Cosmovisor

Setting Up A Node Using Cosmovisor

Cosmovisor is a new process manager for cosmos blockchains. It can make low-downtime upgrades smoother, as validators don't have to manually upgrade binaries during the upgrade, and instead can pre-install new binaries, and Cosmovisor will automatically update them based on on-chain SoftwareUpgrade proposals.

You should review the docs for Cosmovisor located here https://docs.cosmos.network/master/run-node/cosmovisor.html

Install Cosmovisor

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## Get the Cosmovisor binary

wget -O - "https://github.com/cosmos/cosmos-sdk/releases/download/cosmovisor%2Fv1.1.0/cosmovisor-v1.1.0-linux-amd64.tar.gz" | sudo tar -xz -C /bin cosmovisor sudochmod+x/bin/cosmovisor

## Make the necessary directory structure for secretd v1.2

mkdir-p~/.secretd/cosmovisor/genesis/bin

## Setup environment variables for every future bash session

## This will make sure to setup cosmovisor on you shell in

## in case you'll want to run the cosmovisor command manually

echo"# Setup Secret & Cosmovisor export SCRT_ENCLAVE_DIR="{HOME}/.secretd/cosmovisor/current/bin" export LD_LIBRARY_PATH="{LD_LIBRARY_PATH}:{HOME}/.secretd/cosmovisor/current/bin" export PATH="{PATH}:{HOME}/.secretd/cosmovisor/current/bin" export DAEMON_NAME=secretd export DAEMON_HOME="{HOME}/.secretd" export DAEMON_ALLOW_DOWNLOAD_BINARIES=false export DAEMON_LOG_BUFFER_SIZE=512 export DAEMON_RESTART_AFTER_UPGRADE=true export DAEMON_DATA_BACKUP_DIR="{HOME}" export UNSAFE_SKIP_BACKUP=true">>~/.profile source~/.profile

## Setup a systemd service

echo"[Unit] Description=Cosmovisor Secret Network Node After=network.target

[Service] Type=simple WorkingDirectory={HOME} ExecStart=/bin/cosmovisor run start User={USER} Restart=on-failure StartLimitInterval=0 RestartSec=3 LimitNOFILE=65535 LimitMEMLOCK=209715200 Environment=SCRT_ENCLAVE_DIR={HOME}/.secretd/cosmovisor/current/bin Environment=LD_LIBRARY_PATH={LD_LIBRARY_PATH}:{HOME}/.secretd/cosmovisor/current/bin Environment=DAEMON_NAME=secretd Environment=DAEMON_HOME={HOME}/.secretd Environment=DAEMON_ALLOW_DOWNLOAD_BINARIES=false Environment=DAEMON_LOG_BUFFER_SIZE=512 Environment=DAEMON_RESTART_AFTER_UPGRADE=true Environment=DAEMON_DATA_BACKUP_DIR={HOME} Environment=UNSAFE_SKIP_BACKUP=true

[Install] WantedBy=multi-user.target "|sudotee/etc/systemd/system/cosmovisor.service>/dev/null

sudosystemctldaemon-reload sudosystemctlenablecosmovisor

```

Set Up A New v1.2 Node

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## Make the necessary directory structure for v1.2

mkdir-p~/.secretd/cosmovisor/genesis/bin

## Get v1.2 binaries

wget -P /tmp/ "https://github.com/scrtlabs/SecretNetwork/releases/download/v1.2.2/secretnetwork_v1.2.2_mainnet_amd64.deb"

## Verify v1.2 binaries checksum

echo "1a51d3d9324979ef9a1f56023e458023488b4583bf4587abeed2d1f389aea947 /tmp/secretnetwork_v1.2.2_mainnet_amd64.deb" | sha256sum --check

## Extract v1.2 from archive

dpkg-deb-R/tmp/secretnetwork_v1.2.2_mainnet_amd64.deb/tmp/secretnetwork_v1.2.2_mainnet_amd64.deb.extracted

## Move v1.2 binaries to Cosmovisor's directory

mv/tmp/secretnetwork_v1.2.2_mainnet_amd64.deb.extracted/usr/{local/bin/,*lib/*}~/.secretd/cosmovisor/genesis/bin

```

Now the Cosmovisor directory structure should look like this:

```

Copy find ~/.secretd/cosmovisor /home/ubuntu/.secretd/cosmovisor/ /home/ubuntu/.secretd/cosmovisor/genesis/bin/ /home/ubuntu/.secretd/cosmovisor/genesis/bin/libgo_cosmwasm.so /home/ubuntu/.secretd/cosmovisor/genesis/bin/librust_cosmwasm_enclave.signed.so /home/ubuntu/.secretd/cosmovisor/genesis/bin/tendermint_enclave.signed.so /home/ubuntu/.secretd/cosmovisor/genesis/bin/secretd

```

Now you might want to checkout the How To Join Secret Network as a Full Node guide for syncing a node from height 0 or Sync with State-Sync for syncing a node from a more recent block height.

After making the proper configurations to your new node, launch it using sudo systemctl start cosmovisor . You should now see blocks executing in the logs (journalctl -fu cosmovisor).

Migrate A Running v1.2 Node

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## Make the necessary directory structure for v1.2

mkdir-p~/.secretd/cosmovisor/genesis/bin

## Disable the old secret-node systemd service

sudosystemctlstopsecret-node sudosystemctldisablesecret-node

## Move v1.2 binaries to Cosmovisor's directory

sudo mv /usr/local/bin/secretd /usr/lib/{libgo_cosmwasm.so,librust_cosmwasm_enclave.signed.so} ~/.secretd/cosmovisor/genesis/bin

## For a query node also move the query enclave

sudomv/usr/lib/librust_cosmwasm_query_enclave.signed.so~/.secretd/cosmovisor/genesis/bin

## Launch the Cosmovisor service

sudosystemctlstartcosmovisor

```

Now the Cosmovisor directory structure should look like this:

```

Copy find~/.secretd/cosmovisor /home/ubuntu/.secretd/cosmovisor/ /home/ubuntu/.secretd/cosmovisor/genesis/bin/ /home/ubuntu/.secretd/cosmovisor/genesis/bin/libgo_cosmwasm.so /home/ubuntu/.secretd/cosmovisor/genesis/bin/librust_cosmwasm_enclave.signed.so /home/ubuntu/.secretd/cosmovisor/genesis/bin/secretd

```

To relaunch your node, usesudo systemctl start cosmovisor . You should now see blocks executing in the logs (journalctl -fu cosmovisor).

Prepare A v1.3 Node Upgrade (Shockwave Alpha)

The "Shockwave Alpha" upgrade is anticipated to be on Wednesday April 27th, 2022 at 2:00PM UTC. Below are instructions to prepare Cosmovisor for automatically upgrading your node to v1.3.

```

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## Make the necessary directory structure for v1.3

mkdir-p~/.secretd/cosmovisor/upgrades/v1.3/bin

## Get & verify v1.3 binaries

## Uncomment goleveldb or rocksdb:

**wget -P /tmp/
"https://github.com/scrtlabs/SecretNetwork/releases/download/v1.3.0/secretnetwork_1.3.0_ma**

**echo "b5a4387fd3af477f1d7d0c8ab13debc9b9ad9abccb59c82b1a35cc8a90db902b
/tmp/secretnetwork_1.3.0_mainnet_goleveldb_amd64.deb" | sha256sum --check**

## or rocksdb

**wget -P /tmp/
"https://github.com/scrtlabs/SecretNetwork/releases/download/v1.3.0/secretnetwork_1.3.0_ma**

**echo "a1fc48003b3b563aae216901fc5821bb11164746c61b86507bc813cb49bd85cb
/tmp/secretnetwork_1.3.0_mainnet_rocksdb_amd64.deb" | sha256sum --check**

## Extract v1.3 from archive

dpkg-deb-R/tmp/secretnetwork_1.3.0_mainnet_*_amd64.deb/tmp/secretnetwork_1.3.0_mainnet_amd64.deb.extracted

## Move v1.3 binaries to Cosmovisor's directory

mv /tmp/secretnetwork_1.3.0_mainnet_amd64.deb.extracted/usr/{local/bin/secretd,lib/librust_cosmwasm_enclave.signed.so,librust_cosmwasm_query_enclave.signed.so,lib/libgo_cosmwasm.so}
~/.secretd/cosmovisor/upgrades/v1.3/bin

```

Now the Cosmovisor directory structure should look like this:

```

Copy find~/.secretd/cosmovisor /home/ubuntu/.secretd/cosmovisor/ /home/ubuntu/.secretd/cosmovisor/genesis/bin/ /home/ubuntu/.secretd/cosmovisor/genesis/bin/libgo_cosmwasm.so
/home/ubuntu/.secretd/cosmovisor/genesis/bin/librust_cosmwasm_enclave.signed.so /home/ubuntu/.secretd/cosmovisor/genesis/bin/secretd /home/ubuntu/.secretd/cosmovisor/upgrades/v1.3/bin/
/home/ubuntu/.secretd/cosmovisor/upgrades/v1.3/bin/libgo_cosmwasm.so /home/ubuntu/.secretd/cosmovisor/upgrades/v1.3/bin/librust_cosmwasm_enclave.signed.so
/home/ubuntu/.secretd/cosmovisor/upgrades/v1.3/bin/librust_cosmwasm_query_enclave.signed.so /home/ubuntu/.secretd/cosmovisor/upgrades/v1.3/bin/secretd

```

If set up properly, when the time comes Cosmovisor will perform an automatic v1.2 to v1.3 upgrade.

Was this helpful?