Join a Network

Follow this guide to join an existing network through statesync To quickly stand up a fresh full node and join in the network, it's recommended to sync through state sync. If you want to run a local instance of Sei, see[Running a Local Node](#)

Install Seid Binary

To stand up a sei node, the first step is to download and install seid on your machine. If you have not done so, follow the steps in[Install Seid](#) .

State Sync

State sync allows a new node to join a network by fetching a snapshot of the application state at a recent height instead of fetching and replaying all historical blocks. This can reduce the time needed to sync with the network from days to minutes.

Clean Up

If you are not starting a node from fresh, then you need to do some backups and clean ups.

Assuming your sei home directory is /root/.sei

backup priv_validator_state.json

cp

/root/.sei/data/priv_validator_state.json

/root/priv_validator_state.json

backup priv_validator_key.json

cp

/root/.sei/config/priv_validator_key.json

/root/priv_validator_key.json

backup genesis.json

cp

/root/.sei/config/genesis.json

/root/genesis.json rm

-rf

/root/.sei/data/* rm

-rf

/root/.sei/wasm rm

-rf

/root/.sei/config/priv_validator_key.json rm

-rf

/root/.sei/config/genesis.json Note: This step is not needed for fresh nodes.

Update Configurations

1. Set up rpc servers for primary and secondary endpoints. You can use one of the RPC endpoints from the[Tools and](#)

2. page.
3. Set up trust height and trust hash. Each snapshot is created at a certain block height, and best practice here is to set the trust height to be earlier than the latest snapshot block height to avoid backward verifications.

Example: set trust height and hash to be the block height 10,000 earlier

PRIMARY_ENDPOINT

https://sei-testnet-rpc.polkachu.com:443 TRUST_HEIGHT_DELTA = 10000

LATEST_HEIGHT

(curl

-s "PRIMARY_ENDPOINT" /block

|

jq

-r ".block.header.height") if [["LATEST_HEIGHT"

-gt

"TRUST_HEIGHT_DELTA"]]; then SYNC_BLOCK_HEIGHT = ((LATEST_HEIGHT - TRUST_HEIGHT_DELTA)) else SYNC_BLOCK_HEIGHT = LATEST_HEIGHT fi

Get trust hash

SYNC_BLOCK_HASH

(curl

-s "PRIMARY_ENDPOINT/block?height=SYNC_BLOCK_HEIGHT" |

jq

-r ".block_id.hash")

Override configs

sed

-i.bak

-e

"s|^trust-height =.|trust-height = SYNC_BLOCK_HEIGHT|"

~/.sei/config/config.toml sed

-i.bak

-e

"s|^trust-hash =.|trust-hash = \"SYNC_BLOCK_HASH\"|"

~/.sei/config/config.toml 1. Set up persistent peers. If you need additional bootstrap-peer or persistent-peer (used for known good peers) in ~/.sei/config/config.toml.See[Configure General Settings](#) 2. for more info about each peer field.

Example: Get the peers from polkachu rpc server

PRIMARY_ENDPOINT

https://sei-testnet-rpc.polkachu.com:443 SELF = (cat

/root/.sei/config/node_key.json

| jq

-r

.id)

curl

"PRIMARY_ENDPOINT" /net_info

| jq

-r

'.peers[] | .url'

| sed

-e

's#mconn://##' | grep

-v

"SELF"

PEERS

PERSISTENT_PEERS

(paste

-s

-d ',' PEERS) sed

-i.bak

-e

"s|^persistent-peers =.|persistent-peers = \"PERSISTENT_PEERS\"|"

~/.sei/config/config.toml 1. Enable state sync and disable db sync. Note, you can only enable either state sync or db sync at a time.

Enable state sync

sed

-i.bak

-e

"s|^enable =.|enable = true|"

~/.sei/config/config.toml sed

-i.bak

-e

"s|^db-sync-enable =.|db-sync-enable = false|"

~/.sei/config/config.toml

Restore Backups

Once you finished the above steps, if you previously have done the clean up step, we need to restore the previously backed up files.

Restore previously backed up files

cp

/root/priv_validator_state.json

/root/.sei/data/priv_validator_state.json cp

/root/priv_validator_key.json

/root/.sei/config/priv_validator_key.json cp

/root/genesis.json

/root/.sei/config/genesis.json Last updated onMarch 12, 2024[Configure General Settings](#) [Running Seid](#)