CLAIMS

1. A method for managing asset or obligation-backed virtual receipts on a distributed system comprising:

receiving, via a computer processor of an information processing apparatus for a depositary entity and from a custodian, confirmation of a deposit of an underlying asset by an asset originator into an account maintained by the depository entity with the custodian, wherein the asset originator holds the underlying asset;

ringfencing, via the computer processor, the underlying asset in the account maintained by the depositary entity with the custodian;

providing, via the computer processor, confirmation of the deposit and ringfencing to the asset originator;

receiving, via the computer processor, authorization from the asset originator to issue a virtual receipt for the deposited underlying asset;

executing, via the computer processor, issuance of the virtual receipt by writing a transaction to a distributed ledger;

delivering, by the computer processor, the virtual receipt to a virtual receipt holder within the distributed system, in accordance with instructions provided by the asset originator;

assigning, via the computer processor, the virtual receipt to the virtual receipt holder;

writing, by the computer processor, the assignment of the virtual receipt to the distributed ledger;

receiving, via the computer processor, a request to redeem or cancel the virtual receipt from the virtual receipt holder to a designated account;

locking, via one or more computer processors associated with the distributed system, the assignment of the virtual receipt to the virtual receipt holder on the

distributed ledger, wherein locking an assignment comprises marking the virtual receipt so that it may not be transferred;

confirming, via the computer processor, the locked-in assignment of the virtual receipt on the distributed ledger;

canceling, via the one or more computer processors associated with the distributed system, the virtual receipt by writing the cancellation to the distributed ledger; and

transferring via the one or more computer processors associated with the distributed system, from the account maintained by the depository entity with the custodian to the designated account identified in the virtual receipt holder's request.

2. The method of claim 1, wherein the confirmation is received from a custodian that received the deposit of the underlying asset.

3. The method of claim 1, wherein the virtual receipt comprises a token.

4. The method of claim 1, wherein the distributed ledger is a Blockchain-based ledger.

5. A system for managing asset or obligation-backed virtual receipts on a distributed system comprising:

an asset originator;

a depositary entity including a depositary entity processor; and

a distributed ledger system in communication with the depository entity;

wherein:

the asset originator deposits an underlying asset with the depositary entity, via the depository entity processor;

the processor of the depositary entity ringfences the underlying asset in an account maintained by the depositary entity with a custodian;

the depositary entity processor receives confirmation of the deposit of the underlying asset by the asset originator;

the depositary entity processor receives authorization from the asset originator to issue a virtual receipt for the deposited underlying asset;

the depositary entity processor executes issuance of the virtual receipt by writing a transaction to ~~a~~ the distributed ledger system;

the depositary entity processor delivers the virtual receipt to a virtual receipt holder within the distributed ledger system, in accordance with instructions provided by the asset originator;

the depositary entity processor assigns the virtual receipt to the virtual receipt holder;

the depositary entity processor writes the assignment of the virtual receipt to the distributed ledger;

the depositary entity processor receives a request to redeem or cancel the virtual receipt from the virtual receipt holder a designated account;

one or more computer processors associated with the distributed system lock the assignment of the virtual receipt to the virtual receipt holder on the distributed ledger by marking the virtual receipt so that it may not be transferred;

the depositary entity processor confirms the locked-in assignment of the virtual receipt on the distributed ledger;

the one or more computer processors associated with the distributed system cancel the virtual receipt by writing the cancellation to the distributed ledger; and

the one or more computer processors associated with the distributed system transfer the underlying asset from the account maintained by the depository entity with the custodian to the designated account identified in the virtual receipt holder’s request.

6. The system of claim 5, wherein the depositary entity receives confirmation of the deposit of the underlying asset by the asset originator from a custodian that received the deposit of the underlying asset.

7. The system of claim 5, wherein the virtual receipt comprises a token.

8. The system of claim 5, wherein the distributed ledger is a Blockchain-based ledger.