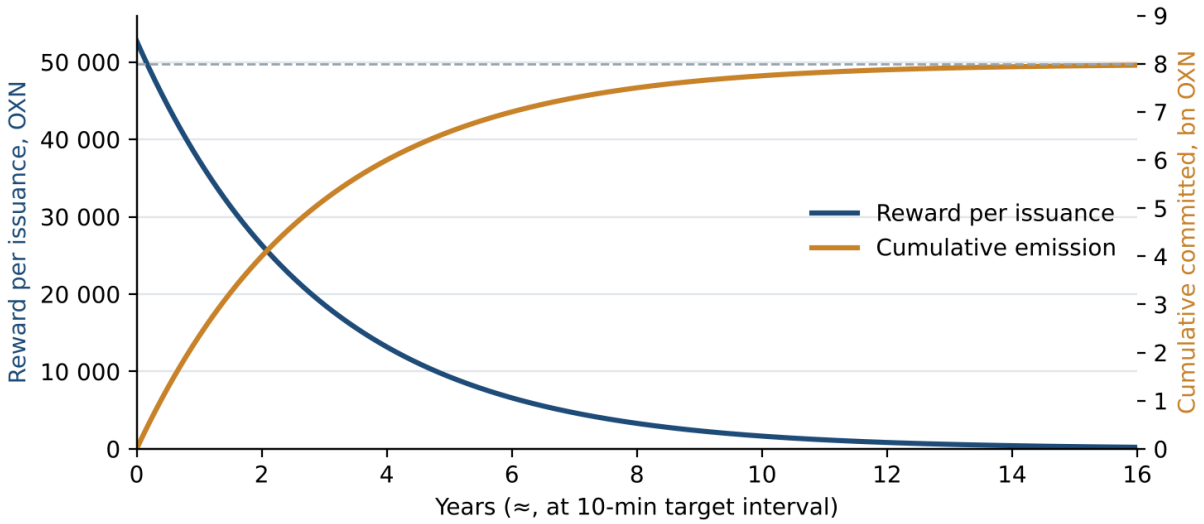
White Paper

Oxano (OXN)

A utility token — the bridge between business and users

A token for settlements and rewards between businesses and users. Issued only through Proof-of-Work mining, with no premine and no initial distribution.



The reward decreases along a geometric curve, without sharp steps; cumulative emission asymptotically approaches the cap. The chart is built from the contract parameters at a 10-minute target interval; the first 16 of ~119.6 years are shown.

8 bn max supply | 0 initial supply | BNB Smart Chain | ERC-20 (BEP-20) | Fair Launch

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Abstract

Oxano (OXN) is a utility token of the ERC-20 (BEP-20) standard with ERC-20 Permit support on BNB Smart Chain, combining mining, market circulation and practical use in a growing network of partners, where the token serves as a shared digital asset for payments, transfers, rewards and other interaction scenarios.

New OXN is issued exclusively through Proof-of-Work mining. Maximum emission is capped at 8 billion OXN, with no premine, airdrop or team allocations. The mining reward gradually decreases, slowing the rate at which new tokens enter circulation: it declines smoothly after each successful mining, without halvings, halving approximately every 2 years. About 50% of the maximum supply is issued within the first ~2 years and about 99.6% within ~16 years, while the entire emission under the contract spans approximately 119.6 years. Thus, capped emission is the foundation of a limited-supply model with a declining issuance rate: it is impossible to issue additional tokens in response to growing demand.

Tokens are created at the moment of claim directly in the user's wallet and belong to the user: the project provides the technology and is not a holder or custodian of users' tokens. At launch, a single project pool operates — the Official OXN Pool; as total hashpower grows and becomes more distributed, mining is planned to be opened to independent pools, and pool admission is to be handed over to an on-chain vote of OXN holders (DAO).

Liquidity is formed only from already mined tokens: during the first 17,532 issuances (≈ 4 months), a liquidity formation period applies, during which the Official OXN Pool fee is temporarily increased and directed to forming OXN/USDT liquidity as well as to supporting the token's utility; thereafter, the standard 2% fee applies.

The smart contracts have been audited by Hexens (August–September 2026): no critical or high-severity vulnerabilities were found, and all findings have been fixed.

The Oxano economic model connects three areas: miners provide the issuance of new OXN through computational work, users receive and use the token, and businesses create additional demand through its practical application.

Expansion of the partner network is the key driver of OXN's development: more partners means more areas of application and higher demand from users and companies.

The complete rules for issuance, distribution and fees are set out in the separate document "Oxano (OXN) Tokenomics"; in case of any discrepancy, the tokenomics document prevails.

Token Passport

Name	Oxano
Ticker	OXN
Network	BNB Smart Chain (BSC)
Standard	ERC-20 (BEP-20) + ERC-20 Permit
Decimals	18
Maximum supply	8,000,000,000 OXN
Initial supply	0 OXN
Issuance mechanism	Proof-of-Work (mining)
Target issuance interval	600 seconds (10 minutes)
Reward half-life (H)	105,192 issuances (~730.5 days, about 2 years at the target interval). The reward decreases continuously after each issuance; there are no halvings
End of emission	After 6,289,925 successful minings (~119.6 years at the target interval)

Premining / Airdrop	None (Fair Launch)
Team / private sale / foundation allocation	None
Pool fee	2% of the reward mined through the Official OXN Pool; during the liquidity formation period — 25% / 25% / 12% / 8%. There is no fixed project share of total emission
Liquidity formation period	Issuances 1–17,532 (≈ 4 months at the target interval); ≈ 154.8 million OXN are directed to forming OXN/USDT liquidity as well as to supporting the token's utility
Token recipient at claim	The user's wallet: tokens are minted directly to it
Transfer tax, rebasing / reflection	None
Contract upgradeability	Not upgradeable (no proxy)
Audit	Hexens, final report dated 10.09.2026

1 Problem and Solution

1.1 Problem

Businesses constantly need new audiences. Today they mostly have to be acquired through advertising platforms, aggregators and affiliate networks. Competition for attention drives up acquisition costs, while discounts and promotions erode margins.

To attract, retain and win back customers, businesses use cashback, bonuses and referral programs. But traditional loyalty infrastructure requires dedicated accounting, payout and integration systems, and the bonuses earned usually remain within a single company or platform.

For the user, this means limited choice: the reward is tied to a specific brand, its terms and rules of use.

For the miner, issuing crypto assets through Proof-of-Work does not guarantee their economic value: electricity and equipment costs by themselves do not mean that the mined token will find a buyer or generate income. At the same time, the link between mining, real demand and everyday consumer scenarios often remains limited.

1.2 Solution

OXN brings businesses, users and miners together in a single economic model in which each participant plays its role.

For businesses

OXN is a tool for attracting and incentivizing an audience. A business acquires tokens and uses them for cashback, referral payouts and other rewards, directing part of its marketing budget straight to customers. Batch transactions at the smart-contract level make it possible to distribute rewards to a large number of users with lower transaction costs.

For users

Instead of spending advertising budgets on promotion, network partners direct them straight to customers as OXN rewards for target actions — from purchases to likes, reviews and other micro-activities. The user receives a real benefit from interacting with brands rather than just seeing their ads. Moreover, OXN is not bonus points tied to a single company, but a transferable on-chain asset that can be accumulated, used with different network partners or exchanged on a DEX.

For miners

New OXN is issued through Proof-of-Work. The miner receives tokens for confirmed computational work, while demand from businesses arises from the acquisition of OXN for partner programs and rewards.

In this way, OXN provides a sustainable economic model: the business gets a tool for working with its audience, the user gets a reward applicable in unlimited scenarios, and the miner gets a token used in the partner network's economy. As new partners join, OXN's use cases expand and generate additional demand for the token.

2 Token Design and OXN Tokenomics

This section presents the key provisions of the tokenomics. The reward formula, emission checkpoints, the claim model and full definitions are set out in the document "Oxano (OXN) Tokenomics".

2.1 Emission and Fair Launch

- **Issuance mechanism:** exclusively Proof-of-Work (PoW) mining. Arbitrary additional emission is technically impossible.
- **Fair Launch:** no premining, airdrop or hidden allocations; no allocations to the team, a foundation or private investors.
- **Maximum supply:** 8,000,000,000 OXN, hard-capped by the smart contract. Initial supply — 0 OXN.
- **Emission schedule:** the mining reward decreases smoothly along a geometric curve, providing an effect similar to halving but without sharp steps: each successful mining yields approximately 0.00066% less than the previous one, and over 105,192 issuances (about 2 years) the reward halves. Cumulative emission asymptotically approaches 8 billion OXN and cannot exceed this limit.
- **Accrual:** the reward is formed based on mining results. No tokens are created upon successful mining: the smart contract records in the vault the reward accrued to the pool and the Merkle root. Tokens are created on-chain when the user receives them through claim and are minted directly to the user's wallet, bypassing pool and project addresses.
- **Stable emission rate:** mining difficulty adjustment is built into the smart-contract logic and targets one issuance (successful mining) every 10 minutes — about 144 issuances per day. The initial reward per issuance is about 52,714.65 OXN.

2.1.1 The emission curve in figures

OXN issuance involves three different time scales that should not be confused: 10 minutes — the target interval between successful minings; about 2 years — the step over which the reward halves (this is not the mining term: the steps follow one another); about 119.6 years — the formal end of emission under the contract. Long before the formal end, the reward per issuance becomes lower than the gas cost of the mine() transaction, so mining in the tail of emission loses economic sense.

Year (≈)	Reward per issuance	Cumulative emission	Share of max supply
0	~52,714.65 OXN	0 OXN	0%
2	~26,357.32 OXN	~4.0 bn OXN	50%
4	~13,178.66 OXN	~6.0 bn OXN	75%
8	~3,294.67 OXN	~7.5 bn OXN	93.75%
16	~205.92 OXN	~7.969 bn OXN	~99.61%
~119.6 (end of emission)	→ 0	~8.0 bn OXN	→ 100%

Years are a calculated projection at a 10-minute target interval: the reward decrease is tied to the number of successful issuances, not to calendar time. With sharp changes in hashrate, emission over time may temporarily accelerate or slow down; the reward curve and the maximum supply do not change. Unlike

classic halving, the reward decreases smoothly — by less than 0.1% per day and approximately 2.8% per month — without a one-time shock to mining economics. These figures describe only the protocol reward and are not a forecast of user returns, token price or available liquidity. The detailed model is in Section 2 of "Oxano (OXN) Tokenomics".

2.2 Economic Model

2.2.1 Mining and issuance

New OXN is mined by miners on real hardware. Mining is the only mechanism for creating new tokens.

2.2.2 Distribution and circulation

Oxano acts as a technology provider of the mining infrastructure and the ecosystem. Partners acquire OXN on the open market to reward users and settle within the network. No separate emission to cover operating expenses for partners or holders is provided for.

2.2.3 Token use

OXN performs several functions in the ecosystem:

- rewarding users for target actions;
- payment for partners' goods and services;
- free transfer, exchange, sale and P2P transactions;
- accumulation as a transferable digital asset.

2.2.4 Demand and limited supply

The supply of OXN is capped at 8 billion tokens, and the rate of issuance of new tokens gradually declines.

Demand is formed by partners acquiring OXN to attract and incentivize audiences, and by users applying the token to pay for goods and services.

As the partner network and use cases expand, potential demand for the token grows, while its supply remains limited by the emission rules.

2.2.5 Token acquisition by partners

No premine, special reserves or separate emission are provided for partner programs. OXN for rewards must be either mined by miners or acquired by partners on the open market.

Thus, the funding of partner programs depends on the volume of OXN already issued and being mined.

2.3 Official OXN Pool: Launch Pool, Service Fee and Opening of Mining

At launch, mining is carried out through the Official OXN Pool. Its purpose is to guide the network through the early stage at which it is most vulnerable: total hashpower is small, while the reward per issuance is at its maximum. The launch pool addresses three objectives: balanced growth (staged onboarding, limits per account, wallet or device), fair distribution under uniform public rules, and protection against the concentration of mining among large players.

At the launch stage, a single pool operates, its operator is appointed by the project, and independent (community) pools and solo mining are not available. This is a deliberate temporary decision for the launch, not the target state.

Pool fee

The standard Official OXN Pool fee is 2% of the reward mined through this pool: 98% goes to user distribution and 2% to the project's operating reserve. The fee amount is a public term of the pool, not a protocol parameter: the smart contract assigns the entire reward to the pool, and the fee is allocated in the pool's accounting.

Liquidity formation period. OXN has no premine, so liquidity is formed from already mined tokens. During the first 17,532 issuances (≈ 4 months at the target interval), the Official OXN Pool fee is temporarily increased and decreases according to a pre-published schedule: 25% / 25% / 12% / 8% (steps of 4,383 issuances, ≈ 1 month each). The entire fee for this period, including the base 2%, goes to a separate disclosed Liquidity Bootstrap address and is used to form OXN/USDT liquidity — ≈ 154.8 million OXN in total (≈ 1.93% of the maximum supply) as well as to support the token's utility. The steps are tied to the number of issuances, not to the calendar; the schedule is fixed before launch and will not be extended. From the 17,533rd issuance, the standard 2% fee applies.

There is no fixed project share of emission: the fee is taken only from the reward mined through the Official OXN Pool, and as mining opens to independent pools, the project's share decreases. Even if all mining goes through the Official OXN Pool, the total project fee will be ≈ 184.2 million OXN for the first year (7.86% of that year's emission, 2.30% of the maximum supply) and ≈ 217.3 million OXN for the first 2 years (2.72% of the maximum supply).

The pool fee (including the liquidity formation period):

- is not a premine, a hidden allocation, a transfer tax, a DEX swap tax or additional emission (it is included in CAP and the reward curve);
- is calculated at the pool level when distributing mined OXN;
- the standard 2% fee is directed to the operating reserve to support the infrastructure — pool software, monitoring, publication of claim data and claim tools; in addition, it may be used to provide initial liquidity for the token; during the liquidity formation period, the fee goes to the Liquidity Bootstrap address. In both cases it arrives at a disclosed public address in the same way as user rewards — through claim; the fee does not accumulate on the pool address.

The fee is not a source of commercial gain for the project. The project's economic interest is linked not to OXN emission or growth in its price, but to the token's applicability in business: to the development of the partner network, integrations and services through which companies use OXN for settlements and rewards.

Opening mining to independent pools

A single pool is the launch configuration, not a permanent one. As the network's total hashpower grows and becomes distributed among a larger number of participants, the project plans to open mining to independent pools.

Stage	State	What happens
1. Launch	A single project pool — the Official OXN Pool	Staged onboarding of participants, limits and anti-abuse rules, pool fee according to the liquidity formation period schedule, then 2%, publication of data for claim and distribution verification
2. Opening pools	The project pool and independent pools	The pool software is published as open source: any participant can deploy their own pool. Addresses of independent operators receive MINTER_ROLE; each pool keeps its own accounting and sets its own participation terms and fee
3. DAO governance	Pool admission is decided by the community	Adding and removing pools is decided by an on-chain vote of OXN holders; the administrator role is transferred to the voting contract

The transition criterion is not a calendar date but the state of the network: total hashpower must be sufficient so that no single large participant or pool can obtain a dominant share of issuance. New pools do not increase emission: pools compete for the same reward. Stages 2 and 3 describe the project's intentions, not a commitment with fixed deadlines; until the DAO is launched, pool admission is carried out by the project's admin multisig.

2.4 Key Supply Definitions

Term	Definition
Max supply	Maximum emission limit: 8,000,000,000 OXN
Total supply	Sum of all OXN actually created on-chain. Grows as users withdraw rewards through claim
Accrued by pool	Total reward committed to a pool based on mining results; tokens have not yet been created
Unclaimed	Committed but not yet received through claim. Tokens have not been created and are not included in total supply
Circulating supply	Total supply minus OXN on disclosed project addresses: the operating reserve, the Liquidity Bootstrap address and OXN in project-owned liquidity pools
Operating reserve	OXN received through the standard 2% Official OXN Pool fee, held on a disclosed project address
Liquidity Bootstrap	A disclosed project address that receives the entire Official OXN Pool fee during the liquidity formation period

3 PoW Emission Economics and OXN Architecture

3.1 The economic basis of Proof-of-Work

OXN emission is based on Proof-of-Work (PoW): issuing each new token requires verifiable computational work on physical hardware and real energy expenditure. Unlike tokens whose issuance is determined by an administrative decision of the team, OXN emission is conditional on meeting protocol requirements.

The PoW economic model includes three elements:

- **Resource basis.** Producing OXN requires electricity, computing equipment and operating costs for running it.
- **Cost base.** The cost of mining is formed by electricity prices, equipment depreciation and infrastructure operating expenses. This creates economic costs of issuance but does not guarantee the token's market price or its correspondence to the cost of production.
- **Independence of emission from demand.** The emergence of additional demand does not allow issuance to be increased by decision of the team. The mining reward decreases along a predefined geometric curve, and issuance is determined by protocol rules and confirmed work.

3.2 Technological constraints on emission

OXN issuance is limited by the programmatic conditions of the smart contract and the PoW mechanism.

- **Verification:** issuance is possible only upon submission of a valid PoW proof.
- **Access control:** the emission function is available only to holders of MINTER_ROLE and subject to verification conditions; there is no unrestricted public mine().
- **No arbitrary issuance:** an administrative free-minting function and mechanisms for bypassing PoW verification are not provided for by the contract architecture.
- **Binding to the pool:** at the smart-contract level, each address with MINTER_ROLE is a separate pool with its own accounting. A PoW solution is bound to the address of the pool that found it, so a solution cannot be intercepted and submitted on behalf of another pool.

Thus, the authority to technically call the issuance function does not make it possible to create OXN without confirmed computational work or beyond the emission formula and hard cap. At the same time, the MINTER_ROLE holder generates the Merkle root, i.e. determines among which addresses the pool reward is distributed (see Section 7.5).

3.3 Accessibility of mining

OXN mining is aimed at the mass user and assumes easy entry through software that does not require special technical skills. Participation does not require purchasing expensive equipment or ASIC farms, or setting up industrial infrastructure independently. The core principle is installing and launching the software in a few clicks, without complex settings or the need to connect to pools manually.

The main participation scenario:

- launching mining through user software without setting up nodes, smart contracts or pool connections independently;
- tracking the mining process and accumulated rewards through the user interface;
- receiving accrued OXN through the claim mechanism.

A simple user interface lowers the technical entry barrier while preserving the basic emission principle: new OXN is issued exclusively within the PoW mechanism.

3.4 An organic scarcity model

OXN scarcity is formed by capped emission and a declining issuance rate, not by artificial token burning.

Key mechanisms:

- new OXN must be mined through PoW — arbitrary expansion of supply in response to growing demand is not provided for;
- the reward per issuance steadily decreases along a geometric curve — halving approximately every 2 years;
- mining difficulty adapts to the network's actual computing power in both directions (by no more than ±5% per recalculation) and does not fall below the minimum threshold set at deployment;
- difficulty is recalculated automatically upon successful mining; in addition, once the recalculation interval has elapsed, any address can trigger it through the public readjust() function — this protects the remaining miners if a large amount of hashpower suddenly leaves the network. The caller chooses neither the value nor the direction: the new difficulty is calculated by the contract;
- the token's applicability expands through the onboarding of partners and new use cases.

The economic model combines capped supply, adjustable mining difficulty, a decreasing reward per issuance and demand growth through the expansion of the partner network and the token's use cases.

3.5 Architectural barriers against manipulation

The OXN distribution model eliminates a number of sources of privileged token concentration at the project's launch.

Mechanism	Economic consequence
No early investors with token allocations	No obligations to provide an exit for funds that received tokens on special terms.
No premine	The team does not receive a pre-reserved share of emission before the public launch.
Minting directly to the user's wallet	The pool has no balance of user tokens that could be withheld, lost or misappropriated: an unclaimed reward is an accounting record, not tokens in anyone's wallet.

OXN enters circulation through mining, acquisition on the open market or rewards for participation in partner programs.

These mechanisms reduce the risks of manipulation associated with privileged allocations and concentration of tokens among early participants. They do not rule out market concentration later on and do not eliminate volatility, low liquidity and other risks typical of crypto assets (see Section 12).

3.6 Micro-divisibility and micropayments

The minimum unit of account of OXN is 0.000000000000000001 OXN (10^{-18}) — one quintillionth of a token. For comparison: bitcoin is divisible only down to 0.00000001 BTC — OXN is 10 billion times finer.

Divisibility by itself does not make micropayments cost-effective: if each accrual is carried out as a separate transaction, the network fee may exceed the reward amount. Therefore, in OXN micro-divisibility works together with batch settlement:

- **precise accounting** — accruals are recorded with a precision of 10^{-18} OXN for each second, action or interaction;
- **accumulation** — accruals are summed up for each recipient over the settlement period;
- **batch settlement** — the final amounts for many recipients are settled in a single batch transaction, so the fee is shared among all participants in the batch, and the cost per recipient decreases as their number grows (see Section 7.5).

This combination makes economically viable those scenarios that are poorly suited to banking systems and individual on-chain transfers:

- Pay-per-second — payment for seconds of digital service consumption;
- micro-tips and rewards for likes, reviews and other actions;
- accruals for individual steps, interactions and micro-activities.

This expands the possibilities of using OXN in partner loyalty programs and digital services with frequent transactions and small reward amounts.

4 Use Cases

OXN is a standard ERC-20 (BEP-20) token on BNB Smart Chain. It can be used in existing EVM products and payment infrastructure without issuing one's own token. OXN transfers are not subject to built-in fees; the contract does not recalculate holders' balances (no rebasing or reflection).

Scenario	How it works
Payment for goods and services	Settlements in OXN within partner services.
Mass payouts	Batch transactions for simultaneous crediting of OXN to a large number of recipients.
Rewards and cashback	Crediting OXN for purchases, referrals and other target actions.
Referral programs	Rewarding users for bringing in new customers.
Exchange and transfer	Transferring OXN between users and exchanging it for other assets through supported infrastructure.
Partner offers	Discounts, special terms and other incentive mechanics linked to the use of OXN.
Payment solutions	Accepting OXN through crypto processing and other integrations.
Mining	Obtaining OXN through Proof-of-Work without the mandatory purchase of specialized equipment.
Card payments (future)	Integration of OXN with physical cards through payment partners.

Thus, OXN can be used both to attract and reward users and directly for settlements. Specific terms of use are determined by the partner.

5 B2B Ecosystem and Value for Partners

5.1 Value for business

OXN is a ready-made settlement and reward instrument for attracting, incentivizing and retaining customers. Partners use a single token for cashback, referral programs, rewarding activity and paying for goods and services without issuing their own token or building separate loyalty infrastructure.

Portable rewards instead of closed points. The partner directs its marketing budget straight to rewarding customers in OXN for target actions — from purchases and referrals to activity and micro-interactions. The user receives an asset that can be used in other ecosystem services, not only at the company that issued it.

For business, this means:

- reallocating the advertising budget in favor of direct customer rewards;
- access to the audience of OXN holders and miners already familiar with digital assets;
- additional scenarios for acquisition, repeat purchases and customer retention;
- mass crediting through batch transactions without developing one's own points system.

5.2 Onboarding and mechanics

OXN is built on the ERC-20 standard and compatible blockchain infrastructure. Partners can integrate the token through standard interfaces or crypto payment solutions, without issuing their own asset.

Typical workflow:

- **The partner defines the terms.** It selects the target action and the reward amount: a purchase, a referral, a subscription renewal, a review or other activity.
- **It acquires and credits OXN.** It buys tokens on the open market and distributes them among customers, including through batch transactions.
- **The user receives OXN.** The tokens arrive at the user's address and belong to the user regardless of further participation in the partner's program.
- **The reward is used in the network.** The user pays for goods and services, receives discounts and special offers from other partners, or transfers or exchanges the tokens.

The ecosystem's partner marketplace provides an additional channel for placing offers and attracting audiences. OXN acts as a settlement instrument, while specific discounts, terms and the availability of goods or services are determined by the partners themselves.

5.3 Benefits for users

In traditional loyalty programs, points are tied to a specific service, and their use, validity period and exchange rate are determined by the company. OXN changes this model:

Traditional points	OXN
Use within a single program	Use with different partners that accept OXN
Rules and terms are set by the program issuer	The token belongs to the user on-chain
Points may expire and terms may change	The token itself has no built-in expiry
Rewards are limited to one company's offers	Exchange, transfer and various use cases are available

OXN may have a market rate and be exchanged for other digital assets through supported venues. However, market value, liquidity and convertibility to fiat depend on the availability of the relevant markets and services and are not guaranteed by the protocol.

Even if a particular partner ceases operations, the user retains control over their tokens, but the availability of that partner's specific goods, discounts and services ends in accordance with its terms.

5.4 Key areas of application

E-commerce and SaaS	Cashback on purchases, referral rewards, subscription payments, access renewals and upgrades.
Travel and ticketing	Rewards for bookings, payment for transfers, ticket discounts and special partner offers.
Web3 games and gamification	Payouts for tournaments, achievements, in-game activities and cross-project rewards.
Payments and digital services	Accepting OXN through crypto payment gateways, paying for premium features, service fees and digital goods.
Mining and reward distribution	Connecting to mining through accessible interfaces and mass crediting of OXN for user actions.
Bank card payments	Integration with crypto cards and payment providers is being considered for the future, enabling OXN to be used for offline purchases.

6 Liquidity and Compatibility

OXN is issued as a standard ERC-20 (BEP-20) token on BNB Smart Chain. Once tokens appear on the market, participants can create OXN trading pairs with other assets and provide liquidity through BSC AMM protocols. The project does not provide for a premine or a separate token allocation for market making. Initial liquidity is formed on the reverse-launch principle — only from already mined OXN: during the liquidity formation period (the first 17,532 issuances), the Official OXN Pool fee goes to the disclosed Liquidity Bootstrap address (≈ 154.8 million OXN), and thereafter the operating reserve may also be used for liquidity. Liquidity is added to the pool gradually according to a published schedule; inflows and their use are disclosed regularly. The planned base trading pair is OXN / USDT; the quote asset (USDT) is provided by the project, and information about the specific venue will be disclosed separately. Providing liquidity does not guarantee demand for the token, price stability, market depth or the ability to exit a position.

Wallet compatibility

EVM compatibility allows OXN to be used with wallets that support BNB Smart Chain, such as MetaMask, Trust Wallet, Coinbase Wallet, Binance Web3 Wallet, SafePal, Ledger, Trezor and others, as well as integrated into custodial solutions and payment services. Specific support depends on the provider and on the token being added to its interface.

Thus, OXN does not require a separate infrastructure standard: basic token operations — storage, transfer, exchange and connection to compatible services — work through existing EVM infrastructure.

7 Technology Architecture

7.1 Blockchain network

OXN operates on BNB Smart Chain (BSC) — one of the largest EVM-compatible blockchain networks. BSC was chosen for its low fees, high throughput, fast finality and broad infrastructure support. The token is implemented to the ERC-20 (BEP-20) standard, ensuring compatibility with Web3 wallets, DEXs/CEXs and a wide range of applications on the BNB network. The target interval and the difficulty recalculation window are set in the contract in seconds, so the issuance schedule does not depend on the network's block time.

7.2 Technology stack

Component	Solution	Purpose
Network	BNB Smart Chain	High-speed EVM blockchain
Token standard	ERC-20 (BEP-20)	Compatibility with wallets and DEXs/CEXs
Contract language	Solidity 0.8.35	Implementation of token and mining logic
Libraries	OpenZeppelin	Audited security standards and role-based access
Gasless approvals	ERC-20 Permit (EIP-2612)	Signed off-chain approvals without a separate approve transaction
Zero-Knowledge proofs	Groth16 (BN254)	Efficient ZK proofs for batch payouts
Development framework	Foundry	Testing, fuzzing and deployment of contracts

The smart contract is implemented in Solidity using audited OpenZeppelin libraries. The protocol is built on a modular architecture with separation of responsibilities and relies on a role-based access model with two roles — administrator (DEFAULT_ADMIN_ROLE) and minter (MINTER_ROLE). The contract is non-upgradeable — the token and vault contracts are deployed without a proxy, and the logic is immutable after deployment.

DEFAULT_ADMIN_ROLE is assigned to a multisignature wallet (Safe multisig) on the token and vault contracts with a 4-of-7 scheme: the wallet has seven independent key holders, and any administrative action requires signatures from at least four of them. An unauthorized action would require control over four keys simultaneously. After deployment, the deployer key holds no roles. Granting MINTER_ROLE is the pool admission mechanism (see Section 2.3).

7.3 Contract architecture

The protocol consists of four independent but coordinated components:

- **OXN-coin** — the main token contract: the ERC-20 implementation and the Proof-of-Work emission logic in a single contract. Issuance of new tokens is available only to holders of the corresponding role and occurs exclusively upon confirmed computational work.
- **ProductionVault** — the reward distribution contract with isolated accounting for each pool. It stores payout state and verifies ZK proofs on-chain; a ring buffer of roots (the 10 most recent Merkle roots for each pool and epoch) limits the attack surface on historical states. The vault is an accounting module: it keeps records of unclaimed balances and Merkle roots, not the tokens themselves, and is not a project treasury. The vault is set at deployment and cannot be replaced.
- **Verifier** — an auto-generated ZK verifier (Groth16/BN254). Used only to verify proofs and contains no mutable business logic.
- **BatchVerifier** — an auto-generated verifier of batch proofs (Groth16/BN254). An immutable dependency of ProductionVault: without it, the batch payout mode described in Section 7.5 is unavailable.

This modularity architecturally allows partner reward pools to be connected without affecting the token contract itself, while ensuring guarantees for the portability of OXN between services. This capability is not provided at launch: only the Official OXN Pool operates.

7.4 Contract guarantees

- New tokens are created exclusively as a result of confirmed computational work by miners (PoW); arbitrary emission is impossible.

- The transfer, balanceOf and allowance functions comply with the ERC-20 standard; there are no hidden functions for mass withdrawal of funds.
- The contract logic does not allow unilateral freezing of holders' funds.
- The invariant totalSupply ≤ totalCommitted ≤ CAP holds: tokens issued through claim do not exceed the volume committed to pools through mining, which in turn does not exceed the maximum supply.
- The administrator cannot increase the maximum supply, change the reward curve or reward amount, replace the vault or change the contract code.
- Revoking MINTER_ROLE stops further issuances by that key, but already published roots are preserved, and pool participants retain the right to claim.

7.5 Two-layer payout delivery

Reward delivery is split into Settlement (on-chain execution of the payout) and Data Availability (publication of the source snapshot).

Settlement — permissionless. Any address with a valid Groth16 proof can execute a payout; the tokens are minted to the wallet specified in the Merkle tree record, regardless of who sent the transaction. The on-chain verifier makes no discretionary decisions.

Data Availability — the project's obligation. The snapshot and the common batch are published regularly for all addresses entitled to a payout; any third party can perform the submit. The full data tree is not stored on the blockchain: the pool operator publishes and preserves the Merkle root, the list of addresses, cumulative balances and data for building proofs. Each participant can find their record in the published data and confirm that it is included in the root recorded on the blockchain.

Modes. Single — a proof for one address; a third party can perform the submit without access to the recipient's private key. Batch — a single proof settles many recipients (exactly 256 records; an incomplete batch is padded with empty records) in one transaction: the total cost grows sublinearly, and for large N the cost per recipient decreases.

Proof validity period. A root is published only through mine(), in the same transaction as the reward. A proof is accepted while its root is among the pool's 10 most recent roots for the given epoch; with a single pool and a 10-minute interval, this is on the order of an hour and a half. If the root has been displaced, the unclaimed amount is preserved: it is reflected in a newer root, and the proof must be rebuilt.

Regulatory implication. Pool operators, aggregators and front-ends that initiate the submit do not receive or hold the recipient's crypto assets — funds are issued directly to the address specified in the proof: the vault calls the token's mint to that address, and the verifier only checks the proof and does not dispose of funds. The non-custodial model may reduce risks related to safekeeping of funds and licensing, depending on the jurisdiction and the operator's model.

8 Security and Audit

The security of user funds is a project priority. A Defense in Depth strategy is implemented: cryptographic guarantees, verifiable code and independent review of the contracts.

Internal verification

A multi-level code analysis stack is applied: static analysis (Slither), invariant and fuzz testing (Foundry, Echidna), and symbolic verification of key properties (Halmos). Mutation testing (Gambit) has been launched as a pilot and is not yet part of the mandatory checks. This makes it possible to detect defects before going on-chain and to maintain consistent codebase quality between releases.

External audit

An independent audit of critical components was performed by Hexens from August 10 to September 10, 2026 (final report dated 10.09.2026). Scope: mining difficulty recalculation, emission, reward accounting, and the ZK implementation of single and batch claim.

Critical	High	Medium	Low
0	0	2	2

ID	Severity	Summary	Status
OXN1-1	Medium	The estimate of work performed overstated difficulty and slowed emission relative to the target interval	Fixed
OXN1-2	Medium	Outdated BSC and Polygon block times in the configuration accelerated emission (approximately 6.7× on BSC)	Fixed
OXN1-3	Low	A pool could keep difficulty near the minimum by alternating bursts of mining and idle periods	Fixed
OXN1-4	Low	The ZK proof format for batch claim was incompatible with the contract, and batch claims failed	Fixed

All vulnerabilities identified by the audit were fixed before the contracts were deployed. The source code is verified on the block explorer, allowing any participant to independently compare the deployed bytecode with the public codebase. Hash of the audited version (SHA-256): 4eb982ad210009bb4c97980e44b2fe4c752d913029389e80e7cfab2a6e57b346. The configuration reviewed in the audit included BNB Smart Chain and Polygon; deployment is on BNB Smart Chain only.

Rug pull protection architecture

- **Capped emission** — only through PoW; arbitrary token creation is ruled out.
- **No backdoors** — no hidden administrative functions for bypassing the rules.
- **Role-based access model** — two roles are used: the administrator grants and revokes roles, and the minter submits mining results. The administrator cannot change the reward curve or the emission cap, or issue OXN outside the protocol rules. The administrator role is assigned to a 4-of-7 multisig.
- **Inherited BSC security** — block finality is provided by the BSC network.
- **Deterministic payout execution** — the payout amount is determined by the pool's published root and the amount already received; the contract cannot pay out more than has been accrued to the pool.
- **One-time on-chain payouts** — the smart-contract state rules out repeated execution of the same claim; each reward can be paid out exactly once.
- **Cryptographic verification of payouts** — mass claim operations are confirmed by ZK proofs verified on-chain; it is impossible to forge or substitute the set of recipients outside the published root.
- **Disclosure** — as they become ready, the project publishes the addresses of the token and vault contracts, the admin multisig, significant operational addresses (pool fee, operating reserve, Liquidity Bootstrap address, liquidity), the addresses of operators with MINTER_ROLE, and claim data.

9 About the Project

OXN combines many years of experience in the digital asset industry, in-house technology developments and industrial mining infrastructure.

9.1 Experience and expertise

The team has been working in the digital asset and mining industry since 2011. Over this time, it has accumulated practical experience in developing and operating industrial-scale mining infrastructure.

9.2 In-house technology

The project relies on its own technology stack and deep R&D expertise in blockchain, cryptography and industrial mining. This makes it possible to develop key system components independently and reduce dependence on external technology providers.

9.3 Operational infrastructure

OXN is supported by a distributed mining infrastructure based on real computing capacity. The in-house technology and production base provides control over mining processes and operating costs; the PoW emission rules, however, are set by an immutable smart contract and cannot be changed by the project.

At the core of OXN is a combination of many years of industry experience, in-house technology and operational industrial infrastructure.

10 Roadmap

Milestone 0 — Foundation

Status: completed

Goal: Build the technological, operational and legal foundation of the project.

- A core team has been formed with expertise in blockchain, Solidity/ZK, PoW mining, B2B partnerships, product and legal support.
- R&D of key ecosystem components has been carried out and the OXN architecture has been selected.
- Key smart contracts have been developed: PoW emission, reward accounting, claim mechanics and vault infrastructure.
- An emission model without premining, airdrops or hidden allocations has been designed.
- The project's legal and IP foundation has been established.
- An initial architecture review and a legal assessment of reward/loyalty mechanics have been conducted.
- Basic infrastructure has been prepared for the public launch.

Milestone 1 — Genesis Launch

Status: current stage

Goal: Public launch of OXN, mining and the core ecosystem infrastructure.

- An independent external audit of critical smart contracts has been carried out (Hexens, August–September 2026); identified vulnerabilities were fixed before deployment.
- Deploy and verify the smart contracts on BNB Smart Chain.
- Publish the contract addresses, the repository and technical documentation.
- Launch the server-side mining infrastructure and the user mining interface.
- Launch the Official OXN Pool.
- Launch the miner access layer for connecting to mining, monitoring accruals and claiming OXN.
- Launch a dashboard for pool statistics, accruals and infrastructure status.
- Introduce monitoring, anti-fraud mechanisms, redundancy and basic incident response procedures.
- Carry out load testing and verify the resilience of the mining infrastructure.
- Run a Fair Launch without premining or hidden allocations.
- Create the conditions for initial AMM liquidity on a DEX through the liquidity formation period: publish the Liquidity Bootstrap address and the schedule for adding liquidity to the OXN/USDT pool.
- Launch the official website and public communication channels.

Milestone 2 — Ecosystem Readiness

Status: planned

Goal: Prepare OXN for use beyond mining — in reward programs, B2B integrations and first payment scenarios.

- Improve the user journey for receiving, storing and using OXN.
- Prepare B2B tools for crediting OXN for purchases, referrals, activity and other target actions.
- Release documentation and integration materials for partners.
- Prepare legal and compliance materials for B2B integrations.
- Prepare the infrastructure for onboarding additional pool operators: publish the pool admission policy and transition criteria, and prepare the pool software for open-source publication.
- Scale batch mechanics for mass distribution of OXN.
- Build and launch the first partner integrations in e-commerce, SaaS, gaming, travel and loyalty.

Milestone 3 — Partner Network Expansion

Status: planned

Goal: Build a network of partners using OXN for rewards, acquisition and settlements with users.

- Onboard B2B partners using OXN for cashback, referral and loyalty programs.
- Launch a partner marketplace for goods and services.
- Expand the number of services accepting OXN as payment.
- Onboard e-commerce, SaaS, gaming, travel and digital-service platforms.
- Expand the mining network and onboard additional pool operators subject to security requirements — as the network's total hashpower grows and becomes more distributed.
- Integrate OXN with crypto processing, billing and payment gateway providers.
- Develop mass mechanics for crediting and distributing rewards.
- Run joint acquisition and marketing programs with partners.

Milestone 4 — Applicability Network Scaling

Status: planned

Goal: Scale OXN as a portable instrument for rewards and settlements across different partner ecosystems.

- Expand the number of partners accepting OXN and using it for rewards.
- Increase the number of use cases: purchases, subscriptions, cashback, referrals, rewards and digital services.
- Add new OXN acceptance points through external services and payment infrastructure.
- Expand access to mining through lightweight interfaces once their technical, economic and security feasibility is confirmed.
- Hand over pool admission to an on-chain vote of OXN holders (DAO): the administrator role that grants and revokes MINTER_ROLE is transferred to the voting contract. This is the project's intention, without fixed deadlines.
- Scale the user base through community- and partner-led acquisition.
- Develop joint programs to encourage the use of OXN.
- Consider integrations with aggregators and centralized venues as the necessary infrastructure and market conditions are met.

Milestone 5 — Payment Utility Expansion

Status: future direction

Goal: Expand the use of OXN in payment scenarios, subject to technical, legal and economic conditions.

- Scale payments for goods and services in partner ecosystems.
- Expand integrations with crypto-processing and payment gateway providers.
- Integrate OXN with external payment infrastructure.
- Explore the possibility of using OXN through crypto-card infrastructure for offline payments.
- Hold negotiations with card issuers, Banking-as-a-Service and crypto-card providers.
- Assess KYC/AML, custody and off-ramp requirements, jurisdictional restrictions and unit economics.
- Launch a card pilot once legal, technical and economic feasibility is confirmed.

11 Legal Status

OXN is designed and offered as a utility token, not as a security, an investment contract or a financial instrument. The classification takes into account the criteria of MiCA (Regulation (EU) 2023/1114) and the Howey test (SEC). The Fair Launch architecture and the absence of a premine rule out deriving profit from the managerial efforts of third parties, which rules out the qualification of OXN as an "investment contract" or a transferable security.

OXN is not a promise of yield, price growth, passive income, guaranteed liquidity, mandatory buyback, guaranteed exit from a position or mandatory listing on centralized exchanges. This document does not constitute financial, investment, tax or legal advice.

12 Risks and Disclaimer

OXN is not an investment instrument. The project provides the technology: the team has no premine, pre-allocation or reserved share of emission — every OXN comes into existence only through mining. The project may operationally accumulate OXN exclusively through the disclosed Official OXN Pool fee (during the liquidity formation period — 25% / 25% / 12% / 8% to the Liquidity Bootstrap address, then 2% to the operating reserve), not through a hidden allocation. The smart contract and related services are provided "as is", without any guarantees of returns, price growth or liquidity.

Category	Description
Smart contract	Code errors, exploits, immutability of logic after deployment.
Regulatory	Changes in legislation or reclassification of the token; restrictions or bans in certain jurisdictions.
Market	Price volatility, no guarantees of liquidity or future value.
Operational	Unavailability of third-party wallets, exchanges or partner services.
Mining	The calendar emission schedule depends on hashrate; high concentration of mining activity and Sybil attacks require anti-abuse monitoring.
Tax	Tax consequences depend on the user's jurisdiction.
Consensus	Inherited from BSC; network-level failures or attacks.

The security of the BSC network is not guaranteed by the project. Partner services are not part of the protocol. Holders are solely responsible for complying with the laws of their jurisdiction.

13 FAQ

Token and emission

What is OXN?

OXN is an on-chain token used for rewards, settlements, referral payouts and loyalty programs in the partner ecosystem. The token is issued through Proof-of-Work and can be transferred between users.

How is new OXN issued?

New OXN is issued exclusively through Proof-of-Work mining. Issuance requires confirmed computational work; arbitrary emission by decision of the team is not provided for.

What is the maximum amount of OXN?

The maximum supply is capped at 8,000,000,000 OXN. The initial supply is zero, and the issuance rate gradually declines along a predefined geometric curve.

Does OXN have halvings, and how long will emission last?

There are no halvings: the reward decreases smoothly after each successful mining and halves approximately every 2 years (105,192 issuances). About 50% of the maximum supply is issued within the first ~2 years and about 99.6% within ~16 years; under the contract, emission ends after 6,289,925 successful minings — approximately 119.6 years at a 10-minute target interval.

Who owns OXN before it is mined?

No one. Tokens do not exist before issuance. Premine, private sales and pre-allocations are not provided for. Part of the already mined reward through the Official OXN Pool goes to the project in accordance with the disclosed fee mechanics: during the liquidity formation period (the first 17,532 issuances) — 25% / 25% / 12% / 8% to the Liquidity Bootstrap address for forming liquidity, then 2% to the operating reserve.

Who holds my tokens before claim?

No one: tokens do not exist before claim. An unclaimed reward is a record in the pool's accounting, not tokens in anyone's wallet. At claim, OXN is minted directly to the user's wallet, bypassing pool and project addresses; the project is not a holder or custodian of users' tokens.

Can additional OXN be created outside of mining?

No. Arbitrary minting is not provided for by the architecture. New tokens can be issued only when the conditions of the PoW mechanism are met.

Why is emission based on Proof-of-Work?

PoW links token issuance to verifiable computational work and real resource costs. At the same time, the emission rate cannot simply be increased in response to growing demand.

Using OXN

Where can OXN be used?

OXN is intended for use with ecosystem partners: payment for goods and services, cashback, referral rewards, loyalty programs and other user incentive scenarios.

How is OXN different from ordinary bonus points?

Bonus points are usually tied to a specific company and its rules. OXN is a transferable on-chain asset: the user controls the tokens received and can use them with different partners, accept, transfer or exchange them.

Does OXN expire like bonus points?

The token itself has no built-in mechanism for automatic expiry. However, specific validity periods or terms of individual partner offers may be determined by the partner.

Can OXN be transferred to another user?

Yes. OXN is a transferable token and can be used for P2P transfers, exchange and other supported on-chain operations.

Can OXN be exchanged for other assets?

Technically, OXN can be used in supported exchange and trading services. The actual availability of markets, liquidity and convertibility to fiat depend on specific venues and providers and are not guaranteed by the protocol.

For partners

How can a company integrate OXN?

Through the standard token interface in EVM-compatible infrastructure. A partner can use OXN for crediting cashback, referral rewards, incentivizing activity and settlements.

Does a partner need to issue its own token?

No. The partner uses the existing OXN and does not need to create its own token or separate blockchain infrastructure for reward mechanics.

Where does a partner get OXN for rewards?

The partner acquires OXN on the open market or uses the volume of tokens available to it. No separate emission of OXN for partners is provided for.

What does a user get for interacting with a partner?

The user can receive OXN for target actions: purchases, referrals, subscription renewals, activity, reviews, micro-activities and other actions defined by the partner.

Mining

Do I need to buy expensive equipment to mine OXN?

No, participation does not necessarily require purchasing your own ASIC equipment or industrial infrastructure. The project's user layer is designed for simplified connection to mining through accessible interfaces and the pool.

What is the Official OXN Pool?

It is the official pool for mining OXN, through which user onboarding and the distribution of mined rewards are organized at launch. During the liquidity formation period (the first 17,532 issuances, ≈ 4 months), the pool fee is 25% / 25% / 12% / 8% and goes to the Liquidity Bootstrap address; thereafter, 2% of the pool reward goes to the operating reserve and 98% to pool participants.

Will other pools appear?

A single pool is the launch configuration, not a permanent one. As the network's total hashpower grows and becomes more distributed, the project plans to open mining to independent pools, publish the pool software as open source and hand over pool admission to an on-chain vote of OXN holders (DAO). These are the project's intentions, not a commitment with fixed deadlines; at launch, independent pools and solo mining are not available.

Security and risks

Has the OXN code been audited?

Yes. An independent audit of critical smart contracts was performed by Hexens in August–September 2026 (final report dated 10.09.2026): 0 critical, 0 high, 2 medium and 2 low findings. All identified vulnerabilities were fixed before the contracts were deployed. See Section 8 for details.

Does OXN guarantee an increase in value?

No. OXN does not guarantee returns or growth in market value. Price, liquidity and demand are determined by the market and depend on the number of users and partners, available use cases and market conditions.

Glossary

Term	Definition
AML / CTF	Measures and procedures to counter money laundering and terrorist financing.
AMM	Automated Market Maker — a mechanism for automated market making and token exchange through liquidity pools.
Batch Transaction	An operation that allows a large number of transfers or accruals to be executed within a single transaction or batch operation.
BSC	BNB Smart Chain — the EVM-compatible blockchain on which OXN is deployed.
Claim	The mechanism by which a user receives accrued OXN to their own on-chain address. Tokens are created (minted) precisely at the moment of claim.
Circulating supply	Total supply minus OXN on disclosed project addresses: the operating reserve, the Liquidity Bootstrap address and project-owned liquidity pools.
DAO	An on-chain vote of OXN holders to which decisions on adding and removing pools are planned to be handed over.
DEX	Decentralized Exchange — a venue for exchanging digital assets without a traditional centralized intermediary.
ERC-20	The interface standard for fungible tokens in EVM-compatible networks. OXN uses an ERC-20-compatible interface (BEP-20) on BNB Smart Chain.
EVM	Ethereum Virtual Machine — the smart-contract execution environment with which BNB Smart Chain is compatible.
Fair Launch	A token launch without pre-issuance for the team or investors, premining or hidden allocations.
Liquidity Bootstrap	A disclosed project address that receives the entire Official OXN Pool fee during the liquidity formation period for forming OXN/USDT liquidity.
Liquidity formation period	The first 17,532 issuances (≈ 4 months), during which the Official OXN Pool fee is temporarily 25% / 25% / 12% / 8% and goes to the Liquidity Bootstrap address.
Liquidity Pool	A pool of tokens used to enable exchanges on decentralized trading venues.
Merkle root	An on-chain snapshot of pool participants' cumulative balances; claim entitlement is verified against it.
MiCA	Markets in Crypto-Assets Regulation (EU 2023/1114) — the regulation of crypto assets in the European Union.
MINTER_ROLE	A technical role for submitting confirmed mining results to the contract. Each address with this role is a separate pool with its own accounting.
Multisig	A multisignature wallet: an administrative action requires several signatures rather than a single key. The OXN admin multisig uses a 4-of-7 scheme.

Term	Definition
On-chain	An action or data that is recorded and verified directly on the blockchain.
Operating reserve	OXN received through the standard 2% Official OXN Pool fee, held on a disclosed project address. The project's only OXN reserve.
PoW	Proof-of-Work — an issuance mechanism in which the creation of new OXN is linked to confirmed computational work. Consensus of the network itself is provided by BSC.
Premining	Issuance of tokens before the public start of the main emission mechanism.
P2P	Peer-to-peer — direct interaction or transfer of assets between users without the need for a centralized intermediary.
Reward half-life (H)	105,192 issuances (about 2 years), over which the smoothly decreasing reward halves. A step of the curve, not a mining term.
Successful mining (issuance)	One successful call of mine() confirming a found PoW solution. It records the reward in the pool's accounting; no tokens are created.
Utility Token	A token intended primarily for use in specific products, services, settlements or reward programs.
Vault	An accounting module for accrued but not yet claimed rewards: it keeps records of unclaimed balances and Merkle roots, not the tokens themselves, and verifies claim rights. It is not a project treasury.
ZK / Zero-Knowledge	A cryptographic approach that makes it possible to prove the correctness of a statement without revealing the underlying data.

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