## Guide to Becoming a Validator for the Kima Network

Testing was conducted on Ubuntu 22.04

## Minimum requirements:

OS: Ubuntu 22.04 CPU: 2 vCPU RAM: 4 Gb HDD: 50 Gb

Open ports: 22, 26656, 26657, 9090, 5051, 5052, 5053, 8081, 8082, 7070

## **Installation steps:**

- 1. Copy two scripts testnet-validator-1.sh and testnet-validator-2.sh to the server by any convenient method.
- 2. Make these files executable using the command sudo chmod +x testnet-validator\*
- 3. Run the first script with the command ./testnet-validator-1.sh The script will install all necessary components and start the software installation
- 4. After the script successfully completes, you will receive the following message:

```
Successfully copied 110MB to /usr/local/bin/kimad {
    "latest_block_hash": "CFEFE1F4C72D9B37ACE217DA981EACB5A3922457B3C1AC299E0E26DE89DFEDAE",
    "latest_app_hash": "39ADB909DE885FEB686503DBE54CA7B80DDCB28E0291DCA6D237063D2DEA3913",
    "latest_block_height": "73",
    "latest_block_time": "2024-02-06T08:49:09.127781765Z",
    "earliest_block_hash": "987DED55621247E44EB0EBD427158B6F5880F956F0142A3F7D777BEDE1765824",
    "earliest_app_hash": "E3B0C44298FC1C149AFBF4C8996FB92427AE41E4649B934CA495991B7852B855",
    "earliest_block_height": "1",
    "earliest_block_time": "2024-02-06T08:42:51.916685734Z",
    "catching_up": true
}
```

5. Synchronizing with the blockchain network takes some time, and you need to wait for it to complete.

You can check the status by running the command - watch -n 1 'kimad status | jq .SyncInfo'

```
Every 1.0s: kimad status | jq .SyncInfo

{
    "latest_block_hash": "517F8AA0D1EBC8250226C133DCF80E137305A3C02D27742801F32C59AE994857",
    "latest_app_hash": "ABE9B8DB5388B77857E1F1C14C8E5DFBF3CFAF7AAC18C6A3FECD1D2F34CBAF51",
    "latest_block_height": "33607",
    "latest_block_time": "2024-02-08T08:32:17.46768897Z",
    "earliest_block_hash": "987DED55621247E44EB0EBD427158B6F5880F956F0142A3F7D777BEDE1765824",
    "earliest_app_hash": "E3B0C44298FC1C149AFBF4C8996FB92427AE41E4649B934CA495991B7852B855",
    "earliest_block_height": "1",
    "earliest_block_time": "2024-02-06T08:42:51.916685734Z",
    "catching_up": true
}
```

6. After synchronization is complete, the status will change to false, and your status will look like this:

```
Every 1.0s: kimad status | jq .SyncInfo

{
    "latest_block_hash": "7C350722E0ED9481C9DF33136043E7D7F093C379009D67ABBC47F97C05F239C6",
    "latest_app_hash": "7FA20BE7AFE43CC4A111F480708E846D3641234A730502AD67941569B039A130",
    "latest_block_height": "37369",
    "latest_block_time": "2024-02-08T13:53:54.714413136Z",
    "earliest_block_hash": "987DED55621247E44EB0EBD427158B6F5880F956F0142A3F7D777BEDE1765824",
    "earliest_app_hash": "E3B0C44298FC1C149AFBF4C8996FB92427AE41E4649B934CA495991B7852B855",
    "earliest_block_height": "1",
    "earliest_block_time": "2024-02-06T08:42:51.916685734Z",
    "catching_up": false
}
```

- 7. Next, you need to run the second script by executing ./testnet-validator-2.sh
- 8. After its successful completion, you become a validator for the Kima Network blockchain

## Additional information:

If you encounter any errors while running the scripts, try running them again.