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MicroStrategy¹ and Bitcoin: The impact of corporate investments on the stability of the cryptocurrency market

The objective of this article is to identify the impact of corporate investments in Bitcoin on the stability of the cryptocurrency market, with particular emphasis on the investment strategy of MicroStrategy (currently Strategy). The first section of the paper outlines the operational mechanisms of Bitcoin, including its consensus system and the blockchain technology that underpins its security and decentralisation. The second section examines the structure of the cryptocurrency market, identifying its key participants and the mechanisms driving its volatility and dynamics. The third section is dedicated to an analysis of MicroStrategy's quarterly reports for 2023 to 2024. The final section presents the conclusions, which indicate that the company's aggressive acquisition strategy is associated with significant financial risk. The analysed data suggest that continued exposure to the highly volatile cryptocurrency market may lead to serious challenges for the firm, potentially undermining its long-term financial stability. Consequently, this may pose systemic risks to the broader cryptocurrency market, particularly by exerting substantial downward pressure on the supply side.

Keywords: cryptocurrencies, financial risk, MicroStrategy, Bitcoin

JEL classification: G32

Markets are never wrong, but opinions often are.

Jesse Livermore

Introduction

The cryptocurrency market, with Bitcoin (BTC) as the dominant player, is gaining significance as a modern form of investment and becoming a subject of interest for both individual and institutional investors. Its development, although

¹ On 5 February 2025, MicroStrategy rebranded itself as „Strategy” – a change intended to better reflect the company's innovative approach to Bitcoin investment. However, the former name is used in this article, as all reports referenced in the analysis originate from a period during which the original name was still in effect.

dynamic, is not without risks, especially considering its high volatility that presents a significant challenge for individuals and entities investing capital in this asset. This volatility arises from both the nature of the cryptocurrency market itself and from various external factors, such as legal regulations, changes in the perception of such investments, and macroeconomic decisions. In the context of the growing importance of cryptocurrencies in the financial system, the role of corporate investments is becoming increasingly visible, given their tangible impact on price formation and market dynamics. These actions not only attract media attention but also serve as an important starting point for further research into the impact of such investment strategies on the stability of the entire cryptocurrency market.

The goal of this article is to identify the impact of corporate investments in Bitcoin on the stability of the cryptocurrency market, with particular focus on the investment strategy of MicroStrategy. Through its decisions regarding large-scale Bitcoin purchases, this company has become one of the main examples of corporate investors in this asset, and its strategy serves as benchmark for other entities considering similar investments. The research question posed in this study is: "How will the sharp fluctuations in Bitcoin affect the financial stability of MicroStrategy?". The research methods used include financial analysis and market data analysis, which allow for examining the impact of Bitcoin's volatility on the company's financial performance, as well as assessing the risk associated with holding a large amount of this asset on the company's balance sheet. This analysis aims to identify potential dangers associated with concentrating investments in a single type of asset, especially in the context of their high volatility and low liquidity on exchanges.

This article aims not only to answer the research question but also to provide broader conclusions that may be useful in evaluating the risk associated with corporate investments in cryptocurrencies. Given the growing risk stemming from the high concentration of assets, it becomes crucial to understand how market volatility can affect the assumptions and outcomes of companies. The results of this research may contribute to a better understanding of the impact of corporate investments on the cryptocurrency market and serve as an important element in assessing potential threats to the stability of financial market in the era of digital assets.

1. Characteristics and operational mechanisms of Bitcoin

Bitcoin is the pioneering cryptocurrency that paved the way for the development of digital assets based on blockchain technology. The concept of a virtual currency was introduced in 2008 by an anonymous individual or group operating under the pseudonym Satoshi Nakamoto, and the network became operational in 2009 [Böhme et al., 2015, pp. 213–238]. Bitcoin was created as a decentralised

payment system, existing independently of traditional financial institutions. Its mechanism relies on a global network of computers that collectively process and validate transactions, thus eliminating the need for intermediaries in the exchange process.

Bitcoin's technology employs blockchain as the core of its system. This is a decentralised, transparent ledger in which every transaction is recorded within a structure of cryptographically linked blocks [Shi, 2016, pp. 1–8]. This architecture ensures data permanence and resistance to tampering. New blocks are added through a process known as mining, which involves solving complex mathematical problems by computers. This process is based on the Proof of Work (PoW) consensus algorithm, which requires substantial computational power and energy expenditure, thereby providing a high level of security for the entire network.

A unique feature of Bitcoin is its limited supply – only a maximum of 21 million units can be generated within the network. It is worth noting that not all the Bitcoins will ever be available on the market. Numerous wallets have been lost, and their owners lack the private keys necessary to access their capital. This makes Bitcoin a deflationary asset, setting it apart from traditional fiat currencies, which can be issued in unlimited quantities. Inexperienced investors often perceive Bitcoin as a form of “digital gold” a view reinforced by its limited supply. However, current observations suggest that Bitcoin not only retains its value over the long term; in fact, it has appreciated significantly.

The Bitcoin network utilises advanced cryptographic methods to protect data and ensure transaction security. The implementation of asymmetric cryptography enables users to sign transactions using a private key, while allowing others to verify them with a corresponding public key. Data integrity within the network is further reinforced by using the SHA-256 hashing function [Nakamoto, 2008, p. 3]. This function transforms any set of input data into a unique fixed-length string consisting of 64 characters. Even a minimal alteration in the input data, such as changing a single letter, results in a significant change in the output and the rejection of the block. This ensures the uniqueness of each hash.

SHA-256 is recognised for its high level of security due to the irreversibility of the process – it is impossible to reconstruct the original data from the hash [Nakamoto, 2008, p. 7]. Moreover, the SHA-256 function ensures that different inputs always generate distinct outputs, thereby safeguarding data integrity. Although hash generation is typically a rapid process, it can be significantly slowed down by congestion within the Bitcoin network. An increase in the volume of transactions intensifies competition among miners, who must solve increasingly complex computational problems. Additionally, the algorithm dynamically adjusts the mining difficulty to maintain the average block creation time at approximately 10 minutes.

Due to these characteristics, Bitcoin has not only revolutionised the perception of money but has also become the foundation for the development of blockchain technology and cryptocurrency systems worldwide.

2. The structure and operational mechanisms of the cryptocurrency market

The cryptocurrency market is a dynamically evolving financial domain that relies on digital assets utilizing blockchain technology to ensure the security and transparency of transactions. Within this market, there exists a wide array of tokens, with the most significant belonging to the category Layer 1 (L1), such as: Bitcoin, Ethereum, BNB, Solana, Tron, PulseChain, Toncoin and others. These projects differ in terms of their consensus mechanisms for instance, Bitcoin operates based on Proof of Work, whereas Ethereum and PulseChain rely on the Proof of Stake (PoS) [Sheikh et al., pp. 786–791].

Numerous applications, layers, and additional tokens are built on top of these networks, serving various functions within the broader cryptocurrency ecosystem. A notable example includes tokens from the DeFi (Decentralized Finance) sector, which offer users access to financial services such as lending, asset exchange, decentralised trading platforms, and staking mechanisms. Projects like Uniswap and MakerDAO enable users to actively participate in platform governance through voting rights, made possible by holding specific governance tokens.

In addition to projects with functional applications within the cryptocurrency space, there also exists a segment of more speculative assets, such as meme coins. As the name suggests, these typically emerge from jokes or popular internet trends. Their value is closely tied to speculation and community enthusiasm, and the tokens themselves lack practical utility beyond what is associated with their cultural context.

From a structural perspective, the cryptocurrency market occupies a space between perfect competition and monopoly. On the one hand, a feature of cryptocurrencies is the presence of numerous participants, which fosters competition across various segments of the market. On the other hand, Bitcoin holds a dominant position in terms of market capitalisation and exerts significant influence over the entire market, contributing to market asymmetry. Furthermore, certain areas, exhibit a concentration of power, which may give rise to quasi-monopolistic behaviour when a limited number of trading platforms dominate the market.

The cryptocurrency system relies largely on the stability and functioning of the US dollar, which stems from the dominance of stablecoins such as USDT (Tether), USDC (USD Coin – Coinbase exchanges), and DAI [Kołodziejczyk, Jarno, 2000,

pp. 155–170]. They are designed in such a way so that their value is pegged at a 1:1 ratio to the US dollar. As a result, they have gained popularity due to their capacity to minimise the risks associated with the high price volatility typical of cryptocurrencies.

The issuers of the aforementioned tokens regularly audit their reserves to verify the actual backing of assets corresponding to the value of the issued coins. Despite these procedures, this system remains susceptible to criticism and generates concerns related to potential risks. The uncertainty among potential buyers primarily revolves around the possibility of insufficient reserve coverage in extreme situations, such as a financial crisis, sudden capital outflows, or regulatory actions.

Moreover, the stability of the system is also contingent upon the health of the US economy, the monetary policy of the Federal Reserve, and the overall condition of the US dollar market. This interdependence renders cryptocurrencies, albeit indirectly, sensitive to these macroeconomic factors. Many analysts and market participants have noted that such a strong reliance on the dollar may become a significant challenge in the future, particularly in the context of regulatory shifts, such as the implementation of the Markets in Crypto-Assets (MiCA) regulation in 2025 (which governs the issuance of crypto-assets and the provision of related services within the EU), or in the event that evidence emerges of insufficient reserve backing by stablecoin issuers.

Crypto-assets highlight their dependence on the US dollar while introducing unique dynamics to the financial market. In this context, the cryptocurrency market exhibits a different response to various phases of the economic cycle. In traditional markets, changes stemming from the economic cycle, such as recessions, expansions, or modifications in monetary policy, have a predictable impact on asset prices. For instance, a period of economic slowdown typically results in a capital flow toward bonds or gold, which are considered safe havens [Iwaszczuk et al., 2021, p. 33]. In the case of cryptocurrencies, market reactions can be more complex and harder to predict. During periods of financial crisis, when trust in traditional institutions declines, Bitcoin is often perceived as an alternative asset with characteristics akin to digital gold. These narrative prompts retail investors to reallocate capital, driven largely by fear of financial loss. Such behaviour typically results in a surge in Bitcoin's valuation. A notable example of this phenomenon occurred during the COVID-19 pandemic, when a similar shift in investor sentiment was observed.

Despite the panic that prevailed in traditional financial markets during that period, substantial price increases were observed (Figure 1). One of the key drivers behind these upward movements is Bitcoin's built-in mechanism known as halving, which involves reducing the block reward for miners by half [Nakamoto, 2008, p. 3]. This event occurs approximately every four years and plays a crucial role in

shaping Bitcoin's supply dynamics [Burniske, Tatar, 2017, p. 32]. The reduction in mining rewards creates a scarcity of newly generated units, which often leads to an increase in Bitcoin's value, enhancing the appeal of this finite asset [Meynhard, 2019, p. 72].

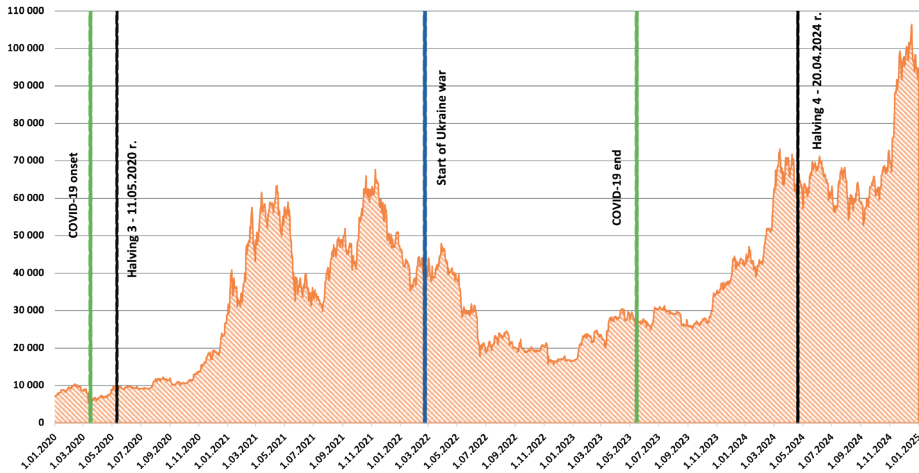


Figure 1. Bitcoin stock quotes

Sources: Own analysis based on Reuters data [Reuters, n.d.].

Historically, halvings have frequently triggered new bull cycles in the cryptocurrency market, further emphasizing their unique cyclicity compared to traditional financial markets [Zeng et al., 2020, pp. 209–220]. In this context, the phenomenon of asymmetric correlation has been observed, whereby the movements of major indices such as the S&P 500 exert a noticeable influence on Bitcoin's price dynamics. However, trend shifts within the cryptocurrency market tend to have only a marginal impact on stock market indices [Matkovskyy, Jalan, 2019, pp. 93–97]. A fundamental aspect of the idea that underpinned Satoshi Nakamoto's project is the absence of a central supervisory authority – a significant departure from traditional assets, which are subject to national and international regulatory frameworks. The blockchain technology at the core of the system enables peer-to-peer transactions without the need for intermediaries, thereby enhancing both transparency and the overall security of operations [Nakamoto, 2008, p. 2]. In parallel, there are privacy-focused projects such as Monero, which employ technologies like stealth addresses to enhance transactional anonymity [Van Saberhagen, 2013, p. 3]. The absence of regulation and central oversight entails not only benefits but also significant risks, such as vulnerability to extreme volatility, market manipulation, and fraudulent activity. Those risks are exemplified by projects that promise unrealistically high rates of return or excessive interest in staked assets, as well

as instances of misconduct and abuse (one notable example is the FTX exchange, which engaged in the misappropriation of client funds). In conventional financial systems, regulatory institutions have the capacity to implement stabilizing measures, although such actions have, at times, proven to be equally hazardous. The cryptocurrency ecosystem lacks comparable mechanisms, meaning that its dynamics are governed primarily by technological protocols and the fundamental principles of economics – supply and demand [Marwala et al., 2017, pp. 15–25].

3. MicroStrategy and BTC purchases

According to the latest report [MSTR, Q4, 2025], in the current fiscal year MicroStrategy (currently Strategy) is continuing its Bitcoin accumulation strategy. However, it is essential to closely examine the company's debt profile, both realised and projected earnings, as well as the maturity schedule of its outstanding debt instruments. The financial statements dated 30 October 2024 indicate that the company currently holds a total debt of USD 4.264 billion, with an average annual interest rate of 0.811%. The interest payments alone amount to USD 34.6 million [MSTR, Q3, 2024, pp. 4–5, 12, 15, 39–42]. In 2023, the company reported revenues of approximately USD 496.3 million; however, its expenses, excluding Bitcoin, amounted to roughly USD 611 million. In that period, MicroStrategy incurred a net loss of approximately USD 115 million, yet proceeded to acquire 56,650 BTC [MSTR, Q4, 2025, pp. 6, 10, 20, 45–48]. The company's performance in 2024 also remains subpar. Despite generating revenues of USD 469.7 million, MicroStrategy reported a record net loss of approximately USD 1.853 billion [MSTR, Q4, 2025, pp. 6, 10, 20, 45–48]. On the other hand, despite the aforementioned figures, the company acquired 258,320 BTC in 2024 at a total cost of USD 22.1 billion, corresponding to an average purchase price of USD 85,447 per Bitcoin. As a result, the total Bitcoin holdings of MicroStrategy have reached 471,107 BTC, acquired for a cumulative investment of USD 30.4 billion, at an average price of USD 64,511 per BTC [MSTR, Q4, 2025, pp. 6, 10, 20, 45–48]. It is immediately apparent that MicroStrategy's Bitcoin purchases in 2023 exceeded its annual revenues by more than threefold; and in 2024, nearly tenfold. However, the company's primary concern remains its indebtedness, which encompasses not only the interest payments but also the principal amounts on which those interests are calculated. An analysis of financial reports from the beginning of 2024–Q1_24 reveals that the maturity of the earliest debt instruments, issued in 2020, falls in December 2025, with a repayment obligation amounting to USD 650 million [MSTR, Q1, 2025, pp. 5, 12, 16, 27–30]. In turn, the Q2_24 report indicates that the liabilities have been paid [MSTR, Q2, 2024, pp. 4–5, 12, 15, 25–28], which raises a question: how did the company manage to secure

such a substantial amount of capital within a relatively short period, despite its poor financial performance? The answer lies in MicroStrategy's approach to issuing new shares to raise capital, which is then used to meet upcoming debt obligations.

In the short term, the company's strategy appears to be a brilliant plan. "Cheap" credit denominated in US dollars permits the acquisition of appreciating assets (Bitcoin) which are then followed by the repayment of debt through rising share prices rather than actual cash flows. However, over a four-year horizon, significant equity dilution occurs, as the issuance of new shares accelerates sharply (Figure 2).

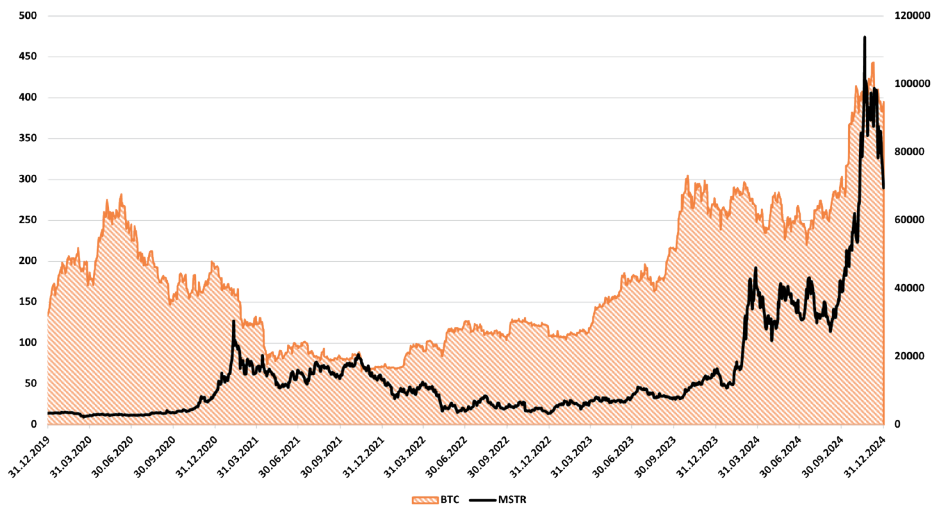


Figure 2. BTC quotes compared to MSTR (MicroStrategy's stock ticker)

Source: Own analysis based on Reuters data [Reuters, n.d.].

A continued upward trend can be observed (Table 1), driven by the company's ongoing accumulation of debt, which it also intends to repay using MSTR shares (MicroStrategy's stock ticker). It is important to note that while the company holds \$30.4 billion in crypto assets, this represents unrealised gains, making the company appear profitable in theory [MSTR, Q1, 2025, pp. 5, 7, 12, 16, 27–30]. The diluted shares continue to appreciate as they are underpinned by the Bitcoin holdings, which remain in a bullish trend.

Table 1. MSTR report

Variable	6/30/2020	12/31/2020	12/31/2021	12/31/2022	3/31/2023	3/31/2024	6/30/2024	9/30/2024	12/31/2024	2/02/2025
Total Bitcoin Holdings	-	70,47	124,391	132,5	189,15	214,278	226,331	252,22	447,47	471,107
Shares Outstanding (in ,000s)										
Class A	76,51	76,23	93,22	95,85	149,041	156,83	171,03	182,995	226,138	237,191
Class B	20,35	19,64	19,64	19,64	19,64	19,64	19,64	19,64	19,64	19,64
Basic Shares Outstanding	96,86	95,87	112,86	115,49	168,681	176,47	190,67	202,635	245,778	256,831
2025 Convert Shares @ \$39.80	-	16,33	16,33	16,33	16,33	16,33	3,659	-	-	-
2027 Convert Shares @ \$143.25	-	-	7,33	7,33	7,33	7,33	7,33	7,33	7,33	2,883
2028 Convert Shares @ \$183.19	-	-	-	-	-	-	5,513	5,513	5,513	5,513
2029 Convert Shares @ \$672.40	-	-	-	-	-	-	4,462	4,462	4,462	4,462
2030 Convert Shares @ \$149.77	-	-	-	-	5,342	5,342	5,342	5,342	5,342	5,342
2031 Convert Shares @ \$232.72	-	-	-	-	2,594	2,594	2,594	2,594	2,594	2,594
2032 Convert Shares @ \$204.33	-	-	-	-	-	-	3,915	3,915	3,915	3,845
Options Outstanding	14,81	11,57	11,67	15,77	12,936	7,03	5,916	5,678	4,956	4,956
RSU/PSU Unvested	-	740	1,05	1,2	2,359	2,57	2,244	2,034	1,845	1,807
Assumed Diluted Shares Outstanding	111,67	124,51	149,24	156,12	207,636	217,666	221,671	235,042	281,735	288,192
BTC Yield % (period-over-period)	-	-	47.3%	1.8%	7.3%	8.1%	3.7%	5.1%	48.0%	2.9%
BTC Yield % (YTD)	-	-	-	-	-	-	-	-	74.3%	2.9%

Source: [MSTR, Q4, 2025].

4. Conclusions

An analysis of MicroStrategy's operations, led by its co-founder and Executive Chairman, Michael J. Saylor, reveals a strong correlation between the company's aggressive debt acquisition strategy and the prevailing trend in the Bitcoin market. This phenomenon is closely linked to the rising value of the company's stock, which in turn enhances its ability to secure further debt while maintaining favourable cost ratios. As a result, the debt incurred becomes less costly to maintain than the asset it is used to acquire. Within this framework, Bitcoin serves as the core of the company's investment strategy. However, such a strategy entails considerable risk, which answers the research question. In the event of a trend reversal in the cryptocurrency market, if Bitcoin's value were to decline, MicroStrategy's stock, which is largely underpinned by BTC, would probably follow the same downward trajectory. Consequently, the company may be forced to issue an increasing number of shares in order to meet its upcoming interest and principal obligations. This scenario causes a substantial dilution of existing equity, effectively flooding the market with new shares and further weakening the company's position. As these dynamics unfold, MicroStrategy may encounter growing difficulty in attracting new investors to purchase its stock. Michael J. Saylor's strategic decisions are fundamentally based on the assumption of sustained upward momentum in the Bitcoin market. However, every investor should recognise that such a dependency is inherently risky, as all markets experience bearish phases. Moreover, Bitcoin operates within recurring cycles influenced by its halving mechanism. If BTC enters a prolonged sideways trend or declines to lower levels, it could trigger a cascading drop in the value of MSTR shares, driven by an inverse correlation between the value of the underlying asset and the number of newly issued shares. In a critical scenario, where the company's financial stability and operational viability were to be threatened, it may be forced to liquidate part of its Bitcoin holdings. In accordance with the aim of the study, which was to identify the impact of corporate investments in Bitcoin on the stability of cryptocurrency market, it can be stated that the actions of such a large institutional player would likely deteriorate an already fragile market sentiment, intensifying the downward pressure on Bitcoin prices and further undermining the company's performance. Currently, a relatively small supply of BTC is available on cryptocurrency exchanges, meaning that even modest shifts in volume can significantly impact price volatility. Michael J. Saylor likens his strategy to that of real estate developers in historical Manhattan [Maldonado, 2024], an approach predicated on the assumption of continually rising property values, which allows for increasing leverage and sustained expansion. However, during times of crisis, such as the 2008 Global Financial Crisis, traditional markets were stabilised through government intervention. In contrast, a recession

in conventional markets could have a disproportionately severe impact on cryptocurrencies, which are still perceived by a large segment of inexperienced investors as a primarily speculative sector.

Ultimately, it will be the market that delivers the verdict, and time will reveal whether Michael J. Saylor is a visionary investment strategist or the architect of one of the most prominent cryptocurrency-driven financial pyramids.

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