

Investment Strategy Update #38

Does Bitcoin have a place in your portfolio?

- Bitcoin has quadrupled over the last few months due to combination of factors including: 1) rising inflation concerns; 2) fears of money debasement due to extreme money printing (Modern Monetary Theory becoming more mainstream) and 3) belief that it is gaining acceptance as a more common medium of exchange.
- Increasing institutional interest appears to be validating the Bitcoin bulls, adding credibility and (potentially) durability to the current rally versus 2017, when we saw the last price spike.
- Bitcoin is a relatively young asset class (the same can be said of cryptocurrencies) and while it has rallied strongly and appears to be gaining increased acceptance within a diversified portfolio, it remains highly volatile and somewhat untested as an inflation hedge.
- We think it can provide returns uncorrelated to traditional assets as well as providing some protection from further currency debasement and a potential spike in inflation, due to its fixed supply. However, it is not the only asset to provide insurance for these tail risks, with gold the more traditional and historically proven alternative.
- We think Bitcoin (and/or other cryptocurrencies) in combination with Gold (which fulfils a similar objective), should comprise no more than 5% of a diversified portfolio. Bitcoin adds value via diversification as well as hedging tail-risks, but it comes with high uncertainty (regulatory and valuation risk), is an asset class that is still in its infancy and remains highly speculative.

What is Bitcoin?

Bitcoin is a type of cryptocurrency. Cryptocurrencies are digital currencies in which the ownership and transaction records are secured using cryptography, often in an online peer-to-peer (i.e. decentralised) public ledger known as a 'Blockchain'.

Bitcoin, the first cryptocurrency to be come into existence, is the largest by market capitalisation and has spawned many other cryptocurrencies (over 2,000 active cryptocurrencies exist as of January 2021).

New Bitcoins are created through a process known as 'mining' which involves the solving of complex mathematical problems. 'Miners' solve these mathematical problems using considerable amounts of computer power and are 'rewarded' with Bitcoins for their efforts. So far 19 million Bitcoins have been mined but the Bitcoin protocol caps the total number of Bitcoins that can ever be mined at 21 million (this milestone likely to be reached around the year 2140) with the reward for mining new coins decreasing over time.

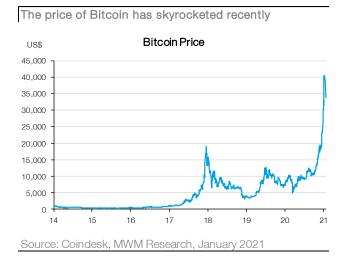
Why does Bitcoin exist?

Bitcoin came into existence on 3rd January 2009, in the wake of the GFC and associated bailouts and instability of the banking system. The motivation behind the creation of Bitcoin appears to have been a desire for a non-intermediated medium of exchange – i.e. a currency that bypasses banks, central banks, corporations and governments. Indeed, Bitcoin creator Satoshi Nakamoto stated in his/her/their white paper that: "The root problem with conventional currencies is...the central bank must be trusted not to debase the currency". One of the key advantages of Bitcoin versus 'fiat' currency is that it has a fixed supply and so cannot be debased by 'money printing', a policy which is currently being pursued across the world by central banks.

Bitcoin, being a form of currency, is notionally a 'means of payment' and a 'store of value'. However, given its inefficiency as a payments system (high and variable transaction costs and long transaction times) we believe Bitcoin is being treated more as a 'store of value' by investors although some would argue it is more a vehicle for speculation. This may explain why Tether (a rival cryptocurrency) is bigger than Bitcoin by transaction value despite having only 3% of Bitcoin's market capitalisation.

Why is the price of Bitcoin skyrocketing?

Recently the price of many cryptocurrencies has risen substantially, with Bitcoin quadrupling over the last few months and is up around 900% since the start of 2019.



Key reasons for the price rise include:

1. A protest vote against monetary debasement.

Bitcoin is a fixed supply currency in contrast to 'fiat' currencies whose supply is at the whims of central bankers. This makes it analogous to gold (whose supply is independent of central banks) and a useful hedge against the risk of 'monetary debasement', particularly given the increasing mainstream acceptance of MMT. Commentators have recently been likening Bitcoin to 'digital gold'. Indeed, some have attributed Bitcoin's recent rise (dwarfing that of gold) as evidence of it displacing gold as the preeminent 'store of value' or 'insurance policy against monetary debasement'.

2. Rising inflation concerns: Like gold, Bitcoin is also regarded as a hedge against inflation, given its fixed supply. While actual inflation is currently very low, this may not always be the case, particularly given recent and upcoming fiscal and monetary stimulus. The recent Democrat Party victory in runoff elections in the US state of Georgia reignited the 'reflation' trade on the belief that an unconstrained Biden Presidency would be more likely to increase infrastructure stimulus. In response, the US 10-year breakeven market-implied inflation rate rose above 2% for the first time since 2018.

3. Bitcoin as a future payments system: Bitcoin's rise is in part due to belief that it is gaining acceptance as a medium of exchange, and recent news flow seems to bear this out:

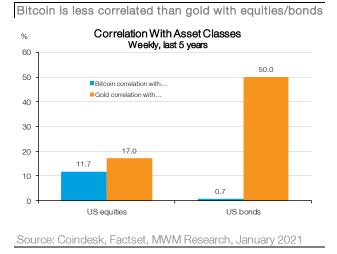
- In October Paypal announced that beginning in early 2021, PayPal customers will be able to use their cryptocurrency holdings as a funding source to pay at PayPal's 26 million merchants.
- On 4th January 2020 the U.S. Office of the Comptroller of the Currency authorised national banks and federal savings associations to participate in 'independent node verification networks' (i.e. blockchains) and use 'stablecoins' (i.e. a type of cryptocurrency pegged to something such as a U.S. Dollar) to conduct payment activities and other bank-permissible functions. While Bitcoin is not a 'stablecoin' it is likely this decision will add to the bullish sentiment around cryptocurrencies generally and Bitcoin specifically.

4. Increasing institutional interest seems to be validating the Bitcoin bulls, adding credibility and (potentially) durability to the current rally versus 2017 when we saw the last price spike:

- In November the US\$5 billion Guggenheim Macro Opportunities Fund filed an amendment with the U.S. Securities and Exchange Commission to allow it to gain exposure to Bitcoin by investing up to 10% of the fund's net asset value in the Grayscale Bitcoin Trust.
- In December the Massachusetts Mutual Life Insurance Company announced it has purchased US\$100 million of Bitcoin, or roughly 0.04% of its

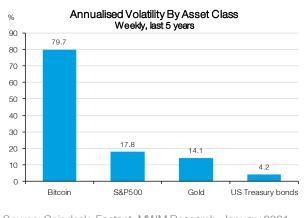
general investment account, suggesting increasing institutional interest in cryptocurrencies.

5. A source of uncorrelated returns: Bitcoin is also increasingly being seen as a legitimate addition to a portfolio, in part due to its returns being uncorrelated with the returns of other major asset classes. In fact, over the last five years, Bitcoin's weekly returns have been less correlated with US equities and US bonds than gold.



But there are also risks to the outlook...

1. Volatility: Bitcoin is more volatile than other asset classes. Over the last five years the weekly volatility of Bitcoin has been ~4x that of the S&P500, ~6x that of Gold and ~19x that of US Government Bonds.



Bitcoin is MUCH more volatile than other asset classes

Source: Coindesk, Factset, MWM Research, January 2021

Because Bitcoin supply growth is fixed by a computer program, its supply is not impacted by its price (i.e. a higher price does not create more Bitcoins). **This is a**

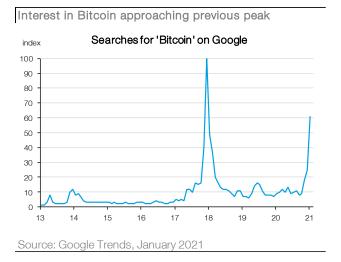
key difference with gold (& other commodities), where an increase in price will likely drive an increase in supply and vice versa. This implies that the price of Bitcoin will always be substantially more volatile than gold and that this volatility is not likely to dissipate over time.

2. Regulatory risk: Overhanging the entire cryptocurrency ecosystem is the possibility that authorities could take regulatory steps that could curtail the use and thus demand for Bitcoins. This has happened before: For example, on 5 December 2013, the People's Bank of China prohibited Chinese financial institutions from using Bitcoins, and within two weeks the price of Bitcoin had fallen 51%.

More recently, the U.S. Financial Crimes Enforcement Network has proposed new reporting requirements which would require cryptocurrency exchanges to collect identity data not just about their own customers, but about anyone who transacts with their customers using their own cryptocurrency wallets. The rule would require exchanges to keep records of cryptocurrency transactions over US\$3,000 and to report cryptocurrency transactions over US\$10,000 to the government, potentially undermining Bitcoin's appeal as an 'anonymous' medium of exchange.

3. Substitution risk: Another risk for Bitcoin is the possibility of a rival, which in theory is only a few lines of computer code away. Bitcoin may have 'first mover advantage' and 'brand recognition' but so did Myspace until Facebook came along (as of writing there are around 2,000 defunct cryptocurrencies according to Coinopsy).

4. Sentiment is overheated: Bitcoin can't be valued according to traditional metrics, so it is difficult to determine whether Bitcoin is 'overbought'. However, one indication that sentiment may be overheating is the proliferation of google searches for 'Bitcoin'. ON this metric, interest is certainly elevated and approaching the levels seen in late 2017 – just prior to a significant price fall. This does not preclude Bitcoin from rising further, but it does warrant some caution.



Bitcoin has a place, but understand the risks...

For those investors wishing to add Bitcoin to an investment portfolio, Bitcoin does provide a nontraditional hedge against 'tail risks' of monetary inflation and money debasement although this comes with significantly higher volatility and more potential regulatory risk than gold which offers a more traditional hedge for similar risks. Investors should understand that Bitcoin while exciting remains a speculative investment that remains in its infancy.

Jason and the Investment Strategy Team

The report was finalised on 11 January 2021.

Recommendation definitions (Macquarie Australia/New Zealand)

Outperform - return >3% in excess of benchmark return

Neutral - return within 3% of benchmark return

Underperform - return >3% below benchmark return

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