# Openverse Network

Layer0 infrastructure that enables blockchain interconnection and interoperability

The combination of Bitgold and Bitcoin will truly realize the peer-to-peer currency theory of Bitcoin.

Openverse introduction

- Openverse is a Layer0 hub network based on blockchain technology. It is based on the existing blockchain technology and proposes the concept of "fully open protocol cross-chain". It will realize "the transmission of value (token/NFT/message) between different blockchains, metaverses and the traditional Internet is as simple as sending email".

- Openverse has innovatively proposed protocol systems such as the "Bitcurrency VRC10 Protocol", "Privcurrency VRC110 Protocol", and "Public Currency Issurance Mechanism, PCIM". Based on the support of these protocols, Openverse will add important sub markets such as the issuance, trading, and payment of Bitcurrencies to the existing EVM public chain, promoting the universalization of Web3.

- The earliest idea behind the Openverse project came from Dr In 2014, Bright wrote "The Public Currency Issuance System", which innovatively proposed the public competition issuance mechanism of Bitcurrency, Bitsecurity, and currency. With the development of blockchain and Web3 technology, these ideas and designs are being put into practice in the main network and ecology of Openverse - we hope that Openverse will become the pioneer of value Internet. The combination of Bitgold and Bitcoin will truly realize the peer-to-peer currency theory of Bitcoin.

- In order to protect the environment and reduce energy consumption, Openverse Network does not use POW consensus mechanism but instead uses DPOS consensus. Up to 100 authentication nodes and standby access nodes will provide value Internet root servers globally. According to the Openverse public chain's Bitgold allocation plan, creators and technical teams, civilian teams and institutions, and various sovereign countries will all become the owners of these root servers. Among them, sovereign countries can have 40 verification nodes, which will make the entire value Internet subject to the supervision and management of the national government, with the weight reaching 40%.

- Openverse is also a widely open and continuously expanding interconnected metaverse and blockchain infrastructure built for a decentralized future.

- Openverse is not positioned as a competitor to Ethereum, it will embrace Ethereum. Some projects, such as Bridge, allow you to bring ETH and ERC20 tokens to the Openverse network and send Openverse IBC tokens to the Ethereum ecosystem. Other Openverse projects include introducing Ethereum virtual machines into Openverse's Ethermint and reducing the cost of using dApps for decentralized financial (DeFi) applications.

- At Openverse, we build the "Metaverse Center" with the concept of "value as the core, unified standards, and complete openness". Please join our growing network and access the most powerful metaverse infrastructure.

Industry Frameworks
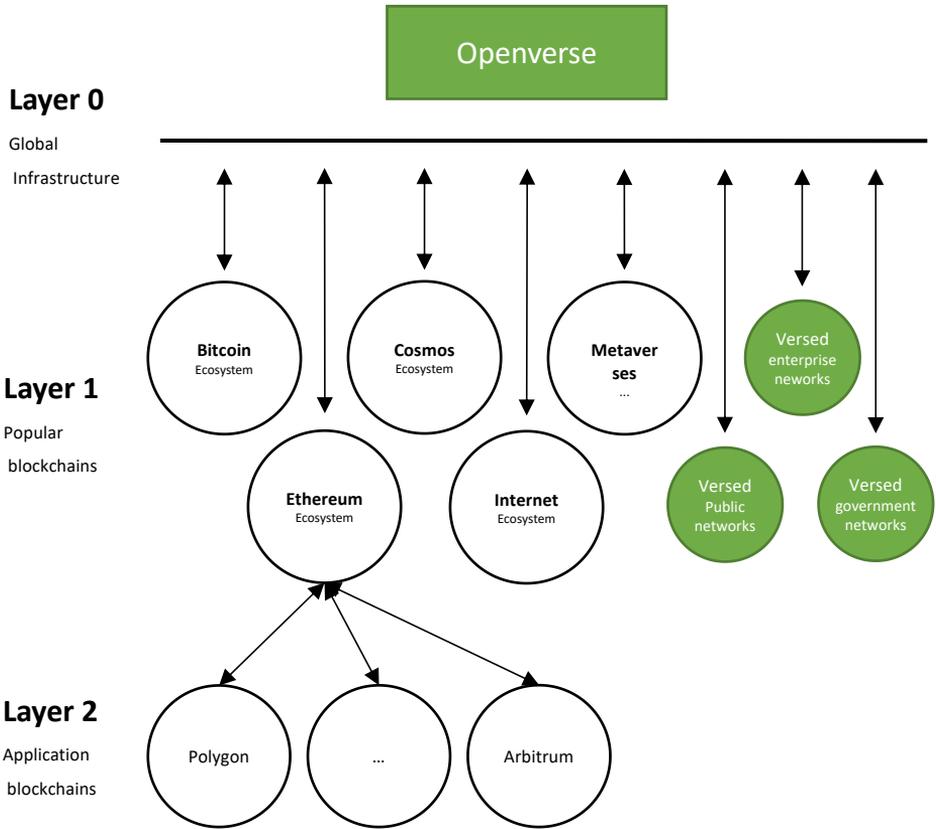
Consensus mechanism

Main network DPOS validator nodes growth plan

Validator nodes distribution

Testnet lauched: June 18, 2023

Mainnet Schedule: March, 2024

Consensus Algorithm: Tendermint Byzantine Fault Tolerance

Consensus mechanism: DPOS
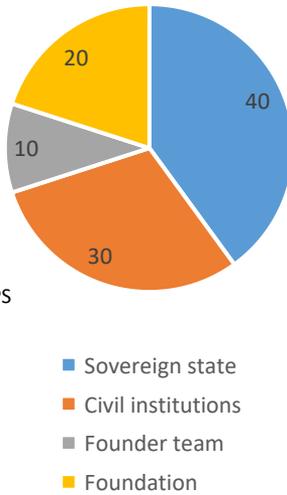
Block cycle: 0.5 seconds

Main network performance: 100K+TPS

Scalable performance: unlimited access, heterogeneous, unlimited TPS

validator nodes: 100+

Native coin: Bitgold, 200 million

40
30
10
20

- Sovereign state
- Civil institutions
- Founder team
- Foundation

- In order to excavate a relatively balanced number of Bitgold, in addition to technology and foundation nodes, private nodes are mainly used, and the total amount of pledge determines the upper limit of the total amount of pledge for the other three parties. If there are no sovereign state nodes, the vacancy will be ignored.

- The pledge of the foundation and founding team serves as a permanent backup security to initiate the node.

- It is expected that the Energy community will launch a plan to dig BTG across the entire network when more than half of the gifts are given, early in Q1 2024.

Main network technical characteristics

UNIVERSE NAME SERVICE, UNS

Just like websites have domain names, metaverses and blockchains will have names. These names will be managed on the openverse network, which will operate a Universe Name Service. They will make it much easier for users of the Interchain to identify the metaverses and blockchains they want to interact with.

IBC

IBC is an interoperability protocol for communicating arbitrary data between arbitrary state machines.
The protocol consists of two distinct layers: the transport layer (TAO) which provides the necessary infrastructure to establish secure connections and authenticate data packets between chains, and the application layer, which defines exactly how these data packets should be packaged and interpreted by the sending and receiving chains.
The IBC application layer can be used to build a wide range of cross-chain applications, including but not limited to token transfers, interchain accounts (delegate calls between two chains), non-fungible token transfers and oracle data feeds.

Universe Identification（UID）

Universal Identification (UID) is the account standard for IBC enabled worlds. Essentially, they allow the metaverse to securely control accounts on other metauniverses through IBC. With this feature, users will be able to access the entire Interchain through their individual openverse account. A UID for all chains.

Fully compatible with EVM

Since the launch of Ethereum in 2015, the ability to control digital assets through smart contracts has attracted a large number of developers to build decentralized applications on Ethereum virtual machines (EVMs). The community is continuously creating a wide range of tools and introducing standards, which further enhances the adoption rate of EVM compatible technologies.
Whether you are building new use cases on the Openverse network or porting existing dApps from another EVM based chain (such as Ethereum), you can easily build and deploy EVM smart contracts on Openverse to implement the core business logic of dApps. Openverse is fully compatible with EVM, allowing you to use the same tools (Solidity, Remix, Oracles, etc.) and APIs (i.e. Ethereum JSON-RPC) available on EVM.
Openverse enables you to build scalable cross chain applications in a familiar EVM environment. The following are the basic components for building and deploying EVM smart contracts on Evmos.

Economic framework
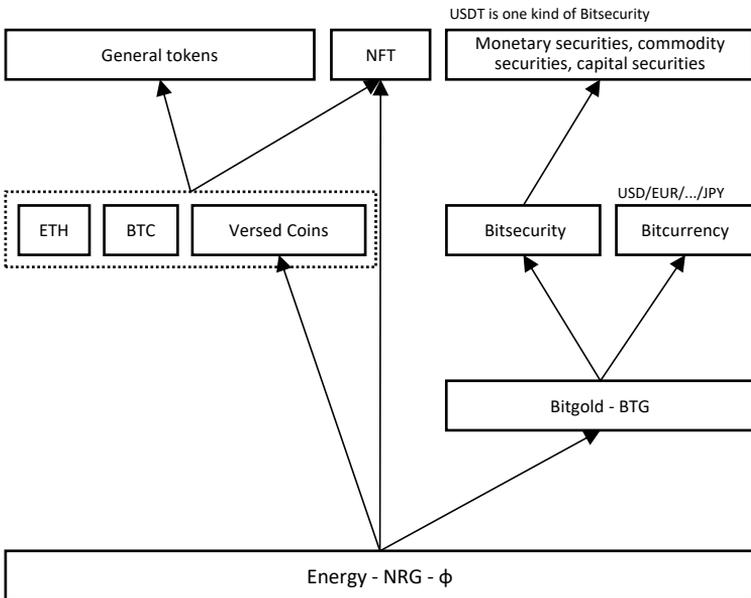
Versed coins: Refers to heterogeneous networks connected to the Openverse 4.0 network, where Energy can be used as the security layer and GAS fee.

Interpretation of Economic Framework

Unlike other blockchain networks, Openverse separates the governance main currency from the asset main currency, resulting in a hierarchical asset structure as follows:

BitGold (metaphorically referred to as real estate):

• Bitgold serves as the primary currency for global governance, primarily responsible for trading GAS fees, verifying the collateral of nodes in the main network to ensure network security, providing security verification for heterogeneous network access to the main network, and also serving as a voting power for network development. At the same time, it also serves as the global asset master currency, which can be used as collateral to produce Bitcoin, currency securities, universal tokens, spatiotemporal tokens, etc., serving as the underlying layer of these digital assets. It is similar to real estate built on land and can be borrowed from banks; Similar to ancient gold standard assets.

BitCurrency (similar to money):

• Bitcurrency is a category consisting of over 200 global Bitcurrencies, including USD/EUR/JPY/GBP. In the Openverse ecosystem, we refer to it as a "constant currency" that is positioned similarly to fiat currency. Bitcurrency is minted by mortgaging Bitgold onto the chain, and everyone can participate in this minting activity and use it as fiat currency in daily life.

BitSecurity (similar to securities):

• Bitsecurity is also a category where various banks, securities institutions, and enterprises can issue corresponding Bitsecurity by mortgaging Bitgold as collateral, which will be managed by national institutions. Bitsecurity includes stock securities, currency securities, etc.

General tokens (similar to points):

• Tokens, also known as XRC20 tokens, have a wide range of uses and can replace any digital asset with divisible value.

NFT (similar to digital certificates):

• It is an inseparable value chain and can be simply understood as a digital certificate that can be widely used in fields such as copyright and real estate.

Bitgold - Native coin

Bitgold is the native coin of the Openverse network, used to protect valuable inter chain services in the network. If you hold BTGs, you can use a mechanism called staking to temporarily lock them and contribute to the security of the Openverse network. With the arrival of Openverse's next-generation network, Bitgold will become the universal GAS cost and governance main currency to ensure the security of all networks. More importantly, starting around 2024Q1, mining will generate more Bitgold by pledging to validator nodes. The validator will simultaneously receive a portion of the transaction fees charged by the blockchain.

At the same time, it also serves as the main currency of global assets, and its role is to produce Bitcoin, currency securities, universal tokens, spatiotemporal tokens, etc. by pledging Bitgold, serving as the underlying layer of these digital assets. It is similar to a property built on land and can be borrowed from a bank; Similar to the gold standard assets of early currencies.

In order to protect the environment, Openverse adopts the consensus mechanism of DPOS, avoiding power loss in POW blockchain networks and allowing everyone to participate in network mining.

Bitgold effect:

- Becoming a underlying asset: By pledging Bitgold, currency securities, universal tokens, and spatiotemporal tokens can be produced as value endorsements;

- Exchange medium: All assets can generate decentralized transaction pairs with Bitgold, achieving an unrestricted universal deposit and exchange system;

- Credit protection: With the increase of assets in the system, having a Bitgold account will also increase the credit value;

Bitgold - distribution

Bitgold total supply

According to 2023 data provided by the World Gold Council, 208874 tons of gold have been mined globally since human civilization[https://www.gold.org/about-gold/gold-supply/gold-mining/how-much-gold](208874000 kilograms, an increase of approximately 3000 tons per year). From a mathematical perspective, we have taken a number of the same size and set the total number of BTGs issued to 200 million, which is constant. All developers should prioritize the movement of decimal points and never consider changes in numerical values.

Bitgold DPOS Rewards

BTG holders who participate in DPOS pledge protection for inter chain security will receive BTG rewards. The total production limit of DPOS is 100 million BTGs, gradually decreasing.

Bitgold distribution(M)

■ Civil institutions ■ Founder team
■ Foundation ■ Sovereign state
■ Staking reward
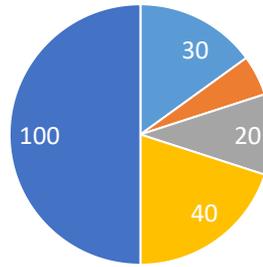
10 million: founding team, with a linear release of 20 years after the main network is launched for 10 years;

20 million: Utopia Foundation, released linearly over 20 years after 10 years of main network launch;

30 million: Private institutions, including capital, media, and ordinary individuals, IDO will be immediately released;

40 million: Sovereign state reserves, with each sovereign state holding 1 million, to be released immediately upon accession;

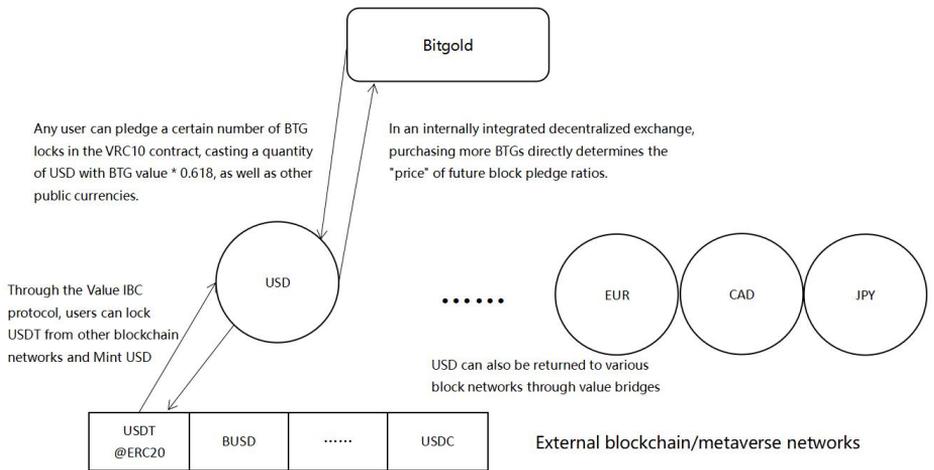100 million: Long term pledge income for approximately 30 years.

Bitcurrency

- **What is bitcurrency**
  - **Bitcurrency**, also known as cryptocurrency/Constant Currency, is a public asset that is competitively issued by the public through the mortgage of Bitcurrency. In order to facilitate naming with Ethereums ERC-20 as a reference, we named the Bitcurrency standard "VRC-10". Bitcurrency is a completely decentralized issuance of digital assets running on the main openverse network. Bitcurrency is a digital asset with constant value, known as constant currency. Compared to stable currency, it is another form of legal currency, not a competitor. Therefore, when naming and designating, the corresponding legal currency name is directly referenced. Currently, there is no such currency in the world. Although it looks similar, it is actually a completely different example, such as USDT (which is a product of centralized issuance by Tether Company, and we believe it will cause a minor disaster). It is a competitor to USD on the openverse network rather than a homogeneous product. We very much hope that everyone can reach a consensus: Bitcurrency is the issuance of sovereign legal currencies in the openverse square ecosystem, and it is M0 (M0 refers to cash in circulation, which is the sum of cash on hand in various units outside the banking system and cash held by residents, the narrowest sense of currency).

- **Bitcurrency issuance mechanism**
  - After analyzing the shortcomings of the gold standard and the central bank's legal currency issuance mechanism, as well as studying works such as "Denationalization of Money", the openverse network proposed a new idea using blockchain technology, "Bitcurrency Issuance Solution - Public Currency Issuance mechanism, PCIM.".
  - PCIM is a monetary issuance system that issues bitcurrency through mortgage based assets such as Bitgold and the participation of the entire population. We can also call it the "New Gold Standard System".
  - PCIM allows participants to have the power to mint bitcurrency, which can be used in commercial and economic life just as legal currencies are used in daily life. At the same time, participants still have the value-added space of Bitgold, as in the above analogy, mortgagers still have the value-added return of real estate.
  - Please refer to the white paper and relevant papers by Dr. Guangming for details.

PUBLIC CURRENCY ISSUANCE MECHANISM

Bitgold

Any user can pledge a certain number of BTG locks in the VRC10 contract, casting a quantity of USD with BTG value * 0.618, as well as other public currencies.

In an internally integrated decentralized exchange, purchasing more BTGs directly determines the "price" of future block pledge ratios.

USD

Through the Value IBC protocol, users can lock USDT from other blockchain networks and Mint USD

EUR

CAD

JPY

USD can also be returned to various block networks through value bridges

USDT @ERC20	BUSD	......	USDC

External blockchain/metaverse networks

Privcurrency

- **What is Privcurrency**
    - Privcurrency, also known as corporate currency, is a relatively stable cryptocurrency issued by enterprises or individuals, accepted independently, and issued by trusted users.
    - The essence of private currency is monetary securities.
    - Private domain currency is a currency issued by enterprises, as mentioned in Mr. Hayek's "Denationalization of Currency".
    - But our private currency also has a deposit (15% margin)

- **Privcurrency issuance mechanism**
    - Privcurrency is a percentage of Bitgold pledged by enterprises as collateral, with a default value of 15%. In special circumstances, it is modified by a referendum.
    - Please refer to the white paper and relevant papers by Dr. Bright for details.

Bitsecurity

Digital finance solutions operating within regulatory frameworks in various countries

Financial products such as stocks, bonds, and options can enter the blockchain

What is BitSecurity

- BitSecurity is a category where various banks, securities institutions, and enterprises can issue corresponding Bitsecurity by using Bitgold as collateral, which will be managed by national institutions. Bitsecurity includes stock securities, currency securities, etc.
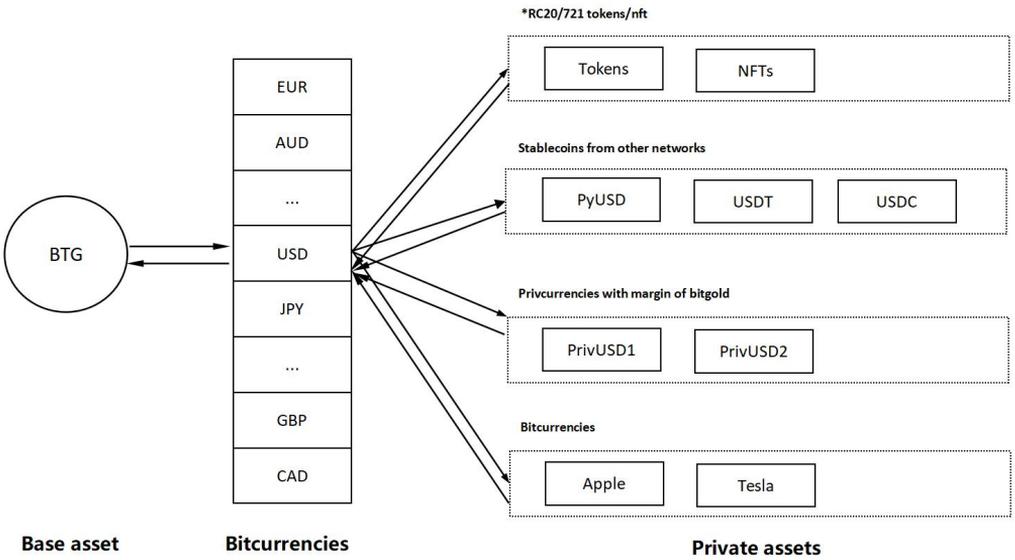
BitSecurity function

- 1. Monetary securities: Monetary securities are valuable securities that can be used as substitutes for currency, mainly used for commodity transactions between enterprises, payment of labor remuneration, and liquidation of debt and debt. Common types include promissory notes, bills of exchange, promissory notes, checks, etc.

- 2. Capital securities: Capital securities refer to a written proof that capital is invested in enterprises or supplied to enterprises or countries. Capital securities mainly include equity securities (ownership securities) and debt securities, such as various stocks and bonds.

- 3. Goods securities: Goods securities (commodity securities) refer to the proof of the right to extract goods. Securities holders can use the securities to extract the goods listed on the securities, commonly including manifests, shipping certificates, bills of lading, etc.

BitSecurity Release and Management

- BitSecurity must be led by the national government and issued in a managed manner. The specific plan will be customized when the regulations of the digital economy are more complete.

- At present, BitSecurity can be used for experimental purposes by pledging BitGold as a security deposit. (Please refer to the smart contract template)

DEX - Markets - OpenSwap

*RC20/721 tokens/nft

| Tokens | NFTs |

Stablecoins from other networks

| PyUSD | USDT | USDC |

Privcurrencies with margin of bitgold

| PrivUSD1 | PrivUSD2 |

Bitcurrencies

| Apple | Tesla |

BTG

| EUR |
| AUD |
| ... |
| USD |
| JPY |
| ... |
| GBP |
| CAD |

Base asset　　　　**Bitcurrencies**　　　　　　**Private assets**

MILESTONES AND ROADMAP

Milestones

- In 2014, Dr. Bright proposed the idea of decentralized competitive currency issuance and wrote the first version of the white paper
- Maged borrowed ideas for development in 2017 and launched trial runs in 2019 and 2021
- In 2021, Dr. Bright took over and restarted the project, combining the latest technological resources and ideological concepts to improve the entire system
- On June 18, 2023, the test network was launched and a series of supporting tools were launched
- The main network has been launched in the first quarter of 2024

Roadmap

- On July 1, 2023, an open community www.opensoci.com was established, using social free mining methods and airdropping 61.8 billion Energy
- In Q4 2023, pledge mining will be launched to produce BTG
- In Q1 2024, establish a decentralized trading market
- In Q2 2024, when the air drop is completed, all 101 effective main network nodes (including team nodes, civilian nodes, and sovereign state nodes) will be online
- In Q3 2024, EVM and COSMOS assets can freely enter and exit across the chain

Future

- Openverse 4.0, standards or protocols for inter chain security, chain ID, UID, etc., with technology development completed and long-term implementation
- Ecosystem: OpenPayment open-source program, opening specific applications for BitCurrency and BitSecurity, payment, securities market
- Ecosystem: Versed open technology, providing blockchain and Web3 capabilities for governments and hyperenterprise organizations in various countries

Openverse Long term goals

An Infrastructure for Web3

We are in the era of switching from the centralized Internet, that is, Web 2.0, to the decentralized Web3. Under the concept of Web 4.0, the ownership of digital content created by users is clearly owned and controlled by users, and the value created will also be distributed according to the agreements signed by users and others. We need a world-wide web3 infrastructure.

The Hub for Blockchains

Under current circumstances, each blockchain network has formed its own ecosystem and small society, and is an island of value. Many teams have developed a large number of bridges and protocols to link various networks. On this basis, we are carrying out the next step of development. Through the interchain communication protocols, different blockchain networks can communicate securely.

Protocols for Metaverses

Like the communication between blockchain networks, all meta-universe ecosystems also need to be interconnected. The connection is based on mutually accepted standards and protocols. The Openverse Team attempts to collect and sort out scattered protocols, form a unified protocol series of the metauniverse, break through various information islands, and let users hold value to flow.

Philosophy

- **Triangle Impossibility Theory and Extension:**
    - We often hear about the theory of the impossible triangle, which states that decentralization, economy, and efficiency cannot be coordinated. It appears to be very accurate and can indeed be expressed clearly on the triangle of a two-dimensional plane. But let's zoom in a bit and consider that the area of this triangle varies in size (area size represents "impracticality"). If the area is infinitely large, it means the system is not operational, and if the area is infinitely small, it can ignore the theory that this triangle is impossible. For example, the triangle area of POW's Bitcoin theory is much smaller than that of POS Ethereum, which means the latter has much greater practicality. Therefore, the Openverse main network adopts POS while providing security for heterogeneous networks, which minimizes the impact of its triangle impossibility theory and even eliminates the need to consider it.
    - Economic effect and environmental protection: so far, all social cooperation has been moving towards globalization, ranging from bank SWIFT and transportation network to the Internet, international organizations, and abstract standards and protocols. Every step of progress is actually reducing transaction friction costs, and blockchain technology is naturally born for this purpose. It can standardize value, digitize, and standardize transactions, making it the best collaborative tool currently available. Therefore, Openverse currently adopts blockchain technology as the underlying layer, while using partially decentralized consensus technology POS. Compared to POW's Bitcoin network, the operating cost of the entire Openverse network may be one million times that of Bitcoin.

- **The balance between centralization and decentralization**
    - After thousands of years of development, humans have formed various levels of centralized governance and management institutions, but this has also led to many problems, including abuse of rights, single point risks, and so on. With the emergence of the Internet, "information transparency" has emerged for the first time in human history. With the emergence of blockchain technology, we have achieved "value transparency" and "decision-making transparency". If promoting the rapid development of a society, ecology, and organization is its own mission, and it requires participation in external collaborations, there must be a balance between centralization and decentralization. Because centralization represents economy and efficiency, but we can use decentralization to promote fairness, justice, and openness.

- **The Innovation and Risk Balance of Science and Technology**
    - The invention and innovation of technology always drive social progress, enhance the ability of the human body, promote social cooperation, and seek more material and spiritual supply for human life. However, scientific creation is always ahead of the times, which may lead to irrational conclusions, just like Openverse using blockchain/Web3 technology and PCIS to issue Bitcurrency, which is beyond the coinage mechanism of sovereign states or the current law. But this is not necessarily a bad thing. The path of human development is definitely not following the rules. We should balance risks while innovating.

- **World Diversity and Government Management**
    - On the other hand, Openverse does not advocate that there is only one chain or one protocol in the world to maintain the diversity of the world, but also to carry out value exchange at a low cost and reasonably. Therefore, Openverse advocates that the value Internet should inherit the architecture of the Internet, separating public and private domains, and advocates "heterogeneous networks, unified protocols, and mutual communication". Openverse provides a protocol platform for countries, society, technology enthusiasts, and the general public, rather than a decentralized anti government platform. Therefore, Openverse hopes that countries will actively participate in node construction, participate in ecological voting governance, and use Versed blockchain programs to run dedicated blockchains, enterprise blockchains, and government blockchains.

Openverse official:

- **Official website:** https://www.openverse.network

- **Development documentation:** https:/https://docs.openos.info

- **User Academy:** https://academy.openverse.network

- **Wallet terminal:** mainstream decentralized wallets can be used

- **Wallet/Browser/Network Status/Verification Nodes:**

  https://app.openverse.network

- **Github:** http://github.com/openversenetwork

- **Twitter:** https://twitter.com/OpenverseGlobal

- **Telegram:** https://t.me/OpenverseChannel

- **Public service:** global@openverse.network

Openverse Network

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