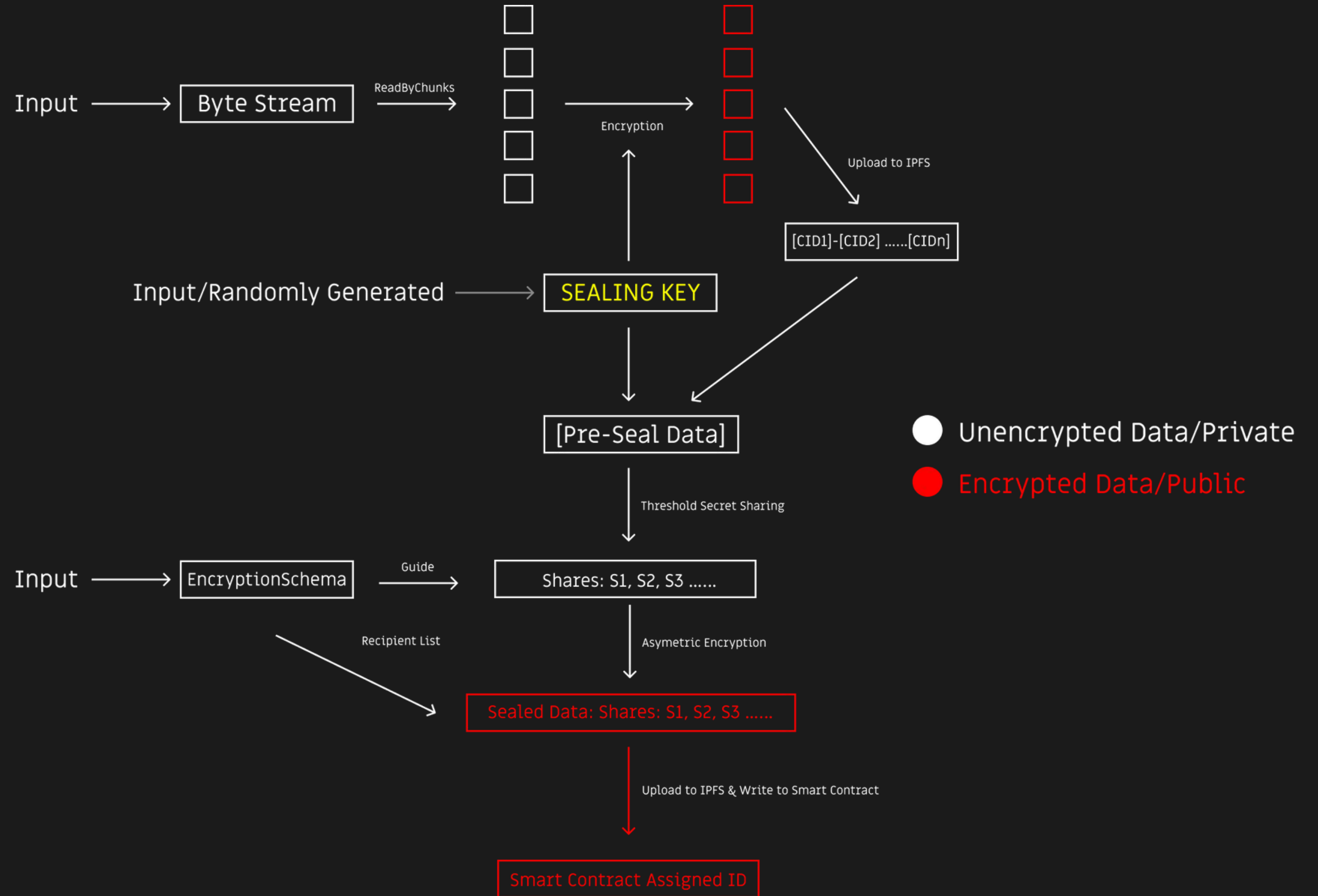
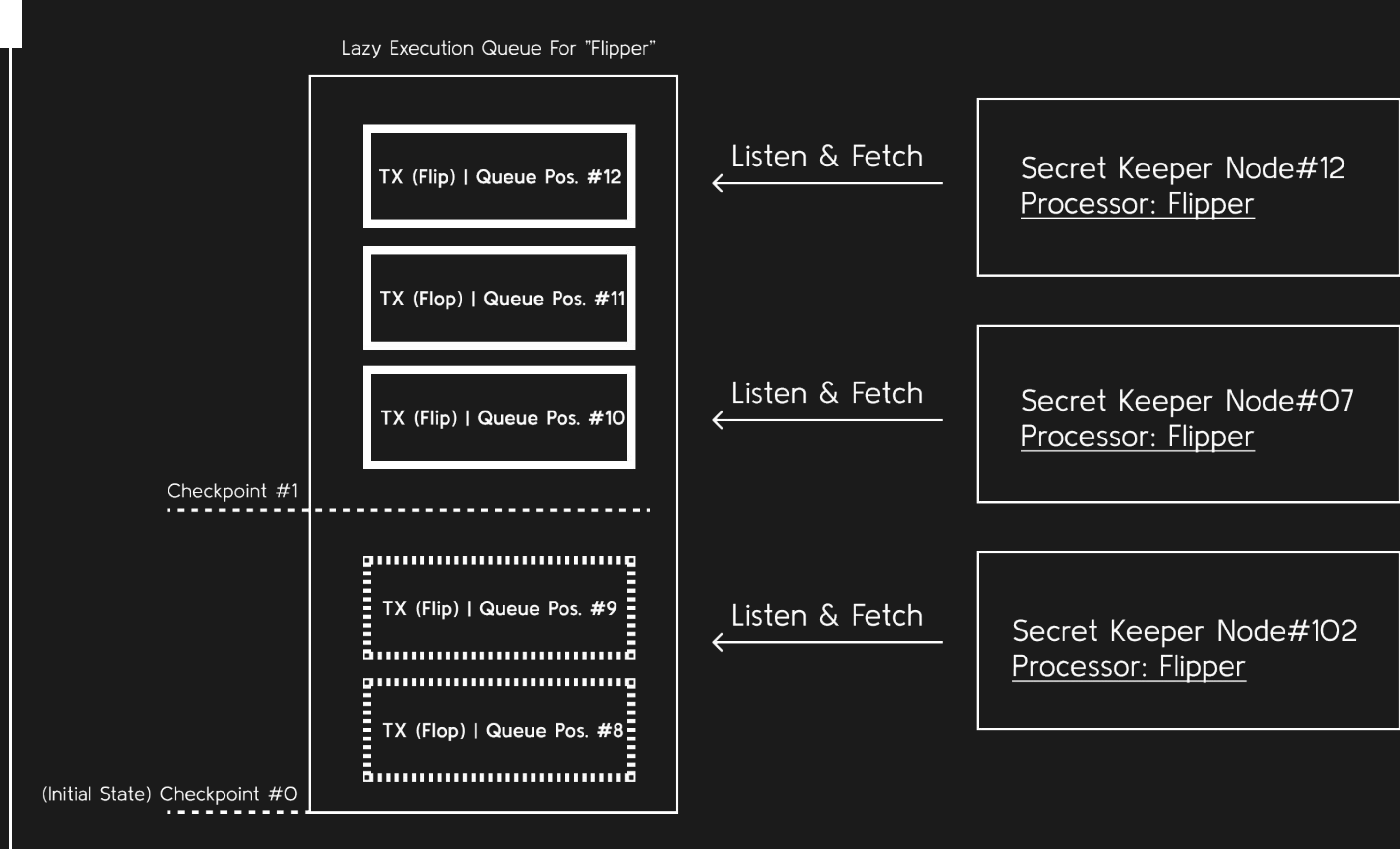


SkyeKiwi Protocol Design



Lazy
Execution
Queue



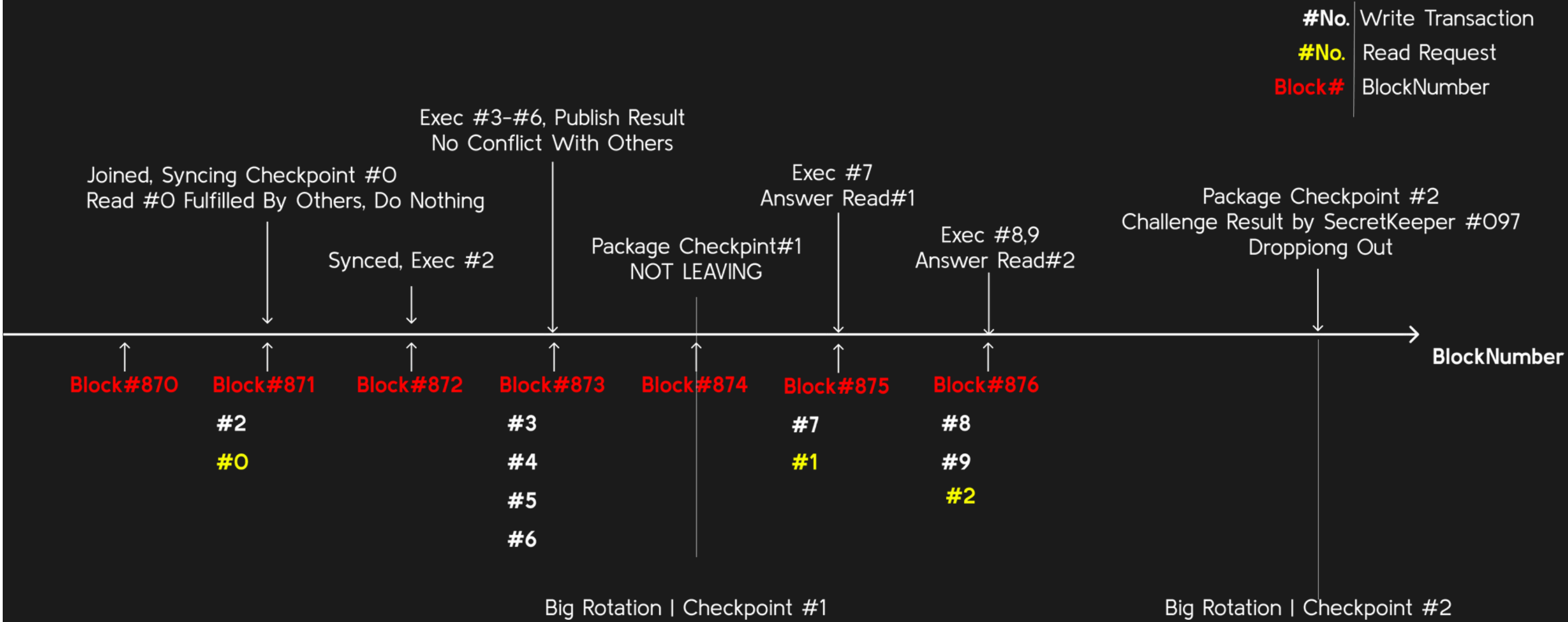
SkyeKiwi Network

Lazy TX Queue
For Secret
Contract
0x82736482



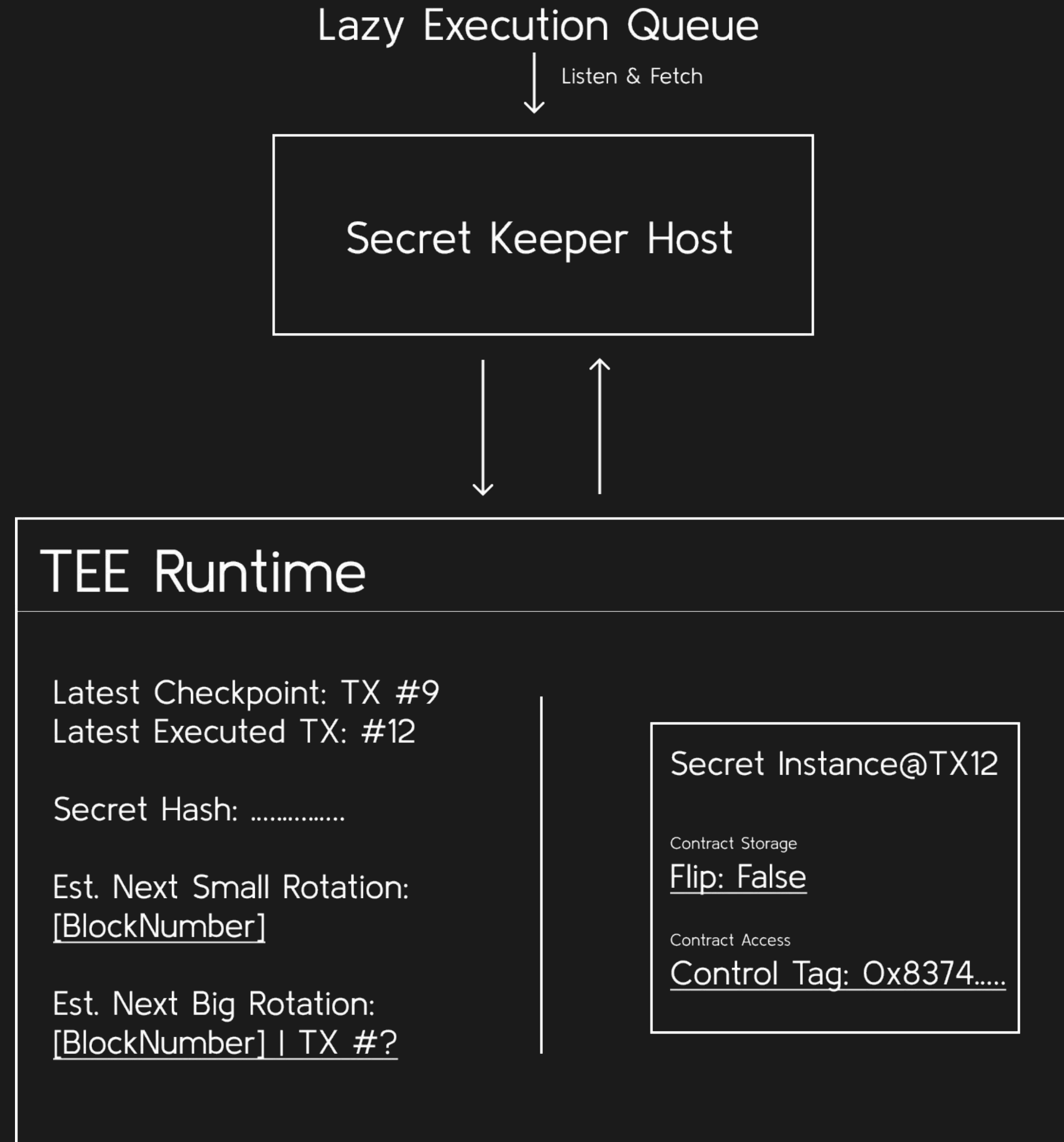
Executing Timeline For a SecretKeeper

SK #032



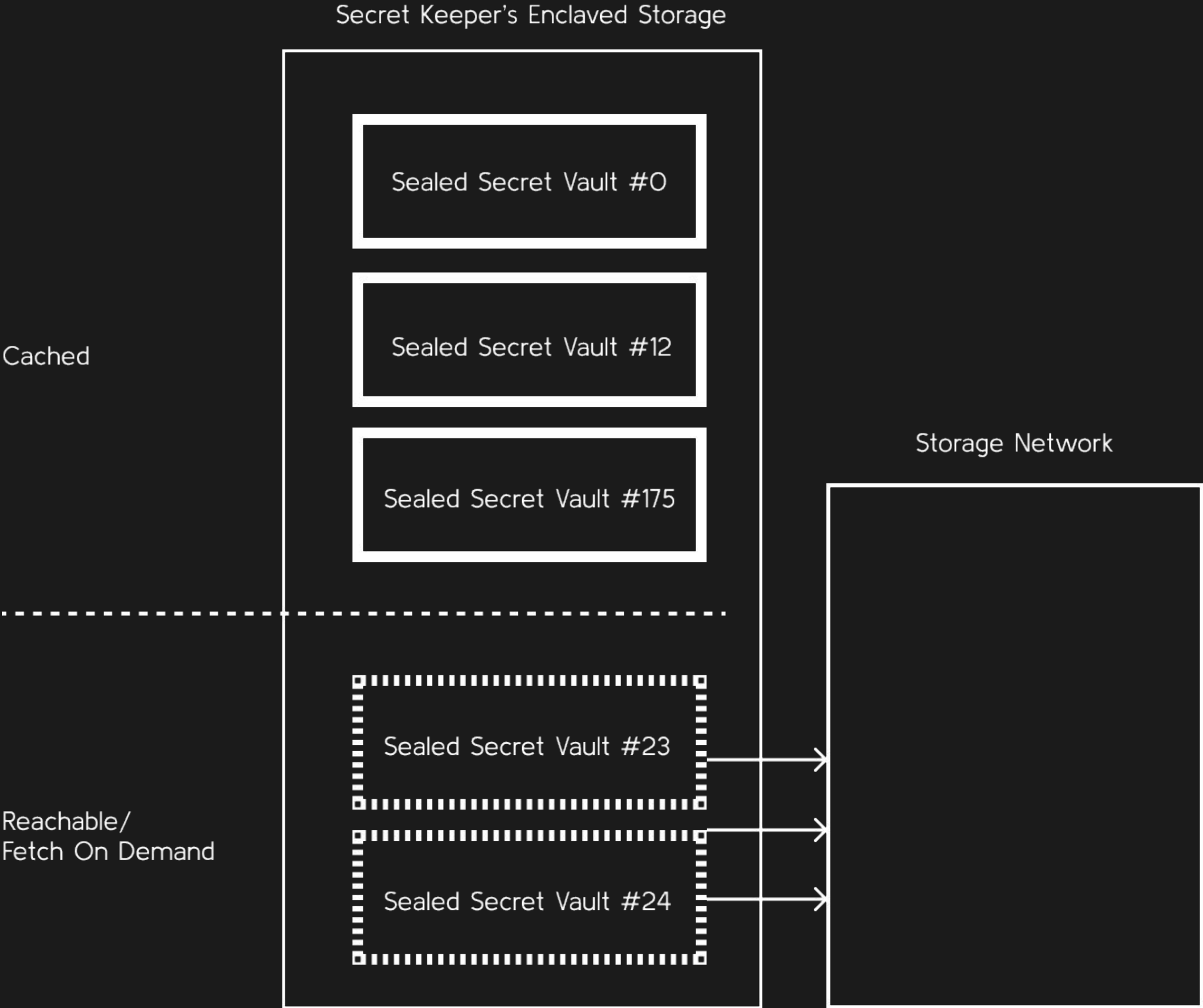
SkyeKiwi Network

How
SecretKeepers
Process secret
Requests?



SkyeKiwi Network

Cached/Reachable Encrypted States For a SecretKeeper



Economics



Economic Model

Token Inflation Model

The SkyeKiwi Network will adopt a two phase token inflation model.

Gas Fee

- Transactions involving secrets processing will be charged with a multiplier upon the public transaction cost. The multiplier can be fixed or changing.
- Gas fee will go to both node operators and secret owners.

Secret Slot Auction?

Secrets processing is expensive for the node operators. Most likely, one secret can serve many contracts. Therefore, we are limiting the number of secrets available to the network. Secret slots can be auctioned or claimed, upon market demands.



Two Phase Release Schedule

Fixed release for the first 5 years, then decrease exponentially with a half-life of 2 years.

On Network Genesis: 1 Billion SKW

On Far Future: 3 Billion SKW

Against Demand Uncertainty

New customers have to take a greater risk for an inadequate service.

Consequently, on an exponentially decreasing supply schedule, when the fees market is not established enough, the node operators might be rendered entirely unsustainable with decreasing subsidies.

Against Centralization

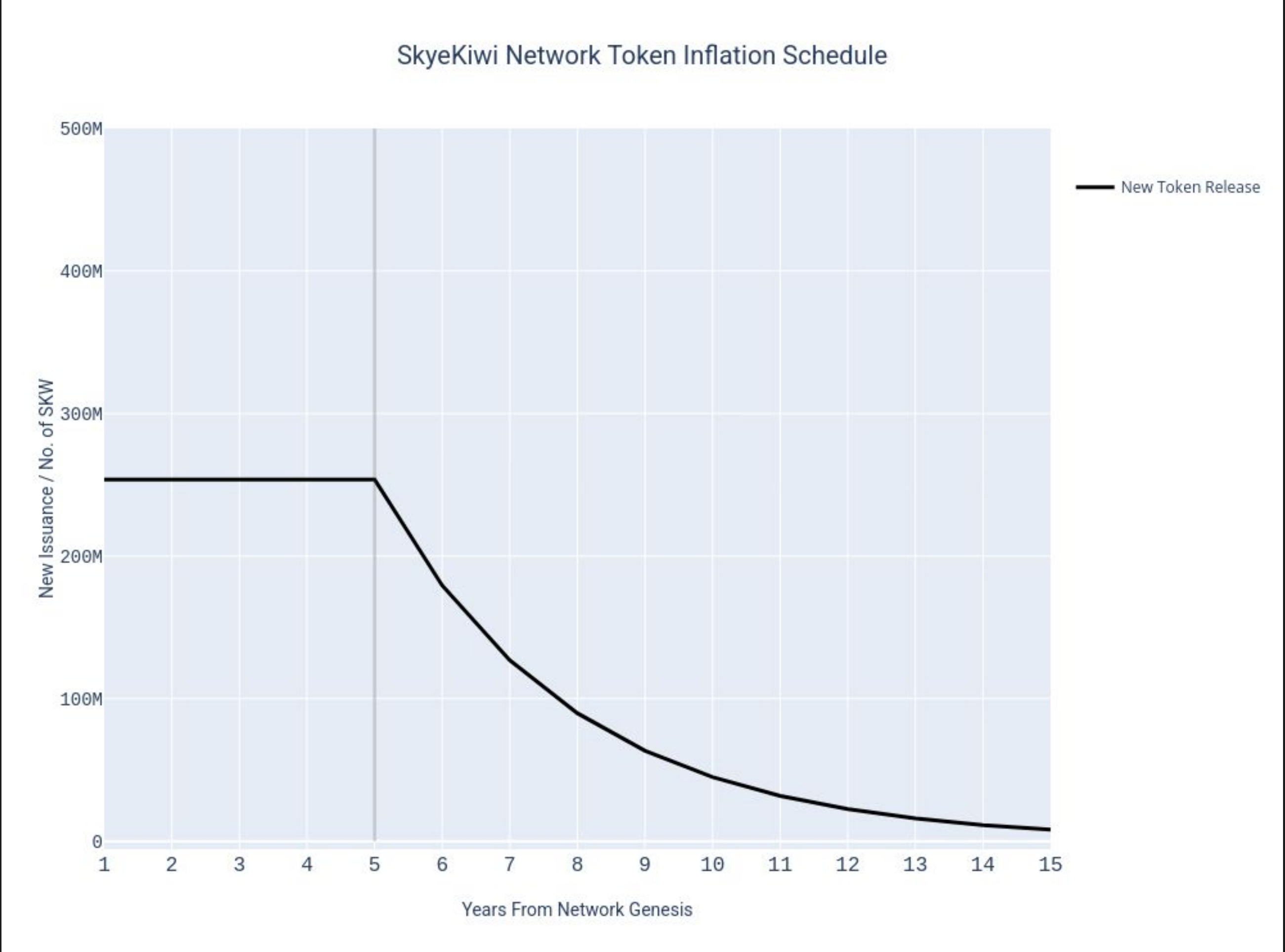
New customers have to take a greater risk for an inadequate service.

Consequently, on an exponentially decreasing supply schedule, when the fees market is not established enough, the node operators might be rendered entirely unsustainable with decreasing subsidies.

Against Risk to Pricing

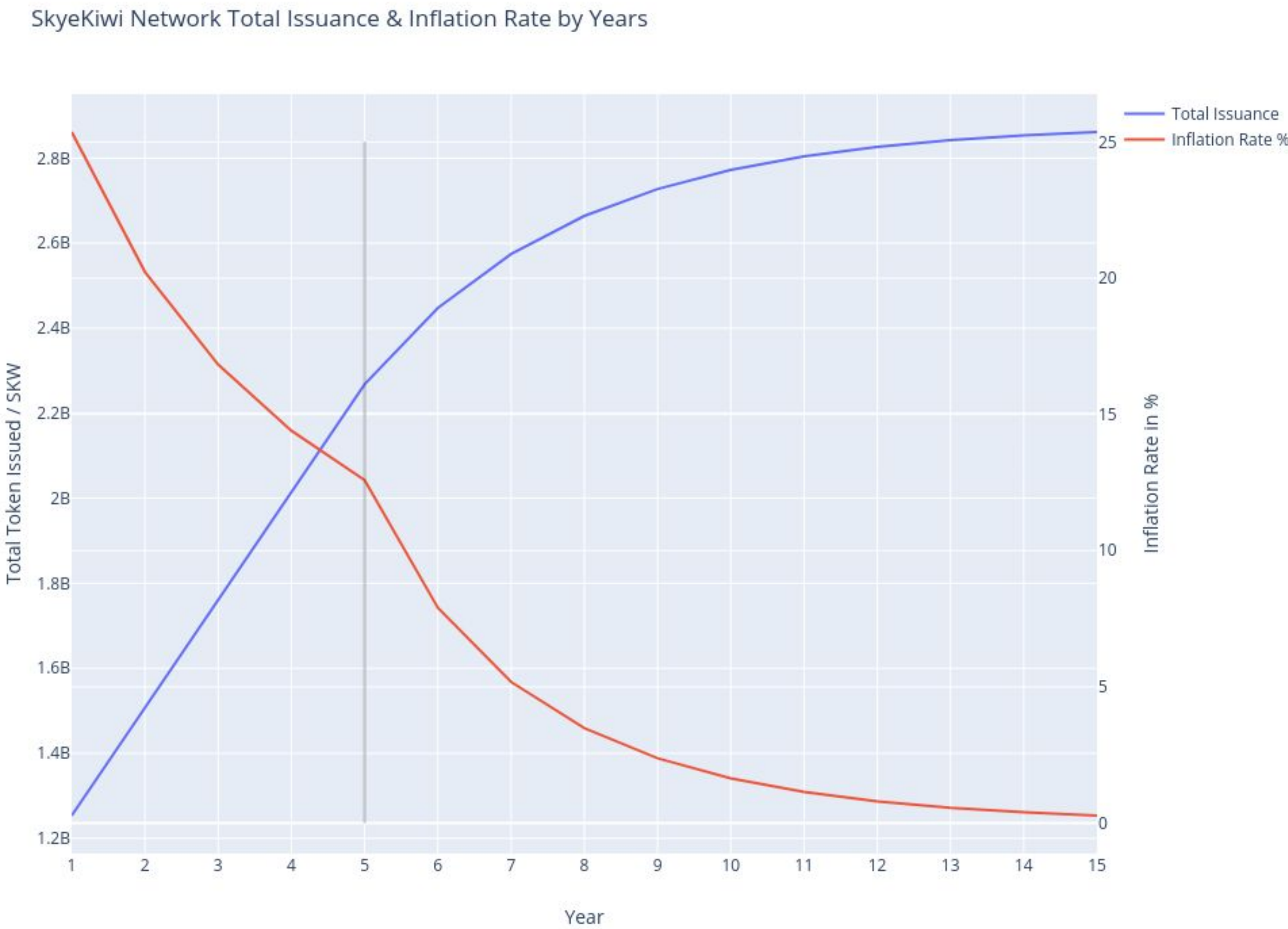
If the work required to collect subsidies does not align well with the work required to earn fees, the incentives for node operators might not be aligned with the purpose of the larger community. High but decreasing subsidies may compel node operators to offer unsustainably cheap service and raise prices once subsidies shrink in the early days of a network.

SKW Token Inflation Schedule



SKW Token

Total Issuance & Inflation Rate



9-Month Technical Roadmap



Milestone 1

Private POA Testnet

On SkyeKiwi Protocol

- IMPLEMENT explicit API for Proof-Of-Access
- IMPLEMENT APIs for secret version management and allow asynchronous modification for secrets

On SkyeKiwi Network

- IMPLEMENT registry for secrets
- IMPLEMENT the early lazy execution engine, on par with SmartWeave engine of Arweave
- CONFIG staking rewards to match the two phase token release schedule
- PORT SkyeKiwi Protocol to Rust

Misc Deliverables

- CONTRIBUTE to Polkadot.js to enable the browser extension to encrypt/decrypt messages
- INTEGRATE a private faucet bot
- INTEGRATE SkyeKiwi Protocol to use the testnet Secret Registry
- INTEGRATE Arweave archiving with SkyeKiwi Protocol
- RUN some IPFS clusters to temporary cache chunks before the Crust Network fetches it
- BUILD KiwiSign, the open source contract signature platform

Milestone 2

POA Testnet with TEE

On SkyeKiwi Protocol

- INTEGRATE Arweave for file hosting
- AUDIT for both TypeScript & Rust implementation

On SkyeKiwi Network

- IMPLEMENT on chain registry for Secret Keeper Nodes
- IMPLEMENT the Small and Big Rotations
- IMPLEMENT the lazy execution task queue
- INTEGRATE TEE RemoteAttestation
- INTEGRATE TEE to run the SkyeKiwi Protocol
- INTEGRATE TEE to run the Lazy Execution Engine

Misc Deliverables

- EXPECTED to be able to shutdown SkyeKiwi IPFS nodes and run on Decoo instead
- INTEGRATE with wallet makers and find a good portal for users to access the SkyeKiwi Network
- DEPLOY a test smart contract to demonstrate to others



Milestone 3

Public Testnet

On SkyeKiwi Protocol

- ENSURE it is stable enough

On SkyeKiwi Network

- IMPLEMENT the economic incentive model for node operators
- IMPLEMENT the fee market structure to forwards fee to secret deployer
- IMPLEMENT secret checkpoints
- INTEGRATE essential chain-extensions and off-chain workers to the blockchain
- INTEGRATE an awesome DAO module to SkyeKiwi Network
- TEST on cross-chain functionalities on Rococo

Misc Deliverables

- ADOPT an efficient airdrop module for preparation of the pre-mainnet launch
- CONTRIBUTE to the WASM smart contract module on Substrate & maybe FORK a SkyeKiwi modified version of it
- DOCUMENTATE as much as we can. PROVIDE early developers a good overall tutorials of how to build with the SkyeKiwi Network