CLAIMS

What is claimed is:

1. A method for processing asset transfers, the method comprising:

in response to an asset transfer request between a payee and a payer, obtaining (102), by a first member of a blockchain corresponding to the payee, a blockchain asset transferred from a second member of the blockchain corresponding to the payer, wherein the blockchain asset is issued by an anchor point at the blockchain for the second member of the blockchain, wherein the anchor point is for exchange of the blockchain asset for an equivalent corresponding off-chain asset, wherein the first member and the second member hold blockchain assets issued by the same anchor point and the transfer of the blockchain asset between the first member and the second member is performed directly, wherein the blockchain asset is held at an account of the second member for the asset transfer request, wherein the first member of the blockchain performs a corresponding first transfer-out operation to transfer the off-chain asset to the payee, wherein a blockchain account book of the blockchain is configured to register holdings of blockchain members of the blockchain and changes to the blockchain assets, wherein the holdings include blockchain assets issued by anchor points;

when the first transfer-out operation for transferring the off-chain asset from a payee account opened for the payee at the first member to the payee fails, writing (104), by the first member, a transaction reversal application for an asset transfer transaction corresponding to the asset transfer request to publish the transaction reversal application on the blockchain, wherein the transaction reversal application is written in the blockchain account book at the blockchain;

based on the transaction reversal application being registered in the blockchain account book, returning the off-chain asset to the payer in advance to the first member returning the blockchain assets to the second member; and

performing (106), by the first member, an asset clearing with the second member for the off-chain asset corresponding to the first transfer-out operation, wherein the first member counts the off-chain asset corresponding to the transfer-out operation into a preset off-chain account that is self-owned by the first member, and wherein the first member regularly summarizes surplus assets in the preset off-chain account to return the surplus assets to the second member to complete the asset clearing.

2. The method according to claim 1, further comprising:

writing, by the first member, a serial number of the asset transfer transaction into the transaction reversal application to uniquely represent the asset transfer transaction.

3. The method according to claim 2, further comprising:

registering the transaction reversal application in the blockchain account book at the blockchain.

4. The method according to any one of the preceding claims, further comprising:

querying, by the second member, the transaction reversal application to determine the first member as related to the asset transfer transaction.

5. The method according to any one of the preceding claims, further comprising:

counting, by the first member, the off-chain asset corresponding to the second transfer-out operation into a preset off-chain account,

wherein performing, by the first member, the asset clearing with the second member for the off-chain asset corresponding to the second transfer-out operation comprises:

regularly summarizing, by the first member, surplus assets in the preset off-chain account, to return the surplus assets to the second member to complete the asset clearing.

6. The method according to claim 1, wherein performing, by the first member, the asset clearing with the second member for the off-chain asset corresponding to the second transfer-out operation comprises:

transferring, by the first member, a blockchain asset to the second blockchain member, wherein the transferred blockchain asset is equal to the blockchain asset transferred by the second member to the first member based on the asset transfer request.

7. The method according to any one of the preceding claims, wherein a time interval between a time period of writing the transaction reversal application and a time period of creating the asset transfer transaction is not greater than a preset time interval.

8. The method according to any one of the preceding claims, further comprising:

initiating, by the first member, the asset transfer request for collecting the off-chain asset from the payer; or

initiating, by the second member, the asset transfer request for paying the off-chain asset to the payee.

9. The method according to any one of the preceding claims, further comprising:

exchanging off-chain assets for corresponding blockchain assets through the anchor point at the blockchain; and

issuing, by the anchor point, the corresponding blockchain assets on the blockchain.

10. The method according to any one of the preceding claims, further comprising:

registering holdings and changes of blockchain assets of a blockchain member, such as the first member and/or second member of the blockchain, at the blockchain account book of the blockchain to provide unified blockchain asset management, the blockchain account book comprising a unified distributed account book, wherein the blockchain assets are issued by one or more anchor points of the blockchain.

11. The method according to any one of the preceding claims, wherein the first member and the second member holds blockchain assets issued by the anchor point, wherein the second member is configured to directly transfer the blockchain asset issued by the anchor point to the first member.

12. The method according to any one of the preceding claims, further comprising:

transferring, by the second member, the blockchain asset to the first member by an intermediate member of the blockchain to form an remittance route,

wherein the second member and the intermediate member hold blockchain assets issued by the anchor point as a first anchor point, and the intermediate member and the first member holds blockchain assets issued by a second anchor point at the blockchain, and

wherein a downstream member of two adjacent members of the remittance route sets a trust

amount limit for the corresponding anchor point, and a sum of the off-chain asset and a blockchain asset issued by the corresponding anchor point and held by the downstream member is not greater than the trust amount limit.

13. The method according to any one of the preceding claims, further comprising:

returning, by the first member, the blockchain asset transferred by the second member based on an original route including a path of member of the blockchain for executing operations at blockchain members for transferring blockchain assets; or

transferring, by the first member, a held blockchain asset issued by the anchor point to the second member, wherein an amount of the held blockchain asset is an amount that is to be returned to the second member.

14. An apparatus for processing asset transfers, wherein the apparatus is implemented by software, hardware, or a combination of hardware and software, and the apparatus is configured to perform the method of any one of claims 1 to 13.

15. An electronic device, comprising:

a processor; and

a memory, configured to store an instruction that when executed by the processor, the processor is configured to implement the method according to any one of claims 1 to 13.