

*In the name of God, the Lord of soul and wisdom,
Beyond this, no thought can reach.*



Rial Ethereum Whitepaper

March 2026

Introduction

Rial Ethereum is a fully decentralized ERC-20 token, mirroring Rial value, created to give Iranians real and complete control over their money. The system runs entirely on the Ethereum blockchain through an immutable smart contract that acts as a transparent fund. Anyone in the world can send Ethereum to the contract and instantly receive Rial Ethereum tokens at the current market price. In the same way, anyone can return their tokens to the contract at any time and receive Ethereum back at the prevailing market price. Every step is automatic, with no banks, no government, and no central authority able to interfere. The mission is clear: to build a digital Rial that no regime or institution can freeze, confiscate, or censor. The entire Ethereum reserve that backs every token lives inside the smart contract, and the code itself enforces all rules forever. This creates true free-market money where the money is supported by the market not the government.

Disclaimer: This whitepaper is for informational purposes only. Always do your own research and fully understand the risks before using any decentralised protocol.

The Problem We Solve

For decades, the Iranian banking system has been under total regime control. Banks can freeze accounts, set daily limits, delay transfers for hours or days, and monitor every movement. During protests, sanctions, wars, or internet shutdowns, people often lose access to their savings completely. Even when everything works, identity checks and surveillance give the regime power to confiscate funds at any time. Traditional money in Iran is not truly owned by the people — it belongs to the system. Rial Ethereum changes this by moving the entire monetary process onto Ethereum, the most secure and decentralized blockchain ever built. Your wallet becomes your personal bank, and no one outside your control can touch what is inside it.

Once Iran is free and has a democratic government, will we still need decentralized money like Rial Ethereum?

The answer is yes — and the reasons are fundamental.

True democracy requires a clear separation of powers. One of the most important separations is between the government and the central bank. The central bank and monetary policy must remain completely independent from politicians. However, even in many democratic countries today, this independence is under constant threat. A decentralized monetary system like Rial Ethereum helps protect this independence and strengthens the separation of power.

Central banks naturally want total control. In the name of regulation and anti-money laundering, they often restrict people's accounts and transactions. Because they are large bureaucratic organizations, they tend to become inefficient and slow. Their bad policies end up hurting the entire economy. But when people have a real alternative like decentralized money, the central bank is forced to compete. It must improve its services and become more efficient, or people will simply move their money elsewhere.

For example, with Rial Ethereum you can send 1000 billion RIALE to anyone in the world, instantly, 24 hours a day, without asking permission or filling out any forms. A traditional central bank will almost never allow this level of freedom. Competition from decentralized systems forces them to offer better service to the people.

Politicians often make big promises during elections. To pay for these promises, some try to access citizens' private assets. They are often supported by powerful and corrupt companies. Over time, they change laws to take more control over people's money and property. Even in democratic systems, the fundamental right to own private property is constantly under attack. This right is the foundation of a free economy and a free country. Without it, individual freedom disappears. Decentralized money acts as a powerful shield.

It creates a safe space where no government, politician, or bank can touch your assets. Only you control your money. This protection gives people and entrepreneurs more confidence to invest, create businesses, and build the economy.

In short, decentralized money protects freedom in three critical ways:

- It supports the separation of powers.
- It forces the banking system to become more efficient through real competition.
- And most importantly, it protects **the sacred right of private property**.

How Rial Ethereum works

Rial Ethereum is essentially a decentralized fund. Each Rial Ethereum token represents one unit of this fund, and its reserve asset is Ethereum. The entire fund is managed by a fully decentralized smart contract on the Ethereum blockchain. The contract issues new tokens when users send ETH to it, and redeems those tokens by paying the equivalent amount of Ethereum directly back to the holder.

To buy Rial Ethereum tokens, simply send any amount of ETH to the issuance address "**sodor.rial.eth**". The smart contract automatically reads the current market price from its price feed, deducts a 0.1% commission, and instantly mints the exact number of tokens into your wallet. All the Ethereum you send stays locked inside the contract as permanent backing for the newly issued tokens.

To sell Rial Ethereum tokens, the easiest and most reliable way is to send your tokens directly to the redemption address "**ebtal.rial.eth**". The smart contract automatically burns the tokens you send and returns the corresponding amount of Ethereum to your wallet after deducting the 0.1% commission.

No special apps or interfaces are needed — any standard wallet such as Trust Wallet or MetaMask can do this with a normal transfer.

The Treasury and Backing Mechanism

Every Rial Ethereum is an ERC20 token backed by real Ethereum held inside the smart contract. No one, including the project creators, can ever withdraw or move this reserve because the code makes it impossible. The contract continuously compares the total Ethereum reserve to the total number of tokens in circulation. The goal is for each token to hold a value close to one Iranian Rial. If at any moment the reserve ratio falls below what is required to support the full supply at the market price, the contract automatically switches to proportional redemption. In this mode, when tokens are sent for redemption, the holder receives a fair share of the remaining Ethereum reserve divided equally among

all current holders. This adjustment happens instantly as soon as the ratio drops — it does not require a dramatic or sharp fall in Ethereum's price against the Rial. The system protects itself and every holder from ever becoming insolvent.

Fees and Tokenomics

The only fee in the system is 0.1 percent on each buy or sell transaction. This small commission helps cover development and keeps the project sustainable. There are no fees for transferring tokens between users — only normal Ethereum network gas fees apply.

The launch was completely fair. No tokens were pre-mined, no allocations were given to any team or investors, and every single token in existence was purchased with real Ethereum by real users. The token name displayed in wallets and on explorers is "Riale Bazaar Azad" with the symbol "RIALE".

Risks

We want every user to understand the risks clearly and completely before using Rial Ethereum.

1. Because of internet filtering and sanctions inside Iran, you will almost always need a reliable VPN to access your wallet and make transactions. A complete nationwide internet shutdown could temporarily prevent you from reaching the blockchain, although your tokens remain perfectly safe on Ethereum.
2. In cryptocurrency you are your own bank. If you lose your private key or seed phrase, no one — not the project team or anyone else — can ever recover your funds. This responsibility is permanent and absolute.
3. Every transaction requires Ethereum gas fees, so you must always keep a small amount of Ethereum in your wallet, and sending very small amounts may not be economical.
4. The value of your tokens depends directly on the Ethereum reserve inside the contract. If Ethereum's price against the Iranian Rial falls, the contract immediately adjusts the redemption rate using the proportional mechanism explained earlier. You may receive less Ethereum than the current market price would suggest, but this automatic adjustment protects all holders equally and prevents the system from ever collapsing.
5. Ethereum is a public blockchain, so all transaction history and balances are visible to anyone. If you ever connect your real-world identity to your wallet address, your privacy could be compromised.
6. Global statistics show that 9 out of every 10 startups fail within their first year. As a startup in the challenging world of cryptocurrency, our journey is even more difficult. The reality is that building a decentralized stablecoin is a major global challenge that no one in the world has yet solved perfectly. We are moving exactly

on the edge of risk. Beyond the normal problems of any business, we face countless legal, technical, and advertising limitations.

7. The current price feed is centralized and represents the main trust assumption in the system. If it is compromised or manipulated, an attacker could mint a disproportionate amount of tokens and potentially drain most or all of the Ethereum reserve. See the following **Oracle Compromise Risk** section for full details.

Oracle Compromise Risk

At the current stage, the Rial Ethereum system depends on an external price feed (oracle) to determine the exchange rate between Ethereum and the Rial. This price feed is provided by a server controlled by the project team. While the smart contract and the Ethereum reserve are fully decentralized and cannot be altered or accessed by anyone, the oracle remains a centralized component and represents the primary trust assumption in the system.

If the oracle is compromised—either through a hack, leakage of its private key, or malicious intent by the operator—it becomes possible to manipulate the price data sent to the contract. Because the contract fully trusts this price input, any incorrect value will be used for minting and redeeming tokens.

A critical attack scenario illustrates the severity of this risk. Assume the total supply of Rial Ethereum is 1 trillion tokens, backed by a corresponding amount of Ethereum in the contract. If an attacker gains control over the oracle, they can artificially set the price of Ethereum extremely high—for example, reporting that 1 ETH equals 100 trillion Rial. The attacker can then send a very small amount of ETH (for example, 1 ETH) to the contract and receive an enormous number of tokens, effectively acquiring the majority of the total supply at negligible cost.

After acquiring this dominant share, the attacker can reverse the manipulation by setting the price back to a normal or very low level. At this point, the system detects that the reserve is insufficient to support all tokens at the reported price and automatically switches to proportional redemption mode. In this mode, each token represents a share of the total Ethereum reserve.

Because the attacker now holds the majority of all tokens, they can redeem them and withdraw a proportional majority of the Ethereum held in the contract—potentially draining almost the entire reserve. The remaining users would still hold their tokens, but there would be little or no Ethereum left in the contract to redeem them.

It is important to emphasize that in this scenario, the smart contract itself is not broken and no rules are violated. The system behaves exactly as designed, but it relies on

incorrect price data. The vulnerability arises entirely from the centralized nature of the oracle.

This means that, in the worst-case scenario, if the oracle is compromised or misused, it is technically possible for a malicious actor to extract most or all of the Ethereum reserve from the system. Users' tokens would remain in their wallets, but their backing would be significantly reduced or effectively lost.

We are fully transparent about this risk. The current design prioritizes simplicity and functionality, but it includes this known trade-off. Our plan is to eliminate this vulnerability by replacing the centralized oracle with a fully decentralized price feed that aggregates data from multiple independent and verifiable sources. Once implemented, no single party will be able to manipulate the price, and this class of attack will be removed entirely.

Until that transition is complete, users should understand that the oracle is the only component that requires trust, and it carries systemic risk that can affect the entire reserve.

Decentralization and Security

The smart contract is immutable in its core functions. Even the creators cannot freeze tokens or touch the treasury. The only changeable part at this moment is the price feed address, and even that can be locked permanently with one transaction so it can never be updated again. The contract uses well-tested OpenZeppelin libraries and includes protection against common attacks. All rules are enforced by code that lives forever on the Ethereum blockchain.

Fair Launch and Community

Rial Ethereum was launched with total fairness. There were no pre-mined tokens, no investor rounds, and no hidden allocations. The entire project is driven by the community. We invite every Iranian to learn about it, use it, share it, and help strengthen the backing by participating. In the future we plan to lock the price feed forever and move to a fully decentralized oracle.

Future Plans

To expand, strengthen, and support the Rial Ethereum ecosystem, we have defined several key directions for future development. Our goal is to build a sustainable, community-driven, and truly decentralized system that can evolve into a real financial infrastructure over time.

Our first priority is organic community growth. This project depends on people who understand and believe in it. We aim to clearly communicate the importance of independent, decentralized money and why it matters. The protection of the private property (private ownership) right, free market, and individual financial sovereignty are fundamental principles behind this system. Educating users and spreading this perspective within the community is a core part of our strategy.

In parallel, we plan to seek grants and build strong connections within the broader blockchain ecosystem. By collaborating with other projects, organizations, and contributors, we aim to attract developers, builders, and supporters who are aligned with the vision of creating open and independent financial systems.

Another critical focus is increasing demand for the token. As explained earlier, when the price of Ethereum falls, the reserve backing the system becomes relatively smaller, and users may have to redeem their tokens at a price lower than the open market rate. To mitigate this, it is important to build sufficient demand so that users can trade their tokens within the community or in secondary markets at prices closer to fair market value, rather than relying solely on the contract for redemption.

To support this, we invite developers to build applications, tools, and services on top of the Rial Ethereum ecosystem. In addition, the team plans to launch an exchange that enables conversion between ETH and RIALE, as well as trading of futures contracts denominated in Rial. This exchange will be designed with incentives for market making to ensure deep liquidity and efficient price discovery. More detailed information about this initiative will be released in the future.

On the technical side, one of our main priorities is eliminating reliance on a centralized oracle. We are actively exploring multiple approaches, including the use of decentralized oracle networks such as Chainlink, price feeds derived from decentralized exchanges (DEX AMMs), and hybrid models that combine multiple independent data sources. The goal is to create a fully decentralized and tamper-resistant pricing mechanism.

We are also researching improvements to the system's pricing logic. Currently, the issue (mint) price is set at the market rate. However, in situations where the redeem price falls below the market price, it may be beneficial to increase the issue price in order to reduce supply. This could help strengthen demand, improve token pricing, and better protect holders. This area is still under research and development, and we are committed to finding the most robust and sustainable design.

We believe this project can only succeed through collective effort. We welcome contributions, ideas, and collaboration from the community. The future of Rial Ethereum will be shaped by those who choose to build, support, and participate in it.

Conclusion

Rial Ethereum is more than a cryptocurrency. It is a peaceful way for Iranians to take back control of their money. For the first time we have a digital Rial that no regime can censor, freeze, or confiscate. The treasury lives on the blockchain, the rules are written in unbreakable code, and the power belongs entirely to the people who hold the tokens in their wallets. Join the movement. Send Ethereum to "**sodor.rial.eth**" to get started, use "**ebtal.rial.eth**" to redeem when you need, and help spread the idea of truly free money. Together we are building the financial future Iran deserves.

Official Links

Contract address: [0x21c3AA992d0C5929459383d58B73cAAEa0a2584e](https://etherscan.io/address/0x21c3AA992d0C5929459383d58B73cAAEa0a2584e)

Website: <https://rialet.com>

Email: info@rialet.com

Github: <https://github.com/rialet/rialet>

Whitepaper: <https://rialet.com/whitepaper.pdf>

X: [@RialEthereum](https://twitter.com/RialEthereum)

Telegram: [@rialet](https://t.me/rialet)