



Light Paper

Setheum - As it Is... Just Unique!

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The Setheum Whitepaper is available for reference and further reading, but it is quite outdated, this updates on many of the numbers and parameters of the White Paper, but the concept is basically the same.

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The Blockchain Network

Setheum is a DeFi operating system, liquidity exchange provider, and financial system that resolves the issues of liquidity and stablecoin reliability issues mostly raised by centralized stablecoins by creating algorithmic elastic stablecoins stabilized by pristine crypto assets and managed by the network's democratic governance system that gives back all upturn elasticity returns and market growth to the community.

Setheum is built with the Substrate modular interoperable blockchain framework and is based on the Nominated Proof of Stake (NPoS) consensus algorithm.

In Setheum, one can pay for transaction fees in any token currency without having to hold Setheum's native token.

Setheum implements a free and fair economic system that pursues equality of opportunity and the maximization of public utility in the crypto-economy.

Motivation and Inspiration

The Inspiration behind Setheum was initially to provide an alternative payment system to the current FinTech atmosphere.

To create a system that is bipartisan and open to the public providing an easy to use remittance network that is also easy to onboard, attractive for day-to-day spending and transparent.

Something I could build an ecommerce platform on and use as the main payment option and a bridge between traditional finance and cryptocurrency in both low-level and high-level endpoints, especially in the less developed and developing parts of the world.

The motivation is to make it easier for the free-flow of capital internationally and intersystematically (interoperability between distinct systems/networks), to maximize capitalization and economic growth, realizing that this is the solution for many of the problems challenging communities around the world, inequality in capital distribution and discrepancies in the free flow of capital between equality of opportunities and systematic fairness in capital distribution. Equality of opportunities cannot be achieved without the free-flow of capital, while there is no systematic fairness in the distribution of capital there can be no free-flow of capital in the hands of the public.

In Setheum, the capital will be directed to the public for the public utility in the Setheum economy through various mechanisms including CashDrops, to be discussed further below, and the Setheum Public Fund also to be discussed further below.

Principles and Core Values

Setheum has a set of Principles and core values that shall not change or get corrupted in its underlying governance.

Setheum is following the Islamic Finance principles and core values in compliance to the Shari'ah in respect to Economics and Financial applications.

This simply means in its basics that Setheum as a system will and shall not implement any products in its core system modules that supports, builds or implements non-halal financial products, mainly interest-based loans and related interest-bearing products as a network.

The stablecoin system in Setheum also does not support interest and usury. Setheum is an interest-free financial system.

This does not mean however that products built on or integrating to Setheum have to abide by these principles, rules and values. They do not have to.

These laws are only pertaining to the system modules of Setheum as a network system and the entirety of the Setheum blockchain core under its governance system.

Smart contracts build and deployed on the Setheum Network for example on the Setheum EVM (SEVM) can implement and build whatever they want however they want to do what they want, as long as this has nothing to do with changing the values of what Setheum stands for and the governance of the network.

These laws, values and principles are the core pillars of Setheum so they cannot ever change and should not ever change.

You can build outside of these laws on Setheum, as long as they are not built-in to the code of Setheum as a blockchain network.

Setheum Foundation & the SPF

The Setheum Foundation is the non-profit organization that supports development and growth in the Setheum ecosystem. It supports projects and teams building on Setheum with financial grants, technical support, community partnerships and community support.

Most importantly, the Setheum Foundation stewards the Setheum Public Fund (SPF)(previously the Setheum Charity Fund) that supports humanitarian and environmental causes to help the needy and underprivileged communities, minorities, orphans, physically challenged, the sick, refugees, and animals around the world.

It focuses on funding NGOs, Public Health and Research Institutions around the world and communities in need to lessen the suffering felt by all kinds of people, communities, animals around the world and even ecological problems.

The Setheum Foundation also supports R&D in blockchain technology, cryptography and computing for the common good of the public.

Setheum EVM (SEVM)

The Setheum EVM (SEVM) enables Solidity smart contracts to be deployed on the Setheum blockchain with minimum changes. It also offers many distinct features such as **"bring your own gas"** (paying fees in any tokens other than Setheum's native token), and an **on-chain automatic scheduler** that enables use cases like subscription and recurring payments, **microgas** (paying very miniscule gas fees) etc.

Setheum Elastic Reserve Protocol (SERP stablecoin ecosystem)

The Setheum Elastic Reserve Protocol (SERP) is the backbone of the Setheum Economy, it is the stablecoin financial system of Setheum first of its kind and unique to Setheum.

The Serp implements algorithmically stabilized stablecoins that are serped or stabilized algorithmically with the Serp Reserve Asset called the "Serp Dinar" which is a Tier-1 token (free-floating cryptocurrency) on Setheum, sort of like the gold-standard but superior in technology and system utility. The Serp Reserve Asset of the "Setter (SETR)" is the "Serp Dinar(DNAR)" while the "Setter (SETR)" is the Serp Reserve Asset of the "SetCurrencies". More SetCurrencies can be added to the network simply through a runtime upgrade.

When a Setheum StableCurrency goes higher than its peg in price (higher demand than supply), then that height in demand is injected into the economy to stabilize the price of that stablecurrency, we call that a SerpUp, the opposite is done for a SerpDown to Serp down the supply.

The supply injected into the economy during upturns/serpups of a stablecurrency is distributed as described below:

- 40% to buy back the Serp Reserve Asset for burning;
- 10% to the “Setheum Public Fund”;
- 50% to the “CashDrop Pool” for users to claim;

The SERP also issues a per period inflation rate balance for the Setheum stable currencies, the inflation rate can be adjusted through the governance under the Setheum Shura Council with a democratically voted approval by the members of the Shura Council. The Governance is discussed further below.

The initial inflation rates at Genesis will be at 5%. The injected inflation balance will be distributed as such in the table below:

Currency	Treasury	BuyBack DNAR	BuyBack SETR	BuyBack SETHEUM	Charity Fund	CashDrop Pool
SETR	10%	30%	-	-	20%	40%
SETEUR	5%	20%	20%	5%	10%	40%
SETUSD	5%	20%	20%	5%	10%	40%

CashDrops

CashDrops are essentially cashback given to the users of the Setheum currencies whenever they claim on their transactions.

So, each transaction has a toggle button that says “claim cashdrop” before the transaction is sent (transfers “to” only).

Below is the CashDrop claims minimum transfer amounts that can claim and cashdrop rates per currency of claim (these parameters can be updated via network runtime upgrade with the approval of the governance council of Setheum):

Currency	Minimum Claimable Transfer	Claim Rate
SETR	1 SETR	4%
SETEUR	2 SETEUR	3%
SETUSD	2 SETUSD	2%

Tokens & Stablecoins

There are two classes of currencies, free-floating tokens (what I like to call the “Tier-1 Tokens” (T1)), and stable-currencies (what I like to call “Tier-2 Tokens” (T2)) in Setheum.

Currency	Token Class	Initial Supply	Initial Price	Initial Market Cap
SETHEUM (Setheum)	T1 - free-float	852,000,000 (852 Million)	\$0.01	\$8,520,000 (8.52 Million USD)
DNAR (Serp Dinar)	T1 - free-float	258,000,000 (258 Million)	\$0.01	\$2,580,000 (2.85 Million USD)
SETR (Setter)	T2 - stablecoin	3,130,000,000 (3.13 Billion)	\$1.25 pegged	\$3,912,500,000 (3.9125 Billion USD)
SETEUR (SetEuro)	T2 - stablecoin	2,580,000,000 (2.58 Billion)	€1.00 pegged	€2,580,000,000 (2.58 Billion EUR)
SETUSD (SetDollar)	T2 - stablecoin	2,580,000,000 (2.58 Billion)	\$1.00 pegged	\$2,580,000,000 (2.58 Billion USD)

Initial Token Allocations

Initial Allocations for the Setheum Currencies is described in the table below:

Currency	Treasury	Charity Fund	Cash Drop Pool	Foundation	Team	Initial DEX Liquidity	Advisors	Strategic Partners	Initial Airdrop Event (IAE)	-
SETHEUM	10%	20%	-	25%	25%	5%	2%	3%	10%	-
DNAR	10%	20%	-	25%	25%	5%	2%	3%	10%	-
SETR	10%	10%	12%	20%	18%	2%	2%	6%	20%	-
SETEUR	10%	10%	12%	20%	18%	2%	2%	6%	20%	-
SETUSD	10%	10%	12%	20%	14.6%	5.4%	2%	6%	20%	-

AirDrops

In Setheum, Airdrop functionality is provided to the public with an interface, such that anyone can create and distribute an Airdrop with just a click by providing a JSON file containing airdrop currency, airdrop recipient accounts, and airdrop amounts associated with each recipient.

Built-In Exchange (SetSwap - DEX)

Setheum has a built-in Decentralized Exchange that I like to call “SetSwap” (initially SettleInDex). In SetSwap there is what I call the EFE (Exchange Fee Evaluator) that is the first of its kind and unique to Setheum (one of the Setheum originals). The EFE essentially lets available two types of Exchange fees, one for Tier-2 paired pools (LPs paired with at least one Setheum stablecurrency for example “BTC_SETUSD_LP”), then another fee structure for every other pool that is not a “T2-Paired-LP” on the DEX.

Exchange Fee Evaluator (EFE)

The EFE structure takes less fees from traders that swap with a “T2-Paired-LP” than it takes from a “non-T2-Paired-LP” (a “non-T2-Paired-LP” is for example “BTC_DNAR_LP”).

The difference between these fees is then paid to the pool by the SERP by issuing the T2-token (stablecurrency) to the pool to balance out the full Exchange Fee.

This lets the traders pay less fees while the LPs (Liquidity Providers) earn more fees. The SERP lets us do that with economic stability.

This in turn attracts more traders, more trading volume, more LPs, more liquidity, more market attractiveness, more trading opportunities and more natural economic growth based on market drive and demand, which in turn expands the SERP economy, which in turn props the market value of the Serp Dinar and the Setheum tokens which in turn improves overall market performance and economic growth.

The initial Exchange Fees are as such below (They can be updated with governance through runtime upgrades):

- Exchange Fee: 0.3%;
- T2 Exchange Fee: 0.1%
- EFE Effect (Difference): 0.2%

Governance

The Governance of Setheum is based on an on-chain governance mechanism that supports democratic approval processes for network runtime upgrades and on-chain parameter updates through extrinsics with governance approvals.

The Setheum governance system involves these following governance chambers:

- ★ The Shura Council: This is the general governance council of the Setheum network in charge of electing the Technical Committee and approving Runtime Upgrades, and approving proposals and referenda democratically.
The initial tenure for the Shura Council Members (election period) is 16 weeks (6 months). They govern the inflation rates, exchange fees, cashdrop rates, oracles, staking slash reversal, Setheum Treasury, et al.
- ★ The Technical Committee: This is in charge of the technical aspects like debugging, code maintenance and runtime upgrades.
- ★ The Referendum Chamber: This is a public chamber that lets SETHEUM token holders vote on certain topics approved and pushed to this chamber by the Shura Council.

Staking, Nominating and Validating (NPoS)

Setheum will use a Nominated Proof of Stake (NPoS) mechanism to secure the network. Nominators will nominate validators to be in the active set of validators by staking their Setheum (SETHEUM) with a validator(s). Validators will produce new blocks, validate blocks, and guarantee finality. It is important to note that validators will only earn rewards if they have enough staked SETHEUM to qualify to be in the active set. The active set will update every era, which is 4 hours (initially was 24 hrs, now upgraded) on Setheum. Setheum is able to provide strong finality and availability guarantees with much fewer validators. Therefore, Setheum uses Nominated Proof of Stake (NPoS) to select validators from a smaller set, letting smaller holders nominate validators to run infrastructure while still claiming the rewards of the system, without running a node of their own. And so with Setheum able to stay alive even when most of the network goes offline, Setheum will be able to survive WWII.

The Staking rewards range from 14% to 20%.

Initial Airdrop Event (IAE)

Setheum's initial Token Offering will not be a traditional ICO, IEO or IDO. It will instead be an IAE, an Initial Airdrop Event that will take place on our Community Social Media outlets. In this event, we will give away the IAE Allocated tokens as allocated above in the tables, in an airdrop on Setheum to the participants of the IAE. There will be a referral program in the IAE with a large number of participants. We will not require you to pay anything to join, it is absolutely free to join IAEs and this is also a free IAE.

Beware of scammers, we will never ask for your private keys, or to send us anything, or contact you individually or send you links on emails or DMs, and we will certainly not recommend that you use unknown and untrusted wallets.

So, keep in touch and wait for the IAE. We will announce it on our Social Media accounts. Follow us on the accounts on our website <https://setheum.xyz>

References and Further Reading

Setheum WhitePapers: <https://github.com/Setheum-Labs/Setheum-Labs-White-Papers>