

Table of Contents

Key Takeaways	2
Crypto Market Performance	3
Decentralized Finance (“DeFi”)	5
Non-Fungible Token (“NFT”)	6
Charts of the Month	7
Runes Have Generated Over US\$135M in Fees Since Launch	7
Liquid Restaking Growth Shows No Signs of Slowing	8
Stablecoin Supply Approaches Two-Year Highs	9
TON Ecosystem Gains Traction	10
Upcoming Events and Token Unlocks	11
References	12
New Binance Research Reports	13
About Binance Research	14
Resources	16

Key Takeaways

- ◆ The crypto market experienced downward momentum in April, closing the month with an 11% decrease in total market capitalization. Several factors, including changes in expectations of rate cuts, geopolitical risks, and a slowdown in flows of spot BTC ETFs, were seen as the main contributors to the downward pressure.
- ◆ The Runes Protocol, a new token standard for fungible tokens on the Bitcoin network, has generated over US\$130M in fees since launching on April 20. They have also been responsible for roughly 50% of all of Bitcoin's transactions since then, across 3M+ transactions recorded, generating approximately 33% of all fees on the network.
- ◆ Total value locked ("TVL") in liquid restaking protocols continued to track upward, crossing the US\$10B mark in April. Apart from the liquidity benefits of LRTs, a key driver of growth has been "point farming," where users participate in these protocols to earn points in hopes of being eligible for future airdrops.
- ◆ The total supply of USD-pegged stablecoins has been on an upward trajectory this year, reaching US\$160B in April, the highest level in nearly two years. This growth corresponds with a broader market upturn, emphasizing stablecoins as crucial indicators of crypto market demand. Particularly, First Digital's FDUSD and Ethena's USDe have been major beneficiaries of this growth, increasing 80.0% and 52.3%, respectively, in April alone.
- ◆ The TON network has witnessed a surge in on-chain metrics as DeFi TVL and monthly active addresses both broke all-time highs in April. This was largely driven by the launch of "The Open League," an initiative that aims to bring millions of Telegram users on-chain and drive activity on the TON network.

Crypto Market Performance

The crypto market experienced downward momentum in April, closing the month with an 11% decrease in total market capitalization. Several drivers, such as changes in expectations of rate cuts, geopolitical risks, and a slowdown in flows of spot BTC ETFs, were seen as the main contributors to the downward pressure. However, there were also bright spots in April. Notably, Hong Kong regulators approved several spot BTC and ETH ETFs in mid-April, and a total of six crypto-based spot ETFs started trading in Hong Kong on April 30. The stablecoin supplies of USDT and USDC have also been increasing, indicating continued capital flow into the crypto market.

Figure 1: Monthly crypto market capitalization decreased by 11% in April

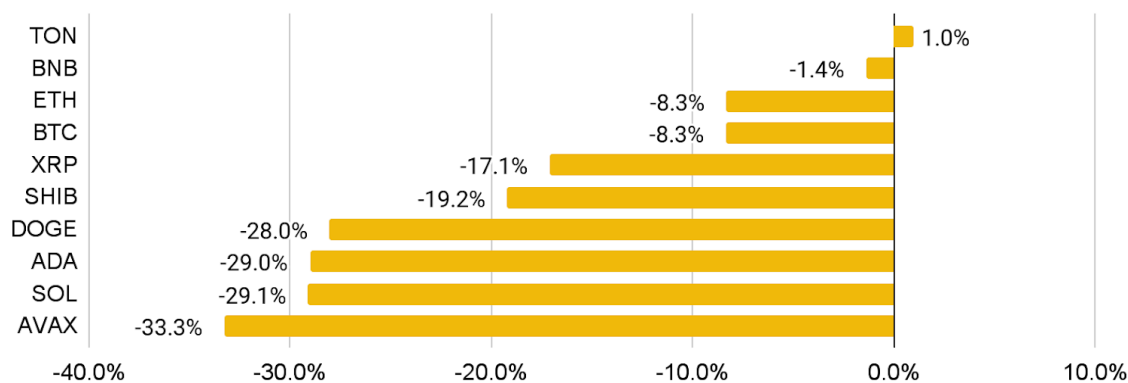
Monthly Change in Crypto Market Cap (%)

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
2024	0.4	40.0	16.3	-11.3								
2023	30.4	3.4	9.3	3.2	-6.0	3.3	1.0	-8.8	2.6	19.0	11.0	15.2
2022	-22.6	-0.3	25.3	-18.1	-25.2	-31.7	21.8	-11.4	-2.1	7.2	-18.0	-4.5
2021	33.9	39.6	31.1	11.4	-25.7	-5.9	12.5	25.2	-9.9	42.9	-1.0	-15.0
2020	35.4	-5.5	-27.7	38.8	10.0	-4.5	25.9	13.7	-7.6	14.6	37.5	39.7
2019	-11.6	12.3	11.1	17.1	55.5	30.8	-22.5	-6.5	-13.7	14.8	-14.7	-7.9

Source: CoinMarketCap

As of April 30, 2024

Figure 2: Monthly price performance of the top 10 coins by market capitalization



Source: CoinMarketCap

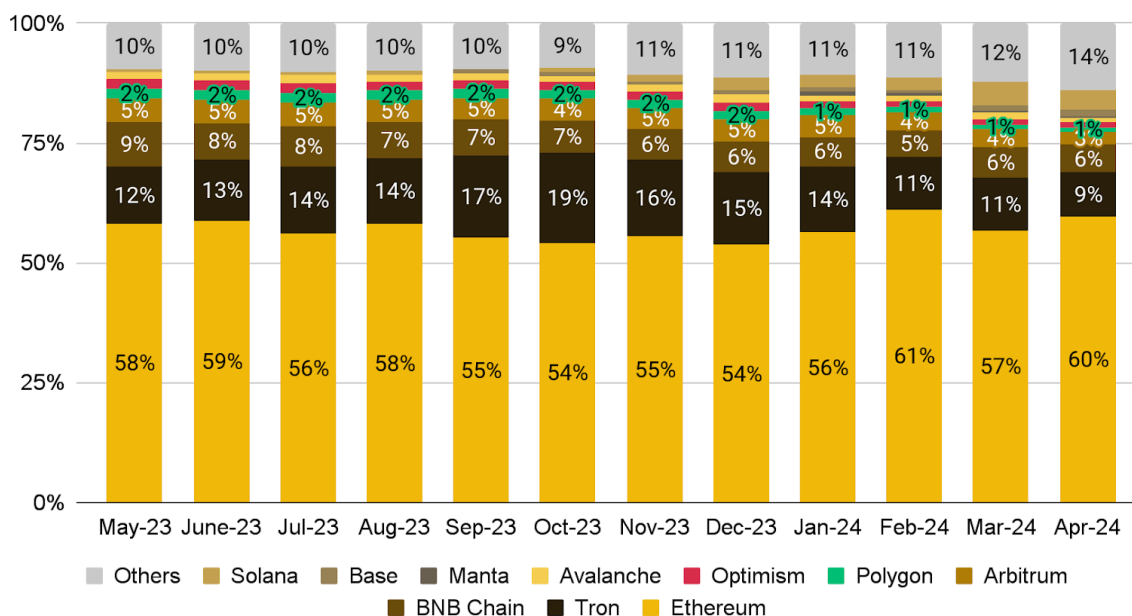
As of April 30, 2024

In descending order of performance:

- ◆ Most of the top ten coins ended the month in the red as macroeconomic factors weighed on market performance. While some coins went through significant sell-offs, TON and BNB showed relative resilience, closing April with a gain of 1.0% and a slight decrease of 1.4%, respectively. TON's outperformance has been contributed to by the traction its ecosystem has recently gained. Referring to on-chain metrics, the TON network's TVL hit an all-time high of US\$170M, while the number of monthly active addresses also more than doubled from 744K in March to an all-time high of 1.7M in April. A key driver of the TON ecosystem's growth was "The Open League," a community rewards initiative that aims to incentivize network usage through a total prize pool of 30M TON tokens. On the other hand, BNB has continued to be one of the top performers over the past few months, with its demand remaining at a heightened level. Notably, Binance introduced its first Megadrop in April, enabling BNB holders to earn rewards by locking up their BNB and completing a series of quests.
- ◆ ETH and BTC both experienced a decline of around 8% in April. A significant development for BTC and ETH in April was the approval by Hong Kong regulators of several spot BTC and ETH ETFs. Three BTC spot ETFs and three ETH spot ETFs began trading in Hong Kong on April 30. Despite being on a smaller scale due to market differences, this event still signals positive progress for the two leading cryptocurrencies. Conversely, XRP and SHIB saw larger declines, ending the month with MoM decreases of 17.1% and 19.2%, respectively.
- ◆ DOGE, ADA, SOL, and AVAX were on the lower end of performance in April, experiencing significant declines in price performance. The first three all saw a MoM decrease of around 29%, while AVAX experienced a larger monthly decline of 33.3%.

Decentralized Finance (“DeFi”)

Figure 3: TVL share of top blockchains



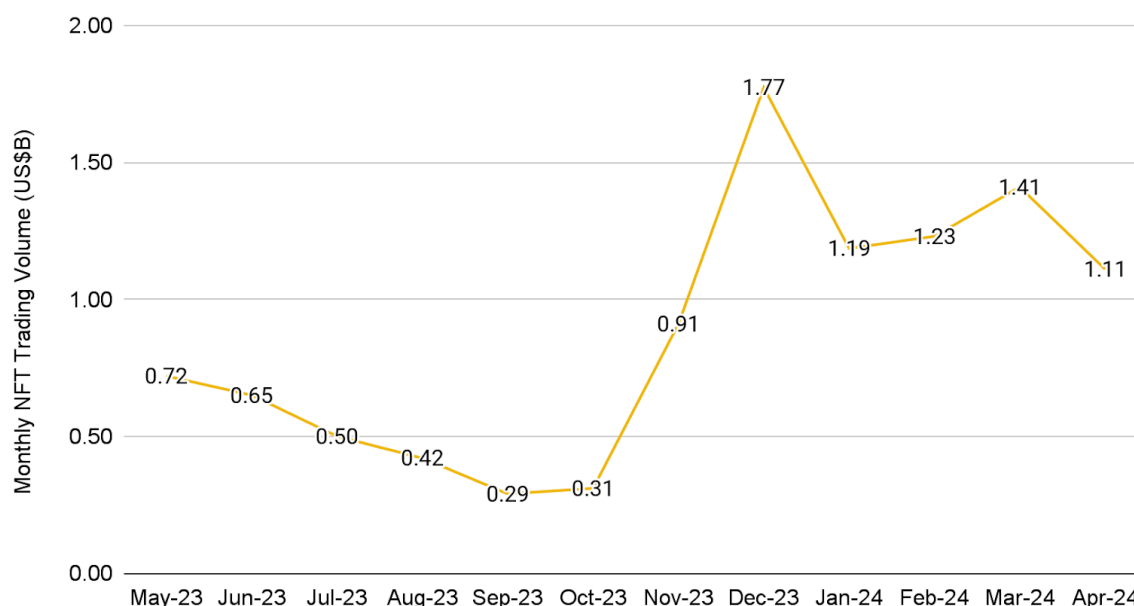
Source: DeFiLlama
As of April 30, 2024

In line with the broader market, the DeFi market also experienced a quiet period in April, posting a slight MoM decrease of 0.7%. Among the top ten chains, Merlin Chain, a native Bitcoin Layer 2, saw the most growth with a MoM gain of 1000%, surpassing US\$1B in TVL. A significant contribution to Merlin’s TVL growth came from the Solv Protocol, which recently launched a yield-bearing BTC token, SolvBTC, along with its points system, leading to a substantial influx of capital.

On the protocol side, notable performers included Pendle and Hyperliquid. Bolstered by the trend of point systems in the current market, Pendle’s TVL surpassed the US\$5B mark at one point, and the protocol’s cumulative trading volume has also exceeded US\$15B, with contributions coming from popular pools related to liquid restaking tokens (“LRTs”) and USDe. Hyperliquid, a Layer 1 with a perpetual DEX, recently launched the spot trading feature and airdropped a meme coin called PURR, named after the protocol’s mascot, as the first tradable token. The team hinted that users would soon be able to deploy native tokens and onchain spot order books permissionlessly on the Hyperliquid Layer 1. As a Layer 1, Hyperliquid’s TVL of US\$435M has surpassed that of Aptos, Near, and Cardano, owing to its deep liquidity and optimized tech stack.

2.2 Non-Fungible Token (“NFT”)

Figure 4: Monthly NFT trading volume



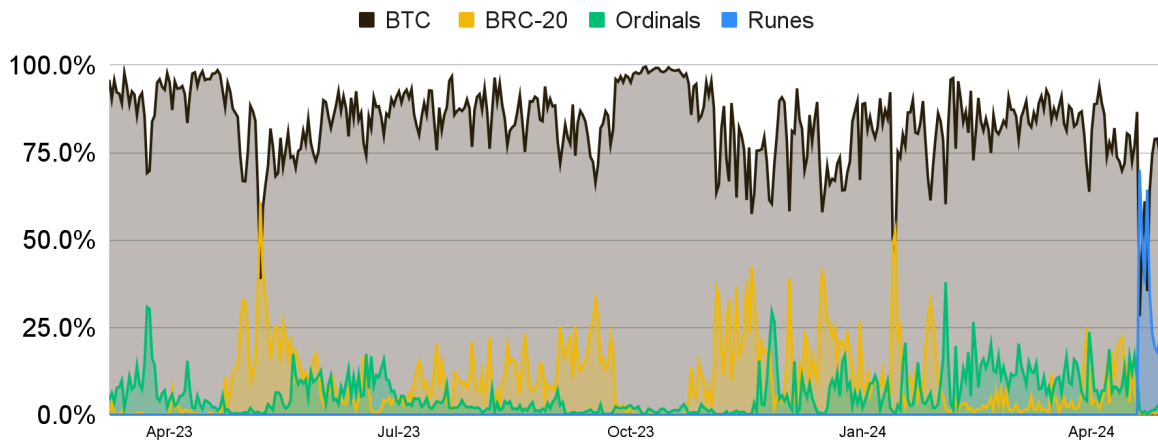
Source: CryptoSlam
As of April 30, 2024

The NFT market experienced a decline in April, registering a total sales volume of US\$1.11B, which marked a 21% decrease from March. Bitcoin collections continued to pique collectors' interest in April. Notably, four of the top five collections in terms of sales volume were Bitcoin collections, namely Ordinals, PUPS, WZRD, and NodeMonkes, which collectively recorded a sales volume of US\$423M. Sentiment toward Ethereum collections remained poor, with blue-chips like CryptoPunk and Bored Ape Yacht Club recording low sales volumes of US\$26M and US\$25M, respectively. In terms of NFT sales volumes across the top chains, Bitcoin led the pack with a sales volume of US\$567M, followed by Ethereum at US\$241M and Solana at US\$153M. On a percentage basis, Bitcoin experienced a 5% decrease in total volume, while Ethereum and Solana both saw notable declines close to or more than 50%, suggesting that collectors have shifted their focus toward Bitcoin collections recently.

Charts of the Month

Runes Have Generated Over US\$130M in Fees Since Launch

Figure 5: Runes have been responsible for roughly 33% of fees on the Bitcoin network since launching on April 20



Source: Dune (@cryptokoryo), Binance Research
As of April 30, 2024

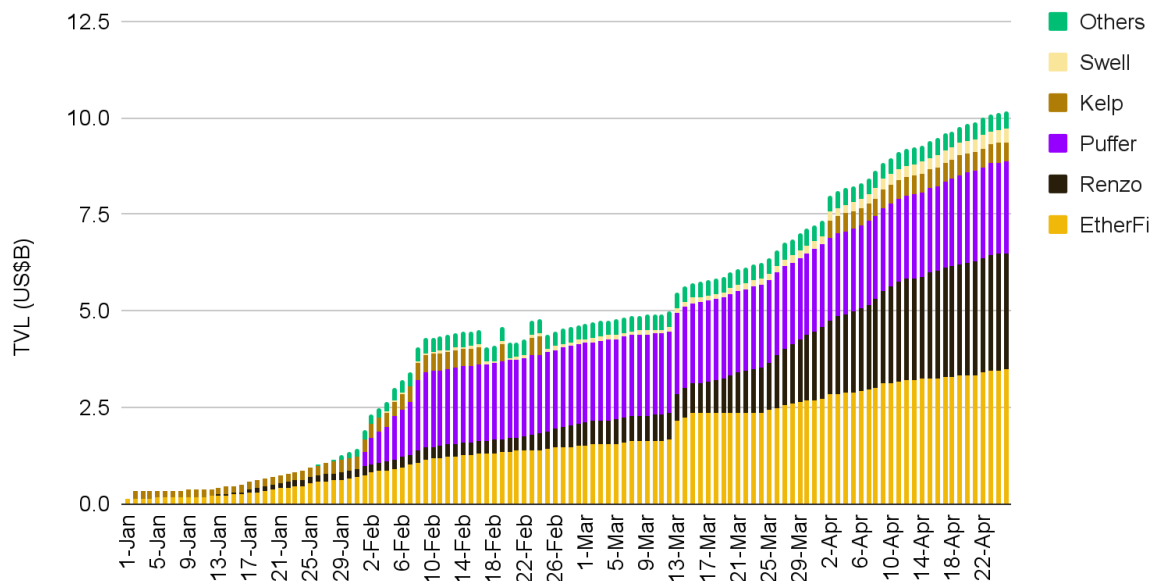
The Runes Protocol, a new token standard for fungible tokens on the Bitcoin network, has generated over US\$130M in fees since launching on April 20. Runes were created by Casey Rodarmor, the developer behind the Ordinals Protocol, which brought Inscriptions (i.e., NFTs) to Bitcoin. Runes use Bitcoin’s unspent transaction output (“UTXO”) model, in combination with the OP_RETURN opcode, to allow users to etch (i.e., create and set properties), mint, and transfer fungible tokens on the network.

Prior to Runes, fungible tokens were made possible on Bitcoin through the BRC-20 token standard, which was released in 2023. However, Rune tokens are more efficient than BRC-20s and leave a smaller on-chain footprint, contributing to lower levels of network strain and enhanced scalability. Runes are also compatible with Bitcoin’s Lightning Network, while BRC-20s are not. BRC-20 is a fungible token standard built on top of the Ordinals Protocol, which is designed for non-fungible tokens. This helps to illustrate why BRC-20s are more complex than Runes tokens, which are based on their own independent technology and unrelated to the Ordinals Protocol.

Since launching, Runes-related transactions have been a significant contributor to Bitcoin network activity. There have been over 3M Runes transactions since launch, representing around 50% of all Bitcoin transactions since then. This is in addition to the over 2,000 BTC in fees that Runes has generated, contributing to roughly 33% of all Bitcoin network fees since April 20.

Liquid Restaking Growth Shows No Signs of Slowing

Figure 6: TVL of liquid restaking protocols cross US\$10B



Source: Dune Analytics (@cryptokoryo_research), Binance Research
As of April 30, 2024

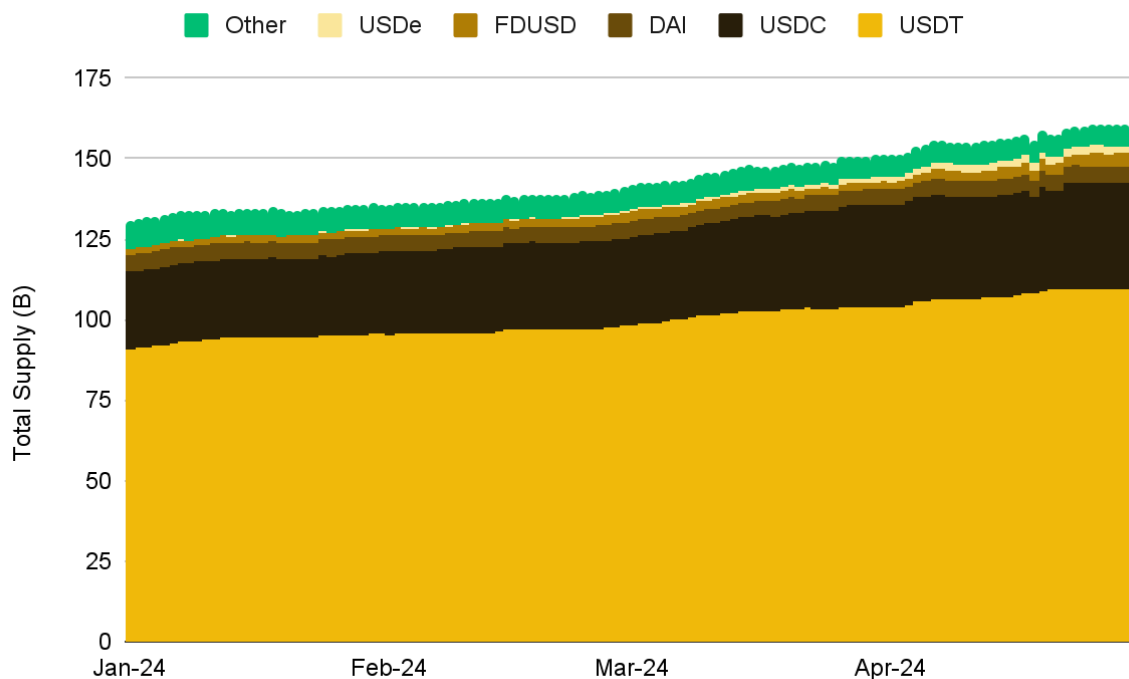
Liquid restaking protocols accept deposits (e.g., ETH, liquid staking tokens) from users and provide them with a liquid restaking token (“LRT”) in return. These LRTs can then be used to participate in the broader crypto ecosystem, thereby allowing users to maintain liquidity or even earn additional yield in DeFi.

Over the past few months, we have seen a steady increase in the TVL of liquid restaking protocols, with TVL crossing the US\$10B mark in April. Apart from the liquidity benefits of LRTs, a key driver of growth has been “point farming,” where users participate in these protocols to earn points in hopes of being eligible for future airdrops. This has also sparked a series of integrations and partnerships between LRT and DeFi protocols, where users are provided with boosted points when they use their LRTs in selected DeFi protocols.

However, LRTs are not without risks. Users take on an additional layer of smart contract and protocol-specific risks as opposed to if one were to interact directly with EigenLayer. For example, the recent depeg of Renzo Protocol’s ezETH also highlights the asset price risk of LRTs. ezETH’s token price on Uniswap fell to a low of around US\$688 temporarily, triggering over US\$60M of liquidations on lending protocols Morpho and Gearbox.

Stablecoin Supply Approaches Two-Year Highs

Figure 7: The total supply of USD-pegged stablecoins has been trending upward this year, reaching \$160B in April, the highest level in nearly two years



Source: DeFillama, Binance Research
As of April 30, 2024

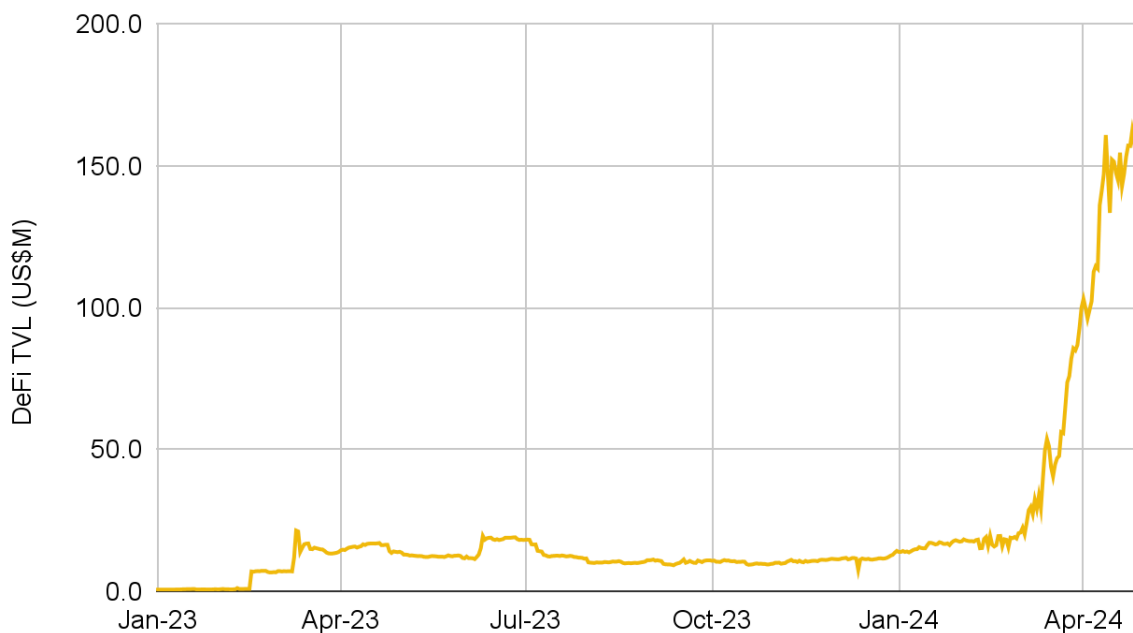
The total supply of U.S. dollar-pegged stablecoins has been on a significant upward trend this year, increasing 22.5% year-to-date (“YTD”). By the end of April, the total supply had reached US\$160B, the highest level in nearly two years. This rise aligns with the broader market upturn, highlighting stablecoins as a key indicator of crypto market demand.

Notably, First Digital’s FDUSD and Ethena’s USDe have been strong beneficiaries of this growth, increasing 80.0% and 52.3%, respectively, in April alone. FDUSD now holds US\$3.9B in supply, while USDe has US\$2.3B, positioning both among the top five largest stablecoins. USDe’s growth has been propelled by its unique delta-hedged mechanism, which enables it to offer attractive yields for its holders. USDe has also been able to capitalize on its initial shards campaign and is now engaging users with an ongoing sats campaign. Meanwhile, FDUSD has been successful in attracting users with its zero trading fee policy on centralized exchanges (“CEXes”). Moreover, the stablecoin is broadening its on-chain reach, having recently integrated with the Sui blockchain in addition to its existing presence on Ethereum and BNB Chain.

As stablecoins continue to play an important role in crypto markets, with major players like Ripple entering the space, the supply of stablecoins is expected to increase, particularly if the positive market momentum persists.

TON Ecosystem Gains Traction

Figure 8: DeFi TVL on TON hits all-time high



Source: DeFi Llama, Binance Research
As of April 30, 2024

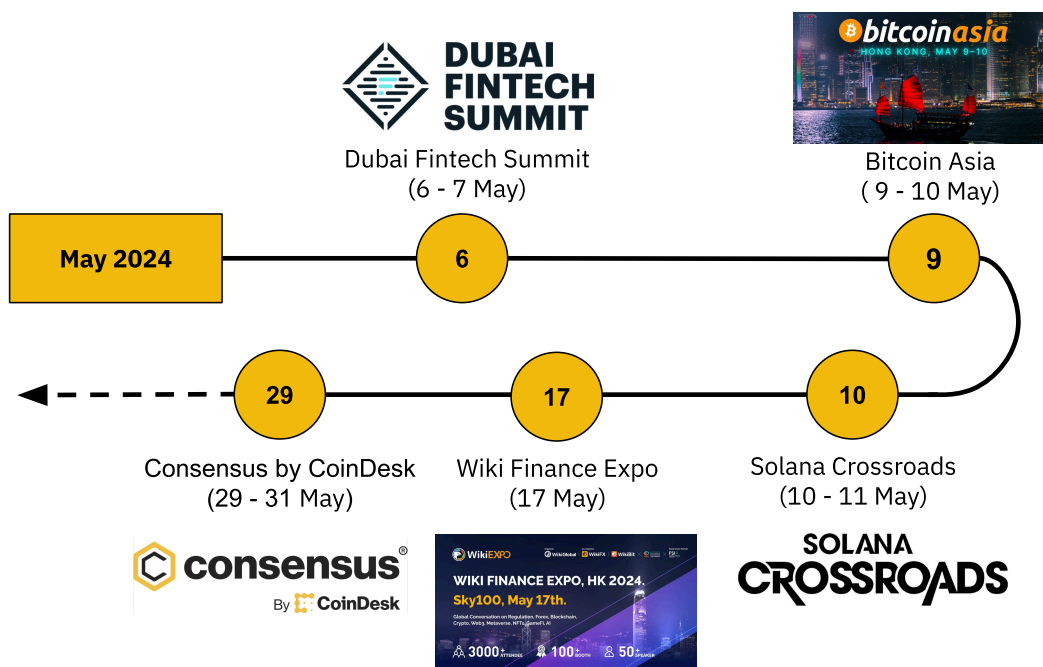
Following the return of Toncoin to the top 10 coins by market capitalization (excluding stablecoins) in March, the TON network has continued to gain traction throughout April. In particular, DeFi TVL hit an all-time high of US\$170M as activity on the network grew. Monthly active addresses also more than doubled from 744K in March to an all-time high of 1.7M in April, based on [data from Token Terminal](#).

Toncoin's on-chain metrics growth has largely been driven by the launch of "The Open League" on April 1. The initiative aims to bring millions of Telegram users on-chain and drive activity on the TON network. A key incentive is the allocation of 30M TON tokens (approximately US\$115M) as community rewards to encourage active participation by users and developers.

Notable partnerships have also been announced in the past month, bringing additional eyeballs to the TON network. For one, the launch of USDT stablecoin on the TON network on April 19 is poised to enable seamless payments and provide global payment infrastructure to a mass audience of over 900M Telegram users. Additionally, the TON Foundation has also announced a partnership with HashKey Group to facilitate on- and off-ramp services for users of the Telegram wallet in the Asia-Pacific region.

Upcoming Events and Token Unlocks

Figure 9: Notable events in May 2024



Source: Binance Research

Figure 10: Largest token unlocks in US\$ terms

PROJECT	TOKEN	UNLOCK IN US\$ EQUIVALENT	% OF SUPPLY	UNLOCK DATE
AVALANCHE	\$AVAX	\$334.49M	2.52%	22 May
MEMECOIN	\$MEME	\$140.12M	32.22%	3 May
APTOS	\$APT	\$104.39M	2.65%	12 May
ARBITRUM	\$ARB	\$97.93M	3.49%	16 May
STARKNET	\$STRK	\$78.72M	8.79%	15 May
dYdX	\$DYDX	\$71.00M	11.09%	1 May
Optimism	\$OP	\$61.12M	2.31%	29 May
ImmutableX	\$IMX	\$53.61M	1.75%	17 May
Ethena	\$ENA	\$48.12M	3.76%	1 May
sui	\$SUI	\$40.85M	2.67%	3 May

Source: Token Unlocks, Binance Research

References

<https://defillama.com/>

<https://coinmarketcap.com/>

<https://www.cryptoslam.io/>

<https://token.unlocks.app/>

<https://dune.com/>

<https://pro.nansen.ai/>

<https://clientdiversity.org/>

About Binance Research

Binance Research is the research arm of Binance, the world's leading cryptocurrency exchange. The team is committed to delivering objective, independent, and comprehensive analysis and aims to be the thought leader in the crypto space. Our analysts publish insightful thought pieces regularly on research topics, including but not limited to the crypto ecosystem, blockchain technologies, and the latest market themes.



Jie Xuan Chua

Macro Researcher

Jie Xuan ("JX") is currently working for Binance as a Macro Researcher. Prior to joining Binance, he worked as a Global Investment Specialist with J.P. Morgan and had prior Equity Research experience at various fund houses. JX is a CFA charterholder. He has been involved in the cryptocurrency space since 2017.



Moulik Nagesh

Macro Researcher

Moulik is a Macro Researcher at Binance, and he has been involved in the cryptocurrency space since 2017. Prior to joining Binance, he had experience spanning cross-functional roles in Web3- and Silicon Valley-based tech companies. With a background in co-founding start-ups and a BSc in Economics from the London School of Economics & Political Science ("LSE"), Moulik brings a comprehensive perspective to the industry.



Shivam Sharma

Macro Researcher

Shivam is currently working for Binance as Macro Researcher. Prior to joining Binance, he worked as an Investment Banking Associate / Analyst at Bank of America on the Debt Capital Markets desk, specializing in European Financial Institutions. Shivam holds a BSc in Economics from the London School of Economics & Political Science (“LSE”) and has been involved in the cryptocurrency space since 2017.



Brian Chen

Macro Research Intern

Brian is currently working for Binance as a Macro Research intern. Prior to joining Binance, he worked as a DeFi researcher at a financial service startup and a Web3 education organization. He holds a Master of Finance degree from the University of California, Irvine (“UCI”) and has been involved in the cryptocurrency space since 2021.