



Fantasy or the Future?

An Investment Perspective on the Metaverse

L Catterton Consumer Insights

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Introduction

“Metaverse” is *the* buzzword in the last quarter of 2021. Following Facebook’s announcement on 28 October that it is rebranding itself Meta, the number of times “metaverse” was Googled surged 25x in two weeks¹. Since then, media and technology behemoths such as Disney, Microsoft, and Nvidia have announced their own metaverse ambitions². Consumer brands from Louis Vuitton and Balenciaga to adidas and Pepsi have also joined in to launch purely digital collectibles in the form of non-fungible tokens (“NFTs”)³.

Global capital markets have likewise witnessed this fervor. Online gaming platform Roblox saw its valuation soar to \$7.1 billion in December 2021, up from \$3.8 billion at the time of its direct listing on the New York Stock Exchange nine months before. In Asia, metaverse-themed exchange-traded funds listed by leading South Korean asset managers grew 27% on average during their first month of trading⁴.

What is behind this explosion of interest in the metaverse? Is it here to stay or will it be another short-lived, over-hyped fad? And even if the concept has real traction, are the businesses venturing into the space commercially viable?

To explore where the path leads, we begin by asking one fundamental question – Is there truly demand for the metaverse?

Demystifying the Buzzword – the What and the Why

The metaverse is an elusive concept. Having been used rather loosely, the word has attained a spectrum of meanings. Popular understanding of the metaverse stems from futuristic worlds depicted in stories such as *Ready Player One* and *Snow Crash*, where protagonists traverse between physical and digital worlds by donning virtual reality (“VR”) or augmented reality (“AR”) devices. Visionary entrepreneurs and excited investors talk about the metaverse as a more evolved form of the internet, a revolutionary infrastructure to power a new generation of applications. Cryptocurrency enthusiasts envision the metaverse as a decentralized promised land where everything runs on the blockchain with full authenticity and interoperability.

The myriad interpretations reflect the multifaceted nature of the metaverse. Simultaneously, the idea holds promises for all the above, and more – a place for socializing and self-expression, an immersive

¹ <https://trends.google.com/trends/explore?geo=US&q=metaverse>

² <https://www.barrons.com/articles/disney-intel-cisco-stocks-metaverse-51637781245>

³ <https://www.glossy.co/fashion/how-fashion-brands-are-navigating-nfts-and-whats-next-for-the-metaverse/>

⁴ <https://forkast.news/metaverse-etfs-south-korea-returns-investors/>

virtual environment offering elevated experiences, a next-generation marketplace where virtual tokens can have astronomical values in the real world. The seemingly infinite possibilities are at the very heart of the intrigue.

Perhaps the more pertinent question then is not “what is the metaverse?”, but rather, “why the metaverse?” Is there a need for it? Can it better fulfill human desires than alternatives?

Use cases for the metaverse matter deeply to us, because as investors, we believe that the fate of any consumer product or service can only be written by its core consumers and be determined by their true needs. We recognize though that human desires are malleable; and like Steve Jobs famously opined, “people don’t know what they want until you show it to them”⁵. Nevertheless, even in these early days, sufficient metaverse (or at least metaverse-esque) communities seem to have emerged to signal the potential of the concept.

As such, we now turn to look at the various ways in which businesses and consumers have stepped into the metaverse. Early signs of consumer engagement and feedback about the burgeoning metaverse applications serve to inform our view of just how promising and real the concept could become in the future.

The Bottom Line: Humans Seek Enhanced Experiences and Circumstances

A common thread that runs through existing use cases for the metaverse seems to be the eternal human pursuit of enhanced experiences and circumstances. To some, the metaverse is a place where they shed or transcend real world inhibitions. To others, it offers a fantastical escape from the banality of everyday life. To yet others, it is a space to unleash one’s potential, create new worlds and rewrite their rules to one’s fancy.

Virtual Avatars Make Socializing Easier and More Interesting

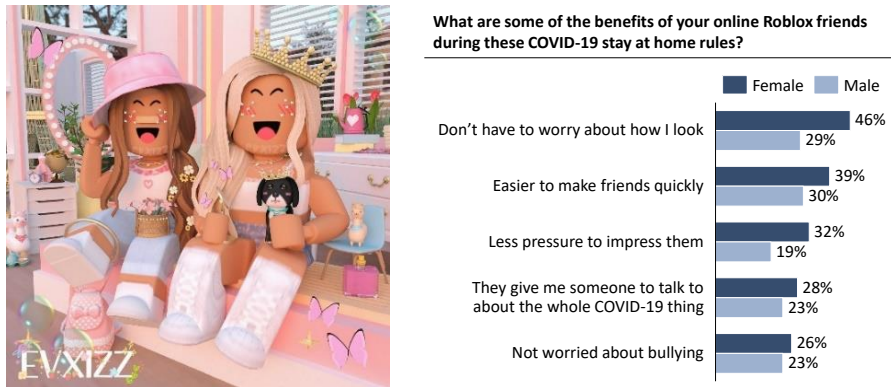
Leveraging technology to enhance socialization has long been a part of the human experience. Technology has not only enabled humans to connect with unprecedented efficiency and convenience, it has also made certain social settings less daunting, especially for the introverted.

Roblox, for example, provides a place where people can meet each other as Lego-like avatars. The platform has proven to be particularly appealing to teenagers who may feel insecure about their

⁵ <https://www.goodreads.com/quotes/988332-some-people-say-give-the-customers-what-they-want-but>

physical appearances. Of its approximately 40 million daily active users, an astounding two-thirds are under the age of 16. Notably, 46% of female users and 29% of male users say that a key benefit of socializing on Roblox is not needing to worry about how they look⁶.

Figure: Selfie taken in Roblox and survey on the benefits of Roblox friendship



Some avatars are also becoming more expressive and life-like on the back of technological advances in areas such as AI-enabled facial recognition and 3D rendering. Take Genies, an L Catterton investment, as an example: the platform allows users to create a “Fantasy Version of You”⁷ – 3D avatars that are more vivid and customizable than previously possible with platforms such as Bitmoji. Having already produced avatars for iconic celebrities including Justin Bieber, Cardi B, and Rihanna, Genies has attracted the attention of Warner Music Group, Universal Music Group (“UMG”), and Coinbase, partnering with these companies to create more virtual avatars for artists and launch digital wearable NFTs. The vision, according to UMG, is for artists to “engage with fans in expressive and authentic ways... across the metaverse”⁸.

Figure: Virtual avatars and items created with Genies



⁶ Roblox user survey

⁷ <https://genies.com/>

⁸ <https://www.universalmusic.com/universal-music-group-and-genies-announce-global-partnership-to-develop-avatars-and-digital-wearable-nfts-for-the-companys-iconic-roster-of-artists/>

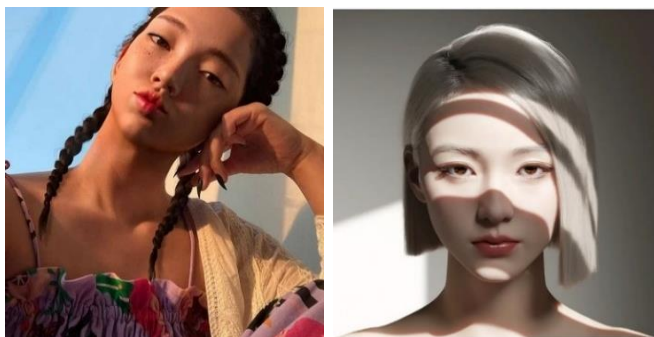
In Asia, the trend of avatar creation is also picking up pace. South Korean player Zepeto, for example, allows users to create highly customizable and personalized 3D avatars using similar technologies as Genies'. The experience is further enriched by cross-over collaborations with brands and celebrities, as well as a host of valuable intellectual properties in its ecosystem. Having strategically onboarded K-pop sensations like Blackpink and BTS, leveraging their influence to attract over 2 million daily active users, Zepeto is now likely "the world's largest virtual fashion marketplace", with around 1.5 billion fashion items on sale, most of which are user-created⁹. The platform, which is owned by South Korean conglomerate NAVER, became the first virtual avatar unicorn in Asia after receiving \$150 million of funding from Softbank in November 2021.

Figure: Zepeto, featuring Gucci and Blackpink



Taking digital engagement to yet another level, some enterprises have created virtual influencers such as Rozy in South Korea and Ayayi in China. Unlike human influencers, these digital personas live only on platforms like Instagram and Tiktok, but their presence is so life-like that followers are mesmerized by their seemingly real existence. With actions that can be completely choreographed, these virtual influencers are considered by their creators and patrons to be less prone to behavioral risks like the social faux pas that have jeopardized the reputations of many celebrities and the brands they endorse in recent years.

Figure: Virtual influencers Rozy (South Korea) and Ayayi (China)



⁹ <https://www.wsj.com/articles/softbank-bets-on-asian-metaverse-platform-selling-digital-gucci-dior-11638270000>

Looking forward, we are optimistic about the future of 3D avatar platforms in Asia due to three main reasons. (1) Offerings are likely to become more compelling as the quality of avatars improves, enabled by cutting-edge technology. (2) They have the potential to reach large pools of users by leveraging existing crowd-pullers like celebrities and trendy digital wearables, and by partnering with dominant social media platforms to realize network effects. (3) There are growing proof points that a sizable market for digital wearables, driven by a vibrant creator community, will further fuel the commercialization of avatars.

Virtual Worlds Provide Immersive, Transporting Experiences

Having some semblance of realness in virtual worlds is critical to some visitors, even as they temporarily depart from the physical one. Allowing users the option to freely explore their digital environments and presenting them with convincing life-like stimuli both help to create the deep immersion that some desire.

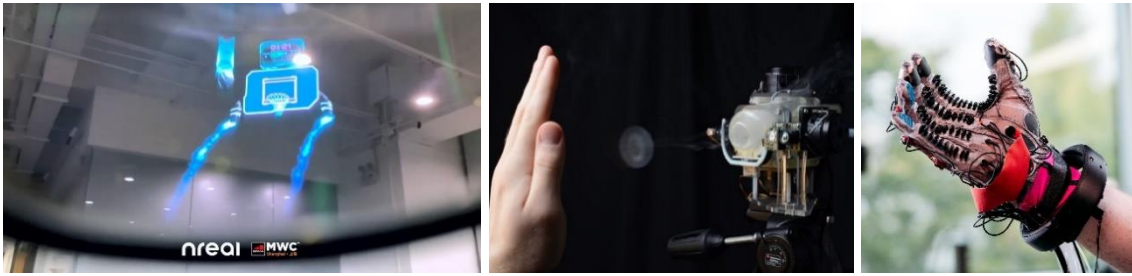
Video game developers have sought for some time now to enrich and expand virtual experiences by offering players the freedom of choice to interact with in-game worlds. Open-world games such as Rockstar's *Grand Theft Auto* and *Red Dead Redemption*, as well as CD Projekt's *Cyberpunk 2077* and *The Witcher* all allow players to explore and progress through the game without needing to follow a predetermined storyline with a linear sequence of events.

More recently, innovators have begun developing mixed reality ("MR") devices to further blur the line between physical and digital experiences. China's nreal is one such business. Its MR glasses project virtual objects in real 3D spaces and let users interact with these objectives using hand motions. For example, one can throw virtual basketballs into a virtual hoop that appears mounted on a wall in one's bedroom. The startup, founded by Chi Xu, a former engineer at leading AR company Magic Leap, launched consumer-grade products in 2020, and now sells them in markets spanning Asia, Europe, and the US. In September this year, nreal closed a \$100 million Series C fundraising round to fund further international expansion¹⁰.

Seizing the same opportunity, others are developing technologies that provide tactile sensations to accompany virtual experiences. Disney's "Aireal" technology, for example, generates an air vortex to simulate sensations as fine as the flaps of butterfly wings. Meta is working on haptic gloves that use inflatable air pockets to make users believe they are touching or grasping an object. The technology, if fruitful, may even be scaled for use in full body suits in the future.

¹⁰ Jingdata

Figure: nreal’s MR glasses, Disney’s “Aireal”, and Meta’s haptic gloves

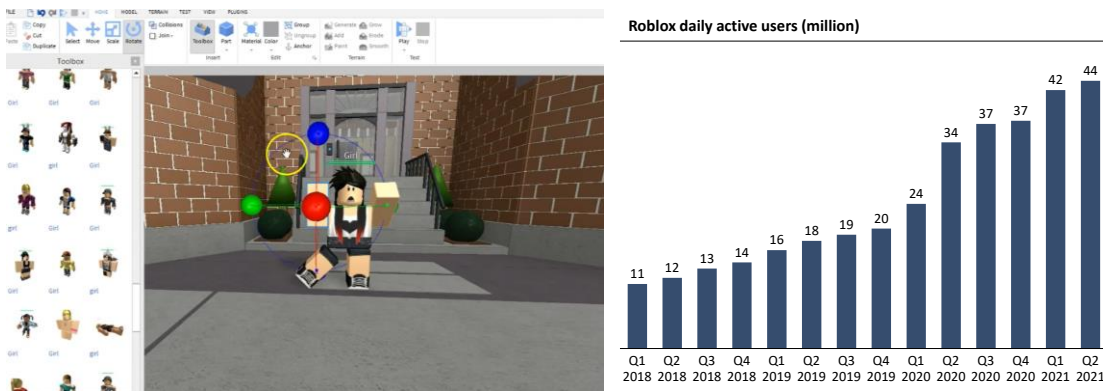


The march towards increasingly immersive experiences looks set to continue and accelerate. Industry insiders are already envisioning experiences so engrossing that people can be transported into new realities indistinguishable from the physical world. For most of us, this experience may be years away – perhaps computer chips implanted into human brains will help. In the near term, the key to winning the battle will lie in which technology could deliver the most believable user experience and reach monetization at scale the soonest.

Virtual Worlds Enable Some Consumers to Monetize Their Hobbies and Skills

As virtual worlds increasingly converge with the physical one, some are realizing that their digital creations can generate real income – potentially an astonishing amount. With the easy-to-use interface that some platforms provide, even amateurs without programming backgrounds can create valuable virtual goods and worlds if they can generate user engagement. Case in point, Roblox paid out around \$250 million to its pool of mostly young adult developers in 2020¹¹, with top individuals earning more than \$2 million a year¹².

Figure: Roblox developer interface and daily active users¹³



¹¹ <https://www.businessofapps.com/data/roblox-statistics/>

¹² <https://www.wired.com/story/on-roblox-kids-learn-its-hard-to-earn-money-making-games/>

¹³ <https://backlinko.com/roblox-users>

Inspired by Roblox's success, a group of ex-Unity veterans in China established user-generated content platform Yahaha in 2020. Owing to its founders' backgrounds, the company has managed to differentiate itself from Roblox by offering an advanced Unity-powered 3D engine that creates more sophisticated visuals, and by catering more to adult developers and gamers. Ahead of its product launch in Q4 2021, the startup already received three rounds of funding from investors including Hillhouse, BAI, Bilibili and Coatue.

Figure: Yahaha developer interface and gameplay demo



Aside from generating income through virtual world-building, players and businesses are also capitalizing on the NFT boom for monetization. Importantly, the value of any given NFT is determined by its scarcity and its community of endorsers – the scarcer the token, and the more strongly it embodies the aesthetic preferences of its community, the more valuable it becomes. In this regard, virtual tokens are priced in the same way real goods are. This simple supply-demand mechanism also explains the stunning \$2.9 million price tags on Jack Dorsey's first tweet and on the most sought-after Bored Ape¹⁴.

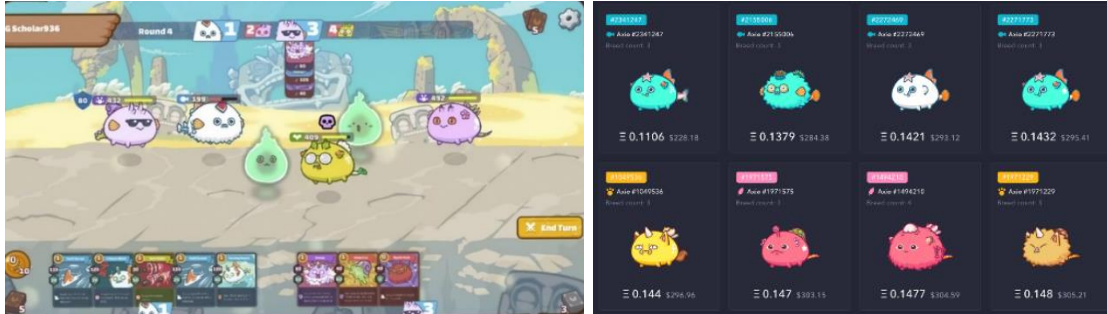
Southeast Asia has become a hotbed for NFT monetization. Vietnamese studio Sky Mavis' Axie Infinity, one of the top NFT-based games, provides users with the opportunity to earn tokens worth roughly \$6 a day¹⁵ by raising cute, Pokémon-like "Axies" and battling them against others. The so-called "play-to-earn" mechanism works in two ways. (1) Players are rewarded with "Smooth Love Potion" tokens when they complete daily in-game tasks. These tokens can then be exchanged for real world money; the precise value depends on market demand for the tokens. (2) "Axies" are also tradable as NFTs that can fetch as much as 300 ETH each¹⁶.

¹⁴ <https://www.bbc.com/news/business-56492358>; <https://www.nftstreet.com/top-10-most-expensive-bored-ape-yacht-club-nfts/>

¹⁵ The tokens for payment are issued by the game, and their price fluctuates with market demand

¹⁶ 1 ETH = \$3,952 as of 20 December 2021 from Coingecko

Figure: Axie Infinity gameplay and marketplace



Despite not having cutting-edge visuals, Axie Infinity has excited the market with the disruptive concepts it stands for – monetization and interoperability. Its success foreshadows a future where a trove of virtual assets can be tradable as NFTs, freely traverse platforms and be exchanged for money in the real world. The game now boasts of 1.5 million daily active users¹⁷ and its token “AXS” has reached a staggering \$26 billion valuation, eclipsing that of other NFT games such as Sandbox (\$15 billion) and Decentraland (\$7 billion)¹⁸.

Furthermore, a startup ecosystem around NFT-based games has also sprouted in the region. The Philippines’ Yield Guild Games (“YGG”) helps aspiring players of such games pay for the initial NFTs to start their gaming journey (three Axies or \$500 – 1,000), provides training along the way, and charges a fraction of the players’ income in return. Now the largest gaming guild, YGG has attracted 45,000 gamers from around the world¹⁹ and trades at a \$5.2 billion valuation²⁰. Meanwhile, Enjin, a Singapore-based platform that provides NFT users with a NFT wallet, marketplace, and developer tools, has raised \$62 million via private rounds as well as initial coin offerings, and now has a valuation of \$2.4 billion²¹.

We believe that the metaverse will become more attractive to users as it increasingly offers clear economic benefits in addition to the freedom to play with alternative identities and elevated experiences. We are therefore excited about projects that can become the building blocks of the future economic system in the metaverse. These could include low-code game-world programming platforms, NFT-focused blockchain infrastructure, and NFT asset management tools, among others.

¹⁷ <https://activeplayer.io/axie-infinity/> as of 20 December 2021

¹⁸ Fully-diluted valuation as of 20 December 2021 from Coingecko

¹⁹ <https://www.noypigeeks.com/gaming/axie-infinity-guide-philippines/>

²⁰ Fully-diluted valuation as of 20 December 2021 from Coingecko

²¹ Fundraising data from Crunchbase; valuation data from Coingecko as of 23 November 2021

Conclusion

We believe the metaverse is more than just a far-fetched fantasy. A real future for the metaverse and its nebulous ecosystem is in the cards, so long as the businesses that take part address true consumer needs in commercially viable ways. We have seen signs of both being possible through surveying early examples. Making socializing easier and more interesting via the use of avatars, offering immersive, transporting experiences through novel storytelling and new technologies, and providing alternative means of making a living as virtual and physical economies converge have all proven appealing to consumers. And these are just the beginning.

Although the metaverse may take years to evolve towards its full potential, we anticipate that consumer adoption will rise as technological advances usher in more compelling offerings. Meanwhile, communities and commercial ecosystems will continue to be built not only in the metaverse, but also spill into the real world with increasing interoperability. These trends illuminate actionable opportunities today, for consumer investors and brands alike.

For consumer brands that aspire to be at the forefront of this movement, virtual avatars present a relatively accessible entry point into the metaverse. Brands like Louis Vuitton, Guerlain, and Givenchy have already taken the lead in experimenting with virtual influencers as the fresh, new faces to tell their stories in China²². Numerous examples also indicate that releasing limited edition NFTs could be an effective way to capture consumers' rising enthusiasm for digital possessions. Regardless of businesses' specific form of involvement, because consumers – especially the young, digitally native ones – will likely embrace the metaverse to greater degrees as time goes on, owning a presence in that environment will become increasingly essential for brand relevance.

As we imagine the future of the metaverse, we also see signs that Asia, with its many emerging ideas and communities, could become a hub for the next generation of metaverse creations. With a high level of digital fluency in developed markets and deepening digital penetration in emerging ones, the region is ready to venture further into the metaverse.

²² <https://weibo.com/ttarticle/p/show?id=2309404670759149895787&sudaref=www.google.com>

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