

# Impact of Crypto Currency on Banking Sector In India

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**Abstract-** *It's no coincidence that the first crypto currency, i.e., Bitcoin, was introduced in the year 2008 immediately after the stock market crash which happened in the same year. The crash was largely credited to the filing of bankruptcy of the iconic US investment bank Lehman Brothers which shook the faith of people in the banking sector, at least for the time being.*

*Crypto market being international in nature, with no regulators, is highly volatile hence extremely risky. Most Governments and Central Banks around the globe don't seem to like crypto citing the reasons such as black money, high risk, dollarisation of economy due to the existence of stable coins like USDT (for nations which don't use USD for exchange domestically like India) etc; but the more logical/real reason for their anguish towards such an innovative technology driven industry with a market total capitalization of 1.19 Trillion USD (at the time of writing this paper) could be entirely different from what they are telling us, this paper shall try to find out such possible reasons .*

*Apart from that, this paper will try to discuss the possible impacts of the rise of crypto currency on the banking sector in India, it will try to investigate the reasons why banks in general don't like people investing their money in crypto, besides this paper will also try to investigate the users expectations of the future of crypto and also the recent legislations (mostly in the form of taxes on crypto earnings) brought by the Government of India and its possible impacts .*

**Keywords-** Bitcoin, Cryptocurrency, Crypto Taxation, Impact of crypto on Banks, Opinions of Governments on Crypto, Future Expectations by users, Risky and volatile market, Technology.

## I. INTRODUCTION

There is no denying the fact that the world is moving at a very fast pace towards creation and adoption of newer technologies, which provides more efficient ways of doing a given task than it was done using tech of last the generation , Crypto engineering projects happens to be one of such forward leaps in the sphere of tech based solutions; the example of this

could be – how first Web 1.0 came , then came Web 2.0 (currently ongoing) , and now works are being done to bring out Web 3.0 by the use of Blockchain technology , the origin of which is crypto itself.

Crypto currency/s original intention was to bypass the banking system and it's creation was largely attributed to the rising people's distrust on the government and the banking system, but recently there are a number of crypto projects which are not even aiming to achieve that original intended target and are rather working to deliver technology-based solutions at very low costs.

Crypto Currency (or Crypto Assets, as categorised by the GOI in its budget session on March 31, 2022) in traditional/original form may be defined as a means of payment which intend to eliminate the middlemen, i.e., the government. But recently it has been seen that crypto has transformed into an entirely different category than what the founder of BTC (the first ever crypto) intended and are not treated as a legal tender (bar El Salvador and Central African Republic), but are rather put in the category of 'digital asset' in most of the countries across the globe.

Crypto being considered as asset class, is now traded openly across the globe giving rise to the activity of crypto trading as a very profitable (and very risky) form of business. There are several trading techniques such as Intraday trading, Swing trading, etc which are used by traders of take profitable entries in this market as per their analysis, as well as their risk tolerance capacity.

Banks around the globe often openly criticise crypto and considers it a threat to the entire banking system of a country, the reasons given by them are many but the real and most sensible reason could be the high probability of reduced inflow of cash in banks ultimately leading to reduced earnings of banks in general.

This paper shall try to find correlation between the rise of crypto and its impact on banks (majorly the cash deposits received by banks in India after the rise of crypto), the impact of the ban that was placed on crypto in India in the

year 2018(repelled in 2020 by the Supreme Court), Indian Crypto taxation policies and its possible impacts and challenges and issues faced by crypto in India.

Further this paper shall try and demonstrate the financial riskiness of crypto market and how unstable it is, using examples of candle stick charts of popular crypto currencies/assets.

## II. OBJECTIVES

1. To find the relation between rise or fall of crypto with the rise or fall of bank's finances.
2. To find whether crypto is really a threat of banks or not.

## III. LITERATURE REVIEW

1. In the words of Marissa A. Scicchitano, Senior Manager in Wolf's Assurance group, financial institutions are hesitant to enter the crypto space due to lack of proper regulations and high price volatility in this field.
2. According to a study conducted by the Association of Certified Anti-Money Laundering Specialists (ACAMS) and the U.K.'s Royal United Services Institute, about 63% of banking employees look upon crypto as a threat rather than an opportunity. Hence, it shows how banks in general tends to dislike crypto.
3. "Like other technology developments in the past, there was the potential for criminal activity," said Brian Brooks, acting Comptroller of the Currency in a statement.
4. As per a January 2021 report published in The Telegraph points out - "According to industry data, around 13% of all Bitcoin sits in the hands of just over 100 individual accounts." They are referred to "crypto whales". Such concentrated ownership, in what is believed by many to be the alternative monetary system, would make that system prone to manipulation.
5. In the words of RBI, on February 14th, 2022, at the Indian Banks Association 17th Annual Banking Technology Conference and Awards- it is futile to even try to regulate crypto, as they believe crypto to be literally nothing, not currency, not financial assets or any assets (digital or otherwise), and it will be impossible to regulate something which doesn't fall in any of the existing categories.

## IV. HYPOTHESIS

H0 – There is no correlation between rise of crypto and cash inflows in banks.

H1 – There is relation between rise of crypto and cash inflows in banks.

## V. RESEARCH METHODOLOGY

The primary aim of this research paper is to find out the impact of money flowing into crypto on the banking sector in India, and for this purpose, this paper shall be considering data post the financial year 2020 (2020 to present) of a major government sector bank in India, ie, SBI and compare this data with that of Bitcoin(BTC).

For the purpose of taking an idea of the financial strength of the banking sector in India, the data of share prices of SBI will be taken up, and for the purpose of rising(or falling) strength of crypto, the financial data of BTC will be taken up. Majorly, these two data will be compared to find out whether there is any correlation between the two.

These two are taken as representatives of their respective sectors because they are the leading players in their respective fields, SBI is the largest public sector bank in India and BTC has the highest dominance in the entire crypto market.

This paper shall try to find whether the suspicion of banks is legit or whether they are over exaggerating only select aspect of crypto in light of their own short-term gains.

The data is mostly taken from online sources , and than analysed and compared.

## VI. CHANT COMPARISONS

1.
  - BTC –



(1)(Source -

<https://in.tradingview.com/chart/xaoSFumS/?symbol=BITSTAMP%3ABTCUSD>)

As can be clearly seen in the chart above, BTC witnessed explosive growth in the year 2020-2021 and the value of BTC has blown up by 52630 USDT(approx.) and that too within a span of one year.

- SBI –



(1.1)(Source -

<https://in.tradingview.com/chart/xaoSFumS/?symbol=NSE%3ASBIN>)

SBI also experienced high level of growth in the year 2020 to 2021, and the price of one share of SBI almost doubled as can be seen in the chart above indicated by green arrow, from April 20 to April 21.

Conclusion –

By comparing these two charts it can be concluded that in the financial year 2020-21 (April 20 – April 21, the time period when BTC witnessed explosive growth), most people looked upon it to be temporary and seemingly were cashing out and booking profits back to their bank accounts as and when they felt was a good opportunity to do so. We came to this conclusion because with the rise of BTC in that time frame, the share price of SBI was also rising pretty decently. This in a way gives us a hint of how the worry of banks against the rise of crypto has little base as people mostly seems to look upon crypto as an asset to trade and make money, ultimately withdrawing the profits they make in the crypto market back to their bank accounts, thus increasing the cash inflow and deposits of cash in banks in general.

2.

- BTC



(2)(Source -

<https://in.tradingview.com/chart/xaoSFumS/?symbol=BITSTAMP%3ABTCUSD>)

The months of April and May of the year 2021 (and the mid of June 2021) saw a brutal crash in the price of BTC, this crash was largely attributed to the ban on crypto mining activities imposed by China on May 2021.

The price of BTC fell all the way from around 60K USDT range to around 30K USDT range (Note – 1 USDT, which is the most popular stable coin pegged in the ratio 1:1 against the USD, is equal to around 83INR at the time of writing this paper

- SBI



(2.1)(Source -

<https://in.tradingview.com/chart/xaoSFumS/?symbol=NSE%3ASBIN>)

The share prices of SBI continued to rise after a small pullback. The prices increased by almost 100INR from the month of April 2021 to mid of June 2021.

Conclusion –

With the per coin price of BTC falling drastically, the share price of SBI continued its bull mode. This could indicate either of the following two scenarios –

1. There is an inverse relationship between the prices of crypto and shares of banks.

2. There is no (or minute) relation between them and they are both running independently.

The first of the above two options seem more reasonable due to the fact that there is only a limited supply of money worldwide, and it's the same limited money which can either be invested in crypto, stocks or deposited in banks.

3.

• BTC



(3)(Source -

<https://in.tradingview.com/chart/xaoSFumS/?symbol=BITSTAMP%3ABTCUSD>)

As can be seen, the prices of BTC saw exponential growth from August 2021 to November 2021, after taking support from around 30000 USDT, and made an ATH at around 68000USDT before crashing down where it is trading now (at point C in the chart at the time of writing this paper) at around 19000USDT.

This also shows how risky and volatile the crypto market is, financially speaking, as can be clearly seen that within a span of around 8 months from November 2021 to June 2022, nearly 49000 USDT (which is equivalent to around INR 4067000, by the current price of USDT at 83 INR) has been wiped from the per coin price of BTC.

• SBI



(3.1)(Source -

<https://in.tradingview.com/chart/xaoSFumS/?symbol=NSE%3ASBIN>)

The per share price of SBI has risen up from INR407.80 to a high of INR533.65, from August 2021 to November 2021, which is a decent growth, which acted as a solid resistance and prices started falling down from that high to where it is trading now at around INR440.30.

Conclusion –

The prices of BTC and SBI shares seem to move in the same direction as can be seen by comparing the two charts above. From point A to point B (August 2021 to November 2021), the prices of BTC were in a bullish mode and had broken past its most recent previous high; a similar scenario can be observed in the prices of SBI that it went on a bull mode and had broken past its most recent previous high.

From point B to point C, the prices of BTC started declining and again a similar scenario can be observed in the prices of SBI. Hence, it can be concluded here that the prices of crypto and shares of bank (which is indicative of the financial health of the bank in question) seem to have a positive correlation, though the degree of this correlation may fall in the category of low due to the fact that though the prices of both are moving in the same direction, the variation in prices over time in the two corresponding asset categories is huge.

**VII. PROVING OF HYPOTHESIS**

- H0 fails two of the three tests conducted in the above chart comparisons (1<sup>st</sup> and 3<sup>rd</sup>), hence can be rejected.
- H1 passes two of the three tests (1<sup>st</sup> and 3<sup>rd</sup>), hence can be concluded as the most reasonable answer to the major question posed by this research paper, that being - there is a relation (that being positive) between the prices of BTC and the share price of SBI.

**VIII. CONCLUSION**

As per the findings of this research paper, there is no proper evidence to support that the rise of crypto could threaten the banking sector of a country, as crypto is majorly looked upon as a new asset class and not as a replacement to fiat currency by most of the world's economies and also due to the fact that there seemingly is a positive correlation between the price of crypto (represented by BTC in this research paper) and the share price of Banks (represented by SBI in this research paper) in India.

As per the findings of this paper, the worry of the banks seemingly is misplaced and also seems to be based on their own short-term vested interests.

It can be said to be misplaced due to the fact that there seemingly is a positive correlation between stock prices of SBI (which is indicative of its financial health) and the prices of BTC.

It can also be seen that after the crypto taxation policy was implemented in India, the trading volumes in the Indian exchanges have dropped considerably due to the harshness of the new tax laws that are implemented in India on March 31, 2021 (source - <https://rb.gy/eavnve>).

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