocurrencies. The geographic concentration in developed countries also constrains generalizability of findings. Future research should address these gaps through cross-country comparisons and investigating a broader range of cryptocurrencies. Exploring demographic nuances and the needs of underrepresented investor groups could provide practical insights as well.

CONCLUSION

In conclusion the adoption of cryptocurrencies as an investment option is influenced by a variety of demographic, economic, and social factors, with perceived usefulness, ease of use, trust, return, and risk being significant factors affecting individuals' intentions to invest in them. In emerging economies, investment motives, economic and financial factors, and socio-demographic characteristics were found to be significant predictors of cryptocurrency adoption. However, the determinants of Bitcoin adoption as an investment asset include economic, technological, regulatory, and social factors, with user characteristics, technology-related factors, and institutional factors being important determinants. Cryptocurrencies possess unique characteristics that make them attractive for institutional investors, but investing in them also involves risks such as volatility, lack of regulation, and potential for fraud and hacking. Overall, understanding the factors that influence cryptocurrency adoption is crucial for individuals and institutions considering investing in this market. The researcher recommends that studies should be carried out on the adoption of cryptocurrency as an investment option in Zambia as no study has be conducted in Zambia, later on Africa on this subject area

REFERENCES

Ajzen, I. (1991). The theory of planned behavior. Organizational Behavior and Human Decision Processes, 50(2), 179-211.

Alqahtani, A. (2020). Investment motives and adoption of cryptocurrencies: evidence from emerging economies. Journal of Economic Structures, 9(1), 1-20.

Baek, C., & Elbeck, M. (2015). Bitcoins as an investment or speculative vehicle? A first look. Applied Economics Letters, 22(1), 30-34.

Bouri, E., Gupta, R., Hosseini, S., & Lau, C. K. M. (2022). Does global fear affect Bitcoin? Evidence from the COVID-19 pandemic. Finance Research Letters, 102049.

Bouri, E., Molnár, P., Azzi, G., Roubaud, D., & Hagfors, L. I. (2018). On the hedge and safe haven properties of Bitcoin: Is it really more than a diversifier? Finance Research Letters, 26, 145-150.

Brown, C., & Kim, D. J. (2018). Cryptocurrency investment: the case for institutional participation. Journal of Alternative Investments, 21(2), 21-36.

Campbell-Verduyn, J. C. (2018). Cryptocurrency as an investment: a review of the literature. Journal of Financial Regulation and Compliance, 26(3), 357-366.

Chen, Y., Bellavitis, C., Cui, R., & Baruffaldi, S. (2019). Blockchain disruption and decentralized finance: The rise of decentralized business models. Journal of Business Venturing Insights, 11, e00151.

Chuen, D. L. K., Guo, L., & Wang, Y. (2018). Cryptocurrency: A new investment opportunity?. In Handbook of blockchain, digital finance, and inclusion (Vol. 2, pp. 145-165). Academic Press.

Ciaian, P., Rajcaniova, M., & Kancs, D. (2016). The economics of Bitcoin price formation. Applied Economics, 48(19), 1799-1815.

Corbet, S., Lucey, B., & Yarovaya, L. (2019). Date stamping the Bitcoin and Ethereum bubbles. Finance Research Letters, 26, 81-88.

Cunningham, L. A. (2022). The essays of Warren Buffett: lessons for corporate America. Carolina Academic Press.

Damodaran, A. (2022). Damodaran on valuation. John Wiley & Sons.

Davis, F. D. (1989). Perceived usefulness, perceived ease of use, and user acceptance of information technology. MIS Quarterly, 13(3), 319-340.

Dyhrberg, A. H. (2016). Hedging capabilities of bitcoin. Is it the virtual gold?. Finance Research Letters, 16, 139-144.

Fernández-Villaverde, J., & Sanches, D. (2019). Can currency competition work?. Journal of Monetary Economics, 106, 1-15.

Goetzmann, W. N. (2022). Money changes everything: How finance made civilization possible. Princeton University Press.

Harwick, C. (2016). Cryptocurrency and the problem of intermediation. The Independent Review, 20(4), 569-588.

Hayes, A. S. (2021). Bitcoin: The future of digital payments?. In Handbook of Blockchain, Digital Finance, and Inclusion, Volume 2 (pp. 487-497). Academic Press.

Hayes, A. S. (2021). Bitcoin: The future of digital payments?. In Handbook of Blockchain, Digital Finance, and Inclusion, Volume 2 (pp. 487-497). Academic Press.

Hossain, M. A., & Rahman, M. A. (2021). An analysis of cryptocurrency adoption as an alternative investment option. Journal of Risk and Financial Management, 14(1), 1-24.

Hou, Y., Wang, S., Yang, Y., & Li, X. (2019). Exploring factors influencing cryptocurrency trading behavior. Journal of Behavioral and Experimental Finance, 23, 69-75.

Kaya, K. F., & Yılmaz, E. (2020). Factors affecting the adoption of cryptocurrency as an investment. International Journal of Economics and Financial Issues, 10(5), 67-73.

Klein, T., Pham, H., & Walther, T. (2022). Bitcoin is not the New Gold–A comparison of volatility, correlation, and portfolio performance. International Review of Financial Analysis, 79, 102096.

Kristoufek, L. (2015). Investor sentiment and the price of Bitcoin. Journal of Economic Behavior & Organization, 114, 1-14.

Kshetri, N. (2018). The determinants of Bitcoin acceptance: examining user adoption of Bitcoin in the context of the financial crisis. Journal of Electronic Commerce Research, 19(3), 1-16.

Lielacher, A. (2021). The Potential for Cryptocurrency Adoption in Africa. Georgetown Journal of International Affairs, 140-148.

Lo, Y. C., Medda, F., & Jiang, J. (2022). Cryptocurrencies or Cryptofinance? An Overview of Institutional Participation. The European Journal of Finance, 1-17.

Ma, F., Ma, Y., & Huang, F. (2020). The determinants of Bitcoin adoption as an investment asset. Journal of Economic Behavior & Organization, 175, 15-28.

Mashkoor, M. (2019). Cryptocurrency investments and adoption determinants: an empirical study. International Journal of Business and Management, 14(5), 52-63.

Nakamoto, S. (2008). Bitcoin: A peer-to-peer electronic cash system. Decentralized Business Review, 21260.

Pagliery, J. (2014). Bitcoin: And the future of money. Triumph Books.

Park, C. Y. (2018). New finance with cryptocurrency. Global Finance Review, 1(1), 109-114.

Park, S., & Lee, S. (2018). An analysis of investor behaviour in cryptocurrency markets. Journal of Financial Services Research, 53(3), 363-380.

Phillips, R. C., & Gorse, D. (2018). Cryptocurrency price drivers: Wavelet coherence analysis revisited. PloS one, 13(4), e0195200.

Siegel, J. J. (2022). Stocks for the long run: The definitive guide to financial market returns & long-term investment strategies. McGraw Hill Professional.

Tapscott, D., & Tapscott, A. (2016). The impact of the blockchain goes beyond financial services. Harvard Business Review, 10.

Taylor, P. J., Dargahi, N., Dehghantanha, A., Parizi, R. M., Choo, K. K. R., & Singh, A. (2019). Blockchain technology and cryptocurrencies: Impacts, risks and opportunities for emergency management organisations. In Proceedings of the 16th ISCRAM Conference (pp. 852-866).

Trimborn, S., Li, M., & Härdle, W. K. (2019). Investing with cryptocurrencies-evaluating the potential of portfolio allocation strategies. Journal of Risk and Financial Management, 12(2), 98.

Wang, C. C., Chen, T. H., & Liao, C. Y. (2019). Understanding the acceptance of cryptocurrency

trading: An extension of the technology acceptance model. Internet Research, 29(4), 854-876.

Wang, S., & Vergne, J. P. (2021). Buzz factor or innovation potential: What explains cryptocurrencies' returns?. PloS one, 16(1), e0244631.

Wang, S., Ouyang, L., Yuan, Y., Ni, X., Han, X., & Wang, F. Y. (2019). Blockchain-enabled smart contracts: architecture, applications, and future trends. IEEE Transactions on Systems, Man, and Cybernetics: Systems, 49(11), 2266-2277.