Governance Parameters

This section explains the governance variables associated with Band Protocol's threshold signature implementation.

tss

Module

tss module is responsible for general threshold signature implementation. It has the following module parameters.

tss:max_group_size

This parameter controls the possible maximum number of the members of any valid group.

tss:max d e size

This parameter controls the maximum of the DE nonce capacity of any member. This is to prevent spamming.

tss:creating period

This parameter controls the maximum number of blocks allowed during the group creation period until the creation is deemed expired.

tss:signing period

This parameter controls the maximum number of blocks allowed for signature creation after a signature requested is broadcasted until the signing is deemed expired.

bandtss

Module

bandtss module is for BandChain's specific TSS assumption. Mainly it involves maintaining the TSS primary group, including managing the incentive and penalty of involved participants. It has the following module parameters.

bandtss:active duration

The parameter is the active requirement for the members of the primary group. If a member does not send anyMsgHealthCheck within this threshold, the member will be marked inactive and will not be tasked to sign any payload until becoming active again.

bandtss:reward_percentage

This parameter controls the percentage of BandChain block rewards that are allocated exclusively for the active members of the primary TSS group.

bandtss:inactive penalty duration

This parameter controls the cooldown before an inactive TSS member can sendMsgActivate to active themselves back to the system. This is to ensure there is penalty in the form of not getting rewards to the inactive TSS member before they can activate themselves back.

bandtss:fee

This parameters controls the fee amount paid to each of the signer for every TSS signature requested. This fee is in addition to the percentage of the block rewards that the active TSS members already get. Previous Requesting a TSS Signature Next Oracle Binary Encoding (OBI)