

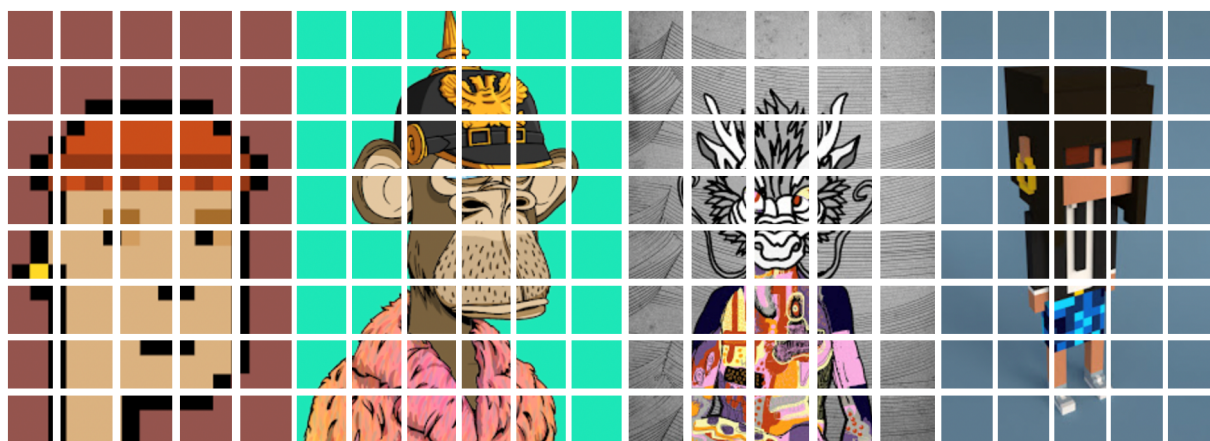
Fractionalized NFT

Disclosure: The content is strictly for your general information only. No part of the content that we provide constitutes financial advice, legal advice, or any other form of advice meant for your specific reliance for any purpose. Any use or reliance on our content is solely at your own risk and discretion.

Lucius Fang, Research Analyst

7 July 2021

As the name itself suggests, [Non-Fungible Tokens \(NFTs\)](#) are unique digital assets. Unfortunately, the uniqueness of each NFTs makes them hard to be exchanged with other assets and thus hard to be priced. Read on to learn more about the various attempts on fractionalizing NFTs to make NFTs more liquid.



FRACTIONALIZED NFT

What is NFT?

Non-Fungible Token (NFT) refers to **unique digital assets**.

Have you ever wondered why many of our essential documents such as Passport, Identity Card, and Birth Certificates are still written on paper rather than stored in a digital copy? This is because there was no way to prove the authenticity of a digital document. NFT solves that by making sure that each digital item is **provably unique**.

With this technology, NFT has given birth to a whole new digital asset class with categories such as art, sports cards, collectibles, gaming items, domain names, etc.

Why do we need fractionalized NFT?

NFT provides an alternative for digital artists to earn a living. Before this, digital arts may not have captured much value due to the ease of having digital copies. By making digital items provably scarce, a growing number of collectors have taken their interest into the digital space, bidding up the value of NFTs. Investors are eyeing this niche NFT space with interest, but it is not easy to have exposure to the growth of NFT.

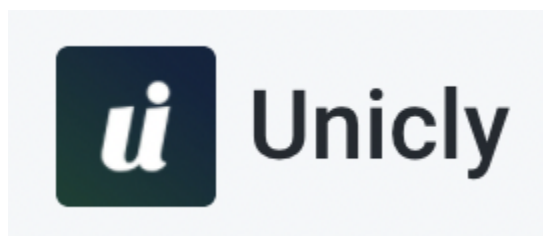
Like traditional art pieces, NFTs have the problem of not being liquid. Due to the lack of trading activities, it is hard to establish market prices. Without real-time price, it is challenging to integrate NFT as collateral for borrowing.

As such, NFT has a few drawbacks of becoming an attractive asset class:

- **Not liquid**, causing high slippage during buying and selling
- **Lack of market prices**, thus hard to value
- **Not a good collateral**, therefore low capital efficiency
- **Significant capital outlay** is required to obtain exposure to the highly-priced NFTs

Fractionalization aims to solve the problems by making NFT divisible, thus more tradable. Below we will look at four projects tackling the issue of fractionalizing NFTs - [Unicly](#), [Niftex](#), [NFTX](#), and [NFT20](#).

Unicly



Unicly is a relative newcomer in the NFT space.

Users can lock a collection of NFTs through Unicly to issue fungible share tokens called uTokens. uToken basically represents ownership of the NFT collection. uToken has governance rights over the collection, such as deciding which NFTs can be included in the collection. Unicly supports different types of NFTs, making the structure similar to an NFT fund.

To redeem an underlying NFT from the collection, first uToken holders will have to vote to unlock the collection. Interestingly, there is no way to bid for the entire collection - buyers have to bid on the underlying NFTs individually. Once the voting threshold is achieved, the collection will be unlocked, and the respective highest bidders can claim their NFTs. Then, the uToken holders can claim the ETH paid by the bidders.

Unicly has a governance token named UNIC. UNIC holders can lock UNIC to receive xUNIC that is eligible for the protocol's earnings.

uTokens can be traded inside [Unicswap](#) - its own Automated Market Maker (AMM) exchange. UnicSwap is a fork of [Uniswap V2](#). The swap fee is 0.3%, where 0.25% goes to the Liquidity Providers of uTokens. The remaining 0.05% of the fees are used to buy back UNIC tokens and subsequently distributed to xUNIC holders.

Name	Symbol	Price (USD)	Market Cap	Liquidity	Actions
1.  Jenny Met... 	uJENNY	\$1.745135	\$17,451,345	\$8,357,067	Bid Trade
2.  CryptoPun... 	uPUNK	\$0.07529	\$18,822,520	\$3,235,968	Bid Trade
3.  Hashmask 	uMASK	\$0.029456	\$2,945,610	\$1,299,806	Bid Trade
4.  Aavegotch... 	uGOTCHI	\$1.19744	\$1,197,440	\$1,162,576	Bid Trade
5.  Mystic Axies 	uAXIE	\$0.336487	\$3,364,872	\$1,033,407	Bid Trade
6.  Autoglyph 	uGLYPH	\$0.042333	\$4,233,295	\$923,125	Bid Trade
7.  Bored Ape... 	uAPE	\$0.002322	\$2,321,700	\$791,317	Bid Trade
8.  ArtBlocks 	uARTBLOCKS	\$0.016264	\$1,626,380	\$516,983	Bid Trade
9.  MoonCats 	uMOON	\$0.151044	\$1,510,443	\$440,162	Bid Trade
10.  The Beppl... 	uBEEPLE	\$0.037273	\$372,733	\$363,741	Bid Trade

Unicly currently has 44 collections, with projects such as Cryptopunks, Hashmask, Aavegotchi, and Axies. Launched on 7 April 2021, it has since managed to amass a Total Value Locked (TVL) of [\\$45 million](#).

Niftex



Niftex is one of the first fractionalized NFT projects. It was launched back in May 2020, way before the NFT hype.

Similar to Unicly, it allows users to mint fractionalized NFTs that can be called shards. It started off focusing on individual NFTs such as highly-priced [Axies](#) and [CryptoPunks](#).

But it also offers features that allow users to mint shards for a bundle of NFTs. The shard holders also have governance rights towards the underlying NFTs. For example, if the underlying NFT is a piece of land from Decentraland, the utility generated from the land, such as rent, can be distributed to the shard holders. Similar to Unicly, Niftex supports different types of NFTs inside a bundle.

Even though Niftex started by leveraging Uniswap v1, in the recent launch of Niftex v2, it has decided to utilize its own exchange to incorporate features such as royalties distribution. There are a few art NFT minting platforms that allow royalties to be distributed to the artist every time a trade is made. This is a novel idea that may significantly improve artists' earnings where traditionally, artists have only benefited from the primary sales of their creations.

With fractionalized NFTs though, since the NFTs are locked inside a smart contract, any sales of the shards will not trigger the royalties. Niftex pioneered a new feature called artist trade fee royalties, where a part of the trading fees will accrue to the artist.

Niftex introduced a buy-out clause for the fractionalized NFTs so that purchasers can buy the underlying NFTs even without collecting all the shards created. Let's look at an example to see how the buy-out works in practice.

Assuming there are 100 shards available for an NFT with a 10% minimum amount of shards required to trigger a buy-out. A buyer would like to buy the whole NFT for 100 ETH. To trigger the buy-out, the buyer will have to stake 10 shards and 90 ETH. To cancel the buy-out, shard holders will have to buy out the staked 10 shards with the quoted price, totaling 10 ETH. The system is designed to prevent spamming.

#	Name	Market Cap 	Liquidity 	Price 	ROI 	Total Supply 
1	 APE Punk NIFTEX Uniswap	\$975,762	\$162,536	\$97.58	182.54%	10,000 
2	 R64X.com NIFTEX Uniswap	\$557,069	\$154,115	\$87.04	341.06%	6,400 
3	 Antique Zombie Shards NIFTEX Uniswap	\$551,650	\$136,945	\$551.65	399.17%	1,000 
4	 Baddest Alpha Ape Bundle NIFTEX Uniswap	\$352,707	\$47,028	\$0.35	27.66%	1,000,000 
5	 Almace Shards NIFTEX Uniswap	\$341,925	\$23,209	\$34.19	333.15%	10,000 

According to DappRadar, Niftex currently has 25 different shards, with projects such as Cryptopunks, Axie Infinity, and Bored Ape Yacht Club. Niftex has managed to amass a TVL of [\\$3.7 million](#).

NFTX



Unlike Unicly and Niftex, NFTX does not support the sharding of individual NFT. NFTX focuses on creating funds for NFTs with similar value, thus helping to create a price floor for the NFT project.

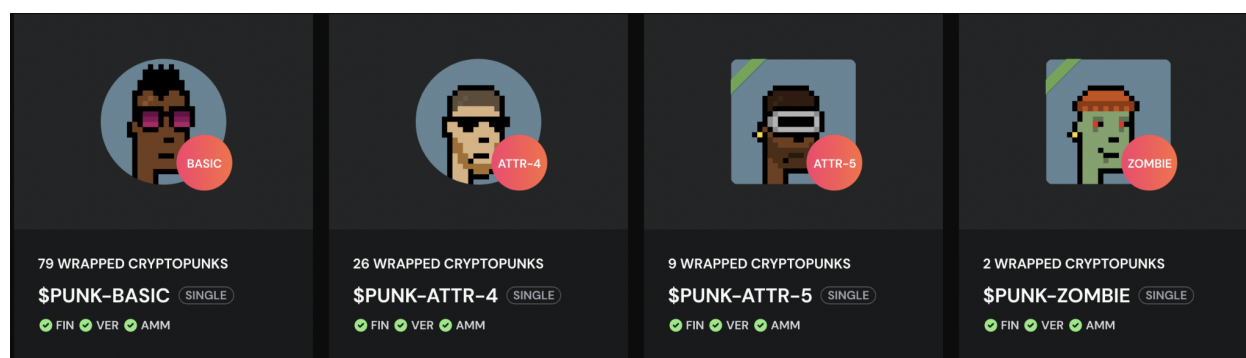
There are two types of funds in NFTX:

1. D1 funds

Every D1 fund token has a 1:1 backing against an NFT. For example, if a user owns 2 [PUNK-FEMALE](#), that means the user can redeem exactly two random female CryptoPunks at any moment.

2. D2 funds

Every D2 fund token is a Balancer pool Liquidity Provider (LP) token with exposure to several D1 funds' tokens. PUNK is a D2 fund that combines five different D1 CryptoPunks funds ([PUNK-ZOMBIE](#), [PUNK-FEMALE](#), [PUNK-BASIC](#), [PUNK-ATTR-4](#), and [PUNK-ATTR-5](#)).



The funds are basically constructed with users depositing their NFTs into the pool. The process is called minting. For example, users can deposit five CryptoPunks and receive 5 PUNK-BASIC

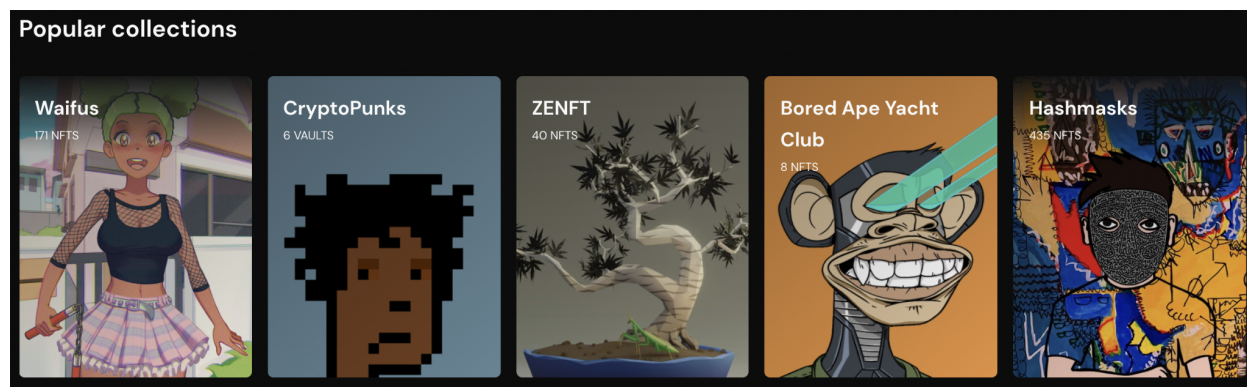
tokens in return. Users can redeem their NFT anytime but do note that the **NFT received will be randomized**. As such, users should not deposit high-value NFT or any NFT that they harbor sentimental value.

Every CryptoPunks has its own unique attributes. The rarity of certain attributes or the combination of them will dictate the price of the CryptoPunks. As such, NFTX has created five different funds to cater to the different price points.

The fund token itself is following the ERC-20 standard, and as such, it is fungible. Users can choose to provide liquidity in decentralized exchanges such as Sushiswap. The default token pair is with ETH. With huge enough liquidity, it helps create a price floor for the NFT while increasing its liquidity. It also allows the Liquidity Provider to earn trading fees.

For example, if Punk-Basic is worth \$40,000, it suggests that the price floor of every CryptoPunks is \$40,000.

Other features that the NFTX team expects to release in the future include NFT loans and randomized gift cards. There are currently no fees charged on NFTX. But in NFTX v2, the team plans to introduce minting fees and redeeming fees, with a premium for withdrawal of specific NFT from the fund.



As of June 2021, it supports up to 35 projects such as CryptoPunks, Hashmasks, Bored Ape Yacht Club, CryptoKitties, and Axie Infinity. It has managed to lock up 2,675 NFTs with a TVL of [\\$2.2 million](#).

NFT20



NFT20 is another NFT index fund provider with a governance token named [MUSE](#). Similar to NFTX, NFT20 funds only support similarly priced NFTs that come from the same project.

There are two ways of selling NFTs through NFT20:

1. **Normal minting:** Users can deposit their NFT into the project's respective pool and mint 100 NFT20 tokens. Five of them will be taken away as fees (5%) to the MUSE holders, while users will receive 95 NFT20 tokens.
2. **Dutch Auction:** For users that believe their NFTs are worth more than 100 NFT20 tokens, they can create a Dutch Auction to set their own price. A Dutch auction is a type of auction where the price is reduced until it is sold.

Currently, the Dutch Auction only serves as an intermediary to facilitate the sales of highly-priced NFT using NFT20 tokens. So the transaction only happens peer-to-peer, the NFT sold will not be included in the funds.

Unlike NFTX, NFT20 allows withdrawal by picking a specific NFT rather than a randomly chosen NFT. This allows greater ability to arbitrage. If any NFT collectors found NFTs in the pool that is worth more than 100 NFT20 tokens, they can immediately withdraw them by buying them with 100 NFT20 tokens.

As of June 2021, NFT20 supports 34 NFT projects with a liquidity of more than \$0 in Uniswap. It includes famous projects such as Hashmasks, Wrapped Moon Cats, and Gan Punks. It has managed to lock up 1 million NFTs with a Total Value Locked (TVL) of [\\$1.8 million](#).

	HASHMASKS	NFTS IN POOL: 151	\$MASK20 SUPPLY: 15100	TRADE \$MASK20: UNISWAP	LIQUIDITY: \$158193.74	FLOOR PRICE: \$548 (0.28ETH)
	WRAPPED MOON CATS	NFTS IN POOL: 559	\$MCAT20 SUPPLY: 55900	TRADE \$MCAT20: UNISWAP	LIQUIDITY: \$139913.94	FLOOR PRICE: \$318 (0.16ETH)
	AAH	NFTS IN POOL: 180	\$AAH SUPPLY: 189473580	TRADE \$AAH: UNISWAP	LIQUIDITY: \$131142.67	FLOOR PRICE: \$1451 (0.75ETH)
	ACCLIMATED MOONCATS	NFTS IN POOL: 108	\$CAT20 SUPPLY: 10800	TRADE \$CAT20: UNISWAP	LIQUIDITY: \$59525.51	FLOOR PRICE: \$320 (0.16ETH)
	GAN PUNKS	NFTS IN POOL: 484	\$GPUNKS20 SUPPLY: 48400	TRADE \$GPUNKS20: UNISWAP	LIQUIDITY: \$59514.00	FLOOR PRICE: \$63 (0.03ETH)

Following the ethos of decentralization, any NFT projects can create their own pool in NFT20.

NFT20 has launched several unique features to attract more users, such as a card game called [NFT Royal](#) and [flash loans of NFT](#). Recently, NFT20 was also launched on [Polygon](#).

Comparison between projects

22/6/2021	Unicly	NIFTEX	NFTX	NFT20
Total Value Locked (TVL)	\$45,000,000	\$3,704,605	\$2,260,211	\$1,800,000
Fractionalization Methods	Bundling	Bundling	Indexation	Indexation
No. of funds*	44	26	35	34
Layer 2 expansion	Polygon	No plan	No plan	Polygon
Exchanges	Own	Own	Sushiswap	Uniswap
Fractional tokens having governance rights	Yes	Yes	No	No
Buy-Out	Yes	Yes	No	No
Swap Fees	0.30%	0.3%-0.4%	0.30%	0.30%
Minting Fees	0%	0%**	0%	5%

* Only includes funds that have liquidity > \$0

** It is a 0% fee for a fixed-price sale (selling the shards at a fixed price for a period of 6 days). It is a 1% fee for self-issuance (issue all fractions to yourself and distribute them as you see fit.)

From the comparison, we can see that there are two ways to fractionalize NFTs:

- Bundling/Collection
- Indexation

Below we are going to explore the advantages and disadvantages of the two approaches.

Bundling/Collection (Used by Unicly and NIFTEX)

Bundling methods refer to the creation of funds that accept different NFTs. Then the fund will be tokenized where users can buy the fund tokens to get exposure to the underlying collection of NFTs.

Advantages:

- Supports fractionalization of individual NFTs.
- Small investors are able to get exposure to a diversified range of highly-priced NFTs.
- Token holders may have governance rights against the underlying assets. This allows the value maximization of NFTs that have utilities, such as income-generating NFTs (gaming lands).

Disadvantages:

- Hard to redeem the underlying NFTs. There are almost no ways to redeem the individual NFTs from the bundle. Require buying out the whole bundle to free the underlying assets.
- There is no price floor to refer to. Every single NFTs will have to be separately valued to come up with a valuation for the whole bundle.

Indexation (Used by NFTX and NFT20)

The indexation method aims to create a price floor by creating funds with similarly priced NFTs.

Advantages:

- Creating a price floor for the NFT series.
- Easy to redeem the underlying NFTs.

Disadvantages:

- Every fund only accepts the same series of NFTs.
- Does not differentiate between common and rare NFTs.

Looking at the TVL among the four projects, we can safely conclude that **the bundling method has managed to attract higher Asset Under Management (AUM)**. This is mainly because the bundling method is more flexible in allowing the inclusion of highly-priced NFTs.

Unicly currently commands the highest TVL, even though it was just launched three months ago. Part of its success is driven by its liquidity mining program that distributes UNIC tokens to the liquidity providers of uTokens. Another reason is the creation of [uJENNY](#) - the first Decentralized Autonomous Organization (DAO) built on Unicly. uJenny singlehandedly contributes almost 40% of Unicly's TVL. Jenny DAO's goal is to acquire valuable NFTs. In this sense it is behaving similarly to an NFT hedge fund.

There are already quite a few NFT DAOs popping out to pool capital to secure rare NFTs. Notable one includes [PleasrDAO](#), [FlamingoDAO](#), and the [Yield Guild Games](#). Investors can then obtain exposure to the DAO's NFTs by obtaining their governance tokens. Through this angle, we can view Unicly and NFTX as platforms that enable the creation of more NFT DAOs.

Even though the bundling method seems to have more adoption, this does not mean that the indexation method has failed. NFTX has approached multiple DeFi index providers to include their fund tokens into the NFT index. For example, PieDao has included two NFTX funds - PUNK-BASIC and [MASK](#) into their NFT index - [PLAY](#). The cross-collaboration with different DeFi players may prove to be key for future adoption.

Price floor as a metric has been heavily utilized by the NFT community to define the success of a particular NFT project. For example, the price floor of Bored Ape Yacht Club has surpassed that of The Meebits, and the [flipping was widely celebrated in the NFT community](#).

There is definitely value in having a price floor, as it can then be used to come up with a minimum valuation of the NFT project. However, if the majority of the value only accrues to the rarest of the NFTs, then the bundling method will be the one to capture the most of the value.

NFT Platform Token Valuation

22/6/2021	Unicly	NIFTEX	NFTX	NFT20
Total Value Locked (TVL)	\$45,000,000	\$3,704,605	\$2,260,211	\$1,800,000
Market Cap	\$12,160,587	N/A	\$16,027,495	\$8,251,696
Fully Diluted Valuation (FDV)	\$155,167,931	N/A	\$24,804,456	\$12,712,574
Market Cap/TVL	0.24	N/A	5.35	3.93
FDV/TVL	3.10	N/A	8.28	6.05

Looking at the projects' respective governance tokens, UNIC may be relatively undervalued. But the NFT market has considerably cooled down since the hype in Q1 2021. Plus, even with all these fractionalized attempts, NFT markets are still considered illiquid. The adoption rate is not satisfactory.

The main source of revenue for Unicy is the 0.05% fee collected from the trading volume. In the past month, the daily volume of UniSwap was hovering only around \$500k to \$1 mil.



Let's assume a daily average trading volume of \$750k. That would bring the yearly volume to roughly \$274mil. With a 0.05% fee, the revenue is only a meager \$137k. That said, the NFT market is still in its early days.

Notable mentions

-  [DAOFi](#)
 DaoFi released Fraction.art, a primary art marketplace that launches fractionalized NFT. After the primary sale, the NFT can be bought from the secondary marketplace facilitated by DaoFi.
-  [Fractional](#)
 Fractional will allow users to mint fractionalized NFTs. Currently, the product is still in beta mode. You can try out the testnet version on their website.

Conclusion

NFT received unprecedented attention in Q1 2021, with eye-popping sales such as the [\\$69 million](#) Beeple art piece. There were no great ways to have exposure to these highly-priced NFTs. Fractionalized NFTs aim to democratize the NFT market and allow retail traders to have exposure to the upside of these NFTs.

Fractionalized NFT market is still in its nascent stage, but it holds immense potential to upend the market for illiquid asset classes. The real estate market alone is expected to grow to [\\$2.8 trillion](#) in 2021. The art market is another one that has been waiting for disruption, clocking [\\$50 billion](#) in sales during 2020. There are already a few crypto projects that tackle the issues, such as [RealT](#).

The adoption of fractionalized NFTs is still fairly lackluster, with the total TVL of the top four players below \$100 million while we see DeFi protocols easily attain that number. NFT as an asset class still has a long way to prove its profitability and sustainability. But with the rise of digital natives and growing demand for alternative investments, fractionalized NFT may emerge as the investment dark horse for the next decade.

References

<https://cointelegraph.com/news/going-to-pieces-fractionalized-nft-projects-gather-steam>

<https://decrypt.co/66046/the-next-big-thing-in-nfts-breaking-them-apart>