

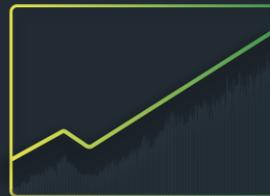


CoinGecko

Quarterly Report

Q1 2021

FULL REPORT



Sponsored by
etoro



Founders' Note	3	- Q1 2021 DeFi Exploits	
Market Landscape	4	Non-Fungible Tokens (NFTs)	32
- Q1 2021 Spot Markets Overview		- NFT Hype is Real	
- Q1 2021 Top-5 Crypto Returns		- NFT Categories	
- Q1 2021 Top-30 Coins Dominance		- NFT Landscape	
- Q1 2021 Top-5 Stablecoins		- NFT Marketplaces	
Bitcoin Analysis	10	- NFT x DeFi	
- Bitcoin Price vs. Trading Volume		- NFT Goes Mainstream: Big Brands Riding the NFT Waves	
- Bitcoin Price Cycle 2016-2017 vs. 2020-2022		- High-Profile NFT Sales	
- Price Returns: Bitcoin vs. Major Asset Classes		Exchanges	42
- Bitcoin Treasuries in Public Traded Companies in 2021		- Q1 2021 Top-10 Cryptocurrency Exchanges	
- Market Capitalization: Bitcoin vs. Gold vs. Top-5 S&P 500 Stocks		- Q1 2021 Top-10 Centralized Exchanges (CEX)	
DeFi Analysis	16	- Q1 2021 Top-10 Decentralized Exchanges (DEX)	
- Q1 2021 DeFi Overview		- Q1 2021 Derivatives Exchanges – Bitcoin Perpetual Swaps Volume	
- Q1 2021 DeFi Price Returns		- Q1 2021 Derivatives Exchanges – Bitcoin Perpetual Swaps Open Interest	
- An Introduction to the DeFi Ecosystem		CoinGecko Highlights	48
- An Introduction to Ethereum Killers		- CoinGecko Premium and Premium+	
- Binance Smart Chain		- Directly adding tokens to MetaMask	
- Terra		- Bitcoin Treasury Page	
- Redefining Algo-Stables		- Categories Ranking Page	
- The Rise and Fall of Algo-Stablecoins		- Mobile App: New Multi-Portfolio Management	
- New Algorithmic Contenders		- 'How to Bitcoin' Book	
- An Introduction to Ethereum Scaling Solutions			

Analysts:



Erina Azmi



Lucius Fang



Win Win



Benjamin Hor



Karmen Lee

Founders' Note

Financial bubbles are indistinguishable from the adoption of new technology.

The total crypto market capitalization continues to surge higher in Q1 2021 with no ceiling in sight. This growth has been underpinned by the NFT sector, with eye-popping sales number decorating daily news headlines. While there are increasing concerns of unjustified prices and bubble formation, we see it as massive retail adoption. We welcome all crypto adopters whether it is through DeFi or NFT.

NFTs are the hot topic in town and have become the gateway drug to crypto. We believe that NFTs can capture the mindshare of a global audience because of its innate ability to create digital collectibles. Even Mark Cuban has decided to embrace crypto, largely because of the NFT narrative. NFTs disrupt the power structure of the creative and content industry, giving back more control to the creators. With popular singers like The Weeknd and Linkin Park joining the NFT party, we foresee more creators joining the NFT hype train.

DeFi has not slowed its strive for innovation either, with new decentralized exchange advancements and launches of stable assets. But what dominates the attention in this quarter are projects' responses to the high Ethereum fees. We finally see more scaling solutions and the multi-chain narrative becoming a reality, with the rise of "Ethereum-Killers" such as Binance Smart Chain, Terra (Cosmos) and Solana. Ethereum is not staying put however, with multiple Layer 2 scaling solutions aiming to go live this year. We are optimistic that scaling problems will soon be addressed and look forward to widescale retail adoption.

Institutional crypto presence is entering into a higher gear this quarter. We see big players like Tesla holding Bitcoin as part of their treasury while Visa will support transaction settlements with USDC on Ethereum. Coinbase's IPO is one of the most hyped public listings and is expected to set the world's sight on the crypto industry. We are excited to see the crypto industry getting the recognition it deserves.

And finally, **can you believe that 8th April was CoinGecko's 7th year anniversary?** In line with our anniversary, we are also happy to announce that we have finally launched CoinGecko Premium. We are grateful to be in the space for so long and will continue our commitment to serving the crypto community! We hope that you will continue to support us.

**“NFTs have become
the gateway drug
to crypto”**



Bobby Ong
COO

TM Lee
CEO

MARKET LANDSCAPE

Q1 2021 Spot Market Overview

Cryptocurrency market capitalization reaches \$2 trillion

Top-30 Market Cap & Spot Trading Volume (Jan 2020 – Apr 2021)



+146%

Top-30 Coins Market Cap Growth in Q1 2021

At the end of Q1 2021, the crypto market cap hit **\$1.9 trillion dollars** – a **146% growth**, up from \$780 billion.

57% of the market capitalization belongs to Bitcoin.

Relative to Q1 2020, the cryptocurrency market grew **vigorously** in both market capitalization (+146% vs. -8%) and trading volume (+155% vs. +48%).

The market had **plenty of defining moments** in Q1 2021 with Coinbase preparing to go public,¹ Fidelity's plans for a Bitcoin ETF,² Tesla accepting Bitcoin as payment,³ and Visa supporting USDC settlement.⁴

However, we **remain cautious with the economic climate**. Although the Fed maintains a dovish stance, U.S. treasury yields have been soaring – sparking inflation fears for some investors.

¹ <https://www.financialexpress.com/investing-abroad/featured-stories/coinbase-listing-company-that-helps-you-buy-hodl-cryptos-is-going-public/2218276/>

² <https://www.cnbc.com/2021/03/24/fidelity-to-launch-bitcoin-etf-as-investment-giant-builds-its-digital-asset-business-.html>

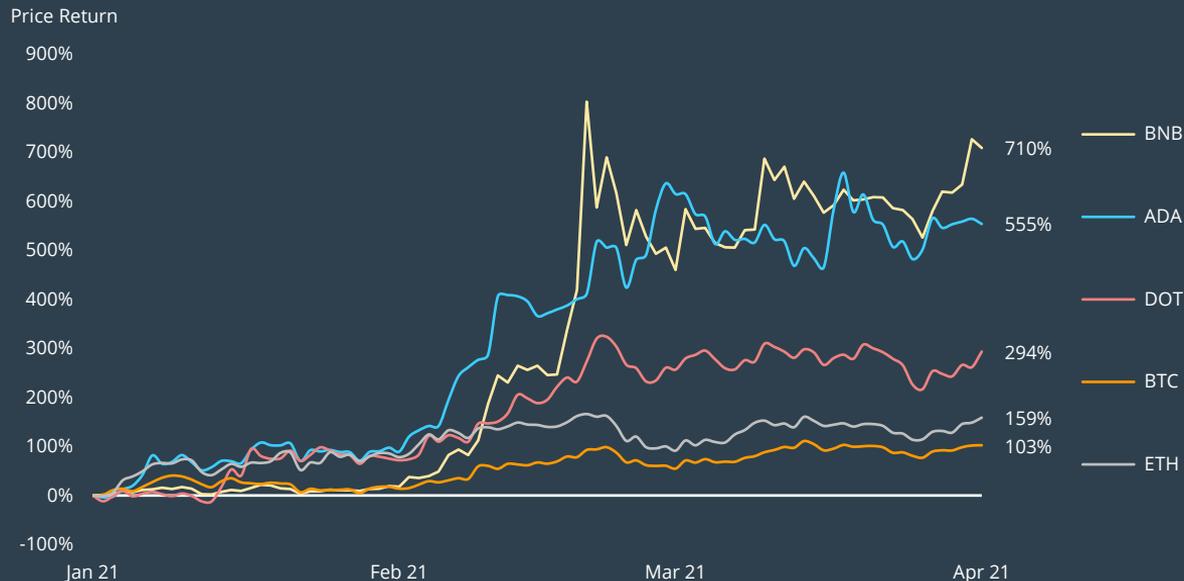
³ <https://www.bloomberg.com/news/articles/2021-03-24/you-can-now-buy-a-tesla-with-bitcoin-elon-musk-says>

⁴ <https://www.forbes.com/sites/ninabambysheva/2021/03/29/visa-to-start-settling-transactions-with-bitcoin-partners-in-usdc/?sh=5ae010af5228>

Q1 2021 Top-5 Crypto Returns

Alternative Layer 1 tokens outperformed Bitcoin and Ethereum – led by BNB

Top-5 Cryptocurrency Price Returns (Jan – Apr 2021)



+364%

Top-5 Cryptocurrencies Average Price Returns in Q1 2021

Price returns Q1 2021
(vs. Q1 2020)

 **+103%**
(-11%)

 **+159%**
(+3%)

 **+710%**
(-8%)

 **+555%**
(-8%)

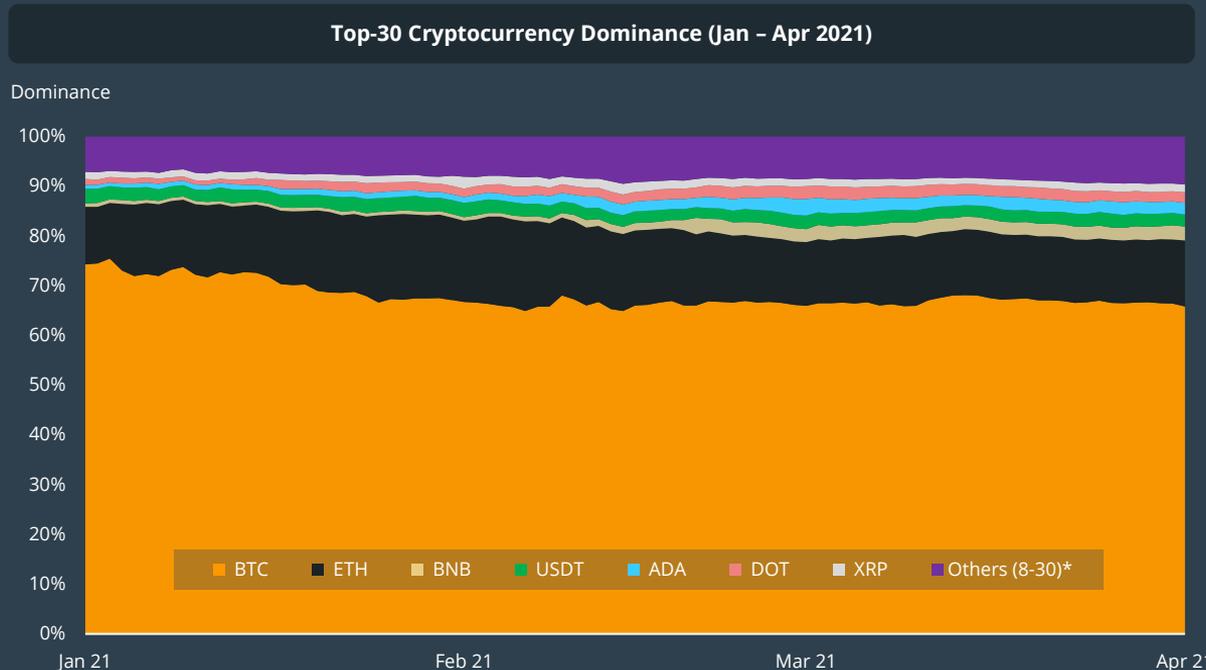
 **+294%**
(N/A)

In Q1 2021, Bitcoin and Ethereum **underperformed** compared to their competing networks. **Binance Coin (BNB) had the best performance with a 710% gain**, followed by Cardano (ADA) and Polkadot (DOT) at 555% and 294% respectively.

* Top-5 Cryptocurrencies exclude Tether (USDT) stablecoin as of 1 January 2021
** Polkadot (DOT) only started trading on 19 August 2020

Q1 2021 Top-30 Coin Dominance

Altcoin season is here - Bitcoin dominance continue to fall



Market Dominance Q1 2021 (% change vs Q1 2020)



Bitcoin's **dominance fell by 5.7% to 65.2%** in this quarter.

Meanwhile, Ethereum climbed the highest by **4.3% to 13.1%**.

Altcoin season is here as we have seen the price of various cryptocurrencies rallying in Q1 2021, helping to push the total cryptocurrency market capitalization to \$2 trillion.

* Others (8 - 30) refers to top 8 - 30 coins by market capitalization on CoinGecko as of 1 April 2021

Q1 2021 Top-5 Stablecoins

Top-5 stablecoins recorded a 120% increase to \$60 billion in circulation



+\$32.6B
Top-5 Stablecoins Market Cap in Q1 2021

Q1 2021 Stablecoins Circulation (Q1 2021 Growth)

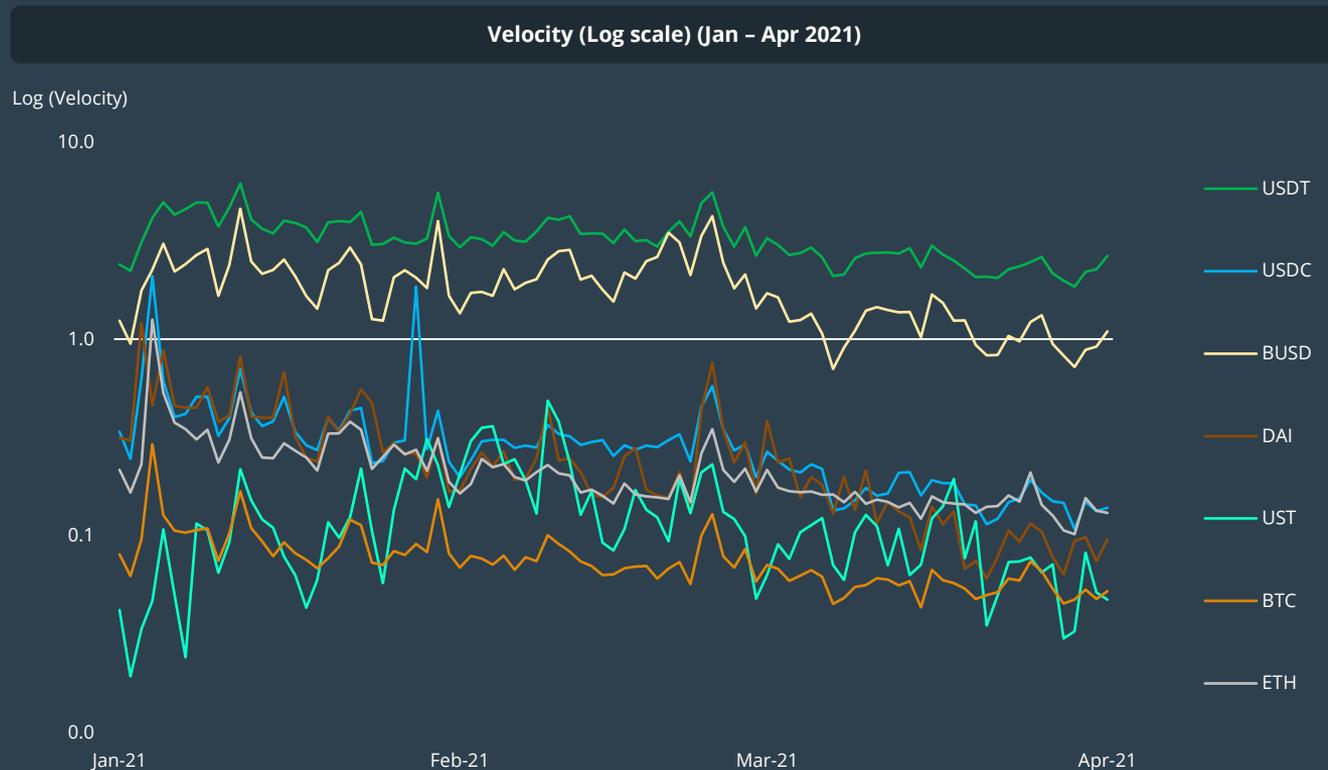
-  **\$40.8B**
USDT +\$19.9B (+95%)
-  **\$10.8B**
USDC +\$6.9B (+176%)
-  **\$3.5B**
BUSD +\$2.5B (+253%)
-  **\$3.0B**
DAI +\$1.8B (+158%)
-  **\$1.6B**
UST +\$1.4B (+796%)

Albeit starting from a low base, **BUSD and UST rose over 250% and 800% respectively**. This is likely in response to the **rise of BSC and Terra - both cheaper alternatives to Ethereum**. Simultaneously, the native tokens of the "Ethereum-Killers" (BNB and LUNA) witnessed impressive YTD price returns (710% and 2,761%) as the gas fees on Ethereum become increasingly unaffordable for smaller players.

Top-5 stablecoins by market capitalization taken as of 1st April 2021. See <https://www.coingecko.com/en/stablecoins>
* Market capitalization for BUSD was tracked by CoinGecko only from 17 April 2020

Q1 2021 Top-5 Stablecoins

Stablecoins are being used more as a medium of exchange than BTC and ETH



The chart shows the **stablecoins' velocity** relative to Bitcoin and Ethereum.

Velocity measures the rate of average trading volume against the market capitalization. **A high velocity means that the cryptocurrency is widely traded within the economy.**

Using logarithmic scale, **USDT and BUSD have the highest velocity**, ranging between 1.0 and 3.0.

With Binance's dominance as the top exchange and the rise of its blockchain (BSC), it is not surprising that BUSD is being widely used after USDT.

BITCOIN ANALYSIS

Bitcoin Price vs. Trading Volume

Won't stop, can't stop: Bitcoin continues to soar

Bitcoin Price and Spot Trading Volume (Jan – Apr 2021)



+103%
BTC Price return in Q1 2021

In this quarter alone, **Bitcoin recorded multiple All Time Highs** and it just **hit \$64,787 on 14th April 2021**.
A year ago on Black Thursday (13th March 2020), Bitcoin crashed 40% intraday to \$5,413. **It has grown 1,097% since then.**

Bitcoin ended Q1 2021 at \$58,817, **a 103% growth** and it appears to be **consolidating above the \$55,000 price range**.

- The bull case is **fueled largely by institutions:**
- **Coinbase's** Nasdaq listing on 14th April 2021
 - **Tesla** holds Bitcoin as an investment asset and accepts it as a medium of exchange
 - **Fidelity's** plan on a BTC ETF
 - **Visa** enabling USDC as settlement on Ethereum
 - **Grayscale's** plan to offer Crypto ETFs

Bitcoin Price Cycle 2016-2017 vs. 2020-2022

Bitcoin's perception as an inflation hedge is strengthening

Bitcoin Price Cycle 2016-2017 vs. 2020-2021



The ascent of Bitcoin in this cycle (2020-2022) is mimicking the trajectory it took in the last cycle (2016-2018).

Bitcoin's price has **more than quadrupled** against the last cycle (**717% vs. 150%**).

One reason why Bitcoin might continue its trajectory:

Inflation

The U.S. President is outlining a **\$3 trillion** budget to boost the economy's recovery. With this, more money is pouring into the market.⁵

However, the Fed is determined to keep interest rates low. In response, **there is a growing fear of rising inflation**.

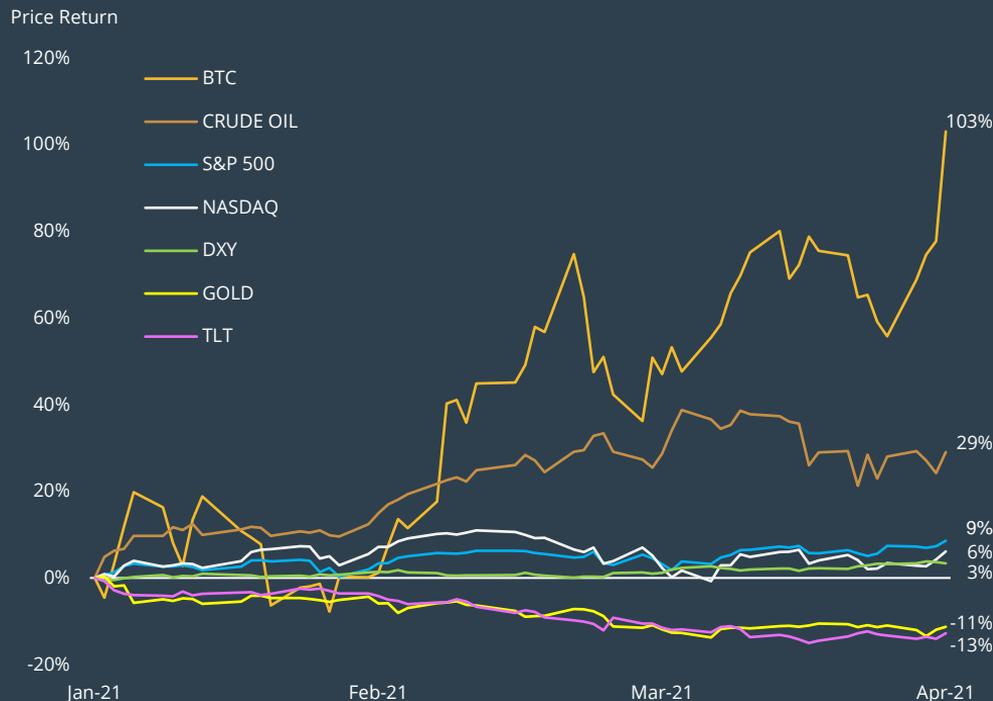
This setup has made Bitcoin an **increasingly viable hedge against the inflationary macro environment**.

⁵<https://www.nytimes.com/2021/03/22/business/biden-infrastructure-spending.html>

Price Returns: Bitcoin vs. Major Asset Classes

Black Thursday one year later: Bitcoin rallied more than 1,000%

Bitcoin vs. Major Asset Classes (Jan - Apr 2021)



	Q1 2021 Return	Q1 2020 Return	March Black Thursday Comeback (13th March 2020)
BTC	103%	-11%	1097%
CRUDE OIL	29%	-67%	94%
S&P 500	9%	-24%	48%
NASDAQ	6%	-19%	71%
DXY	3%	3%	-6%
GOLD	-11%	4%	14%
TLT	-13%	22%	-11%

Bitcoin continues to **outperform (103%)** all major assets classes in Q1 2021.

All major assets classes and indices are performing better except for gold and bonds (TLT) in this quarter relative to Q1 2020, amid a “rally” in the U.S. Dollar index and rising bond yields.

Revisiting the pandemic-triggered Black Thursday in March 2020, **Bitcoin's price is now up more than 1,000%**, due to a wave of institutional adoption amid a conducive macro environment.

Bitcoin Treasuries in Publicly Traded Companies in 2021

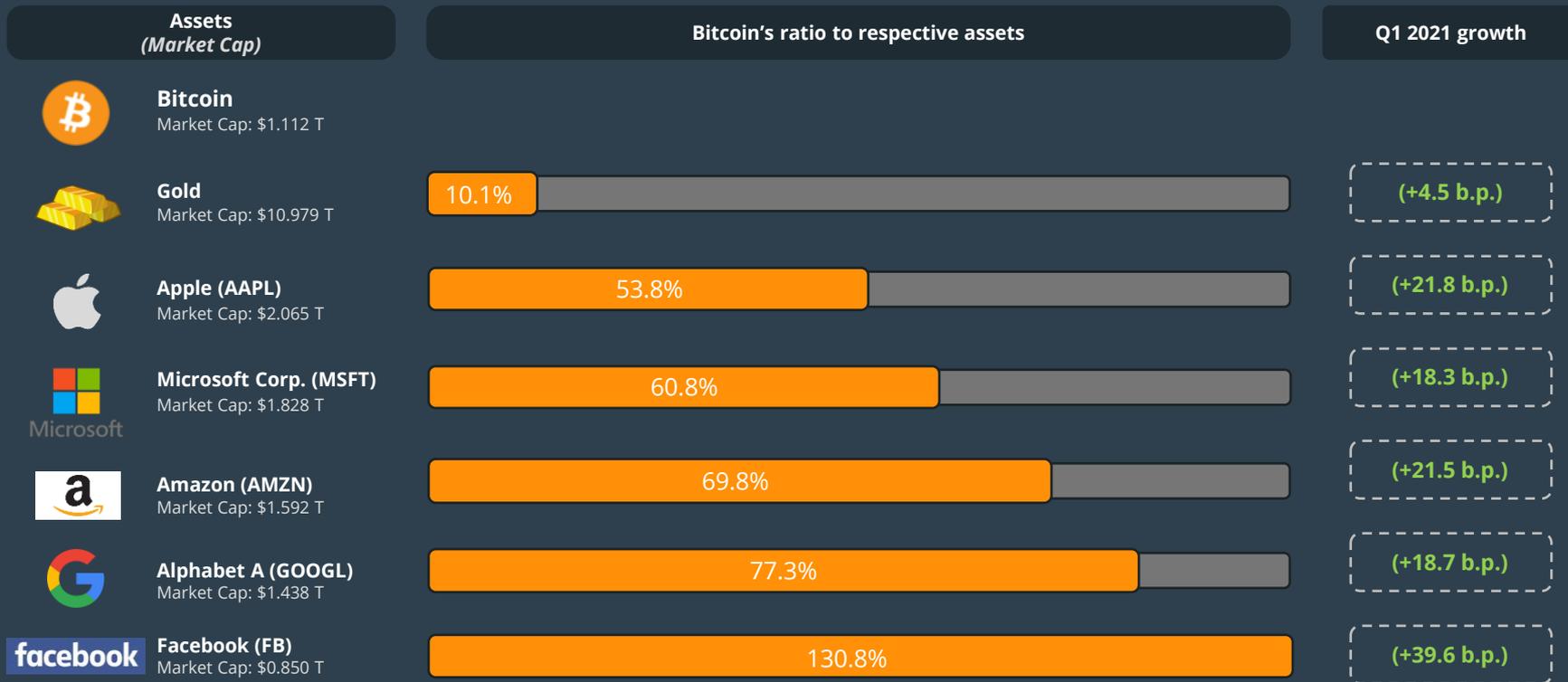
Public companies are now controlling 0.95% of the total Bitcoin supply

Company	Total Bitcoin	Rank	% of Total BTC Supply	
MicroStrategy Inc.	91,579 BTC	#1		0.436%
Tesla	48,000 BTC	#2		0.229%
Galaxy Digital Holdings	16,402 BTC	#3		0.078%
Square Inc.	8,027 BTC	#4		0.038%
Marathon Patent Group	4,813 BTC	#5		0.023%
Hut 8 Mining Group	2,851 BTC	#6		0.014%
Voyager Group LTD	1,239 BTC	#7		0.006%
Riot Blockchain Inc.	1,175 BTC	#8		0.006%
Aker ASA	1,170 BTC	#9		0.006%
Meitu	756 BTC	#10		0.004%

This list only includes public companies. Bitcoin held by private companies are not accounted for.

Market Capitalization: Bitcoin vs. Gold vs. Top-5 S&P 500 Stocks

Bitcoin's market capitalization is only 10X away from flipping Gold



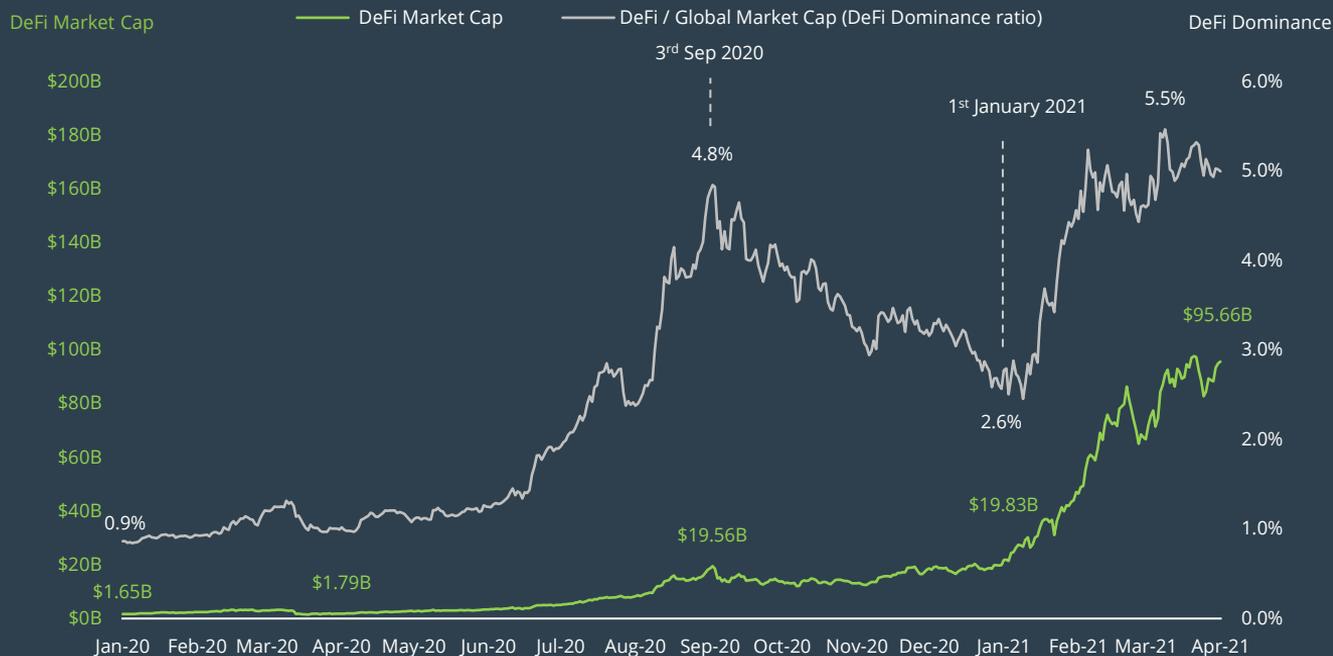
Data snapshot taken on 1 April 2021
 Price of Assets (other than Bitcoin) were sourced from:
<https://www.investopedia.com/top-10-s-and-p-500-stocks-by-index-weight-4843111>
<https://finance.yahoo.com/>

DEFI ANALYSIS

Q1 2021 DeFi Overview

DeFi craze renewed as it broke pass the \$96 billion market cap

DeFi Market Cap vs. DeFi / Global Market Cap Ratio (Jan 2020 – Apr 2021)



DeFi dominance **recorded a new All Time High (ATH) on 9th March 2021 at 5.5%** - it more than doubled from 1st January 2021 (2.6%).

However, **it dropped marginally to 5%** at the end of the quarter.

At the same time, **DeFi's market cap also hit a new ATH at \$95.7 billion**. This is a **382% increase** from \$19.83 billion on 1st January 2021.

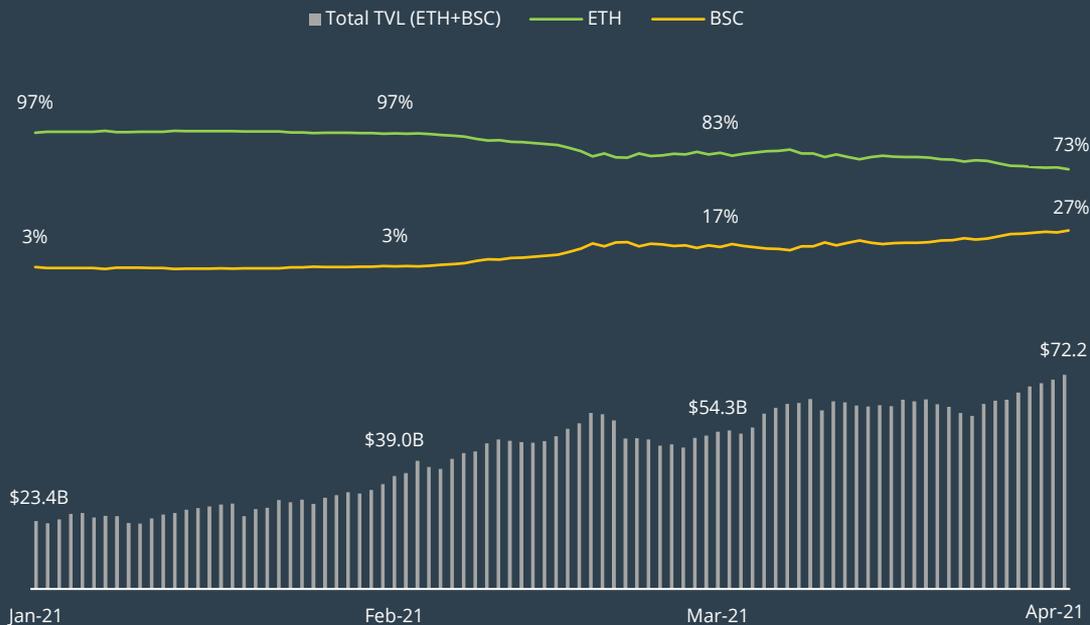
With that, **the DeFi craze was renewed** and currently appears to be **consolidating above \$90 billion market cap**.

This is likely because Bitcoin surpassed \$60,000, while its dominance dropped in the same quarter; suggesting that **capital is flowing from Bitcoin to DeFi assets**.

Q1 2021 DeFi Overview

Total Value Locked (TVL) on Ethereum and Binance Smart Chain (BSC) hit \$72 billion – BSC’s growth is higher than ETH

TVL Dominance ETH vs. BSC (Jan – Apr 2021)



TVL on Ethereum and BSC stood at \$72 billion at the end of Q1 2021, representing a **209% increase**. This is likely driven by the renewed DeFi crazy in Q1 2021.

Total TVL is growing but **BSC’s TVL appears to be stealing Ethereum’s thunder – in Q1 2021 alone, BSC’s TVL rose from 3% to 27%.**

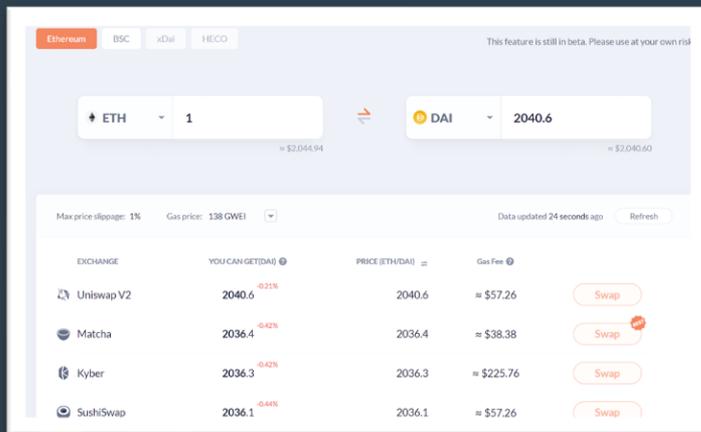
Ethereum is likely losing ground because of **rising gas fees which drives away retail users.**

Users are **seeking cheaper alternatives where they can conduct their DeFi activities** (such as yield-farming) without incurring heavy transactional costs.

Data snapshot taken on 1 April 2021
Data is sourced from: [DeFiStation](#) and [DeBank](#)

Gas fee on BSC is much cheaper than Ethereum

Swapping from ETH to DAI on Ethereum will incur \$57.26 gas fee

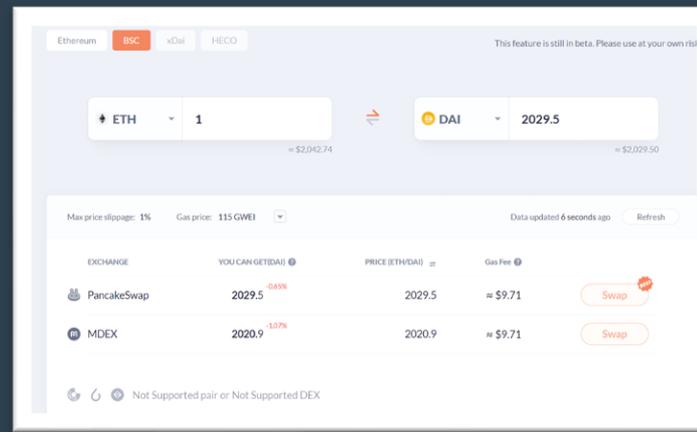


As both ETH price rises and network congestion builds up, Ethereum's gas fee crisis will worsen. At the moment, it is not conducive for retail users to do a simple swap on a decentralized exchange. For example, it would cost you above ~\$57 if you were to swap 1 ETH to 2,040 DAI on DeBank.

However, with the same transaction on BSC, you will be charged ~\$10 gas fee, **that is almost 6x cheaper than on Ethereum.**



Swapping from ETH to DAI on BSC will incur \$9.71 gas fee



Unsurprisingly, "Ethereum-Killers" are racing to provide the cheapest gas fee. **BSC appears to be in the lead** for several reasons:

- Onboards more dApps
- [Offers developers incentives](#)
- Fast and cheap transactions
- EVM compatible that makes the migration from Ethereum to BSC easier.

Q1 2021 DeFi Price Returns

Overall, DeFi tokens had positive returns. CAKE and LUNA were up to 2,900%

Top-5 DeFi Tokens Price Return (Jan - Mar 2021)

	Jan	Feb	Mar	YTD
Top-5 DeFi Tokens				
UNI 	241%	26%	27%	442%
LINK 	101%	9%	19%	159%
LUNA 	125%	265%	248%	2761%
AAVE 	239%	17%	9%	332%
SNX 	140%	7%	-5%	145%
Top-5 CEX Tokens				
BNB 	18%	374%	44%	710%
CRO 	6%	117%	60%	268%
OKB 	-26%	172%	9%	118%
FTT 	92%	133%	54%	591%
HT 	57%	100%	14%	257%
Top-5 DEX Tokens				
UNI 	241%	26%	27%	442%
CAKE 	222%	372%	94%	2843%
RUNE 	256%	48%	-3%	412%
SUSHI 	207%	21%	82%	578%
ZRX 	97%	73%	56%	431%
Top-5 Cryptocurrencies				
BTC 	14%	36%	31%	103%
ETH 	78%	8%	35%	159%
BNB 	18%	374%	44%	710%
ADA 	90%	77%	-9%	555%
DOT 	72%	107%	10%	294%

Out of the top 5 DeFi tokens, **LUNA** experienced the **highest growth in the first quarter, recording a 2,761% increase** over the 3-month period.

Notably, the **CEX and DEX categories** are **showing strengthening signs ahead of the Coinbase IPO listing in April 2021**.

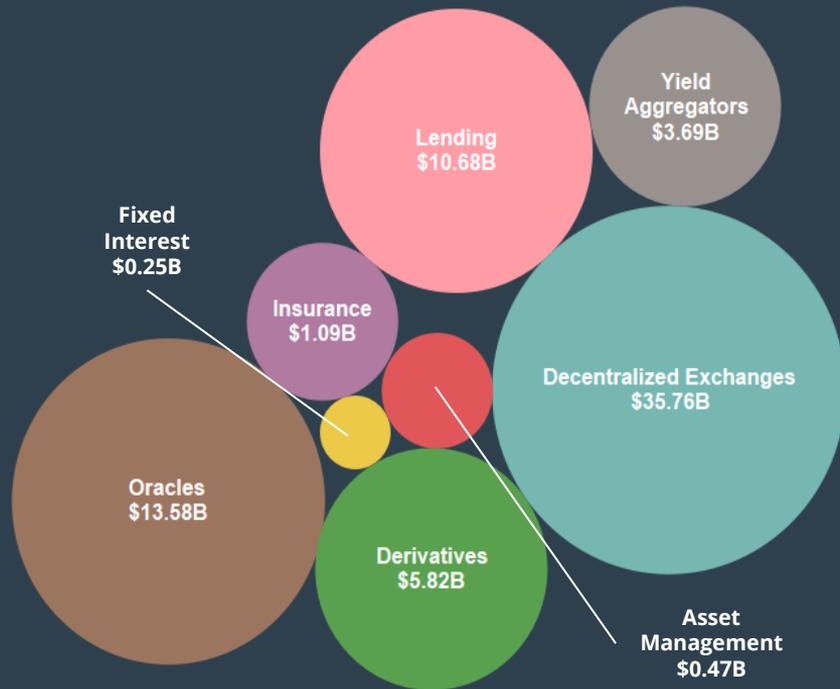
Uniswap managed to claim the **No.1 spot** for market cap in both DeFi and DEX categories. However, **CAKE has surged to more than 28X its value** since the start of 2021.

Overall, most DeFi tokens had a positive month-on-month return, except SNX, **which suffered a slight drawdown of 5%**.

An Introduction to the DeFi Ecosystem

DEXs dominate half of the DeFi ecosystem

Market Cap of each DeFi Category



\$71.3B

DeFi Total Market Capitalization as of 1st April 2021*

As a major pillar of the DeFi space, **DEX tokens make up approximately 50%** of the total market cap. The main contributors include the top DEXs from both the Ethereum and Binance Smart Chain Network such as **Uniswap, Sushiswap and PancakeSwap**.

Both lending platforms and oracles have proven to be the foundation of DeFi. While lending platforms **have a 15% market share**, oracles have a **slightly higher market share of 19%**.

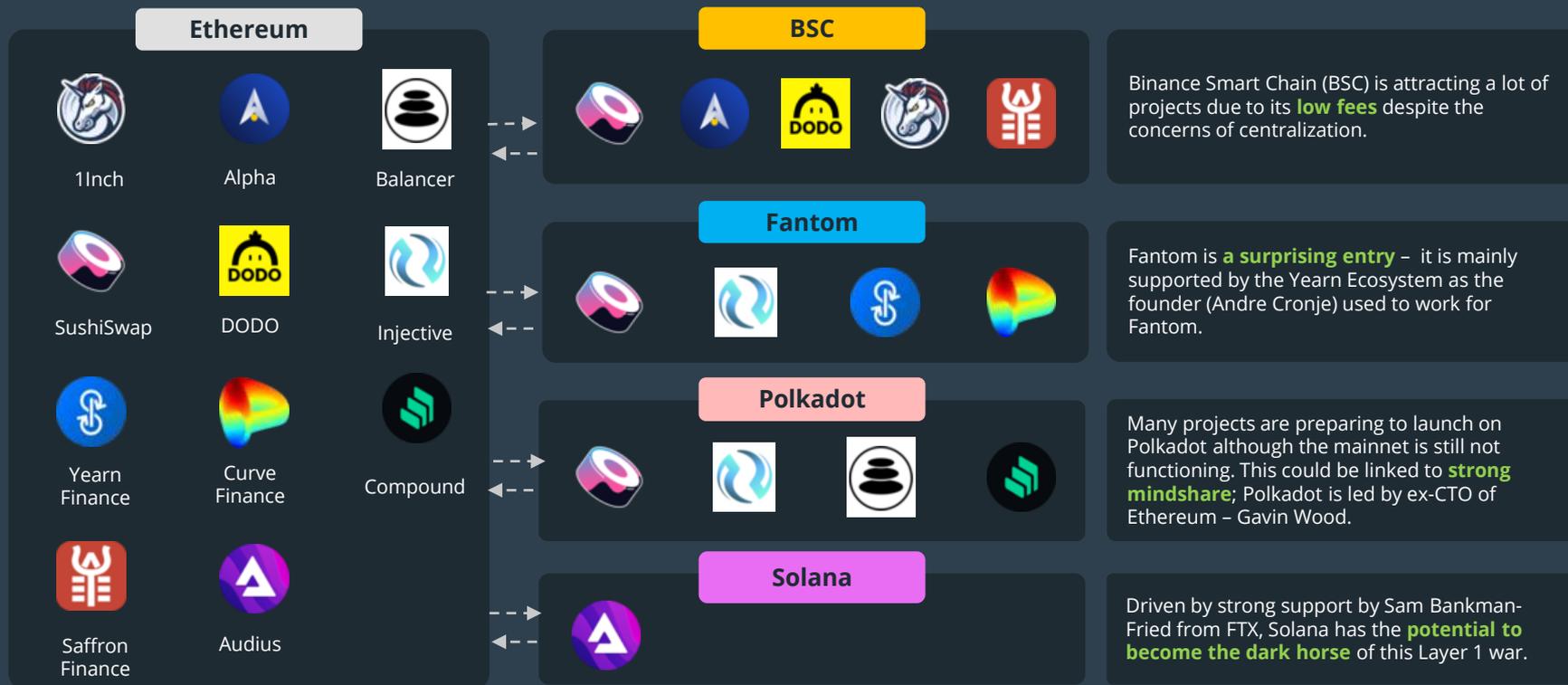
Smaller segments such as fixed interest and asset management are relatively in its infancy, **with a market cap of \$1B or less**. However, there are **fewer projects** within this niche, which suggests that there is **untapped potential for further growth**.

Data snapshot taken on 1 April 2021

*Categorical market cap includes only governance and utility tokens (excluding stablecoins and wrapped tokens).

An Introduction to Ethereum Killers

Ethereum-based decentralized applications are expanding to other chains



An Introduction to Ethereum Killers – Binance Smart Chain

The BSC Ecosystem is flourishing, with DEXs leading the charge

 **Decentralized Exchanges**

 PancakeSwap Price: \$18.20 M. Cap: \$2.65B	 BakerySwap Price: \$1.14 M. Cap: \$164.85M	 JulSwap Price: \$0.19 M. Cap: \$96.46M
---	---	--

 **Yield Aggregators**

 Autofarm Price: \$4,679.33 M. Cap: \$111.48M	 PancakeBunny Price: \$219.30 M. Cap: \$111.03M	 Beefy Finance Price: \$2064.02 M. Cap: \$156.52M
---	---	--

 **Lending**

 Venus Price: \$66.73 M. Cap: \$611.56M	 C.R.E.A.M. Price: \$125.71 M. Cap: \$84.05M	 ForTube Price: \$0.09 M. Cap: \$51.79M
---	--	--

\$19.5B
 Total Value Locked in DeFi on
 Binance Smart Chain as of 1st April 2020*

DeFi on BSC has expanded significantly, **with close to \$20 billion in TVL.**

DEXs continue to be the major pillars of the space. **PancakeSwap** is the leading DEX on BSC with **a total market cap of \$2.7 billion.**

While there are clear market cap leaders in both lending and DEX categories, it is still a **close race between yield aggregators.**

Notably, PancakeSwap has the 2nd largest volume amongst all DEXs.

An Introduction to Ethereum Killers – Terra

The birth of the Terra galaxy is manifesting with the creation of UST



\$7.5B

Terra ecosystem TVL as of 6th April 2021*

In 2021, UST's astounding 800% growth makes it the **largest algo-stablecoin** and the 5th largest stablecoin by market cap.

Unlike most ETH-based algo-stablecoins, UST has managed to create a reliable peg through an ecosystem that **incentivizes usage** and attracts a **strong community**.

Demand Drivers

- Mirror Protocol managed to capitalize on the Robinhood debacle by offering synthetic U.S. equities.
- Anchor Protocol launched with a fixed UST interest rate of 20%.
- Upcoming projects such as Alice, SPAR and Vega are expected to further strengthen the demand for UST.

* TVL for Terra ecosystem is calculated by adding up the staked Luna and TVL of Anchor and Mirror.

Redefining Algo-Stables

The stablecoin landscape has evolved and warrants recategorization

There has rarely been a definitive consensus on what constitutes an algo-stablecoin.

Some might argue that it requires an arbitrage mechanism, while others believe that its collateralization ratio is an important consideration.

We **believe** that an asset qualifies as an algo-stable if it either/or:

- 1. Has no collateral**
(AMPL, BAC, UST)
- 2. Is partially/fully collateralized by their own native token**
(FRAX, sUSD, UST)
- 3. Has a floating peg**
(RAI, FLOAT)

Stablecoins (Fully-backed by Fiat)



USDT



USDC



BUSD



PAX

Stablecoins (Fully-backed by Third-Party Assets)



DAI

Algo-Stablecoins



LUNA



UST



FRAX



FXS



ESD



BAC



BAS



sUSD



SNX



AMPL

Algo-Stableassets



RAI



FLOAT



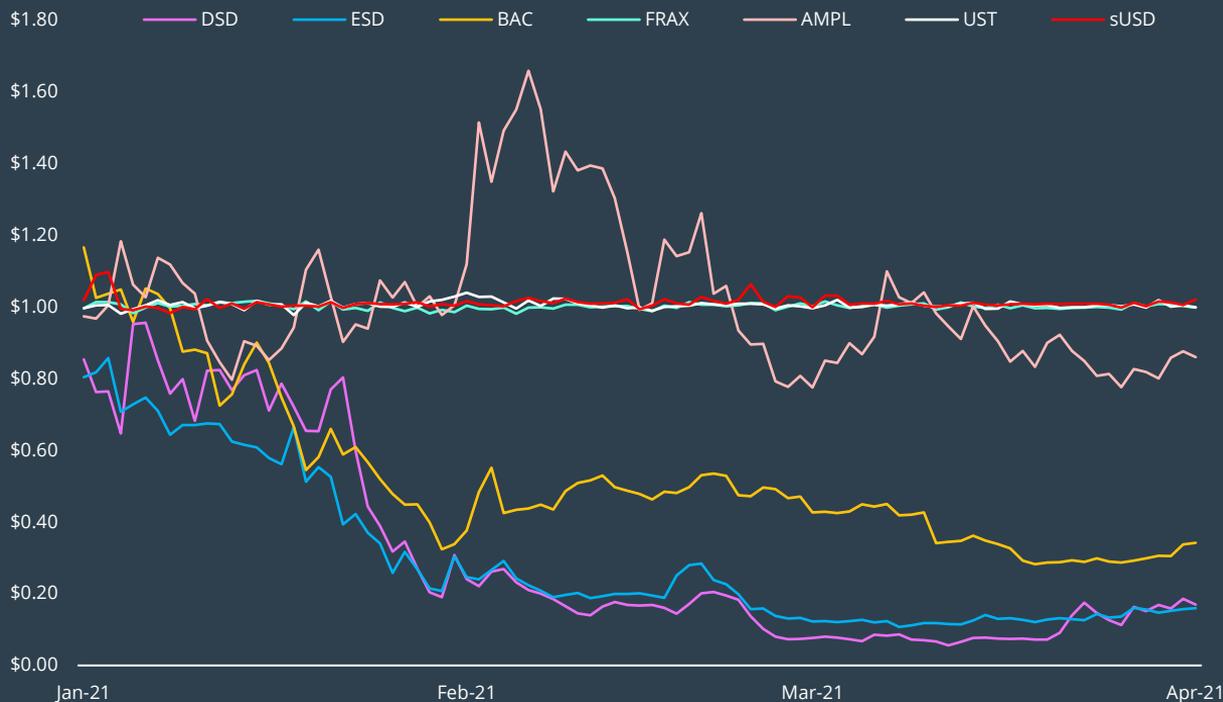
BANK

**This list is non-exhaustive and is only intended for illustration purposes*

The Rise and Fall of Algo-Stablecoins

Most algo-stablecoins have failed to maintain their \$1 peg except FRAX, UST and sUSD

Price for Top-7 Algo-Stablecoins (Jan - Apr 2021)



The Total Market Cap for these seven coins amounted to \$2.23 billion, with **TerraUSD (UST) commanding the lion's share of the market at \$1.6 billion (72.8%)**.

This is followed by Ampleforth (AMPL) with a market cap of **\$250 million (11.2%)** and sUSD with **\$224 million (10.0%)**. FRAX meanwhile has a relatively modest market cap of **\$113 million (5.1%)**.

Although AMPL has been around since 2019, it **has yet to achieve \$1 price stability** through its rebase-type model. Nevertheless, it has clearly outperformed its Seigniorage peers, outside of FRAX, UST, and sUSD.

Impressively, throughout the 3-month period, **FRAX and UST have maintained their peg** as their price has an average deviation of **less than 0.5%** (\$1.001 vs. \$1.005, respectively). Meanwhile, sUSD deviated 1% on average at \$1.01.

*Illustration above showcases the top-7 leaders by market cap for algo-stablecoins.

Multiple factors have been attributed to the failures of Seigniorage-type models

Historically speaking, the currency system was easier to implement because nations had centralized powers (e.g monarchies and governments) to mint coins and guarantee their value. Contrast this with the stablecoin market where new protocols must essentially do the same based on an **experimental product** in a **decentralized environment** which is **heavily saturated with competition and established incumbents**.

1



Liquidity Bootstrap

Protocols were experimenting with **unsustainable liquidity mining incentives** to bootstrap the system. Early farmers were rewarded with high inflationary rewards which caused **massive price swings** due to **supply shocks**.

It did not help either that there were multiple forks/clones which led to **repeated quick pump and dump schemes**.

2



Limitations of AMM

Most protocols leveraged **Uniswap** which uses a **Constant Product Market Maker formula ($x*y=k$)** to create a price spectrum for token pairs based on available liquidity.

This **incentivized users to withdraw liquidity** (bank-runs) and **avoid impermanent loss**, especially during deflationary periods. The result is an **exacerbation of price volatility**.

3



Fragmented Consensus

Most protocols were designed with a somewhat cooperative community in mind - there needs to be **proactiveness** and **strong belief that the system works**.

However, whenever the price was below peg, **deflationary incentives were insufficient** to attract users to support the system. Not to mention, **individual incentives outweighed collaborative efforts**.

The Rise and Fall of Algo-Stablecoins

Frax's success is an important reference for the larger community



Frax is a dual-type seigniorage model. Its stablecoin, FRAX is backed by two types of collateral, which are collateralized-backed stablecoins (USDC) and FRAX Share (FXS).



Key Takeaways

- Frax is **partially collateralized by USDC** (backed by US Dollar cash reserves) which instills to the change in the growth ratio – this effectively measures how much FXS liquidity there is against the overall supply of FRAX and adjusts the collateral ratio accordingly.
- **FXS offers value beyond governance** such as minting requirements and protocol fees which incentivizes users to acquire FXS.
- **Collateral is redeployed elsewhere to earn yield** which helps bring in external revenue and keep the protocol afloat through their Algorithmic Market Operations Controller.
- **Price volatility of FRAX is shifted to FXS** because of its burn/buyback mechanic.
- Frax **automates their collateralization ratio** through a proportional–integral–derivative (PID) controller.

Critical Success Factors



Flexible collateralization ratio



Separation of speculative forces (FXS) from stabilizing forces (FRAX)



Reliable collateral assets

New Algorithmic Contenders

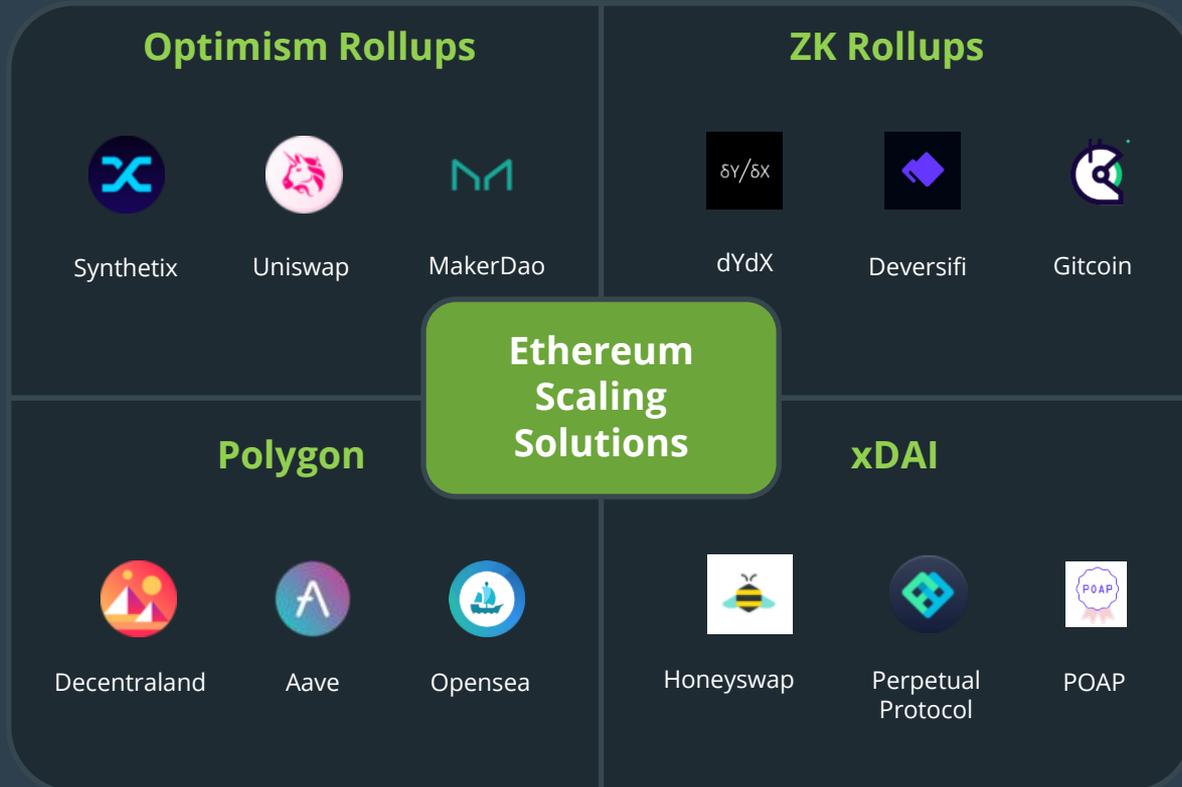
Newcomers are prioritizing flexibility, collateralization, and having contingency plans

		 Fei (FEI)	 Reflexer (RAI)	 Float (FLOAT)
Collateralization		Uses Protocol Controlled Value (PCV). Essentially, Fei purchases ETH from users through newly minted FEI. Fei will then use this ETH to primarily support their collateral-backed liquidity pools.	ETH-based overcollateralized model with a minimum collateral ratio of 145%. Users mint RAI at a 2% stability fee (borrowing rate).	Float purchases ETH from users with newly minted FLOAT through a Dutch Auction. Users must pay with a combination of BANK (share token) and ETH.
Peg Type		Fixed - \$1	Floating (Started at \$3.14)	Floating (Started at \$1.61)
Trading Incentives	< Peg	Users can mint new FEI directly from the system in exchange for an equal \$ amount of ETH as 'payment'.	System lowers the peg. This allows users to mint more RAI and sell it back for ETH for a higher return.	Users can mint new FLOAT directly from the system through a Dutch Auction in exchange for an equal \$ amount of ETH as 'payment'.
	> Peg	Protocol taxes FEI sellers and awards extra FEI to buyers (on top of their initial purchase).	System raises the peg. This makes borrowing more expensive and incentivizes users to repay their RAI loans.	Float offers buyers what bids it would accept in incremental prices through a Reverse Dutch Auction. FLOAT is bought with both ETH and freshly minted BANK.
Emergency Powers (when price below peg for an extended period)		FEI may withdraw their PCV-backed liquidity from Uniswap and buy FEI from the market. At the same time, FEI is also burned. Once the peg is restored, Fei will resupply the remaining liquidity back into Uniswap.	The protocol shuts down and only allows both users with RAI loans and RAI holders to redeem collateral from the system.	Assets stored in Float's collateral vault (Basket) can be used to support the price of FLOAT.

* It should be noted that FEI has launched on 31 March 2021 and has since been trading off peg at \$0.78 (as of 9 April 2021).

An Introduction to Ethereum Scaling Solutions

Ethereum is answering the multi-chain competition with Layer 2 solutions



There are currently **four** main major L2 solutions: (1) Optimism Rollups, (2) ZK Rollups, (3) Polygon, and (4) xDAI.

Major DeFi players such as Synthetix and Uniswap have **chosen Optimism**. This may entice other players to join the network for further integration with bigger protocols.

ZK Rollups managed to **garner some adopters** such as dYdX and Deversifi. Gitcoin has also offered L2 payment option using zksync.

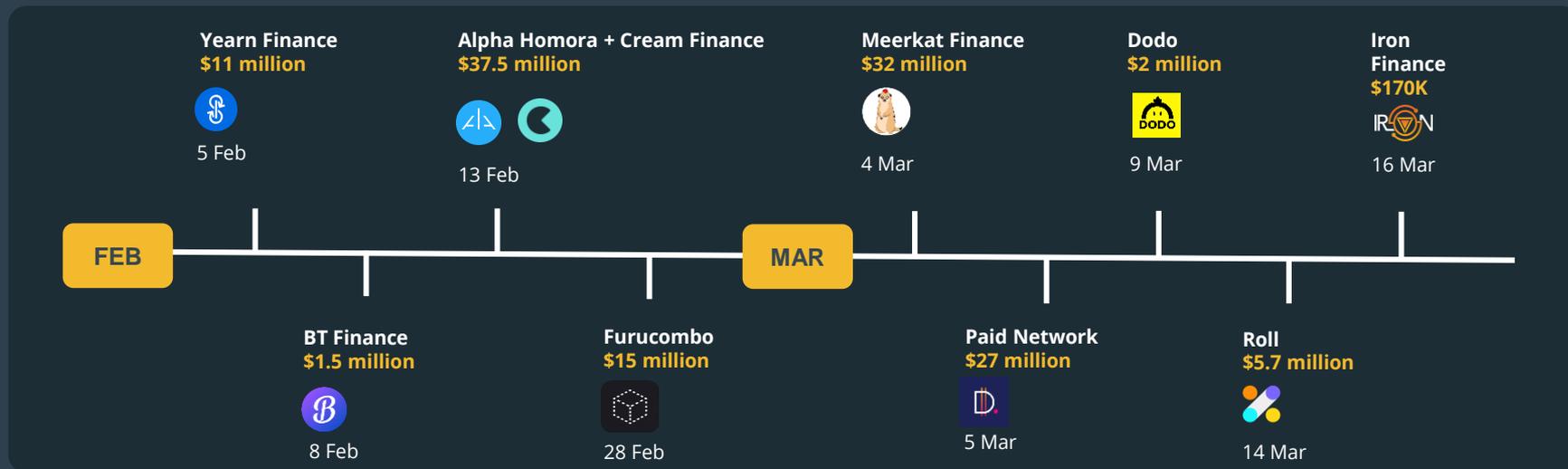
Meanwhile **NFT heavyweights** such as Opensea and Decentraland have expanded to Polygon.

xDAI is attracting **smaller protocols** such as Perpetual Protocol and POAP.

**This list is non-exhaustive and is only intended for illustration purposes.*

Q1 2021 DeFi Exploits

A total of \$132 million was lost due to DeFi exploits



This timeline illustrates notable **DeFi exploits** that occurred in Q1 with **losses totaling \$131.9 million**.

DeFi experienced its **largest exploit to date**, marked by **Alpha Homora's loss of \$37.5 million**. The majority of these hacks were executed through **'flash loan attacks'**.

Despite the growing number of flash loan exploits, the **DeFi ecosystem** has been met with **a heightened scrutiny on protocol security**.

What doesn't kill us makes us stronger.

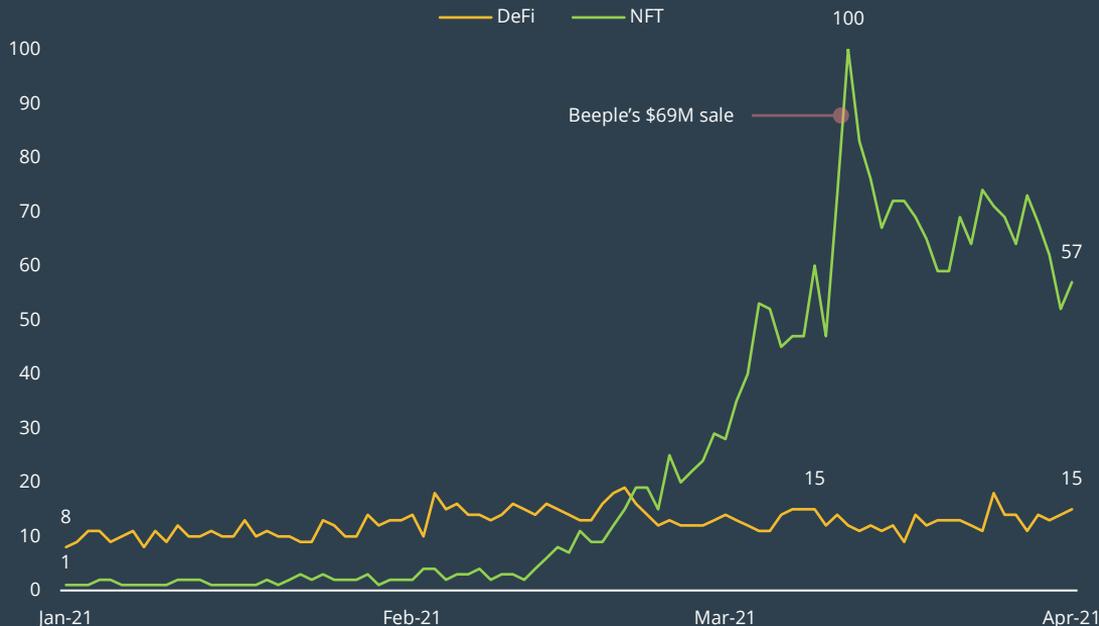
Non-Fungible Tokens (NFTs)

NFT Hype is Real

Despite its slow start, Google searches for 'NFT' far outstrips 'DeFi' by March 2021



Global Google Search Trends (Jan – Apr 2021)



At the start of the year, for every search of **NFT**, there were **8 searches for DeFi**. By early March, **NFT finally flipped DeFi**.

At the end of March, the search **ratio reached 4:1** in favor of NFT searches.

Search interest levels for 'NFT' reached its **All-Time-High of 100 on 12 March 2021***. This coincides with the day right after Beeple sold his art piece 'Everydays: The First 5000 Days' for \$69 million dollars.

Source: Google Trends

*Numbers represent search interest relative to the highest point on the chart for the given region and time. Each data point is divided by the total searches of the geography and time range it represents to compare relative popularity. The resulting numbers are then scaled on a range of 0 to 100 based on a topic's proportion to all searches on all topics.

NFT Categories

Entertainment and content creation are thriving in the NFT space

 <p>Sports</p>	 <p>Chiliz Price: \$0.50 M. Cap: \$2.68B</p>	 <p>Flow Price: \$34.33 M. Cap: \$1.18B</p>	 <p>REVV Price: \$0.58 M. Cap: \$128.69M</p>
 <p>Gaming</p>	 <p>Enjin Price: \$2.55 M. Cap: \$2.28B</p>	 <p>Ultra Price: \$0.60 M. Cap: \$332.98M</p>	 <p>Axie Infinity Price: \$5.69 M. Cap: \$315.37M</p>
 <p>Collectibles</p>	 <p>Ecomi Price: \$0.012 M. Cap: \$2.02B</p>	 <p>Super Farm Price: \$3.58 M. Cap: \$367.74M</p>	 <p>RedFOX Labs Price: \$0.30 M. Cap: \$390.84M</p>
 <p>Metaverse</p>	 <p>Decentraland Price: \$1.02 M. Cap: \$1.35B</p>	 <p>SAND Price: \$0.80 M. Cap: \$552.67M</p>	 <p>Decentral Games Price: \$546.22 M. Cap: \$101.72M</p>

\$27.9B

Total NFT Market Cap as of 1st April 2021

There are **four major** categories for NFT projects:

- **Sports** are one of the biggest categories in NFT with the successful launch of NBA Top Shot on FLOW and Football clubs releasing fan tokens on Chiliz.
- **Gaming** is catching up fast with Enjin releasing their Layer 2 solution for gaming multiverses. Axie Infinity in the meanwhile has popularized the concept of play-to-earn.
- **Collectibles** are gaining strength. Ecomi is partnering up with **Warner Bros, Capcom, and Cartoon Network**.
- **Metaverses** have great potential as the world becomes increasingly digital. Digital lands are becoming valuable virtual real estates.

Art marketplaces are well-established but newer niche categories are growing

NFT Marketplace Landscape

General



OpenSea



Rarible



ZORA



WAX



Nifty Gateway



Enjin

Art



Portion



MakersPlace



Async Art



Foundation



SuperRare



KnownOrigin

Others



EulerBeats



Audius



Font



Valuables



Mirror



MurAll

Trading volumes for OpenSea and Rarible hit \$187 million at the close of Q1 2021



OpenSea was one of the first NFT marketplaces which launched back in 2017. From January to August 2020, OpenSea's trading volumes averaged about **\$1 million per month**. Rarible entered the scene in 2020 and quickly took over OpenSea's sales in August 2020 for the next 5 months due to the liquidity mining program offered.

In January 2021, OpenSea reclaimed its No.1 spot with **\$8 million** and doubled Rarible's trading volume (**\$3.8 million**). The NFT scene then exploded in February 2021 where trading volumes grew by almost **10X**. In March 2021, total trading volume reached an all-time high of **\$187 million**.

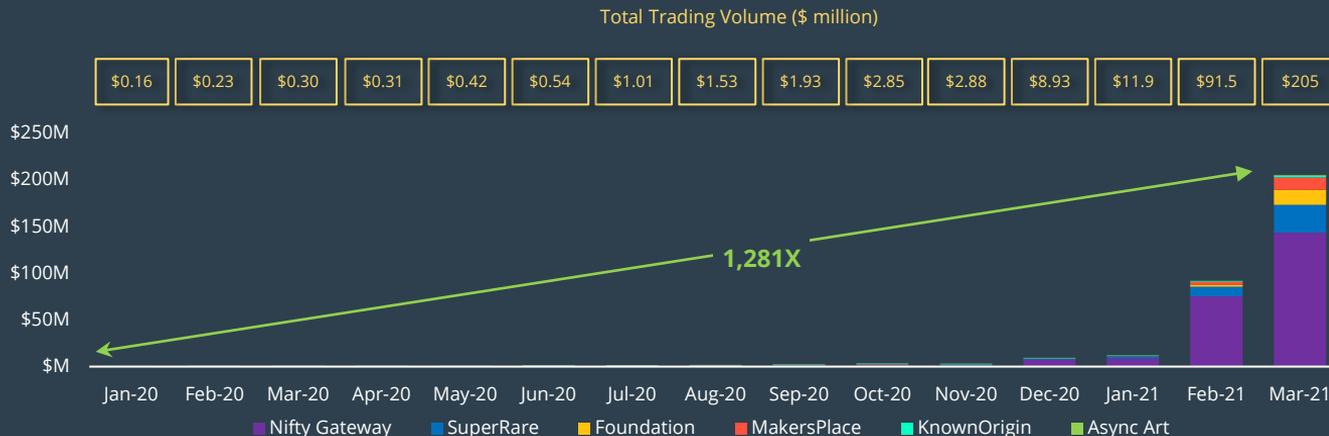
*Data is sourced from @rchen8 (Dune Analytics)
Rarible launched in early 2020 but data was only tracked from July 2020 onwards.

NFT Marketplaces

Niche-art marketplaces and collectibles saw similar breakout volumes



NFT Art-Marketplaces Trading Volume (Jan 2020 – Mar 2021)



Art marketplaces' trading volumes were relatively even until **Gemini's acquisition of Nifty Gateway** in November 2020. From then onwards, Nifty Gateway dominated the market with a **70% market share** by the end of March 2021.

At the same time, the total art trading volume amounted to **\$205 million**, which is **more than both OpenSea and Rarible** combined.



Top-5 Collectibles Aggregate Sales Volume Since Inception (As of 1 April 2021)

 <p>\$376.1M 265,558 Holders</p>	 <p>\$157.4M 1,881 Holders</p>	 <p>\$43.3M 3,920 Holders</p>	 <p>\$32.5M 94,482 Holders</p>	 <p>\$23.8M 10,588 Holders</p>
--	--	---	--	--

Data is sourced from @rchen8 (Dune Analytics), CryptoArt, and CryptoSlam

NFT x DeFi

NFTs are traversing into the realm of finance

Everyone's eyes are on Art, Games, and Metaverses; however, NFT use cases are evolving. Protocols are reinventing the game by **combining DeFi elements with NFTs to create new types of products.**

NFT
x
Yield
Farming



Aave has **gamified yield farming** through an innovative approach: users can **lock interest-bearing tokens from the Aave ecosystem (aTokens)** into NFTs known as Aavegotchis. They must be cared for through smart contract interactions and can be used to (eventually) participate in tournaments and mini games to **farm Aavegotchi's native token, GHST.**

NFT
x
Lending



Due to the illiquid nature of NFTs, NFT20 has recently introduced **flash loans** which allows users to **borrow tokenized NFT assets** on their platform **without collateral** but only if liquidity is returned to the pool within a single trading block. Users can take advantage of arbitrage opportunities, or even claim NFT rewards while they accrue in a pool.

NFT
x
Index
Funds



NFTX makes it possible to **create and trade index funds based on NFT collectibles** such as CryptoPunks and CryptoKitties. Users who do not have the time or knowledge to trade individual NFTs may gain exposure to the NFT markets via these NFT index funds.

NFT Goes Mainstream: Big Brands Riding the NFT Wave

Brand	Description
1 	Created an Ethereum-based game named F1 Delta Time . Players can build a collection of NFTs including car parts and drivers .
2 	Patented NFT shoes called ' CryptoKicks ' in 2019. Just like 'CryptoKitties', different designs of shoes can be 'bred' to create new and custom sneakers.
3 	Released a limited-edition flavor ' CryptoCrisp '. There were 50 packages auctioned and they only exist as NFT artwork.
4 	The first pixelated pizza was sold earlier in March and is re-listed for 5 ETH (\$9,000). Each week, the company releases a new pizza slice NFT .
5 	MGA's Bratz franchise minted a series of " NFT dolls " in the form of collectible cards.
6 	Previously partnered with Samsung to reward users in the form of vAtom tokens in 2019-2020.
7 	Launched Ethereum-based Rabbids game in 2020. Players can purchase characters, but do not own them for very long.
8 	This Procter and Gamble brand released a series of 'NFT' art pieces: Non-Fungible Toilet Paper . Charmin NFT sold for around 0.15 ETH.
9 	Panini America enabled a 'Blockchain' tab on its website, where NFT cards of various sports (i.e NFL, NBA) were sold.
10 	Created five distinct NFTs , on sale for 0.001 ETH (\$1.79). The asking prices on the resale market went up to \$200,000.

High-Profile NFT Sales

The latter half of Q1 saw many high-profile NFTs being sold at eye-watering figures



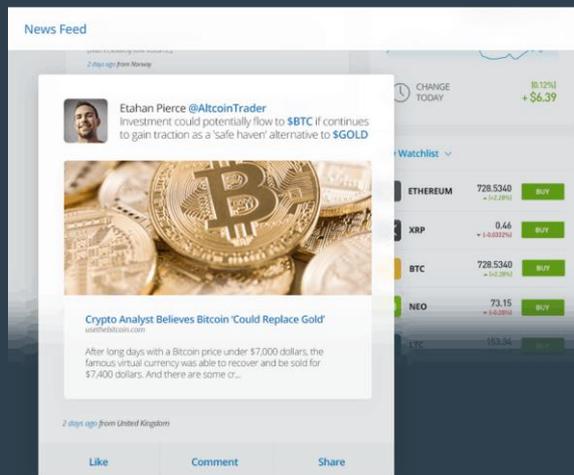


eToro is the world's leading social trading network. Powered by millions of users from over 140 countries, eToro has been able to refine their knowledge and experience into practical trading tools.

eToro offers a smarter, easier way to buy, sell, and trade assets. eToro gives you a streamlined and seamless platform with which to check on the market and trade like a professional.

With its clean and intuitive interface and ability to easily mimic the trades of successful traders, eToro is a great way for beginners to get into crypto trading. Even more advanced traders might learn a few things from the popular investors.

[Click here to learn why 13 million users worldwide trust eToro](#)



News Feed

2 days ago from Norway

Etahan Pierce @AltcoinTrader
Investment could potentially flow to **\$BTC** if continues to gain traction as a 'safe haven' alternative to **\$GOLD**

Crypto Analyst Believes Bitcoin 'Could Replace Gold'
After long days with a Bitcoin price under \$7,000 dollars, the famous virtual currency was able to recover and be sold for \$7,400 dollars. And there are some cr...

2 days ago from United Kingdom

Like Comment Share

CHANGE TODAY +\$6.39

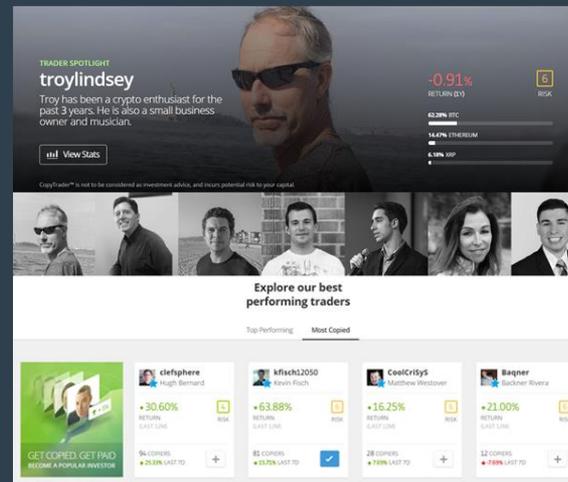
Watchlist

ETHEREUM	728.5340	+142.28%	BUY
XRP	0.44	+1.62027%	BUY
BTC	728.5340	+142.28%	BUY
NEO	73.15	+142.28%	BUY

Social Trading Platform

The array of social features eToro offers is vast and extends well beyond the trading platform itself. While pioneering social features and making the financial market more friendly and accessible to almost anyone around the world, eToro has also extended its reach and is maintaining active social channels.

There's also a social media-like 'Feed' feature, much like Facebook, where traders get to engage, connect, and share knowledge with one another. Join an entire community of crypto traders and benefit from the wisdom of the crowd.



TRADER SPOTLIGHT
troylindsey
Troy has been a crypto enthusiast for the past 3 years. He is also a small business owner and musician.

RETURN (31) -0.91%

62.20% BTC
14.47% ETHEREUM
6.10% XRP
6.23% NEO

CopyTrader™ is not to be considered an investment advice, and incurs potential risk to your capital.

Explore our best performing traders

Top Performing Most Copied

clefphere Hugh Bernard 30.60% RETURN (31) 94 COPIES +2026K LAST TD	ktisk1200 Kevin Frick 63.88% RETURN (31) 85 COPIES +2026K LAST TD	CoolCris5y Matthew Webber 16.25% RETURN (31) 28 COPIES +2026K LAST TD	Ragner Rachael Rivera 21.00% RETURN (31) 12 COPIES +2026K LAST TD
---	--	--	--

CopyTrader

Access original features like CopyTrader, which lets you browse Popular Investors and automatically mimic their trades. Want to test the waters before diving in? No problem — eToro lets you experiment with a \$100k virtual portfolio

eToro USA LLC does not offer CFDs. This publication has been prepared by our partner utilizing non-entity specific information about eToro, and may not be accurate for every entity. Your capital is at risk.

eToro (Europe) Ltd & eToro (UK) Ltd.

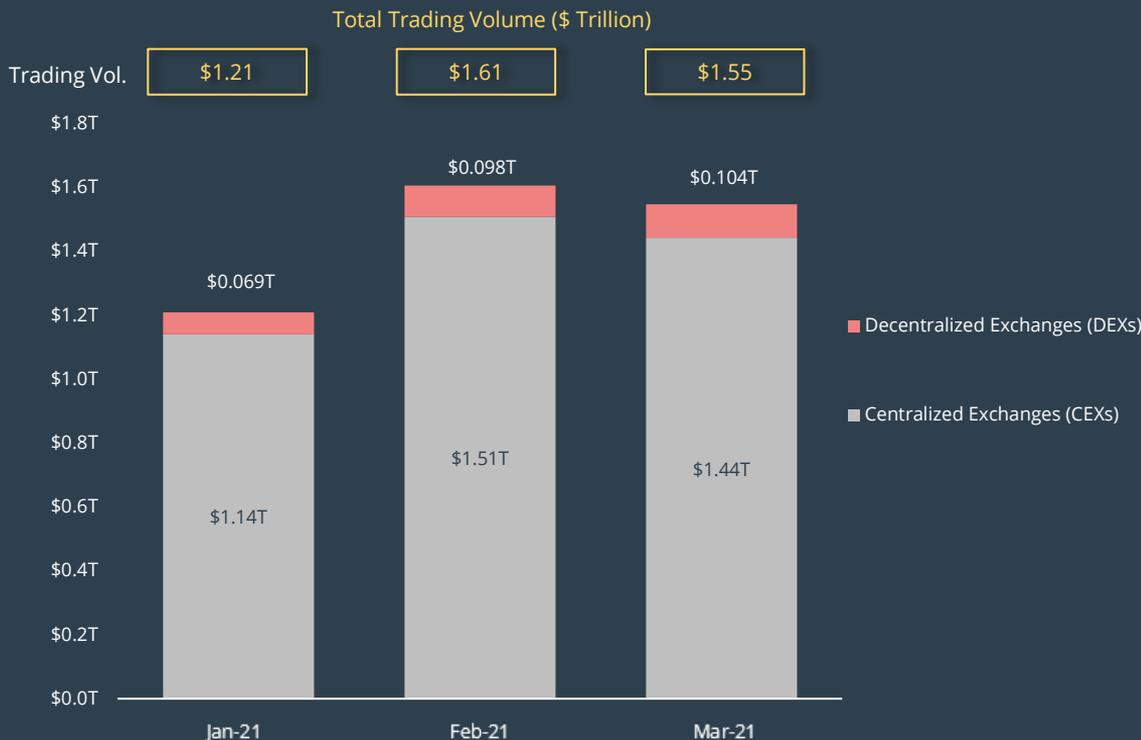
CFDs are complex instruments and come with a high risk of losing money rapidly due to leverage. 75% of retail investor accounts lose money when trading CFDs with this provider. You should consider whether you understand how CFDs work and whether you can afford to take the high risk of losing your money.

EXCHANGES

Q1 2021 Top-10 Cryptocurrency Exchanges

Total spot trading volume grew by 204% to \$1.55 trillion

Top-10 DEX+CEX Trading Volume (Jan - Mar 2021)



+204%
Top-10 (CEXs + DEXs) Total Trading Volume Growth in Q1 2021

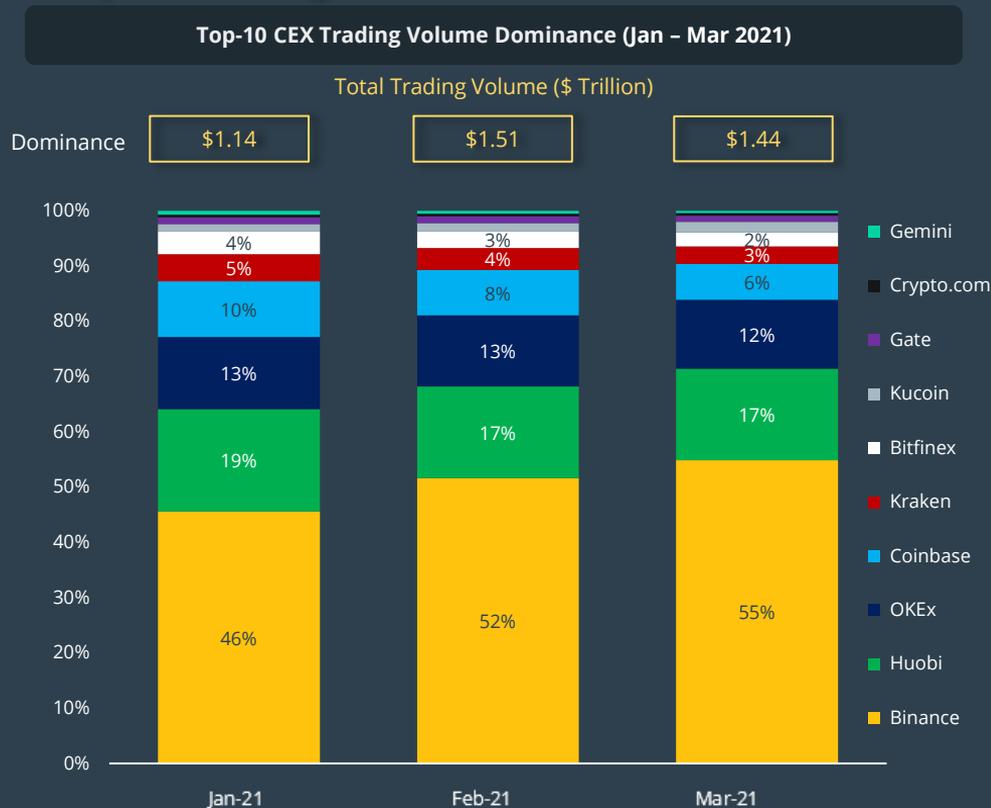
Overall, Q1 spot trading volume across the top-10 centralized and decentralized exchanges **grew by \$1 trillion to \$1.5 trillion (+204%)**.
The trillion-dollar growth was driven by **CEXs who accounted for 93% of the quarter's increase**.

With that said, **DEXs recorded a higher growth compared to CEXs (250% vs. 201%)**, albeit from a lower base.
The **DEX-CEX ratio has increased from 6.2%** in Dec 2020 **2021 to 7.2%** in March 2021.

Top-10 DEX as of 1 April 2021 – Uniswap, PancakeSwap, Sushiswap, 1Inch, Bancor, 0x, Curve, Tokenlon, Balancer, Terraswap
 Top-10 CEX as of 1 April 2021 – Binance, Huobi, OKEx, Coinbase, Kraken, Bitfinex, Kucoin, Gate.io, Crypto.com, Gemini
 *Terraswap's trading volume was only tracked on 5th January 2021

Q1 2021 Top-10 Centralized Exchanges (CEX)

CEXs spot trading volume recorded \$1.44 trillion, 59% of which belongs to Binance



+201%
Top-10 CEX Total Trading Volume Growth in Q1 2021

Centralized exchanges **increased 201%** in spot trading volume, ending the quarter with **\$1.44 trillion**.

Binance is the major contributor to the increase, **accounting for 59% (+\$571 billion)** of this quarter's increase. This is followed by Huobi (15%), and OKEx (11%)

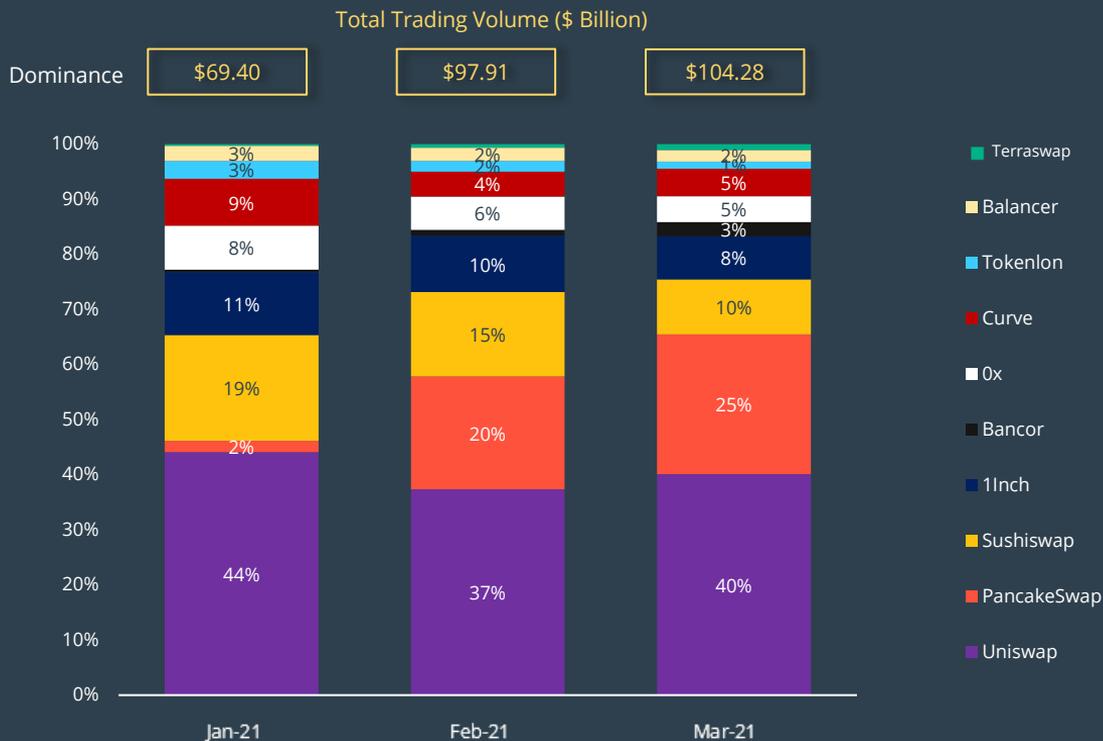
In term of dominance, Binance and Kucoin are the only CEXs who saw their market share increase.

Binance further cemented its dominance, rising from 46% to 55%.

Q1 2021 Top-10 Decentralized Exchanges (DEX)

PancakeSwap is the second-largest DEX and now vying for Uniswap's throne

Top-10 DEX Trading Volume Dominance (Jan - Mar 2021)



+250%
Top-10 DEX Total Trading Volume Growth in Q1 2021

DEXs saw an **increase in its spot trading volume by 250% (+\$75 billion) to \$104 billion.**

PancakeSwap and Uniswap are the main drivers of the growth, equally **accounting for 70% (+\$52 billion) of the volume increase.**

Although the DEX grew, **Tokenlon saw its volume decline marginally by \$620 million** from December 2020 to March 2021.

In terms of dominance, only Pancakeswap (25%), Bancor (3%), and Mirror (1%) managed to increase their market share.

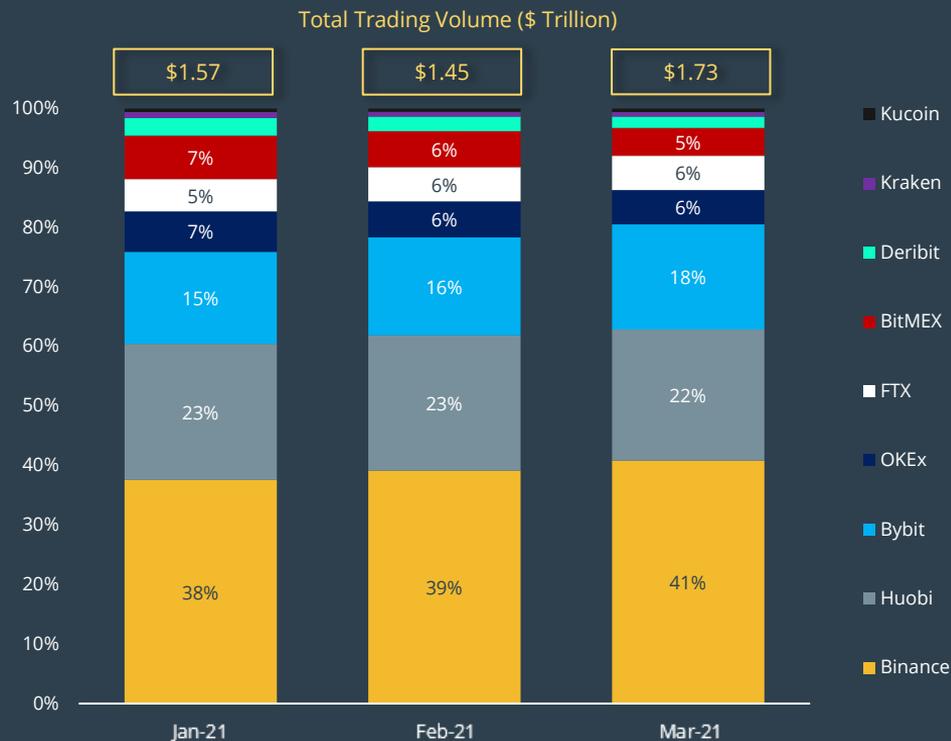
In fact, **Uniswap is losing it's foothold as the "King of DEXs" to PancakeSwap** which coincides with the rise of BSC as the cheaper alternative to Ethereum.

Top-10 DEX as of 1 April 2021 - Uniswap, PancakeSwap, Sushiswap, 1Inch, Bancor, Ox, Curve, Tokenlon, Balancer, Terraswap
*Terraswap's trading volume was only tracked on 5th January 2021

Q1 2021 Derivatives Exchanges – Bitcoin Perpetual Swaps Volume

BTC perpetual swaps trading volume recorded \$1.73 trillion

Aggregate Monthly Bitcoin Perpetual Trading Volume Dominance (Jan – Mar 2021)



+132%
 Top-9 Bitcoin Perpetual Swap Trading Volume Growth in Q1 2021

Bitcoin perpetual swaps trading volume across the top-9 derivative exchanges saw a **net increase of 132% to \$1.73 trillion**.

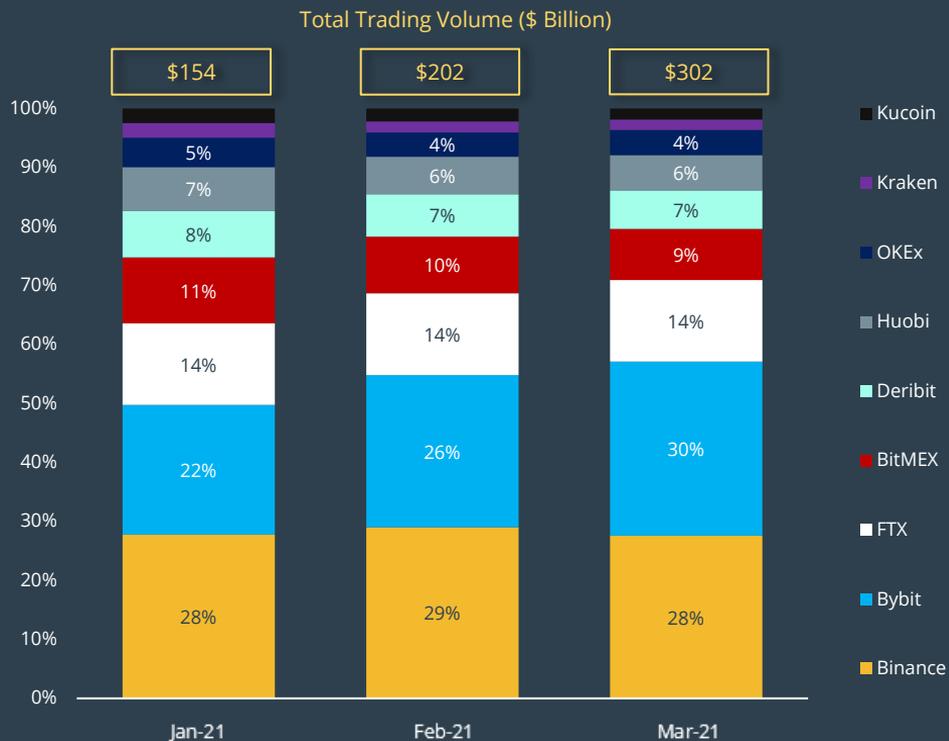
Binance (44%), Huobi (22%), Bybit (20%) accounted for 86% (+\$844 billion) of the total increase in volume.

In term of dominance, **Binance and Bybit are the only ones who climbed (+3% and +3% respectively)**, while others fell. **BitMEX had the biggest drop by -2%.**

Q1 2021 Derivatives Exchanges – Bitcoin Perpetual Swaps Open Interest

Bybit took over Binance’s crown in terms of Open Interest (OI) dominance

Aggregate Monthly Bitcoin Perpetual OI Dominance (Jan – Mar 2021)



+174%

Top-9 Bitcoin Perpetual Swap Open Interest Growth in Q1 2021

Bitcoin perpetual swaps open interest (OI) across top-9 derivative exchanges **recorded a total of \$302 billion** in March 2021. This represents a **174% increase**.

Bybit (32%), Binance (27%), and FTX (15%) accounted for **74% (+\$192 billion)** of the net increase.

Only Bybit rose through the ranks from 22% to 30% and **overtook Binance's dominance** in terms of BTC perpetual swaps open interest.

CoinGecko Highlights

Experience ad-free CoinGecko and stay ahead of the curve!

Free

CoinGecko as it is - perfect for anyone looking to get a 360-overview on the crypto markets

\$0.00 /Lifetime

Current Plan

Top features:

- Live prices, charts & historical data on over 6,000+ cryptocurrencies.
- Redeem daily Candies for swags and goodies!
- Portfolio - Track your holdings. Synced across all devices.
- Android & iOS ready - Track crypto markets wherever!

Premium

Experience ad-free CoinGecko and stay ahead of the curve.

\$5 /mo

 Gecko Preferred

Upgrade to Premium

Everything in Free, plus:

- Ad-free experience on all CoinGecko apps (Web, Mobile App, Newsletter).
- More Candies (1.1x) - Redeem deals to further your crypto experience!
- [Early Adopter Special] CoinGecko Genesis Premium NFT
- 🗨️ Support independent data for the crypto space!

Premium+

For the more demanding, powerful crypto enthusiasts looking for an edge in the markets.

\$10 /mo

Upgrade to Premium+

Everything in Free, plus:

- Ad-free experience on all CoinGecko apps (Web, Mobile App, Newsletter).
- Even more Candies (1.2x) - Redeem deals to maximize your crypto experience!
- [Early Adopter Special] CoinGecko Genesis Premium+ NFT
- CoinGecko Publications - You'll get our critically acclaimed How to DeFi, as well as our newcomer's guide to the grandfather of crypto - How to Bitcoin. Stay tuned for more!
- Private Telegram group with CoinGecko's research analysts.
- Be a pioneer - Get early access to new features first when we release them!
- 🗨️ Support independent data for the crypto space!



Distraction-free



Partake in the crypto space as an early-adopter



Private Telegram group with our analysts

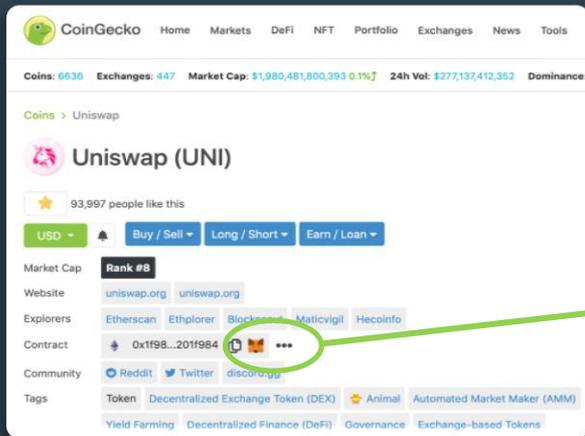
<https://www.coingecko.com/en/premium>

Directly adding tokens to MetaMask

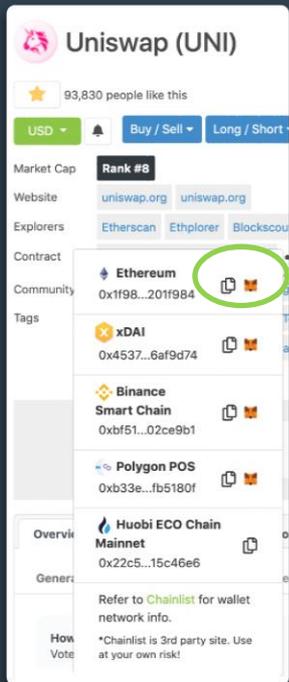
Our multi-chain feature lets you directly add tokens to your MetaMask wallet

Add-to-MetaMask Button New

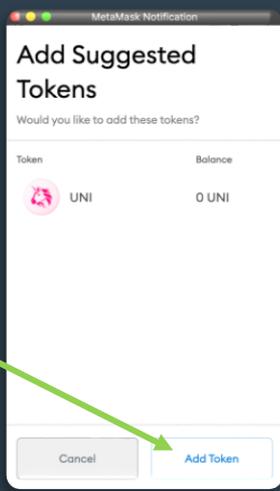
1



2



3



By simply clicking on the MetaMask icon on our coin page, the token is added in your MetaMask wallet.



Say goodbye to the cumbersome task of manually adding a token



Tokens of various chains can also be added

We also track BTC holdings of public companies

Public Companies Bitcoin Holdings New

Bitcoin Holdings by Public Companies
Track publicly traded companies around the world that are buying bitcoin as part of corporate treasury

178,283.4 Total Bitcoin Holdings
\$10,476,155,271 Total Value (USD)
0.96% Public Companies Bitcoin Dominance
21 Companies

#	Company	Symbol	Country	Total Bitcoin	Entry Value (USD)	Today's Value (USD)	% of Total BTC Supply
1	MicroStrategy Inc.	NASDAQ:MSTR	US	91,579	\$2,226,000,000	\$5,381,296,428	0.436%
2	Tesla	NASDAQ:TSLA	US	48,000	\$1,500,000,000	\$2,820,539,955	0.229%
3	Galaxy Digital Holdings	TSE:GLXY	CA	16,402	\$134,000,000	\$963,802,007	0.078%
4	Square Inc.	NASDAQ:SQ	US	8,027	\$220,000,000	\$471,676,546	0.038%
5	Marathon Patent Group	NASDAQ:MARA	US	4,813	\$150,000,000	\$282,817,892	0.023%
6	Hut 8 Mining Corp	TSX:Hut-8	CA	2,851	\$36,788,573	\$167,528,321	0.014%
7	Voyager Digital LTD	CSE:VYGR	CA	1,239	\$7,927,182	\$72,805,188	0.006%
8	Riot Blockchain, Inc.	NASDAQ:RIOT	US	1,175	\$7,200,000	\$69,044,468	0.006%
9	Aker ASA (Seetee AS)	OL:AKER	NO	1,170	\$58,599,450	\$68,750,661	0.006%
10	Meltu	HKG:1357	HK	765	\$39,500,000	\$44,964,108	0.004%

<https://www.coingecko.com/en/public-companies-bitcoin>



Full list of 21 public companies that owns BTC



Percentage of Total BTC Supply owned by public companies

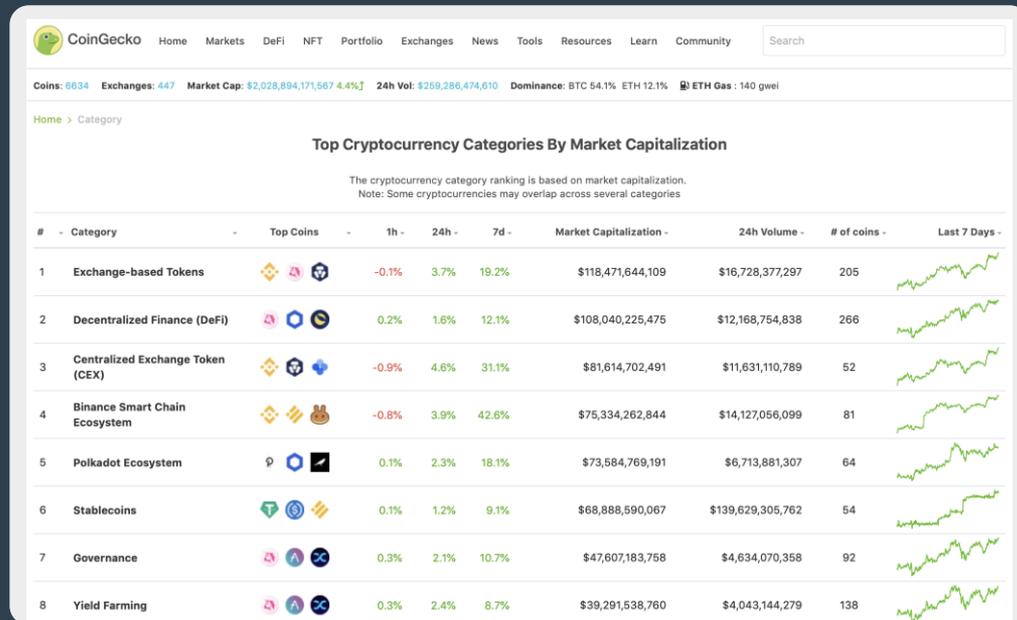


Real-time tracking of Bitcoin's value in USD as part of companies' treasuries

Categories Ranking Page

We now feature token categories to track emerging trends

Crypto Categories Page Ranked by Market Cap New



<https://www.coingecko.com/en/categories>



Crypto assets **assigned** into distinct categories



Efficient and organised way to source data and information



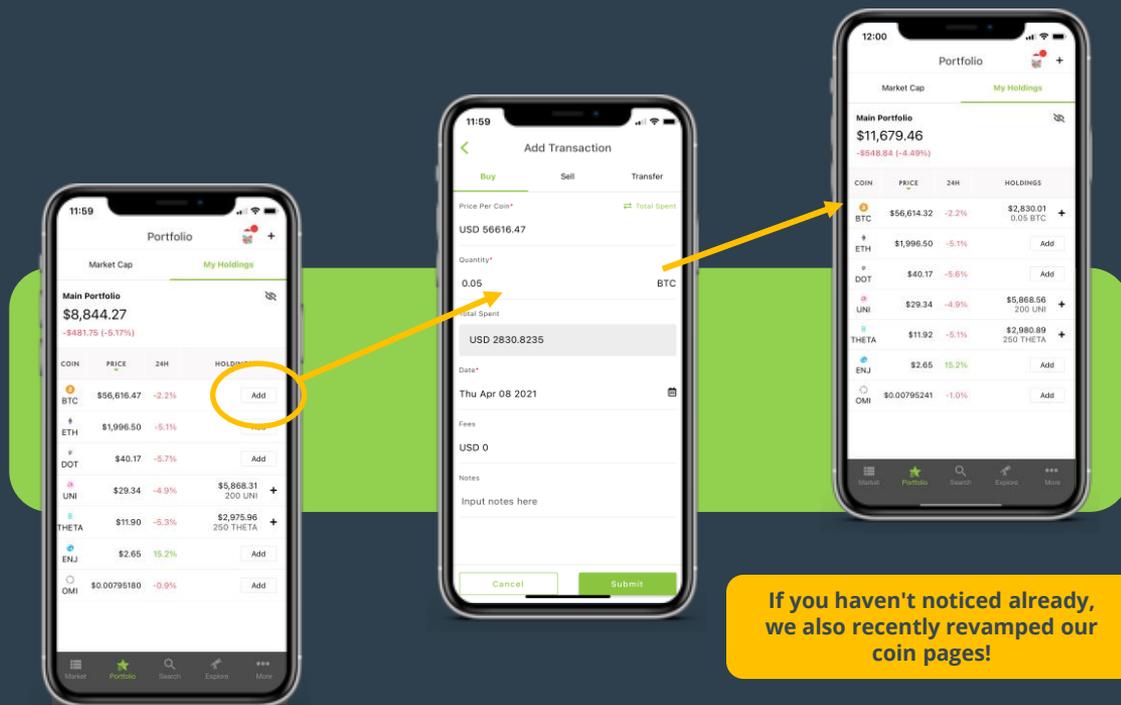
Categories **sorted** by market capitalization



Made **user-friendly** for both novices and experts

Mobile App: New Multi-Portfolio Management

Personalize your own list of cryptoassets and track your P&L



Customizable to your **own choice of asset**



Multiple portfolio curation



Pie chart for holdings, **showing % breakdown**

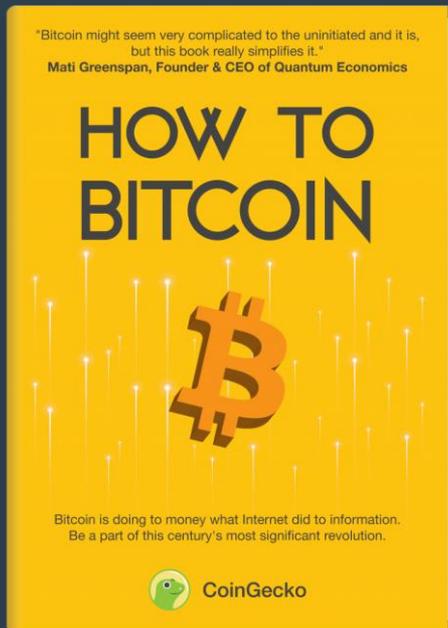


Portfolio overview - view all your portfolios at once



Portfolio sharing - share a public link to your portfolio

Lastly, Don't Forget to Give Our New 'How to Bitcoin' Book a Read!



The Bitcoin revolution is looming upon us,
catch the wave with our new book, it is never too late!



Contains **simple analogies** and **step-by-step** guide



Easy to understand, written for **beginners**



Helps you understand the **Bitcoin movement** and how to **be a part of it!**

Get Your Copy!



FOLLOW US





THAT'S ALL! THANK YOU FOR READING :)

[Take a 1-minute survey and let us know how you feel!](#)