# CENTRAL SECURITIES DEPOSITORY SYSTEM RULES

**Bank of Zambia**

**JANUARY, 2016**

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# 1    General Principles and Objectives

## 1.1    General

The Central Securities Depository (CSD) Rules will be issued in accordance with the Loans and Guarantees (Authorisation) Act Cap 336 of 1996 which gives Bank of Zambia (BoZ) the agency role in the issuance of Government Securities and the BoZ Act No 43 of 1996, Section 4 which gives the Bank authority to implement monetary policy. Further, for the secondary market trading of Government bonds, the Rules will be guided by the Securities Act Cap 354 of 1993. Furthermore, these Rules will be issued in line with the existing Operating Rules and Guidelines for Government Securities Transactions, Open Market Operations (OMO) and the Overnight Lending Facility (OLF).

The CSD is the BoZ Government Securities Registration and Settlement System, which is integrated with the Zambian Interbank Payment and Settlement System (ZIPSS). The CSD maintains the primary record of ownership and settles transactions, on the instructions of Participants, in securities issued by the BoZ and other eligible issuers.

Participants of the CSD operate accounts within the CSD on their own account or on behalf of their clients. Participants may hold client accounts at an individual client level or on a consolidated basis that is a single account may include securities for more than one client. Transactions may be settled free of payment or on the basis of delivery versus payment, through a link with ZIPSS. This link ensures the final (and irrevocable) gross settlement of transactions in accordance with the recommendations of the Committee on Payment and Settlement Systems (CPSS)[1].

The Participants act in their own name and are responsible for the timely settlement of all transactions including those belonging to their clients. In order to become a Participant, an entity shall comply with the criteria on operational capacity, financial soundness, legal soundness and financial requirements as detailed below in Rule 3- Access Criteria and Conditions. The "Rules" shall mean these Rules and each related Annex and attachment thereto and hereto, as supplemented by related materials, including user manuals, system documentation and other documentation provided. Any of these documents may be amended from time to time. If there is a conflict between these Rules and any Annex, the terms of the Annex shall prevail. All time indications in these rules relate to the time at the head office of the BoZ.

The specific terminology relating to the CSD and the acronyms used are explained in the Glossary in Annex 1 to these Rules.

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1.          [1] www.**bis**.org/publ/cpss101a.pdf

## 1.2     Role of the Bank of Zambia

BoZ is the System Operator of the CSD, that is, it is the entity with the legal responsibility for controlling, managing and operating the CSD. In its capacity as the central bank, BoZ holds securities on its own behalf, settles transactions it has executed on the secondary market (as part of its OMO) and mainly manages liquidity in the market under a repo arrangement. In this vein, it is the issuer of OMO instruments and the manager of securities issued by the Zambian Government.

In its capacity as System Operator, BoZ shall be responsible for the authorization to participate in the CSD; the establishment and maintenance of these Rules and Procedures; and the authorization of operating standards and procedures of the CSD. BoZ will control the correct execution of these Rules by the Participants.

BoZ is also the Technical Operator of the CSD.   BoZ, as Technical Operator, will administer the operation of the daily business cycle, manage the creation of reports and charts and will be responsible for the security of CSD data, software and infrastructure, including managing backups and fallback situations.

BoZ can, at its own discretion, delegate operational tasks to third parties. This delegation does not affect BOZ's responsibility towards the Participants for the activities concerned.

## 1.3     Delivery versus Payment

Delivery versus Payment shall be in compliance with the recommendations of the CPSS. The CPSS defines Delivery versus Payment as "a mechanism in an exchange-for-value settlement system that ensures that the final transfer of one asset occurs if and only if the final transfer of (an) other asset(s) occurs. Assets could include monetary assets (such as foreign exchange), securities or other financial instruments.

# 2 Eligible Securities

## 2.1 Basic Structure

Securities which are exclusively issued in book entry form and are either freely or not freely transferable are eligible for holding within the CSD.

Any provisions in the issue documentation or any agreement, instrument deed or record relating to the securities shall be compatible with the provisions, procedures and mechanisms set out in these Rules and Procedures.

Where any right, benefit or privilege attaching to or arising from the security is to be exercisable through the system, the mode of exercise must be valid and effective under the terms of the security issue documentation and comply with any other legal or regulatory requirement, which may from time to time apply to the exercise or such right, benefit or privilege.

## 2.2 Issuers

Securities issued by the following issuers are eligible for holding and settlement in the CSD: the Government of the Republic of Zambia, BoZ, and other issuers at the discretion of BoZ, provided that the securities to be issued meet the basic structure defined.

## 2.3 Primary Register

The record of ownership, held within the CSD, is recognized by the issuers as the primary register for ownership rights in respect of the securities which are eligible for holding and transfer within the system.

## 2.4 Issuance

Securities may be issued either at the nominal value of the security; at a discount to the nominal value; or at a premium to the nominal value.

## 2.5 Redemption

There is no upper or lower limit on the period of redemption for securities held within the CSD. Securities shall be redeemed at their nominal value on the nominated redemption date unless a full or partial redemption has occurred prior to that date in accordance with the terms of issue of the security.

## 2.6 Discount/ Interest /Coupon

The following types of securities may be held and settled within the CSD:

(a) Discount Securities: no component of the discount interest shall be paid during the life of the security.

(b) Interest Securities: only one payment of Interest is made together with the redemption payment.

(c) Coupon Securities: there are several payments of interest during the lifetime of the security as determined by the payment timetable published by the issuer.

Interest on coupon securities may be paid once, twice, three, four, six or twelve times a year. Securities within the CSD may pay interest at a fixed rate or a variable rate.

## 2.7 Ownership Restrictions

The ownership of securities within the CSD may be restricted in accordance with the terms of issue of the security.

## 2.8 ISIN

Securities within the CSD shall be identified by an International Securities Identification Number (ISIN) code and other unique identifiers (UIDs). Both Treasury bills and Government bonds will have ISINs while OMO instruments will have UIDs.

## 2.9 Setting Up Standing Data and Payment Events

The CSD shall automatically create a record giving details of each security when the results of an auction or a private placement are successfully processed.

Once the record is created, BoZ System Administrators may amend the data fields associated with the calculation of the daily value. The CSD shall also create a standing data record for future payment events associated with that security.

## 2.10 Information for Participants

In accordance with Section 15.2 of these rules, Participants are able to view:

(a) an updated list of eligible securities,

(b) standing data related to payment events,

(c) statements of holdings,

(d) award and interest payment notices and

(e) other statements.

## 2.11 Managing Static and Historical Data

BoZ System Administrators may amend details of securities and payment events and remove matured issues from the CSD. The CSD shall retain a history of such changes with the identity of the BoZ Administrator involved. These matured issues are removed when they are no longer required to appear in any query or report in line with the BoZ

retention period. However, the system will retain in the database all the history of the static data and transactions performed on any security.

# 3    Access Criteria and Conditions

## 3.1    Categories of Participants

The following classes of entities may participate in the CSD:

(a) Commercial Banks

(b) Merchant Banks

(c) Central Bank

(d) Financial Institutions

(e) Government Agencies

(f) Insurance Companies

(g) Pension Funds

(h) Private Companies

(i) Private Individuals

(j) Parastatal Organisations

(k) Stock Exchanges

(l) Charitable Organisations

(m) Other authorised entities

In accordance with the relevant laws and regulations, the BoZ may authorize other participants on a case by case basis. These Participants are classified as follows depending on their accessibility to the CSD:

**Primary Participant**: these Participants are eligible to come directly on the auctions and may participate on their own account or on behalf of their clients;

**Secondary Participant**: these participate indirectly in an auction by applying for new securities through a primary participant. These are basically clients of the primary Participants.

Those Participants categorised as Primary Participants already have or potentially can have Virtual Private Network connectivity. In the CSD system, they fall under the following classes:

(a) Central Bank

(b) Ministry of Finance

(c) Government Agency

(d) Bank

(e) Merchant bank

(f) Financial Institution

(g) Insurance Company

(h) Pension Fund

(i) Parastatal Organisation

(j) Stock Exchange

Participants in these classes can be collapsed into three groups in accordance with their roles in the secondary market as follows:

(a) Banks - these Participants are also RTGS Participants; they may trade on their own account but may also operate client accounts on behalf of their customers;

(b) Securities Dealers - these Participants are not RTGS Participants and must appoint a settlement agent, however they may trade on their own account and operate client accounts on behalf of their clients;

(c) Non-Dealers - these Participants are not RTGS Participants and must appoint a settlement agent; they may only trade on their own behalf and are not permitted to operate client accounts on behalf of their clients.

In summary, Participants on the CSD can have some or all of the following roles: Custodian, Primary Participant, Settlement Agent and Issuer.

### 3.1.1 Settlement Agent

All Participants that are not classified as Bank shall appoint a Settlement Agent. Notification of the appointment of a Settlement Agent shall be made In Writing to BoZ by both the Participant and the Settlement Agent.

The Participant may change its Settlement Agent by giving notice In Writing to BoZ. The change shall be effected by BoZ

(a) at the start of day on the date specified in the notice by the Participant; or

(b) if the change has immediate effect, from the start of the next Business Day.

Note that Participants shall appoint only one Settlement Agent at a time.

### 3.1.2 Bank of Zambia

BoZ may be a Participant with the role of primary participant in auctions for securities issued by Government. BoZ will have the class of 'Bank' in the secondary market, for open market operations.

## 3.2 Application for Participation

Each applicant should complete and send to BoZ the Participation Agreement attached as Annex 2 to these Rules and forming an integral part hereof, signed by or on behalf of the relevant applicant. The completion and signing of the Participation Agreement signifies the applicant's acceptance of these Rules.

Provided that the applicant complies with the requirements for participation set out in these Rules, BoZ will signify its consent by countersigning the Participation Agreement and indicating on the Participation Agreement the date on which such accession shall become effective following certification. BoZ undertakes to send a copy of the countersigned Participation Agreement to the relevant Participant. The applicant becomes a Participant upon certification.

Each applicant shall undergo a certification procedure demonstrating that it has the operational capacity to participate effectively and the effective date of accession shall be dependent on the successful completion of the certification procedure.

The registration of Participants to the CSD shall be done at BoZ. In this regard, BoZ will have the primary register.

## 3.3 Financial Soundness and Requirements

For purposes of determining a Participant's financial soundness recourse shall be made to the Participant's standing with its supervisory or regulatory authority for a regulated Participant. For individuals, a valid commercial bank account is a requirement.

## 3.4 Technical Competence

In order to ensure the stable and correct functioning of the CSD, BoZ may make the participation of an entity and/or the maintenance of this participation dependent on the successful outcome of tests demonstrating that this entity has the operational and technical competence required (notably with regard to its IT systems and telecommunications) to be or remain a Participant. The BoZ shall communicate the contents, conditions and dates of any such tests by letter to each Participant concerned.

## 3.5 Authorised Officers, Authorised Persons and Security Administrators

### 3.5.1 Authorised Officers

Authorised Officers are persons duly authorized by the Participant to legally bind the Participant. The Participant shall deliver upon execution of the Participation Agreement and from time to time, as appropriate, the names and specimen signatures of Authorised Officers together with appropriate documentation attesting to the authorisation of each Authorised Officer.

### 3.5.2      Authorised Persons

Authorised Persons are persons duly authorized to access data and to provide instructions with respect to bank accounts, funds transfers and other financial or securities transactions by electronic means and/or persons designated to access such data and to provide instructions, on behalf of the Participant in connection with the CSD. The rights of Authorised persons may be limited.

The Participant shall also deliver upon execution of the Participation Agreement and from time to time as appropriate the names and specimen signatures of Authorised Persons, accompanied by a certificate signed by the Authorized Officer, or equivalent documentation, attesting to the authorization of each Authorised Person and the authenticity of the signature.

The access of Authorised Persons to the CSD shall be limited in accordance with prudential separation of functions.

### 3.5.3      BoZ Authorization

The Participant hereby authorizes BoZ to act in reliance thereon in executing instructions. Any change in the name or other relevant information about Authorized Officers or Authorized Persons shall be acted upon within 2 to 3 working days of receiving instructions.

### 3.5.4      Security Administrators

Security Administrators are authorized persons at BoZ or a Participant that have access to the CSD for the purpose of maintaining User details and profiles of users in the CSD. A Security Administrator shall not have access to transaction entry facilities or management or enquiry functions.

Each Participant shall have, at all times, at least two Authorized Persons recognized by BoZ as Security Administrators. Only BoZ shall have the right, in its sole discretion, to approve the request to create a new Participant Security Administrator and assign a User profile to such Users.

## 3.6    Identification of Participants

Each Participant shall have a code in the form of a SWIFT Business Identifier Code (BIC), which will conform to the bank identifier codes designated by BoZ. The BIC codes of the Participants are specified in Annex 4 to these Rules.

## 3.7  Operational capacity

### 3.7.1  Log in

All Participants should remain logged on to the system throughout the Business day (ie between start of day and end of day).

### 3.7.2  Equipment

BoZ shall not be obliged to supply to Participants any hardware or operating system software to enable utilization of the CSD.

BoZ shall provide the Participant and the Participant shall install and configure any necessary components such as an initial set of smart tokens and related software to support the CSD software in accordance with BoZ instructions. The Participant shall at no time have any proprietary interest in the CSD software and supporting components must be returned by the Participant to BoZ on termination or earlier on demand.

### 3.7.3  Materials

Any material provided in connection with the CSD is the exclusive and confidential property of BoZ. The Participants agree to keep these materials confidential, to limit access to their employees (under a similar duty of confidentiality) who require access for the proper use of the CSD, and to use all Materials in the manner designated therein and in the ordinary course of their business, and not to make any modification to them.

Nothing in these Rules will affect the copyright status of any of the materials and the provisions of this paragraph will apply whether or not such Materials are copyrighted.

### 3.7.4  Primary and Fallback Computer Facilities

Each Participant must be connected via a Webstation configured to exchange messages with the central CSD system. Participants may use the Montran Gateway, accessed via the Webstation, to enable straight-through processing (STP) of transactions between their custody systems and the CSD.

Each Participant shall also provide for fallback IT equipment for their custody system and access to the CSD.

Documents describing the standards and communication protocols (and other functional requirements) for a Participant's computer Interface to CSD shall be provided by BoZ to any Participant that has been approved for connection to CSD. Each Participant shall comply with and its computer interface must function in accordance with such standards and protocols. No computer interface will be implemented unless it has been approved by BoZ.

In order to ensure the stable and correct functioning of the CSD, BoZ may make the participation of a Participant in the CSD, as well as the maintenance of this participation, dependent upon the successful outcome of tests demonstrating that the Participant has the operational and technical capacity required (notably with regard to its IT systems and telecommunications). BoZ shall communicate the contents, conditions and dates of these tests by ordinary letter to each Participant concerned.

BoZ shall not be responsible for any expense incurred by a Participant in establishing any primary or fallback computer facility connected to the CSD under this section.

### 3.7.5 Location of Computer Facilities

Any primary or fallback connection linked to the CSD may only be located where, as determined by BoZ, there are adequate arrangements for on-site review of a Participant's processing and computer facilities, adequate access to digital telecommunications facilities, adequate arrangements for necessary authentication and security devices, and adequate assurances that operation of the system will not be subject to interruption or interference by internal or external political developments.

Any Participant wishing to change the location or the operational characteristics of its primary or fallback computer must present a proposed plan describing the change and obtain the prior approval of BoZ.

### 3.7.6 Staffing at Connection and Changes to Connection

The office in which the primary connection is located must be staffed by personnel fully qualified complying with the requirements in Rule 4  Security Procedures; and authorized at all times by the Participant to take appropriate action on behalf of the Participant with respect to the connection upon signing the User Application Form in the Certification Authority (CA) System Rules.

Any Participant wishing to change the location of its primary connection must obtain the approval In Writing from BoZ.

Both primary and fallback IT equipment must be operated by personnel fully qualified and authorized at all times to take appropriate action on behalf of the Participant with respect to the operation of such computer facilities, according to these Rules.

### 3.7.7 Participant Workstation Minimum Configuration Requirements

Participants' CSD web-stations have to comply at all times with the minimum configuration requirements as detailed in the Participant's Technical Requirements documentation.

## 3.8    Modifying a Participant's Details

Each Participant shall in case of merger, split off, name change or in case of any other change in the information required in the Participation Agreement in Annex 2 notify BoZ immediately and provide BoZ with the information required for amending Annex 3 to these Rules.


## 3.9    Suspension and Termination

### 3.9.1        Suspension

BoZ may suspend the access of a Participant (i.e. "Disable" the Participant in the CSD system) for a specified or indefinite period of time if:

(a) the Participant is subject to prudential supervision and the relevant supervisor requests such suspension;

(b) requested to do so by the Participant;

(c) the Participant no longer complies with a requirement for participation set out in the Rules;

(d) an event occurs which, in the opinion of BoZ, affects, or may affect, the ability of the Participant to participate to the normal and usual extent in sending and receiving payments (a Constraining Event) for a period of time, but only during the continuance of that event and any subsequent period which might be necessary;

(e) an Insolvency Event  occurs in respect of the Participant;

(f) the Participant breaches its obligations under these Rules or the applicable Procedures and fails to rectify the breach or to provide a satisfactory justification; and

(g) the Participant is unable to comply with these Rules by virtue of Force Majeure.

BoZ shall at its discretion decide on any term or grace period, taking into account the specific situation of the Participant concerned.

A Participant whose access to the CSD is suspended under this section is not entitled to participate in the CSD and no instructions shall be accepted from the Participant following the implementation of such suspension. The Participant retains the right to access its data outside the system via a request to BoZ. A Participant whose access to CSD is suspended is not excused from discharging its obligations under these Rules, except as expressly provided in or pursuant to these Rules.

BoZ shall immediately notify all Participants (by the most expeditious means available) of any suspension. BoZ may at its discretion reinstate a suspended Participant. BoZ shall, as soon as reasonably possible, notify all Participants of any decision to reinstate a suspended Participant and the re-commencement ("activation") date for that Participant.

### 3.9.2     Termination

A Participant ceases to be a Participant on (i.e. "Remove" the Participant in the CSD system)

   (a) resignation;

   (b) becoming insolvent or making an arrangement or composition with creditors generally;

   (c) being wound-up, dissolved or otherwise ceasing to exist; or

   (d) BoZ terminating the participation in accordance with these Rules.

BoZ shall at its discretion decide on any term or grace period, taking into account the specific situation of the Participant concerned.

A Participant may, by way of notice In Writing to BoZ, resign with effect from a date, which is a minimum of 10 business days after the date of the service of the notice. The notice is irrevocable.

Access to CSD may be terminated by BoZ In Writing to the defaulting Participant with immediate effect, unless agreed otherwise, no other formalities or court intervention being required, if all of the following conditions have been fulfilled:

   (a) a suspension event has occurred in respect of that Participant and has not been remedied within a reasonable period;

   (b) if that Participant is subject to prudential supervision and BoZ has consulted with the relevant supervisor regarding such termination; and

   (c) BoZ has provided an opportunity for that Participant to make submissions to BoZ regarding such termination.

BoZ is not obliged to give any reasons for such decision and may revoke any such notice at any time before it becomes effective.

Any termination of access to CSD shall not affect any right or liability arising under these Rules prior to the time such termination takes effect or arising in respect of any act, matter or thing occurring prior to that time.

A Participant whose access is terminated pursuant to this section shall continue to be bound by these Rules in respect of:

   (a) any act, matter or thing occurring prior to the time such termination takes effect or as a result of such termination; and

   (b) any fees, costs, charges and expenses which may be levied on, or which are to be reimbursed by Participants in accordance with these Rules in respect of periods

which commence prior to the time such termination takes effect or which relate to any such act, matter or thing.

BoZ will immediately notify all Participants (by the most expeditious means available) of any termination under this section.

Subject to any rights of set-off, counterclaim or combination, which are available at law, upon any termination of the access of a Participant:

(a) any unsettled transactions in the CSD shall be deleted from the CSD and shall be due for settlement directly between the Participants;

(b) the Participant being terminated must immediately pay all sums of money (if any) it owes to any other Participant in respect of obligations arising from the operation of the CSD; and

(c) all sums of money (if any) owed to it by any other Participant in respect of all such payments exchanged must be paid by that other Participant to the Participant being terminated.

A Participant whose access is terminated is not entitled to be repaid all or part of any entrance, operating or other fee, which was paid by this Participant.

BoZ may charge an exit fee in accordance with the Participation Agreement.

# 4 Security Procedures

## 4.1 General Security

Participants shall take all necessary action, including segregation of functions and appropriate written internal procedures and levels of authority to ensure the security of data and procedures.  `

Should any Participant become aware of any CSD related fraud or attempted fraud, they shall immediately report in Writing to BoZ.

## 4.2 System Security

Electronic communication between Participants and BoZ is subject to the communication and data security methods set out in these rules. The Participants shall comply with the applicable Procedures and the methods designated in these Rules, collectively, the "Procedures", and authorize BoZ to act in compliance with the Procedures to transmit and display data and to act upon each instruction

The security procedures, security devices, codes, passwords and other access methods are highly confidential and the Participants shall use and guard them with the highest care and to notify BoZ immediately upon discovering or having reason to suspect that any of the foregoing is or may be compromised.

The security procedures provided by BoZ are designed to verify the source of a communication, as BoZ is required to act on instructions transmitted from a Participant, and not to detect errors in transmission or content including discrepancies between account names and numbers. BoZ may execute an instruction by reference to the account number only, even if the name on the account is also provided. BoZ has no duty to discover, and shall not be liable for errors made by or duplicate instructions issued by a Participant. The Participants agree to be bound by and to settle any electronic instruction executed in its name in accordance with the Rules and Procedures.

The Participants shall develop and maintain adequate internal security procedures and comply with all recommended security procedures in order to prevent unauthorized utilisation of the CSD.

Where software and/or hardware provided by BoZ to the Participant incorporates features relating to security (including ID's and passwords and other measures) the Participants shall be solely responsible for the use of such features. BoZ shall be entitled to assume that all use of such software and/or hardware is by persons authorized to access such facilities.

# 5    Creation and Maintenance of Users

## 5.1 General

Access to the CSD shall only be permitted to authorised and uniquely identified personnel (Users).

Each person named in the corresponding e-Token Application Form (contained in CA Rules) shall be an Authorised Person or the designee thereof duly authorised to receive, transmit and/or confirm data and instructions within the limits, if any, as may be specified by the Participant. As long as BoZ acts in compliance with the communication and data security methods as set forth in these Rules as these may be amended from time to time in accordance with the Procedures in these Rules, it shall have no further duty to verify the identity or authority of the person giving or confirming, or the contents of, any instruction. Notwithstanding any other provision hereof, BoZ shall have the right, in its sole discretion, to refuse to execute any instruction, provided BOZ, acting in good faith, doubts the authenticity or authorisation thereof. BoZ shall provide prompt notice, which may be by telephone or e-mail to an Authorised Person of any such rejected instruction.

BOZ shall be entitled to rely on the authorisations and User lists as set forth on the system by the respective authorised system administrators designated by the Participant through the User Information Request Form received by BoZ at creation and/or designation of Participant. All such forms shall be dated and signed by an Authorised Person and shall be processed by BoZ within two business days under normal circumstances. Likewise, requests for revocation of admittance to the system of a particular user shall be made using the e-Token Revocation Form. In urgent cases such request for revocation or modification may be made by Secure Email and will be actioned by BOZ immediately on receipt.

Each Participant will inform BoZ immediately if any person authorised to utilise the Services on behalf of a Participant ceases to be employed by that Participant or ceases otherwise to work for that Participant or to be under its control.

## 5.2 Request to Issue User Access

Each Participant requesting the authorisation of a User shall, at least two Business Days prior to the effective date thereof, complete and provide BoZ In Writing with:

> (a) an e-Token Application form, as provided in the CA Policy and Procedures , dated and signed by an Authorised Person requesting BOZ to issue an e-Token to the user so enrolled;

> (b) ensure that the previously setup and assigned Participant User Security Administrators (PUSA) have created and authorised the intended user on the ZIPSS/CSD system and have attached the user to their designated profile as determined by the Participant. At system setup, PUSAs shall in line with business and security needs in their operations shall setup appropriated role delimited profiles to which all subsequent users in their respective groups shall be attached.

Only BOZ shall have the right, in its sole discretion, to authorise new Participant User Security Administrators and assign them the Participant's Group/Master profile.

BOZ also has the sole right to:

(a) allocate e-tokens to all duly authorised users; and

(b) issue a digital certificate to the User (on the e-token).

Participants through their PUSAs are responsible for the creation and maintenance of their other Users in the ZIPSS /CSD system, allocation of User names, User profiles and initial passwords.

Before a User is created on the system and an e-Token Application Form ic completed and sent to the Bank for processing to allow the user access , the User must complete the respective ZIPSS/CSD User training appropriate to the functions to be performed and if so requested must demonstrate such necessary knowledge of the use of the system.

BoZ will provide one e-token with a PIN to each registered User. Each e-token is exclusive to the user to whom it is issued, and in no circumstances is it to be shared with or used by another. When received by the registered User, the token's default password shall immediately be changed. After the initial allocation, BOZ reserves the right to charge the cost of these tokens to the Participants, e.g. for replacement tokens and expansion of the User base.

## 5.3 Charging

BoZ shall provide one e-token with PIN to each user. After the initial allocation, BoZ reserves the right to charge the cost of these tokens to the Participants, for example, for replacement tokens and expansion of the user base.

BoZ will also allocate two e-tokens with PIN to each Participant for use in a Contingency Event in the BoZ Contingency Room in Lusaka.

## 5.4 Creation and Maintenance of User Profiles

Participants shall create and manage their own User Profiles. BoZ shall create PUSAs at initial system setup who shall have privileges to administer User Profiles. The PUSAs shall follow internal business requirements and relevant stipulations of these rules in creating the profiles.

BoZ shall approve specific master templates for each Participant. Within the restrictions of this template, Participant User Security Administrators can define profiles for their staff, consistent with the segregation of duties principles. In exceptional circumstances BoZ, having set up the master template on the CSD may approve profiles created by a Participant upon request.

## 5.5 Request to Modify a User

Only Participant Security Administrators can assign and amend User profiles according to User responsibilities, required by Participants or by BOZ. Such assignments and amendments will take place under dual control.

## 5.6 Request to Disable or Remove a user

A Participant that requires one or more of its Users to be disabled or removed can carry out this task online, but must report In Writing to BoZ that a user has been disabled or removed. . The report shall be submitted on the e-Token Revocation Form (See the CA Rules). Users can be removed from the CSD after 7 years as stipulated in the BoZ Information Security Policy.

In case of emergencies, BoZ Administrators can also disable or remove users from the CSD.

## 5.7 Right of Bank of Zambia to Rely on Instructions

Each person listed in the relevant e-Token Application Form (See Form in the CA Rules) shall be an Authorized Officer or an Authorized Person or the designee thereof duly authorized to receive, transmit and/or confirm data and instructions within the limits, if any, specified on the applicable e-Token Application Form (a User). As long as BoZ acts in compliance with the communication and data security methods as set forth in these Rules as these may be amended from time to time in accordance with the Procedures in these Rules, it shall have no further duty to verify the identity or authority of the person giving or confirming, or the contents of, any instruction. notwithstanding any other provision hereof, BoZ shall have the right, in its sole discretion, to refuse to execute any instruction, provided BoZ, acting in good faith, doubts the authenticity or authorization thereof. BoZ shall provide prompt notice, which may be by telephone, to an Authorized Officer of any such rejected instruction.

BoZ shall be entitled to rely on the authorizations and User lists as set forth on an e-Token Application Form until receipt by BoZ, at least two to three Business Days prior to the effective date thereof, of a written request of revocation or modification of such e-Token Application Form, dated and signed by an Authorized Officer. An e-Token Application Form may be revised only by a written request signed by an Authorized Officer and each such proposed revision is subject to BoZ's consent in accordance with the procedure laid down in Rules 5.4, 5.5 and 5.6.
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Each Participant will inform BoZ immediately any person authorized to utilize the CSD on behalf of a Participant ceases to be employed by that Participant or ceases otherwise to work for that Participant or to be under its control or otherwise ceases to hold authority for whatever reason including a change in portfolio with the Participant's establishment.

For further details on Security, kindly refer to the CA Rules.

## 5.8 Retention of User Records

Participants shall maintain User records and all other transactional information related in relation to the ZIPSS/CSD system in accordance with the provisions of the Electronic Communications and Transactions Act of 2009.

# 6 Accounts

## 6.1 General

Participants shall ensure that securities held on their own behalf are held in a separate account (House Account) from securities held on behalf of their clients. Participants may hold client securities in a single Omnibus account; at individual beneficial owner level; or in a combination of both, for example, some clients in an omnibus account and some at an individual level.

## 6.2 Creating Accounts for Beneficial Owners

A Holder may be an individual person or an organization. The Holder can be a real person or nominee. BoZ will create the Holders while the Beneficial Owners will be created by Participants. Records for Holders and Beneficial Owners accounts are created in accordance with the procedures set out in the User Manual.

There are no restrictions on who can be holders or beneficial owners. Equally, there are no requirements on banks to get permission to hold securities in the CSD.

## 6.3 Synthetic Accounts

Synthetic accounts shall be set up automatically by the CSD. They shall not contain any record of holdings of securities. When a new Participant or a new holder is recorded in the CSD, the CSD shall automatically create synthetic accounts in accordance with the roles and classes assigned to that Participant.

The accounts shall be identified by a reference code created in the following way. The first four letters of the Participant BIC code, followed by the letter 'X' followed by the account type number; and if the account is in relation to another Participant (e.g. a primary participant acting on behalf of a secondary participant) or a beneficial owner, the code defining this second party.

The account type numbers shall be as follows:

(a) 0 – Own Account (House Account): this type of account shall be created for all Participants to record the balance of the Participant's own securities.

(b) 1 – Client Account (Beneficial Owner Account): this type of account is created for each Beneficial Owner recorded by a Participant.

(c) 8 – Trading Ceiling Account: this type of account represents the cash limit account of the CSD Participant which is not an RTGS Participant, so it will settle the cash leg of all operations using another Participant's ZIPSS account.

(d) 9 – Issuer Account: this type of account records the securities issued into the CSD by an issuer.

The reference of a Client Account created on behalf of an individual Beneficial Owner shall be followed by the reference for that Beneficial Owner.

## 6.4 Analytic Accounts

An analytic account shall be created immediately securities are acquired by a Participant whether for his own or a client's account. The reference for each analytic account shall be composed of the Synthetic account reference; and the ISIN or UID.

## 6.5 Blocking Accounts

The BoZ Administrator may block a synthetic account if they are requested to do so by the Participant and/or the BoZ believes it is in the best interest of the market to do so. It is important to note that no actions shall be performed on an account which is blocked.

## 6.6 Restricting Accounts

The BoZ Administrator may restrict a synthetic account if any of the following occurs: it is requested to do so by the Participant; an Insolvency Event has occurred relating to the Participant; and/or the BoZ believes it is in the best interests of the market to do so. Actions on a restricted account may only be performed with the explicit authorization of a BoZ Administrator.

## 6.7 Account Balances

Within each analytic account the balances are divided into two, that is, Available Balances and Pledged Balances. Available balances refer to securities that may be used for settlement of transactions; and Pledged balances refer to securities that may be used for collateral purposes and are not available to settle transactions. Within the available balance the following information shall be shown:

(a) Opening Balance: the account balance at the start of the day;

(b) Current Balance: this is the opening balance adjusted for all completed debits and credits to date; the number and value of each debit and credit is shown;

(c) Pending Securities: these are pending deliveries, which cannot be settled because of an insufficient balance of securities in the Participant's available balance; this quantity is deducted from the current balance when calculating the available balance:

(d) Hold Securities: these are securities held in queues awaiting settlement not because of insufficient securities in the account of the seller but because of insufficient funds in the counterparty's ZIPSS settlement account; this quantity is deducted from the Participant's current balance when calculating the available balance.

(e) Projected Balance: this shows the current balance as it would be if all pending and hold transactions were successfully completed.

# 7    Trading Ceiling

## 7.1 General

Trading Ceilings are the mechanism by which Settlement Agents control their risk. The cash leg of transactions executed by a Participant who uses a Settlement Agent will not settle if it would result in the Trading Ceiling being breached.

## 7.2 Setting and Amending a Trading Ceiling

The default level for a Trading Ceiling shall be zero. Settlement Agents may set a Trading Ceiling for each securities dealer and non-dealer for which he acts and may adjust the level of the Trading Ceiling at any time.

## 7.3 Trading Ceiling Values

For each Trading Ceiling, the CSD shall hold the following values:

(a) Initial Value: this is the last value set by the Settlement Agent;

(b) Available Value: the value available for trading at that point in time; and

(c) Reserved Value: the amount reserved for buying transactions initiated but not yet settled.

## 7.4    Updating Trading Ceiling Values

The Reserved and Available Values shall be continuously updated during the day for each DvP transaction. When a buying transaction is accepted from the Participant, the Available Balance shall be decreased and the Reserved Value shall be increased by the cash amount of the transaction. When a buying transaction is settled, the Reserved Value shall be decreased by the cash amount of the transaction and when a selling transaction is settled, the Available Value shall be increased by the cash amount of the transaction.

# 8    Primary Market Transactions

## 8.1 Types of Transactions

CSD handles primary market transactions involving auctions, private placements and payment events (coupon/interest payments, partial redemptions, optional redemptions, redemptions at maturity). All primary market transactions shall be in the domestic currency, the Zambian Kwacha.

## 8.2 Auctions

### 8.2.1   Auctions

 All auctions related to Government securities and OMO will be done in the CSD.

### 8.2.2   Process Auction Results
Auctions shall be settled through an Interface with ZIPSS on a gross basis, using DvP and the auction results shall be processed immediately the auction is finalised.

When an auction is due for settlement; the CSD shall:

(a) debit the issuer's account (which will send the account negative); and credit the issuer's house account with the total nominal value of the securities;

(b) create individual DvP transaction records showing the issuer's House Account as the seller and the relevant Participant's House account, or Client Account or Via Dealer Account (where the Primary Participant is acting on behalf of a Secondary Participant) as the buyer;

(c) process the individual transaction records in the same way as DvP transactions in the secondary market.

Where the buyer is a Securities Dealer or a Non Dealer, funds must be available within the Trading Limit set by the Settlement Agent before the transaction can be sent to ZIPSS for funds settlement.

Where funds are available in ZIPSS to settle the DvP transaction in full for a Participant Account the securities shall be transferred from the House Account of the issuer to the account of the buyer.

Where funds are not available to settle the DvP transaction in full for a Participant's Account within the time limit then CSD shall, at the expiry of the time limit send a cancel request to ZIPSS to cancel the transaction for that Participant and transfer the excluded securities from the house account of the issuer to the issuer account. This effectively reduces the total of the public offering by the value of the excluded securities.

### 8.2.3 Information Available to Participants

The information available to Participants will relate to the status of pending auctions; confirmation of all successful transfers of securities; and confirmation of any cancelled transactions.

## 8.3 Private Placements

Private placements may be either Free of Payment (FOP) or DvP. The FOP placements are processed in the same way as FOP secondary market transactions. DvP placements shall be processed in the same way as the outcome of auctions.

## 8.4 Coupon/Interest

### 8.4.1 Prior Notification

BoZ shall establish a prior notification date for coupon/interest payments.

On this date and on each subsequent date until Payment Date, CSD shall calculate the amount of interest to be paid on each account, assuming that both the account balance and the rate of interest to be paid remain constant.

This information is intended to be of use to Participants but does not warrant that BoZ shall pay the reported amount of interest.

### 8.4.2 Reconciliation

One day before the Payment Date of every payment event, the CSD shall place the payment in 'waiting for reconciliation' status and provide information about the event to the issuer.

Prior to the opening of business on the Payment Date, the issuer shall either confirm the amount payable; or amend the amount payable. In case, the confirmation/ amendment is subject to approval by a different User.

### 8.4.3 Settlement of Coupon/Interest

On Payment Date, the CSD shall compute the amount payable on each account on the basis of the account balance at the end of day on the Record Date and the confirmed payment amount. Where the Payment Day is a non-business day, settlement will take place on the next Business Day.

In terms of settlement, the CSD shall generate a cash settlement instruction for ZIPSS, which shall be settled without any funds check where BoZ is the issuer and provided that there are sufficient funds available in the Ministry of Finance (MOF) settlement account where MOF is the issuer.

## 8.5    Partial Redemptions

BoZ Administrators shall set up the details of Partial Redemptions prior to the Payment Date. On the Payment Date of a partial redemption, the CSD shall reduce the value of each certificate by the amount of the partial redemption. The payment process shall be as described immediately above for coupons/interest.

## 8.6    Redemption at Maturity

On the morning of Redemption Date, CSD shall send a DvP message to RTGS, which will be settled where BoZ is the issuer, without any funds check and in the case of MOF as the issuer, provided MOF has sufficient funds in its ZIPSS Settlement Account.

Once confirmation of payment has been received from ZIPSS, the securities are moved from the Participant's Accounts to the account of the issuer. In the event that there are insufficient funds in the MOF Settlement Account in ZIPSS, the redemption transaction will be queued until settlement takes place; and the issue will be placed in 'Suspended' status to prevent any other activity in that security.

# 9 Submission and Validation of Messages

Messages sent by Participants to the CSD shall immediately be validated. Every message is validated for the presence of mandatory fields in accordance with the SWIFT message standards in respect of field formats (syntax), field contents and the relationship between fields (context) are validated.

If a message is rejected, a Notification (SWIFT message) is sent to the Participant that sent the message. The accepted messages are recorded and chronologically processed by the system according to the FIFO ("First In First Out") principle.

# 10 Secondary Market Transactions

## 10.1 Classes of Transactions

The CSD shall process the following types of transactions:

(a) Sales and purchases of securities (including term deposits) on the basis of DvP;

(b) Repo and reverse repo agreements on the basis of DvP;

(c) Transfer of securities which do not require a transfer of funds, that is, FOP transactions.

All transfers between Participants take place on the basis of an instruction that has been entered by both Participants and matched by the CSD.

## 10.2 Finality of Settlement

Settlement shall be final and unconditional at the moment the current balance in the accounts of the buyers and sellers have been credited or debited with securities. There is no perceptible delay between the debit to the seller and the credit to the buyer in the CSD.

## 10.3 Short Selling

Participants shall not sell securities either on their own behalf or on behalf of their clients that are not owned by them and in their CSD account.

## 10.4 Responsibility for Reporting and Settlement

Where Participants have traded directly with each other (over the counter) it is recommended that these transactions are reported directly to CSD within [1 hour] of concluding the trade or before the CSD cut off time for DvP settlement, whichever is earlier.

It is the responsibility of the Participant acting on behalf of seller (whether it is principal or a client trade) to ensure that securities are available to settle the transaction immediately it is reported to the CSD and at the latest by the cut off time for DvP settlement on that Business Day.

It is the responsibility of the Participant acting on behalf of the buyer (whether it is a principal or a client trade) to ensure that funds are available to settle the transaction immediately it is reported to the CSD and at the latest by the cut off time for DvP settlement on that Business Day.

BoZ may impose penalties, if a Participant fails to report trades within this timescale.

## 10.5   Restricted Accounts

All transactions entered in respect of a Restricted Account shall be queued 'Waiting for Authorization' and shall not be passed for settlement until such approval has been received.

## 10.6   Settlement Day

Transactions may be entered by Participants for settlement on the current Business Day. The Trading Day may be a date prior to the settlement date.

Transactions may be generated by the CSD for settlement on a future date for example, the second leg of a long term repo. If a future transaction is due for settlement on a non-Business Day, it shall be settled on the next Business Day.

## 10.7   Cancellation of Messages and Transactions

Transactions that have been settled are final and cannot be cancelled. If a transaction has been settled in error an equal and opposite transaction shall be matched and settled by the Participants. Participants may cancel messages that require matching provided they have not been matched.

Messages which have been matched cannot be cancelled by Participants. Participants who wish to cancel unsettled transactions may contact BoZ outside of the system to request for such a cancellation. BoZ may grant or refuse such a request at its absolute discretion.

BoZ will consider the request and action agreed cancellations as quickly as possible. However, it is possible that the transaction may settle even though BoZ has agreed the cancellation, if both securities and funds are available. BoZ shall not be responsible for any loss or damage suffered by the Participant as a result of the transaction being settled prior to the cancellation being effective.

## 10.8   Messages and Formats

Participants shall initiate transactions in the CSD by submitting securities transaction messages either from the workstation module or by sending SWIFT format messages through the Montran Gateway (STP).

All confirmation messages shall be sent in SWIFT format to the workstation. Participants may request that, in addition, all messages are sent to the Montran Gateway.

### 10.8.1  Settlement Instructions

The following SWIFT messages shall be entered by Participants to instruct the CSD to transfer securities:

(a) MT540 – Receive Free Instruction;

(b) MT541 – Receive Against Payment Instruction;

(c) MT542 – Deliver Free Instruction;

(d) MT543 – Deliver Against Payment Instruction.


### 10.8.2 Confirmations and Notifications

The following messages shall be sent by the CSD to Participants to confirm the execution of instructions or as notifications to warn of failures and unusual conditions:

(a) MT544 – Receive Free Confirmation

(b) MT545 – Receive Against Payment Confirmation

(c) MT546 – Delivery Free Confirmation

(d) MT547 – Delivery Against Payment Confirmation

(e) MT548 – FOP/DvP Notification

(f) MT599 – Free Format Message


### 10.8.3 Validation and Matching

The CSD shall validate all messages and reject any messages which fail the validation checks. A notification of the rejection shall be sent to the Participant which submitted the message (SWIFT MT548).

All messages that pass validation and require matching shall be checked against any queued messages. If the details on the new message match those on a queued message a transaction (matched messages) shall be passed for settlement. If the new message does not match against a queued message, the new message shall be queued 'Waiting for Matching'.

Each queued message shall be available for matching against new messages. Queued messages shall be cancelled automatically by the system at cut off time for the relevant facility and a notification (SWIFT MT548) sent to the sender of the message.

## 10.9   DvP Sale and Purchase Transactions

### 10.9.1 DvP Processing

The CSD achieves settlement on the basis of DvP through a link with ZIPSS.

The settlement of DvP transactions involves the following stages:

(a) reservation of securities within the CSD account of the seller (deliverer):

(b) the sending of a message to ZIPSS to request the irrevocable transfer of funds;

(c) the update of the securities accounts of the buyer and seller when confirmation of funds transfer has been received.

### 10.9.2 Matching

All DvP transactions require matching. Where Participants have dealt directly with each other outside of any trading systems, Participants shall send messages related to sales and purchases, that is MT543 (DvP Sale Transaction) and MT541 (DvP Purchase Transaction) respectively:

The matching criteria used by CSD shall include:

(a) Message type: 543

(b) Operation type: Delivery versus Payment

(c) Reference: This is a message reference and should be a maximum 16 characters

(d) Trade date: Transaction date

(e) Settlement date: The date the transaction settles

(f) Receiving/delivering agent: The buyer/seller

(g) Issue identifier: ISIN or UID

(h) Face Value Amount: The face value of the instrument

(i) Cash currency: the transaction currency

(j) Delivery account type: own, domestic or foreign

(k) Cash amount: the value of the transaction

### 10.9.3 Processing

Transactions matched within DvP shall be processed as follows:

(a) Check the CSD account of seller for sufficient securities to satisfy the transaction in full:
- o if securities are available; debit 'Available Balance' and place securities in 'Hold' status;
- o if securities are not available then queue the transaction 'Waiting for Securities'; securities in this queue shall be processed each time securities are credited to the account.

(b) Immediately securities are available, the CSD shall check if the Participant is an ZIPSS Participant:

- o if the Participant is not an ZIPSS Participant, the CSD shall check if funds are available within the Trading Ceiling set by the Settlement Agent:

- o if funds are available, the CSD shall debit 'Available Balance' and credit 'Reserved Balance';

- o if funds are not available the transaction shall be queued – 'Waiting Supplementary Funds'.

(c) Immediately funds are available within the Trading Ceiling or if the Participant is also an ZIPSS Participant; the CSD shall send a message to ZIPSS to instruct it to move funds;

- o if funds are available in ZIPSS (in the Settlement Account of the Participant or the Settlement Accounts of the Participant's Settlement Agent), the CSD will receive a message from ZIPSS confirming that funds have been moved;

- o if funds are not available in ZIPSS the transaction shall be queued 'Waiting for Funds Confirmation'.

(d) Once confirmation is received from ZIPSS, the CSD shall:

- o credit the buyer's 'Available Balance' with the securities that were blocked (Hold status) in the seller's securities account;

- o remove the securities from 'Hold' status in the sellers account.


### 10.9.4 Unsettled Messages and Transactions

Messages and transactions are automatically cancelled by the CSD as follows:

(a) If a message is not matched by the cut off time for DvP settlements, the message is cancelled and a notification sent to the sender of the message (SWIFT MT548);

(b) If a matched transaction is not settled by cut off time for DvP settlements, the transaction is cancelled and a notification sent to the buyer and the seller (SWIFT MT548);

It is the responsibility of the Participants to re-create the messages and transactions on the following Business Day to settle their liabilities to each other.

### 10.9.5 Information to Participants

All queued transactions shall be visible to Participants through the workstation. It is the responsibility of Participants to monitor the status of their transactions and to take appropriate action to ensure the settlement of such transactions…

## 10.10 Repo and Reverse Repo Transactions

### 10.10.1 General
A Repo is a sale and repurchase agreement between two Participants. It is made up of two DvP operations linked together. These operations involve two transactions, that is, the first leg referred to as the sale operation and the second leg, the repurchase operation. A Reverse Repo is the same transactions as a repo but viewed from the perspective of the buyer of the securities rather than the seller.

### 10.10.2 Types of Repo

Repo operations may be Intra-day where the second leg due for settlement on the same day as the first leg or long term where the second leg is due for settlement on a future date. Both intra-day Repos and long term Repos may be between Participants or between a Participant and BoZ.

### 10.10.3 Restrictions on Repos

Long Term Repos are not permitted where the redemption date of the security is between the settlement date of the first leg and the settlement date of the second leg.

### 10.10.4 Matching Repos

Participants (including BoZ) shall report repos to the CSD. The Seller and buyer will use the SWIFT MT543 and SWIFT MT541, respectively. The matching process for repos shall be the same as that for DvP transactions except that additional fields relating to contract number and contract expiration date and time (where appropriate) shall match.

### 10.10.5 Processing First Leg

The processing for the first leg of the Repo transaction shall be exactly the same as the processing for a DvP transaction.

### 10.10.6 Processing Second Leg

Once the first leg of a Repo is settled, the second leg is created and is queued 'Waiting for Deferred Start'. Settlement of the second leg, shall be automatically initiated at the date and time entered on the initial message (contract expiration date). Settlement of the second leg shall be exactly the same as the processing for a DvP transaction.

If the second leg is not settled by the cut off time for DvP transactions, the second leg transaction is cancelled. The counterparties shall agree outside of the system the methodology for settling the transaction.

### 10.10.7 Free of Payment Repo

Participants may enter into a Free of Payment (FOP) using the following records: SWIFT MT540–Receive Free Instruction and SWIFT MT542–Deliver Free Instruction. The FOP repo shall be matched and shall result in the FOP transfer of securities between the two Participants.

### 10.10.8 Interest/Coupon Payments

Any interest/coupon payment with a Record Date between the first and the second leg of a Repo shall be paid to the holder of the securities.

This holder of the securities has to return the interest to the original owner.

## 10.11 Free of Payment Transfers

### 10.11.1 Movements within a Participant

To effect a FOP transfer to or from a client or between two clients of the Participant, the Participant shall enter a single message (SWIFT MT542). The message shall be validated by the CSD. Accepted messages shall be passed for settlement. However, those messages which fail validation shall be rejected and a notification (SWIFT MT548) sent to the Participant.

### 10.11.2 Movements across Participants

To effect a FOP transfer across Participants, the Deliverer of securities will use SWIFT MT542 and the recipient will use SWIFT MT540. Messages shall be matched in the same way as for DvP messages except that no value shall be entered or matched.

### 10.11.3 Processing

The CSD shall transfer securities from the delivering account to the receiving account if sufficient securities are available in the deliverer's account. If insufficient securities are available to settle the transaction in full, the transaction shall be queued 'Waiting for Securities'. The transaction shall be cancelled if it is unsettled at FOP cut off time.

## 10.12 Rediscount Facility

The system will accommodate the Rediscount Facility. The operation is created using a Single SWIFT MT543 entered by the Participant requesting the Rediscount. The cash value of the transaction is calculated using the formulas specified in Annex 5.

The CSD will validate that:

(a) The securities that have less than 5 business days to maturity are not eligible for Rediscount (configurable as system parameter);

(b) A higher penalty shall be applied on securities that are rediscounted immediately after settlement.

Once the above-mentioned message is received and accepted, the system will automatically create the rediscount operation that is automatically placed in an approval status, pending authorization from BoZ. Once the approval step is successfully performed, the Rediscount operation is processed so that it transfers the securities from the account of the Participant to the own account of the BoZ. This rediscounted security is held in BoZ account until maturity or can be traded in the secondary market. The agreed cash amount will be transferred from BOZ to the Participant's settlement account.

# 11   Pledges in favour of Bank of Zambia

## 11.1   Types of Pledge

Pledges from Participant to BoZ may take one of the following forms:

(a) Secured Loans used under Open Market Operations.

(b) Loans of Last Resort (LOLR) explicitly granted by the BoZ in emergencies, which may be collateralized with other assets as well as pledged securities.

(c) Zambia Electronic Clearing House Limited (ZECHL) pledge: One of the requirements under the ZECHL Rules is that all members of the ZECHL should hold sufficient eligible securities, in trust, with BoZ, as collateral. All clearing house Participants are therefore required to operate with adequate collateral as provided in the Rules and Procedures of ZECHL.

## 11.2   Secured Loan

A Secured Loan is a collateralized loan which is given to a commercial bank by the BoZ. Secured loans will be issued through auctions as part of BoZ's OMOs.  Both Government Securities and OMO deposits will be considered as collateral for a Secured Loan.

The Secured Loan will be treated as pledge transaction in favour of BoZ. In this case, the CSD shall move securities and/or OMO deposits in the house account of the Participant from the Available balance to the Pledged balance.

## 11.3 Loan of Last Resort

Loans of last resort are agreed between Participants and BoZ outside of the system.

To report a Loan of Last Resort, a Participant sends a Pledge Instruction (SWIFT MT 527) containing the following information: loan value, maturity date, contract number, counterparty (which shall be BoZ),  ISIN and quantity of each security to be pledged.

If the message is valid, CSD shall generate a Pledge Transaction that shall be placed in a 'Waiting for Authorization' queue. Further, when BoZ has authorized the transaction, CSD shall transfer the nominated quantity of each security from the Available Balance to the Pledged Balance and value the securities in accordance with Rule 11.9.

The value of the Pledged securities will be agreed outside the CSD. The Pledge will reported to the CSD using SWIFT MT527. The cash leg will be provided by BoZ to the directly to the Participant's settlement account in the ZIPSS.  On the maturity date of the loan Boz shall await receipt of a repayment confirmation message before releasing the pledged securities (collateral).

## 11.4 Zambia Electronic Clearing House Limited

ZECHL rules impose certain powers, responsibilities and obligations on BoZ as Overseer, Regulator and Participant in the Payment and Clearing Systems.

One of the requirements under the ZECH rules is that all members of the ZECHL should hold sufficient eligible securities, in trust, with BoZ, as collateral. All clearing house participants are therefore required to operate with adequate collateral as provided in the rules and procedures of ZECHL.

The Bank receives daily statistics of participants' net settlements on Electronic Funds Transfers (EFT) and Cheque Image Clearing (CIC) which are used to compute how much collateral each participant is required to provide every month. The settlement figures for each bank are recorded on daily basis. On the first day of every month collateral is reviewed, recomputed and communicated to the participants. Participants are expected to put in place the revised amounts on the 7th working day of every month.

The collateral amount is determined based on the following:

   (a) The highest debit figure of the previous month or
   (b) Three (3) months moving average of the highest debit balances

The higher of the two figures represents the collateral requirement for the Participant for the month. Only cash and Treasury bills with a maximum tenure of 364 days are eligible for ZECHL collateral.

Further, a bank that operates with inadequate collateral is liable to a penalty in accordance with Sections 18 and 19 of the National Payment Systems Act of 2007. The penalty is calculated for every day that the participant operates with insufficient collateral. In addition, BoZ may suspend any participant that operates with inadequate collateral for such period and on such terms as may be determined by BoZ. More specifically, the following will apply:

   (a) Each commercial bank pledges securities for ZECHL collateral requirement on the CSD system on its own.

   (b)The system shall only accept Government securities as ZECHL collateral.

   (c) Pledges entered by participants shall be validated by the system. Pledges with errors shall be rejected and a notification sent to the sender. Equally, a notification shall be sent to Participants on successful pledges.

(d) System shall value eligible securities at their current market values at any given time

(e) Each participant shall hold ZECHL cash Collateral Account on the BoZ banking system

(f) Government Securities pledged as collateral that mature before expiry of contract shall be transferred to the participant's ZECHL cash collateral account on BoZ banking system.

(g) Funds on the cash collateral account shall be transferred to Participants' settlement accounts by BoZ upon receipt of instructions In Writing and confirmation that replacement securities have been provided by the participant on the CSD system.

(h) BoZ shall determine and communicate specific start and release dates for securities pledged. Upon expiry of the contract, securities shall be released back to the Participant.

(i) Prior to expiry of contract, the system should allow Participants to diarise a new contract that shall start immediately the existing contract expires for a Participant to remain compliant with ZECHL rules and the National Payment System Act of 2007.

(j) The CSD system shall generate a notification or warning to Participants and BoZ two (2) days before expiry of existing contract.

Participants should monitor and ensure that they pledge sufficient securities for ZECHL collateral.

The securities that are pledged for ZECHL collateral shall be held separate from other securities and blocked from trading.

## 11.5 Messages and Notifications

The following messages shall be sent by CSD to Participants to confirm the execution of instructions or to warn of failures and unusual conditions under LOLR and ZECHL pledges:

(a) Pledge Instruction – SWIFT MT527

(b) Pledge Notification – SWIFT MT558

(c) Free Format Message – SWIFT MT599

Participants shall submit to the CSD a Pledge Instruction (SWIFT MT527) specifying the pledge maturity date.

Valid messages are processed in the following way. Securities are transferred from the Available Balance to the Pledged Balance in the House Account of the Participant; the Pledge Scope Code is used to keep these securities separate from any other type of pledged securities. The pledged securities are valued in accordance with Rule 11.10.

## 11.6 Pledge End Date

Before the Pledge end date, BoZ should release the securities by submitting a SWIFT MT527 message, if the BoZ does not release the securities on time at the end of the Pledge Date, the CSD shall automatically move the securities from the Pledged Balance to the Banned Balance.

## 11.7 Interest

Interest payable during the life of the pledge shall be paid to the Pledger.

## 11.8 Partial Redemptions

The value of the pledge shall be automatically reduced in the event of a partial redemption of the security.

## 11.9 Parameters

Securities may be pledged by Participants in favour of BoZ provided:

(a) the security (ISIN) has a flag 'Eligible for operation with BoZ'; this determines if a security can be used as collateral within ZIPSS;

(b) the Participant record in CSD has a flag permitting it to perform Pledge or repo operations with BoZ;

## 11.10 Valuation of Securities

### 11.10.1 Calculation of Collateral Value

The collateral value of securities which are pledged to BoZ will be calculated as specified in Annex 8

### 11.10.2 Haircut

The 'haircut' is a parameter held at issue level, which may be updated manually. This value shall be applied to the nominal value of the security.

## 11.11 Execution of Pledges

BoZ may, at its own discretion, execute the Pledge by sale or by appropriation, if:

(a) the loan is not repaid and BoZ, at its discretion, is unwilling to provide any further financing for that Participant;

(b) the Participant or one of its creditors files for cessation of payments;

(c) the Participant is declared bankrupt;

(d) the Participant's Settlement Account in ZIPSS has been terminated or the acts and omissions on the part of the Participant, in BoZ opinion, result in systemic risk or may endanger the smooth operation of ZIPSS or ZECHL; and

(e) the Participant does not comply or no longer complies with the conditions as referred to in Rule 3.

# 12    Pledges not involving Bank of Zambia

## 12.1 Types of Pledge

The following types of pledges may be recorded in the CSD:

(a) between a Participant and its  client;

(b) between the client or one Participant and another Participant;

(c) between two clients (of the same or different Participants); or

(d) between two Participants.


## 12.2 Messages and Notifications

The following messages shall be sent by CSD to Participants to confirm the execution of instructions or to warn of failures and unusual conditions:

(a) Pledge Instruction – SWIFT MT 527

(b)Pledge Notification – SWIFT MT 558

(c) Free Format Message – SWIFT MT 599


## 12.3 Pledges involving a single Participant

Pledges made between a Participant and his client or between two clients of the same Participant shall be reported to the CSD using a single Pledge Instruction (SWIFT MT 527). The CSD shall validate the message. Messages which fail validation shall be rejected and a Notification (SWIFT MT558) sent to the Participant which entered the message. Messages which pass validation are processed within CSD.

## 12.4 Pledges involving two Participants

Pledges made between two Participants, between clients of different Participants or between the client of one Participant and another Participant shall be reported to CSD by both Participants using SWIFT MT 527.

CSD shall validate these messages. Messages which fail validation shall be rejected and notification (SWIFT MT 558) sent to the Participant which entered the message.

Valid messages shall be compared with messages which are in the WFM – 'Waiting for Matching' queue in accordance with the following criteria:

(a) message type;

(b) pledger;

(c) pledgee;

(d) instruments (there may be one or more instruments included in a single pledge instruction);

(e) number of certificates (a number shall be entered for each instrument);

(f) pledge end date;

(g) contract number; and

(h) contract value (this value shall be reported to Participants but shall not be processed by CSD).

The CSD shall pass matched transactions for processing. Messages which do not match shall be queued 'Waiting for Matching'.

## 12.5 Processing

Provided sufficient securities are available, CSD shall update the account of the pledgee as follows debit the Available Balance and credit the Pledged Balance.

If insufficient securities are available the Pledge Instruction shall be queued 'Waiting for Securities'. The queued Pledge Instruction shall be re-tried each time securities are added to the account. Queued instructions shall be cancelled at cut-off time for FOP settlement.

## 12.6 Pledge Cancellation

The Pledgee and Pledger may, at any time, release the securities (cancel) the Pledge. To cancel the Pledge, the Participants shall both submit matchable Pledge messages (SWIFT MT 527).These messages are processed in the same way as initial Pledge messages.

## 12.7   Pledge End Date

Before the Pledge end date, the Pledgee should release the securities by submitting a SWIFT MT527 message, if the Pledgee does not release the securities on time at the end of the Pledge Date, the CSD shall automatically move the securities from the Pledged Balance to the Banned Balance.

At Pledge End Date, the CSD shall automatically move securities from the Pledged Balance to the Available Balance.

## 12.8 Pledge Execution

Pledgees shall only execute a pledge on the instructions of a court or body with similar authority.

To execute a Pledge, the Pledgee shall execute the pledge by appropriation – SWIFT 540, the CSD shall validate the message. Messages with errors are rejected and a Notification (SWIFT MT 558) shall be sent to the Participant that sent the message.

Valid instructions are processed by appropriation. The securities shall be transferred FOP from the Pledged balance in the account of the pledger to the account nominated by the Pledgee on the appropriation instruction.

## 12.9 Interest

Interest payable during the life of the pledge shall be paid to the Pledger.

## 12.10 Partial Redemptions

The value of the pledge shall be automatically reduced in the event of a partial redemption of the security.

## 12.11 Redemptions

It shall be the responsibility of the Pledger and the Pledgee to ensure that the end date of the pledge is prior to the redemption date of the security. Should the securities be redeemed, for any reason, during the life of the Pledge, the redemptions monies shall be paid, by the CSD, to the Pledger. CSD shall issue a report on the maturity date of an issue, showing any outstanding pledges as of that date.

# 13 Repos in favour of Bank of Zambia

## 13.1 Intra-day Liquidity Facility (ILF)

### 13.1.1 Repo Registration Request

Participants may repo securities to BoZ in order to obtain intra-day liquidity support at any time during the Business Day. The intraday facility will be treated as a repo with no interest charged. In this instance, the securities will be transferred to the Bank of Zambia. However, if the loan is not repaid within the business day it will be converted either into an overnight repo or a permanent trade where it will be considered a rediscount (See Rule 10.12) depending on the prevailing policy.

If the prevailing policy dictates that the unrepaid ILF be converted to an automatic OLF loan attracting interest and Bank of Zambia will continue to hold the securities until the loan is repaid at the prescribed time the following procedure will be undertaken:

(a) Create a new second leg operation that is clearly identified as an overnight loan, where the repurchase cash amount will be the original one plus the overnight interest calculated using the following formula provided in ;

(b) It will allow for the CSD to close for the current business day;

(c) It will attempt the settlement of the overnight loan at the beginning of the next business date in the conditions mentioned above;

(d) If the overnight loan is not settled by the end of the processing business day, the system will automatically extend the loan for an additional night, calculating an additional overnight charge that is also debited as a separate transaction. The number of overnight loan extensions to be automatically performed by the system is controlled by the system parameter identified as Number of Overnight Extension Days.

If the Bank's prevailing policy does not allow the creation of an automatic overnight loan the intraday credit collateral will be rediscounted at final cut-off.

## 13.2 Overnight Repo

To activate an overnight loan a Participant shall enter a repo instruction SWIFT MT 543 in the CSD as an Overnight Loan and a maturity date of the next Business Day. If the message is valid, CSD shall generate a Repo Transaction that shall be placed in a 'Waiting for Authorization' queue.

When BoZ has authorized the transaction, CSD shall transfer the nominated quantity of each security from the Seller's Account to the Buyer's Account (BoZ) and the value of the securities in accordance with Annex 6.

CSD shall send a message to RTGS giving the Repo Contract Number and the value of the repoed securities. The cash leg will be settled in RTGS in line with DvP principles.

The following day CSD shall await receipt of a repayment confirmation message from RTGS before releasing the securities (collateral). If the cut off time for DvP is reached prior to receipt of a repayment confirmation message, CSD shall send a cancellation message to RTGS but shall not release the securities.

# 14 Queue Management

The CSD shall place messages and transactions in queues when they cannot be immediately settled, as follows:

(a) Waiting for Matching: this contains messages, which require matching, but which are not yet matched;

(b) Waiting for Securities: this contains sold transactions where there is insufficient Available Balance in the CSD account of the Participant;

(c) Waiting for Supplementary Funds: this contains transactions bought by Participants who do not have their own RTGS Settlement Account and who have insufficient funds available from their Settlement Agent; i.e. settlement of the transaction would breach the Trading Ceiling agreed with the Settlement Agent;

(d) Waiting for Funds: this contains transactions where a confirmation of RTGS settlement is awaited; transactions will normally only appear in this pending status if there is insufficient funds available in the RTGS account to settle the transaction;

(e) Waiting for Future Settlement: this contains transactions which are due for settlement at a subsequent hour or day (e.g. the second leg of repos);

(f) Waiting for Authorisation: this contains transactions on Restricted Accounts, which are awaiting BoZ authorisation.

Information concerning transactions in the queues is available to Participants through the web-station. Participants shall review these queues on a regular basis and ensure that any necessary steps are taken to facilitate the settlement of the transactions. In particular Participants shall review the queues prior to the cut off time for a particular facility.

# 15   Reports and Enquiry Facilities

## 15.1 Access

All information in the system shall be available at all times to persons in BoZ who are authorized to view such information. All Participants shall have the ability to authorize their Users to view some or all of their own data, which includes data relating to their clients. Settlement Agents may also view information to their customers' usage of the Trading Ceiling.

## 15.2 Enquiries

Participants shall be able to view following:

(a) Standing data: this includes List of Participants, Securities, and Payment Events;

(b) Calendar and daily operating cycle (cut-off times): This relates to a list of working and non-working days and the normal timetable within each day;

(c) System status: i.e. what stage in the daily cycle the system has reached.


CSD shall provide the Participant with systematic information on:

(a) the balances and settled transactions which affect their securities accounts and the accounts of their clients;

(b) eligible Securities and Payment Events;

(c) pending and settled transactions;

(d) rejected and cancelled transactions;

(e) queued transactions; and

(f) pledge and repo movements and potential movements.


Participants may make enquiries at any time during the Business Day. The reports may be viewed on the Webstation or may be printed or downloaded in either Excel or CSV format.

## 15.3 End of Day

At the end of each Business Day, the CSD shall provide an Account Activity Report for each Participant.

## 15.4 Digital Signature

All reports provided by CSD shall display a digital signature as a guarantee of authenticity.

# 16   Operating Days and Hours

## 16.1 Operating Days

CSD shall operate each weekday (Monday to Friday) except for public holidays according to the calendar maintained by BoZ. Any deviations from this planned schedule shall be announced in advance to Participants In Writing.

## 16.2 Daily Operating Cycle

CSD shall process in accordance with a daily operating cycle as specified in Annex 9. The cycle shall include the following periods for action:

(a) Prior to Start of Day: during this period, BoZ shall manage Standing Data reports and charts are available to Participants;

(b)  Start of Day

(c) After Start of Day: the settlement of pending auctions and Payment Events will be initiated; any queued value dated transactions with the current Business Day will be entered automatically for processing; Participants may enter transactions;

(d) Intra-day auction cut off: no further intra-day auctions will be processed after this time;

(e) DvP Cut Off: no further DvP transactions may be entered by Participants;

(f) FoP Cut Off: no further FoP transactions may be entered by Participants:

(g) End of Business Day: end of day Reports are generated and are available for downloading by Participants.

When there is an extension in the RTGS Operating hours, an alert should be send from the RTGS Administrator to the CSD Administrator.

## 16.3 Operating Hours

The CSD operating hours are defined in Annex 9 to these Rules and may be modified from time to time.

# 17 Error handling

## 17.1 General Obligations

In case of a technical failure of a Participant compromising the generation or the reception of transactions through CSD for more than one hour during the day, a Participant shall immediately inform BoZ.

BoZ shall inform the Participants in case of a technical failure of the system compromising the Settlement of CSD transactions for more than 30 minutes during the day and for more than 30 minutes after End of Day.

If a technical or other failure at a Participant occurs, the Participant may instruct BoZ to suspend its account and the accounts of its clients and Participants for whom it acts as Settlement Agent. Account suspension requires confirmation In Writing from the Participants and the lifting of such a suspension requires confirmation In Writing from the Participant and BoZ.

The information can be exchanged via free formatted SWIFT MT999-type messages, secure emails, faxes, or phone calls. Authenticated faxes may be requested for confirmation.

## 17.2 Telecommunication Failure

In case the connection of a Participant's CSD Webstation to the VPN breaks down, the Participant should within a reasonable period of time start a new connection via their fallback line. If the Participant is then still unable to send messages to the system, it should contact BoZ to determine what action needs to be taken. Any agreed action shall be confirmed In Writing by the Participant and BoZ.

## 17.3 Failure of the VPN

An inability to access the central system via the VPN for all or a significant number of Participants effectively prevents the effective operation of the CSD. Such a situation will only be deemed to have occurred, if BoZ advises all Participants that such an event has occurred.

A Situation Room will be located within Bank of Zambia, Lusaka. This will facilitate Fallback Site for Participants to enter transactions directly into the CSD via the Montran Gateway and the BoZ LAN. This will require the use of smart tokens to control access in a secure fashion, which will be provided to all Participants by BoZ.

# 18  Audit Rules

## 18.1 General Audit Rules

Each Participant shall assess compliance with the functional, technical and organisational features, including security provisions, as specified for CSD in these Rules. BoZ may require on a regular basis the submission of audit reports and working documents. BoZ shall also assess compliance with the above-mentioned features. It is entitled to examine Participants' controls for adequacy and to make the necessary contacts with the auditors of the Participants.

BoZ shall subject own operations to both internal and external audits.

## 18.2 Annual Audit

Each Participant must submit to BoZ a yearly compliance audit certificate, in the form of Annex 10, within 60 calendar days from the date of the Participant joining CSD. The yearly compliance audit certificate must be duly signed by an Authorized Officer of the Participant. Any evidence of that authorization which is reasonably requested by BoZ must be promptly produced to BoZ following that request.

Only Direct Participants who have VPN connectivity will be subjected to The Annual Audits. See also Annex 10 for further instructions on the procedural requirements in relation to yearly compliance audit certificates.

# 19    Archiving and publication of data

## 19.1 CSD Audit trails

CSD provides comprehensive audit trails, which can be made available to Participants on request at BoZ's discretion.

BoZ auditors are able to examine all the activities carried out on the system, including transaction and static data amendments, but access to audit trail data will be restricted by use of User profiles. Where auditors or any other legal entity wishes to access data about another Participant, BoZ will require a certified copy of a board resolution of that Participant (or the equivalent corporate authority) authorizing the auditors, BoZ or this other legal entity to access data about that Participant. The audit trails provide information:

(a) at application level, showing the path of transactions through the system, the source of all changes to data in the system files and on the databases and providing proof that all transactions received have been processed. The data entry users and approvers for all actions are recorded and are visible on the relevant screens;

(b) at Participant level, showing details of all transactions relating to a particular Participant;

(c) at User level, giving a record of all accesses to the system and the actions of Users, keeping a record of actions by User and showing which Users have taken action on any particular transaction. These elements form part of the technical audit trail known as the system log;

(d) at technical level, providing a secure record of the technical functioning of the system, recording access to system modules and technical events in detail.  This audit trail is referred to as the system log.

The main audit tools, apart from standard reports, are as follows:

(a) Facility to list all transactions for CSD from on-line history files within the system for at least three years, from postings on the database;

(b) Facility to request from BoZ User defined reports for audit purposes based on statistical and other tables in the database. BoZ may make a charge for the production of special reports.


## 19.2 Publication of Statistics

BoZ shall have the right to publish, periodically in its own bulletin, any statistical information relating to the operation of the CSD, provided such information does not compromise the privacy of individual Participant data.

## 19.3 Conservation and Archiving of Documents

BoZ and the Participants shall comply with the laws and regulations applicable in Zambia concerning the conservation and archiving of documents as regards the support and the duration of the conservation. For this purpose, transactions and accounting data will be stored for a period in accordance with relevant Zambian legislation (which specifies seven years). All current transactions and data up to three years are accessible on-line in real-time.

# 20   Security and Confidentiality Provisions

## 20.1 Data integrity and confidentiality (at Participants' level)

Participants must comply with the applicable Procedures and must ensure that the transaction flows in their internal systems are adequately shielded against any internal or external threat. Confidentiality and data integrity must be safeguarded. They must refrain from accessing the central system except through the Montran Gateway or the associated web browser facilities.

## 20.2 Transfer of Information

The Participants hereby authorizes the transfer of any information relating to the Participant to and between the branches, affiliates and agents of BoZ and third parties selected by any of them, wherever situated, for confidential use in connection with the provision of CSD facilities to the Participants (including for data processing purposes) and further acknowledge that any such branch, affiliate, agent and third party shall be entitled to transfer any such information as required by any law, court, legal process or as requested by any authority in accordance with which it is required to act, as it shall determine.

## 20.3 Availability (at Participants' level)

Participants should set up fallback equipment for the IT components required for the connection to the VPN. They should also realize sufficient data backup as regards the data exchanged through the system.

## 20.4 Help Desk

BoZ shall provide a first level help desk to support the operation of the central system and the Participant Webstation in normal circumstances. BoZ shall furthermore centralize and monitor all information and support requests and problem reports addressed to the providers. For more information on the help desk see Annex 11.

## 20.5 Contingency Event

A Contingency Event is any event which disrupts normal processing to the extent that contingency procedures are brought into effect. BoZ shall have the right in their sole discretion to determine and warn Participants that a Contingency Event has occurred. This may or may not include transfer of operations to the CSD alternate site and/or running CSD in stand-alone mode, without communication links to other systems.

Under these conditions, BoZ shall have the right, in its sole discretion, to conduct special reconciliations with Participants and to request therefore the necessary transaction and other information from Participants. As a result of reconciliations in a Contingency Event, Participants may be required to perform special transactions to ensure that all systems are properly synchronised.

# 21 Liabilities

## 21.1 Force majeure

If by force majeure any Participant is rendered unable wholly or in part to carry out its obligations under these Rules (except payment obligations) or is delayed in its operations to be performed pursuant to these Rules (except payment obligations) such Participant may within 14 days from the date of commencement of such force majeure give written notice thereof to BoZ stating the date and extent and the nature of the force majeure causing the same. Upon the giving of such notice, the obligations of the Participant claiming force majeure may be suspended during the continuance of such force majeure so far as such obligations are affected by the force majeure.

The Participant claiming force majeure shall use all due diligence to remove the effects thereof but nothing in this clause requires any Participant to settle any industrial dispute except in such manner as it in its absolute discretion deems fit.

Any Particpant the performance of whose obligations has been so suspended shall resume performance thereof as soon as reasonably possible after the circumstances preventing such performance have terminated and shall promptly thereafter so notify BoZ In Writing.

In the event that a Participant has invoked the provisions of this Clause and a force majeure continues for a period in excess of one (1) month the BoZ may terminate the Participants participation.

A Particpant shall notify BoZ immediately upon its becoming aware of any event known or likely to give rise to a possible suspension of its obligations pursuant to these Rules 3.9.2.

For the purpose of these Rules the term "force majeure" includes (but is not limited to) fires, flood, storms and other damage caused by the elements, strikes, riots, explosions, governmental action or inaction, currency restrictions, acts of God, insurrection and war and any other cause whether of the kind specifically enumerated above or otherwise which is not reasonably within the control of the party claiming force majeure.

There shall be no liability for non-compliance with these Rules to the extent that, and for so long as, there is an inability to perform the obligations under these Rules due to force majeure.

The foregoing shall not prejudice the responsibility to carry out the error handling procedures and other technical operational measures such as those specified in Rule 20.5 (Contingency Event) in accordance with these Rules, so far as possible, despite the Force Majeure Event, and to use all reasonable efforts to mitigate the effects of any such event whilst it is continuing.

## 21.2 Liabilities and Responsibilities

## 21.2.1 Responsibilities of the Participants

### 21.2.1.1 General Principles

The Participants shall issue their instructions to CSD in accordance with the Rules. If there is a transmission problem, Participants shall contact, as appropriate, the BoZ Help Desk. They shall monitor the progress of the transactions as closely as possible and report any irregularities detected to the BoZ Help Desk.

The Participants are individually responsible for:

(a) the correct fulfilling of their obligations resulting from these Rules;

(b) the quality of the data they send on their own behalf and on behalf of their correspondents or customers;

(c) the compliance of the data with the technical protocols and message formats agreed upon;

(d) securing the access to their Participant web-station and SWIFT Interface.

(e) ensuring that they collect all data provided to them by CSD.

BoZ shall not be liable for any loss incurred by a Participant due to a failure by a Participant to monitor and reconcile its transaction flows, and each Participant hereby agrees to hold BoZ and the other Participants harmless from and against any claim, cost or expense (including legal fees) resulting from their failure to monitor their payment flows and their failure to reconcile.

### 21.2.1.2 Correction of an Erroneous Order

If a Participant is aware that its Participant's account or an account managed by the Participant on behalf of a client has received securities erroneously or for an excess amount, the receiving Participant must inform the deliverer immediately and make the repayment as a new instruction. If appropriate, the delivering Participant should take the initiative in requesting the receiving Participant to make the correction.

If, the error has not been corrected on the day the correction was requested by the delivering Participant or on the day the delivering Participant was informed, the delivering Participant may claim interest for delay from the erroneously credited Participant. This interest is calculated on the nominal value of the securities on the basis of a penalty rate determined by BoZ from time to time.

If the delivering Participant reported the error before Initial Cut-Off and if the erroneously credited Participant does not effect the repayment on the same day, the

interest rate applied by BoZ for overnight credit is charged for the period during which the securities were improperly held by the receiving Participant.

### 21.2.1.3 Access control

Participants must comply strictly with the Procedures and the rules governing access to CSD. Only duly authorized Users who have been issued with an access control smart token by BoZ may use the system. The offending Participant is liable for any damage resulting from non-compliance with the Procedures or from improper or fraudulent use thereof.

### 21.2.1.4 Obligations in the event of Constraining Events

In case of Constraining Events (ie events which affect the ability of any Participant to participate to the normal and usual extent in sending and receiving deliveries in CSD), the Participant involved must inform BoZ immediately and do everything possible to:

(a) identify the irregularity together with BoZ;

(b) solve the problem if it is possible for him to do so within his powers and make use of the fallback resources provided, if the need arises;

(c) inform BoZ when the problem has been solved and the system is functioning normally again;

(d) carry out the operations specified in the relevant manual in order to help BoZ to solve a problem affecting CSD and to return to a normal situation once the problem has been solved.

### 21.2.1.5 Obligations for Transactions Performed by Users

The Participant assumes full liability for every transaction performed by one of its Users.

## 21.2.2 Liabilities of Bank of Zambia

### 21.2.2.1 General

To the extent not inconsistent with applicable law, BoZ shall be liable hereunder only for its failure to act with good faith or to exercise reasonable care, which shall be determined in accordance with the reasonable commercial standards of the banking industry in Zambia. BoZ shall not be liable for delay or failure in performance by, nor the accuracy of (nor shall it be under a duty to verify the accuracy of) any data or instructions provided by the Participant or a third party. Under no circumstances shall BoZ be liable for any indirect, incidental, consequential loss (including loss of profit) even if advised of the possibility of such loss.

**21.2.2.2 Force majeure**

If BoZ is prevented, hindered or delayed from or in performing any of its obligations under these Rules by a Force Majeure Event (as defined below), then BoZ's obligations hereunder shall be suspended for so long as the Force Majeure Event continues.

In this context, "Force Majeure Event" means any event which occurs due to reasons beyond BoZ's control that cannot be overcome by reasonable diligence and without unreasonable expense and including, but not limited to, any natural, technological, political or similar cause.

**21.2.2.3 Responsibilities and liabilities of Bank of Zambia**

BOZ as System Operator is responsible for:

(a) checking instructions received from Participants in accordance with these Rules and the User Manuals;

(b) the integrity, security and confidentiality of instructions, from the point at which they are accepted by the CSD until they are dispatched to the counterparty.

(c) keeping a record of all instructions received by CSD according to relevant Zambian legislation;

(d) making available to the Participants the updated information concerning their payment flows and their current account as generated by the system.

(e)The CSD shall be entitled to rely on information received from Participants through the Montran gateway or from the Webstation via VPN; and from other departments or divisions of BOZ.

BoZ shall not be responsible for damage resulting from messages containing errors or for errors which cannot be detected by the checks described in the User Manual.

BoZ shall take all necessary reasonable measures to protect its computer system or to prevent it from being out of order and endeavour to offer as quickly as possible, upon every breakdown or important Constraining Event, a solution to the problem by carrying out the appropriate fallback procedures. If these measures have been taken, BoZ is no longer responsible for the possible breakdown or Constraining Event, even temporary, for any reason, of the computers or the programmes it uses or places at the disposal of its Participants for the processing of their CSD transactions, nor for the destruction or erasing of data stored in the computers or for possible fraudulent use thereof by third parties. The liabilities of BoZ as Technical Operator are limited to:

(a) the correct operating of the system as described in its User and Technical Manuals;

(b) securing by means of adequate devices and procedures the system as regards the data integrity, availability and confidentiality;

(c) the provision of adequate capacity to meet the system performance requirements of the contracts between BoZ and Participants;

(d) endeavouring to solve without delay and in close co-operation with the hardware, software and/or service providers any failure or dysfunction of the system.

BoZ shall not be liable for any failure of CSD resulting from the incorrect use of the system by the Participants or due to software errors or communication failures. Except as provided in Rule 21.2.2, BoZ shall have no liability whatsoever to any Participant or any other person for any loss, liability, or expense suffered by such Participant or person arising from BoZ's acts or omissions in connection with RTGS.

## 21.3 Claims and Compensation

## 21.3.1 System Origin

BoZ shall in case of a failure or a dysfunction raise claims as foreseen in the contracts signed with its counterparts. These sums will be repaid to the Participants proportionally to the direct financial loss they have suffered.

## 21.3.2 Participants' Origin

Any loss incurred due to a fraudulent transfer originating at Participant shall be borne by such Participant.

## 21.3.3 Administrative Fees

BoZ will impose administrative fees against participants for non-compliance.

# 22 Dispute Resolutions

## 22.1 Law and jurisdiction

These Rules are subject to the Laws of the Republic of Zambia.

In case of a dispute between Participants or between Participants and BoZ, the respective rights and obligations in relation to instructions processed through CSD, and all other matters referred to in these Rules, shall be determined according to the laws of Zambia and the provisions contained in the Rules and Procedures referred to in these Rules and Annexes.

## 22.2 Conciliation and Arbitration Procedures

## 22.2.1       Conciliation Procedure

In case of operational error or dispute between Participants, the Participants concerned shall sit together in order to find an amicable settlement and take all necessary measures to that effect.

If Participants fail to reach an amicable settlement within ten days of initiating dialogue, a party to the dispute shall refer, in writing, the dispute to BOZ, to start a conciliation procedure in order to find a solution concerning the error or the dispute, its consequences and damages.

The Participants concerned shall communicate to BoZ all necessary information and documentation to this effect.

## 22.2.2 Arbitration Procedure

Every Participant and BoZ agree to refer any dispute concerning the interpretation or implementation of these Rules on which the parties have not been able to find an amicable settlement or solution through a conciliation procedure within 45 days for arbitration in accordance with the Arbitration Act Number 19 of 2000 of the Laws of Zambia.

The party wishing to make use of this arbitration procedure shall inform the other party by registered letter. Parties shall be free to appoint arbitrators of their choice.

The arbitral body may set time limits to the parties with respect to the conduct of the arbitration and it may also decide to extend time limits, including the time limit to render the arbitral award.

Only with respect to arbitration taking place in Zambia, setting aside proceedings if any shall be conducted before the Zambian courts. For arbitration taking place outside Zambia, setting aside proceedings if any shall be conducted before the competent court of the country where such arbitration takes place.

# 23 Procedure in the Event of Insolvency of a Participant

## 23.1 Notification of Insolvency Events

A Participant must notify BoZ immediately upon becoming aware of

(a) any Insolvency Event in respect of itself; and

(b) any reasonable grounds to suspect that any other Participant is insolvent.

For the purposes of a) and b), 'insolvency' is to be read as meaning that the relevant Participant is not able to pay all its debts as and when they become due and payable.

Upon receiving any notification under (a) above, BoZ shall promptly notify all other Participants. These notifications should comply with the conditions set in Annex 14 to these Rules.

Upon receiving any notification under (b) above, BoZ will promptly make enquiries of the Participant in respect of which insolvency is reported to be suspected and, if the relevant Participant is prudentially supervised by an entity other than BoZ, the relevant supervisor. To the extent that an Insolvency Event is admitted by the relevant Participant and that fact is communicated to BoZ, BoZ shall promptly notify all other Participants.

The provisions of Rule 3.9.1 (suspension) or Rule 3.9.2 (termination) may apply as a result.

## 23.2 Arrangements Following Notification

Upon being informed of the fact that a Participant has admitted an Insolvency Event pursuant to Rule 23.1, BoZ shall take all reasonable steps to ensure that, except with the consent of the appointed trustee, no further instructions are presented to CSD for Settlement by the insolvent Participant. BoZ shall, as a minimum, suspend the Participant and restrict all accounts under the control of that Participant.

The suspended Participant shall remain bound by the obligations resulting directly or indirectly from its participation in CSD.

The Participants expressly acknowledge that the procedures for processing instructions described in Rules 8 to 14 inclusive continue to apply despite the Insolvency Event. This means among other things that the instructions entered into the CSD by Participants are irrevocable from the moment they are accepted for settlement by the CSD and cannot therefore be cancelled by Participants or third parties. Thus any Messages and Transactions which have already been accepted by the CSD shall remain within the CSD and shall be processed as follows:

(a) Transactions due for matching: these will be matched if any matching transactions have been entered by third parties prior to the suspension; no transactions showing the

insolvent Participant as the counterparty shall be accepted following suspension of the insolvent Participant.

(b) DvP transactions: instructions that have been passed to RTGS prior to the suspension will settle if there is sufficient cash in the RTGS Settlement Account. Instructions that have not yet been passed to RTGS shall be rejected by RTGS provided the Participant has been suspended in RTGS.

(c) FoP transactions: instructions will settle provided securities are available in the delivering account:

(d) Pledges: These shall remain pledged until further notice.


Subsequent to the suspension, BoZ shall accept instructions for the management of the insolvent Participants accounts and the accounts of his clients as follows:
(a) From Pledgees in respect of execution of Pledges: BoZ shall have the right to demand and inspect pledge agreements before executing Pledges by sale or appropriation;

(b) From a person authorized by the relevant court in Zambia to manage the affairs of the insolvent Participant under the National Payment Systems Act 2007.

(c) Make arrangements to hold any interest or redemption monies in a segregated account until a person is authorized to manage the affairs of the insolvent Participant.


## 23.3 Suspension or Termination on Grounds other than an Insolvency Event

The procedure for immediate termination of a Participant's activities on grounds other than an Insolvency Event is identical to that in the case of an Insolvency Event.

As soon as the suspension has been lifted, BoZ ensures that the Participant is treated normally again from the beginning of the next Business Day.

# 24 Amendment to the Rules and Complementary Instructions

## 24.1 Amendment to the Rules

BoZ is responsible for the amendment of these Rules from time to time or the Annexes hereto, or any additional documents containing, inter alia, technical provisions and specifications for CSD. Such amendments and additional documents shall become effective as an integral part of these Rules as per the date specified by BoZ, which date shall not precede communication to the Participants. BoZ gives notice to each Participant of the modification 30 calendar days before the entry into force. Such changes shall be deemed notified to the Participant when they have been posted on shared information systems to which the Participants have access. Unless a Participant resigns by way of notice In Writing in accordance with Rule 3.9.2 before the entry into force of the amendments to these Rules, the amendments will be deemed to be agreed upon by the Participants concerned. .

## 24.2 Complementary Instructions

BoZ is entitled to send to the Participants complementary instructions on the organization of the system and on the duties of the Participants. Such complementary instructions will be considered to form part of these Rules.

BoZ sends these instructions to each Participant individually.

# Annex 1 – Glossary

| Short Name | Full Name | Explanation/Definition |
|---|---|---|
| | Annex | An Annex to these Rules |
| | Audit Trail | A sequential record of events having occurred in a system. |
| | Authenticated fax | A fax bearing a code or a signature that can be used as confirmation that the source of the fax is authentic and that the recipient can therefore act on its instructions with confidence that the instructions are genuine. |
| | Authorized Officer | Person duly authorized by the competent entity by all necessary action to legally bind the Participant. |
| | Authorized Person | Person duly authorized by all necessary action to access data and to provide instructions with respect to bank accounts, funds transfers and other financial transactions by electronic means and/or person designated to access such data and to provide instructions, on behalf of the Participant in connection with the Services. |
| | Available Balance | The amount of securities that a Participant or his client has available to meet pending deliveries. |
| BIC | Business Identifier Code | An international standard for identification of institutions within the financial services industry and used in automated processing. They unambiguously identify a financial institution or a non-financial institution. A BIC consists of either eight (BIC8) or eleven (BIC11) contiguous characters. These characters comprise either the first three, or all four, of the following components: institution code, country code, location code, and branch code. The International Organization for Standardization has designated SWIFT as the BIC registration authority. |
| | Beneficial Owner | One or more Holders who own securities. |
| | Block | An action taken via a CSD menu function which prevents a specific Participant from sending SWIFT-format messages or instructions to the CSD and/or receiving such messages from the System. |
| | Business Day | A day on which CSD is operating. |
| | Certification Authority | An entity that issues digital certificates that certify the ownership of a public key by the named subject of the certificate. This allows the counterparties to rely upon signatures of the private key that corresponds to the public key that is certified. |
| | Clearing House | A central processing mechanism through which financial institutions agree to exchange payment instructions or other financial obligations (eg securities). The institutions settle for items |

| | | exchanged at a designated time based on the rules and procedures of the clearing house. In some cases, the clearing house may assume significant counterparty, financial or risk management responsibilities for the clearing system. |
|---|---|---|
| | Collateral | An asset that is delivered by the collateral provider to secure an obligation to the collateral taker. Collateral arrangements take different legal forms. |
| | Constraining Event | Processing, communications or other failure of a technical nature;<br><br>Inaccessibility (total or partial) to facilities by means of which instructions are sent and received; or<br><br>Manifestation of industrial action, which affects, or may affect, the ability of any Participant to participate to the normal and usual extent in the transfers of securities within the CSD. |
| | Contingency Event | Any Constraining Event or any other event or circumstance specified by the BoZ. |
| CSD | Central Securities Depository | The BoZ Government securities Registration and Settlement System for Government, BoZ and other eligible issuers. It has been integrated with ZIPSS. |
| | Class | The capacity in which a Participant acts in the Secondary Market. |
| | Coupon Securities | Securities where Interest is paid during the term of the loan. |
| | Cut-off | A designated time limit beyond which certain functions cannot be performed and must be terminated. |
| | Daily Value | The value held in the CSD and used to calculate the value of securities provided as Collateral. |
| DvP | Delivery versus Payment | A mechanism used in securities transfers which ensures that the final transfer of the securities (the delivery) can be considered completed only if the final and irrevocable payment for the transaction has been made. |
| | Digital Certificate | An encrypted text which enables devices such as electronic tokens to be authenticated by the system and system components to authenticate each other using PKI methods. |
| | Digital Signature | A string of data generated by a cryptographic method that is attached to a message to ensure its authenticity as well as to protect the recipient against repudiation by the sender. |
| EOD | End-of-Day | The end of Processing for CSD. |
| | Fallback Site | The name usually used to refer to the site for back-up operations. Often such sites are used as development sites. Equally often they are operated remotely by engineered remote management tools. |

| FCO | Final Cut Off | The time at which RTGS ceases processing of RTGS transactions and cancels any queued transactions. |
|---|---|---|
|  | Final Settlement | Settlement that is irrevocable and unconditional. |
| FIFO | First In First Out principle | A Queue management system under which instructions are processed strictly in chronological order, such that the "oldest" transaction will be tested first. |
|  | Force Majeure Event | Any event due to any cause beyond the reasonable control of the relevant party, including any natural, technological, political or similar cause. |
| FoP | Free of Payment | Delivery of securities with no corresponding transfer of funds. |
|  | Gross Settlement | The settlement of funds and securities transfers, which is effected individually on a transaction by transaction basis, i.e. without any netting of funds or securities. |
|  | Holder | A person who either singly or in association with others is the owner of securities. |
|  | House Account | An account operated by a Participant for the holding of securities beneficially owned by itself. |
|  | Insolvency Event | Any collective measure provided for in the laws of Zambia or a third country, either to wind up the Participant or to reorganize it, when such measure involves the suspension of, or the imposition of limitations on transfers or payments, such as an adjudication order, a request for composition, extension or suspension of payment, moratorium, liquidation and other similar judicial procedures. |
|  | Interest | The price paid by a borrower to the lender for the loan. |
|  | Interest Security | A security where only one payment of interest is made, at the redemption date of the loan. |
|  | Interface | The common boundary between two functional elements, two layers of system architecture or between two physical devises that is defined by its functional characteristics, common physical characteristics of the link between them, signal or other characteristics. |
| ILF | Intra-day Loan Facility | Credit extended for a period of time that is less than one Business Day. The credit is provided by BoZ for the purpose of providing liquidity for a bank Participant through the ZIPSS. |
| ISO | International Standards Organisation" | The International Organization for Standardization is a worldwide federation of national standards bodies from some 140 countries. The mission of ISO is to promote the development of standardization in order to facilitate the international exchange of goods and services. |

| | | |
|---|---|---|
| | In Writing | By secured e-mail or for Participants that cannot receive secured e-mail, by Authenticated faxes or by SWIFT –type message MT999. |
| ISIN | International Securities Identification Number | The identifier used in the System to identify a particular security.<br><br>The format for ISIN is specified by ISO. |
| | Issuer | A Participant having the authority to issue and sell a security or other financial instruments, and which is therefore obligated on such security or financial instrument. |
| | Materials: | These Rules and each related Annex and rider and attachment thereto and hereto, as supplemented by related materials, including User Manuals, data, processes and other documentation provided by BoZ. |
| MOF | Ministry of Finance | The manager of government accounts. A ZIPSS user via BoZ. An issuer of Government securities in CSD. |
| | Montran Gateway | A Montran solution for the integration of the RTGS/CSD with Participant banks' existing back office and client services. It links the bank's internal systems with the RTGS/CSD via standard message oriented middleware and the VPN for STP of all high and low value deliveries and payments. |
| | BoZ Administrator | Official of the BoZ involved with the administration of the CSD and its component modules. |
| | Nominal Value | The face value of the loan. This is also the value on which the rate of interest is based and usually the amount for which the loan is redeemed at maturity. |
| | Omnibus Account | An account managed by Participant in which the holdings and transactions of multiple holders are combined. |
| | Participation Agreement | An agreement between a Participant and BoZ under which the Participant agrees to be bound by the Rules and Procedures. |
| | Payment Event | The payment by the issuer of interest or redemption monies. |
| | Pledge | A delivery of property to secure the performance of an obligation owned by one party (debtor/Pledger) to another (secured party). A pledge creates a security interest in the property so delivered. |
| | Pledger | An entity/individual that deposits own securities as pledge |
| | Pledgee | An entity/individual to which the pledge is made |
| | Primary Participant | A Participant authorized by BoZ to participate directly in securities auctions. |
| | Primary Market | The initial issue and placement of securities |

| | | |
|---|---|---|
| | | including all the operations related to the primary sale. |
| | Procedures | The procedures and the methods designated in these Rules. |
| | Profile | A list of functions that can be accessed in CSD that are assigned to a particular User or group of Users thereby limiting access to only those functions for that User or Group of Users. |
| PKI | Public Key Infrastructure | A highly secure method for securing access and information transfer based on the use of Public and Private keys. It allows for data encryption, server authentication, message integrity, and client authentication for connections between the user's browser and the application server. It can be used to achieve non-repudiation of transactions. |
| | Queue | A facility for managing Messages and Transactions that are pending in the CSD until the occurrence of an event that will allow further processing. |
| | Record Date | The date, set by the issuer, on which Participants must hold securities in order to be eligible to receive a coupon or interest payment or to participate in a partial or optional redemption. |
| | Redemption Date | The date on which the issuer has agreed to repay the loan. If this date is not a Business Day the loan is repaid on the following Business Day. |
| PUSA | Participant User Security Administrators | This officer is in charge of adding new users to the system by entering specific user information and creating the user profile using the RTGS/CSD interface. The new user would have been approved internally in the business unit based on the business approval rules before information on the new user is entered into the system. When requested, this Administrator would also modify existing user information and profile. Each Participant should appoint an Officer who should ideally come from the business area. |
| REPO | Repurchase Agreement | An agreement in which one party sells a security to another party and agrees to repurchase it on a specified date for a specified price. |
| RTGS | Real Time Gross Settlement | The Zambian Government's Payment System for high and low value transactions which is referred to as ZIPSS. |
| | Role | The capacity in which a Participant acts in the Primary Market. |
| | Rules | These CSD Rules and each related Annex and attachment thereto and hereto, as supplemented by related materials, including User Manuals, data, processes and other documentation provided by BoZ (the Materials), as any of these may be amended |

| | | from time to time. |
|---|---|---|
| | Secondary Participant | A Participant who is not authorized by BoZ to participate directly in securities auctions. |
| | Secondary Market | The trading of securities after they are issued and associated activities. |
| | Securities | A tradable asset of any kind which includes debt securities, equity, debentures and OMO instruments. |
| | Security Administrator | An Authorized Person at BoZ or a Participant that has access to CSD for the purpose of maintaining User Details and the Profiles of Users in the CSD system. |
| | Services | All the services and facilities provided or to be provided by the BoZ pursuant to these Rules. |
| | Settlement Agent | A Participant that is an RTGS Participant which provides a cash settlement service for Securities Participant and Non Participant. |
| | Smart token (e-token) | A USB token which carries an embedded chip with memory and/or processor functions in which is contained a Digital Certificate allocated to a specific User. In other words, it contains the digital certificates that enable access to the system and the application of digital signatures. |
| SWIFT | Society for Worldwide Interbank Financial Transactions | International institutions owned by banks which enable electronic messages to be sent securely between banks and financial institutions. |
| STP | Straight Through Processing | STP is a mechanism for eliminating paper and intervention processing such as re-keying of transactions between one system and another. |
| | Synthetic Account | A synthetic account identifies the type of account that a specific category of direct or indirect participant is allowed to manage. Synthetic accounts do not have a balance associated with them. A generic synthetic account will have an analytical account instance for every ISIN and the securities account balance is associated with the analytic account |
| | Timetable | This shows the events that occur during the CSD day and the activities which can be performed at different stages. |
| | Trading Ceiling | A limit set by a Settlement Agent for each of the Securities Dealers or Non Dealers for which it acts, which enables the Settlement Agent to limit its liability. |
| | User | A staff member of a Participant who is entitled, under these Rules and under the rules and procedures of that Participant, to use specific CSD facilities, and has been issued with an access control e-token, PIN, username and password. |

|  | User Manual | User Manuals and Guides defining how to use the CSD, issued by BoZ from time to time. |
|---|---|---|
| VPN | Virtual Private Network | A communications mechanism managed by BoZ which allows secure communications between Participants. |
|  | Webstation | A computer configured to access the CSD via the VPN. |
| ZIPSS | Zambia Interbank Payment and Settlement System | The real-time gross settlement system or any other settlement system adopted and operated by BoZ that facilitates electronic transfer funds among Participants. |

# Annex 2 – Participant Application Form/Participant Agreement

**1.0** THIS AGREEMENT is made and entered into at _____, this _____ day of _____, 20_____, by and between Bank of Zambia (Name And Address) and _____ (Name And Address) (hereafter referred to as the "Participant").

NOW THEREFORE, in consideration of the promises and mutual covenants made one to the other, be it and it is hereby agreed as follows:

This Agreement shall form part of and be incorporated in the Rules and therefore the terms and conditions set out in the Rules shall unless otherwise excluded or varied hereunder, apply to this Agreement.

The Parties agree that in the event of a conflict, the terms of this Agreement shall prevail.

Unless otherwise specified herein all words and phrases defined in the Rules shall have the same meaning in this Agreement.

## 2.0   Authority

## 2.1   Representations, warranties and covenants:

The Participant hereby represents and warrants as of the date that any part of this Agreement is executed and any Service is used or delivered that:

i.    it is duly organised, validly existing and in good standing in every jurisdiction where it is legally required so to be

ii.   it has the power and authority to execute and deliver, and to perform its obligations under, the Agreement;

iii.  the Agreement is duly authorized, executed and delivered and is enforceable, legal, valid and binding obligation.

The Participant further represents and warrants, as of the date that this Agreement is executed and any Service is used or delivered, that:

i.  all necessary consents, authorisations and instructions have been provided to and/or by each third party, if any, involved in reporting, receiving or transmitting instructions, funds transfers and/or data in connection with these Services;

ii.  all necessary approvals, authorisations and consents, if any, have been obtained and all necessary filings or registrations have been made (and the same will be renewed if necessary) as are required by any governmental or other authority in connection with the execution and performance of the Agreement; and

iii  the performance of the Agreement and delivery and use of the services will not violate or offend any applicable requirement, law, decree, regulation, order or judgment.

iv Upon request by BoZ, the Participant agrees to supply BoZ with copies of any such consents, instructions and authorizations required of the Participant under (iv) or (v).

v The Participant further agrees to immediately notify BoZ if it suspects or knows of any circumstances that could or would cause a breach of any representation or warranty hereunder.

## 3.0 Authorised Persons

3.1 The Participant shall deliver upon execution of this Agreement and from time to time, as appropriate, the names and specimen signatures of persons duly authorised by all necessary action to access data and to provide instructions with respect to bank accounts, funds transfers and other financial transactions by electronic means ("instructions"), and/or to designate persons to access such data and to provide instructions, on behalf of the Participant in connection with the Services and the limitations, if any, upon such authority (each, an Authorized Person), accompanied by a certificate signed by the appropriate officer, or equivalent documentation, attesting to the authorization of each Authorized Person and the authenticity of the signature. The Participant hereby authorizes BoZ to act in reliance thereon in executing instructions. Any change in the name or other relevant information about Authorized Persons shall be delivered to BoZ at least 2 business days prior to the effective date of such change.


IN WITNESS WHEREOF, the parties hereto have set their hands and seals the date and place first above mentioned.

_____
Signature of Participant

_____  _____
Signature of BoZ Representative.

## 4.0 CSD APPLICATION FORM FOR INDIVIDUAL INVESTORS

| | |
|---|---|
| **Application to Join the CSD** | |

| | |
|---|---|
| **To:** | Director<br>Financial Markets Department<br>Bank of Zambia<br>P O Box 30080<br>Lusaka<br>Zambia |

| **I** | **Details of Prospective Investor** | |
|---|---|---|
| **From:** | Name of Applicant (s): | |
| | Date of Birth | |
| | NRC/Passport | |
| | Sex | |
| | Physical and Postal Addresses in Zambia: | |
| | Cell/Telephone Number: | |
| | Fax Number: | |
| | E-mail: | |

| **II** | **Details of Settlement Bank** | |
|---|---|---|
| | Name of settlement Bank | |
| | Name of settlement Branch | |
| | Account Number of Settlement Branch | |
| | Address of settlement Bank | |
| | Name of Contact Person at the Settlement Bank: | |
| | Telephone Number: | |
| | Fax Number: | |
| | E-mail: | |

| **III** | **Persons Authorised to issue instructions on the CSD Account** | |
|---|---|---|
| | **Name** | **Authorised Signature** |
| **A** | | |
| **B** | | |
| **C** | | |
| | Preferred Start Date:<br>*(This is the preferred date on which the Applicant wishes to be admitted as a Participant of CSD.)* | |

The above named body corporate/ Applicant hereby applies for membership as a Participant in CSD. The Applicant agrees that if this application is accepted then subject to and in consideration of that acceptance:

1. The Applicant will observe and comply with the Rules of CSD and the procedures detailed in the User Manual (as defined in those Rules) in force from time to time. Direct participants should collect a copy of the Rules and the User Manual which are currently in force.

2. The Applicant will observe and comply with the requirements and directions of CSD and any relevant statutory authority in force from time to time relating to CSD.

3. The Applicant undertakes not to adversely affect the integrity of instructions sent and received between Participants or the settlement of those instructions (or otherwise introduce a significant new risk into CSD after becoming a Participant).

4. The Applicant undertakes not to impair the overall efficiency of CSD after becoming a Participant.

5. The Applicant undertakes to pay the fees and other amounts payable under the Rules by a Participant.

6. The rights and obligations contained herein shall ensure not only to CSD, but to every other Participant who has agreed to observe and comply with the Rules and User Manual.

Terms not defined in this application have the same meaning as in the Rules of CSD.

For Official Use only

Checked by……………………………….        Approved by……………..……………..
**Bank of Zambia**                              **Bank of Zambia**

## 5.0 CSD APPLICATION FORM FOR CORPORATE INVESTORS

**Application to Join the CSD**

| To: | Director<br>Financial Markets Department<br>Bank of Zambia<br>P O Box 30080<br>Lusaka<br>Zambia |
|---|---|

| I | **Details of Prospective Investor** | |
|---|---|---|
| **From:** | Name of Applicant: | |
| | Date of Incorporation | |
| | Place of Incorporation | |
| | Zambian Company Number (e.g PACRA number) | |
| | TPIN | |
| | Physical and Postal Addresses in Zambia: | |
| | Name of Contact Person of the Investor: | |
| | Company Cell/Telephone Number: | |
| | Company Fax Number: | |
| | E-mail: | |

| II | **Details of Settlement Bank** | |
|---|---|---|
| | Name of settlement Bank | |
| | Name of settlement Branch | |
| | SWIFT BIC | |
| | Account Number of Settlement Branch | |
| | Address of settlement Bank | |
| | Name of Contact Person at the Settlement Bank: | |
| | Telephone Number: | |
| | Fax Number: | |
| | E-mail: | |

| III | **Persons Authorised to operate the CSD Account** | |
|---|---|---|
| | **Name** | **Authorised Signature** |
| A | | |
| B | | |
| C | | |
| | Preferred Start Date:<br>*(This is the preferred date on which the Applicant wishes to be admitted as a Participant of CSD.)* | |

The above named body corporate/ Applicant hereby applies for membership as a Participant in CSD. The Applicant agrees that if this application is accepted then subject to and in consideration of that acceptance:

1. The Applicant will observe and comply with the Rules of CSD and the procedures detailed in the User Manual (as defined in those Rules) in force from time to time. Direct participants should collect a copy of the Rules and the User Manual which are currently in force.

2. The Applicant will observe and comply with the requirements and directions of CSD and any relevant statutory authority in force from time to time relating to CSD.

3. The Applicant undertakes not to adversely affect the integrity of instructions sent and received between Participants or the settlement of those instructions (or otherwise introduce a significant new risk into CSD after becoming a Participant).

4. The Applicant undertakes not to impair the overall efficiency of CSD after becoming a Participant.

5. The Applicant undertakes to pay the fees and other amounts payable under the Rules by a Participant.

6. The rights and obligations contained herein shall ensure not only to CSD, but to every other Participant who has agreed to observe and comply with the Rules and User Manual.

Terms not defined in this application have the same meaning as in the Rules of CSD.

For Official Use only

Checked by…………………………….          Approved by……………..……………..
**Bank of Zambia**                              **Bank of Zambia**

## Annex 3 – Form for Participant Addition or Modification

| | Application to Add or Change a Participant in CSD | |
|---|---|---|
| **To**: | Director<br>Financial Markets Department<br>Bank of Zambia<br>P O Box 30080<br>Lusaka<br>Zambia | |
| **From:** | Name of CSD Participant: | |
| | Date of Birth: | |
| | Place of Incorporation | |
| | Zambian Company Number/<br>Zambian Registered Body Number/<br>Zambian Business Number: | |
| | NRC/Passport | |
| | TPIN | |
| | Registered Office Address/<br>Principal Place of Business in Zambia: | |
| | Complete the following details about the way you want you/ your organization's details held in CSD | (strike out whatever is not appropriate) |
| | Requested action: | Add / Change |
| | Participant Name: | |
| | Participant address: | |
| | Participant Name: | |
| | Participant address: | |
| | SWIFT BIC: | |
| | Name of settlement Bank | |
| | Account Number of Settlement Branch | |
| | Address of settlement Bank | |
| | Name of Contact person:: | |
| | Telephone no: | |
| | Fax no: | |
| | E-mail | |
| | Authorised Signature | |
| | Authorised Signature. | |
| Dated: [                                    ] | | |

For Official Use only

Checked by……………………………….        Approved by………………..……………..
**Bank of Zambia**                                            **Bank of Zambia**

## Annex 4 – BIC Codes

| Bank | SWIFT BIC |
|---|---|
| BANK OF ZAMBIA | BAZAZMLU |
| AB BANK ZAMBIA | ABBAZMLU |
| ACCESS BANK | AZAMZMLU |
| BANC ABC | FMBZZMLX |
| BANK OF CHINA | BKCHZMLU |
| BARCLAYS BANK | BARCZMLX |
| CAVMONT CAPITAL BANK | CVMTZMLU |
| CITIBANK | CITIZMLU |
| ECOBANK | ECOCZMLU |
| FINANCE BANK | ZFBAZMLU |
| FIRST ALLIANCE | FALLZMLU |
| FIRST NAT BANK | FIRNZMLU |
| INDO ZAMBIA | INZAZMLX |
| INTER COMMERCIAL BANK | ICZAZMLU |
| INTERMARKET BANK | IDHZZMLU |
| INVESTRUST | VSTRZMLU |
| STANBIC BANK | SBICZMLX |
| STANBIC ZAMBIA CUSTODIAL SERVICES | SBNZZMLX |
| STANDARD CHARTERED BANK | SCBLZMLX |
| STANDARD CHARTERED BANK SECURITY SERVICES | SCSLZMLX |
| UNITED BANK FOR AFRICA | UNAFZMLU |
| ZANACO | ZNCOZMLU |

# Annex 5 – Procedure for Rediscounting

The CSD accommodates a special type of DvP transactions that will be identified as operation type Premature Disinvestment. The operation is created using single MT543 entered by the Participant requesting the Rediscount.

The cash value of the transaction is calculated by the system using the following procedure:

## 1. Computation of Rediscount Price

The Rediscount Price (RDP) is equal to the Daily Value of the security being rediscounted.

$$RDP = Daily\ Value$$

The daily value is determined based on the type of security using the following formulas:

**Treasury Bills**

$$Daily\ Value = \frac{1}{1 + yield * \frac{nrDays}{YearBase}}$$

*where*:
**Yield**      is the current yield rate expressed as percentage (%) obtained on the most recent auction for this instrument and it is managed at the instrument level,
**nrDays**      is the number of days from settlement date (valuation date) until maturity;
**YearBase**      is the number of days in year according to the Day Count Convention.

## 2.    Computation of Income

$$Y = FA * (RDP - AWP)$$

*where*:
**Y**            is the Income earned on the rediscount,
**FA**            is the Face Amount of the securities being rediscounted; **RDP** is the Rediscount Price calculated in Step One.
**AWP**            is the Average Weighted Price of the account where the securities are being rediscounted.

## 3.    Computation of Tax

$$T = s * Y$$

*where*:
**T**                is the Tax payable,

$s$            is the Tax Rate applicable defined in the participant or client taxation scheme.

4.    Computation of Commission

$$CM = c * Y$$

*where*:
**CM**            is the Commission, **c** is the Commission Rate defined as system parameter in the CSD.

5.    **Computation of Penalties**

**Income Penalty**
$$IP = i * Y$$

*where*:
**IP**            is the Income Penalty, **i** is the Income Penalty Rate defined as system parameter in the CSD.

**Price Penalty**
$$PP = p * FA * RDP$$

*where*:
**PP**            is the Price Penalty,
**p**            is the Price Penalty Rate defined as system parameter in the CSD,
**FA**            is the Face Amount being rediscounted,
**RDP**            is the Rediscount Price.

**Cost Penalty**
$$CP = c * FA * AWP$$

*where*:

**CP**            is the Cost Penalty, **c** is the Cost Penalty Rate defined as system parameter in the CSD,
**FA**            is the Face Amount being rediscounted,
**AWP**            is the Average Weighted Price of the account where the securities are being rediscounted.

**Total Penalty**
$$TP = IP + PP + CP$$

*where*:
**TP**            is the Total Penalty payable,
**IP**            is the Income Penalty,

**PP**            is the Price Penalty,
**CP**             is the Cost Penalty.

6. Computation of Net Proceeds

$$NP = FA * RDP - (T + CM + TP)$$

*where*:
**NP**            is the Net proceeds,
**FA**            is the Face Amount being rediscounted,
**RDP**           is the Rediscount Price, **T** is the Tax
                  payable,
**CM**            is the Commission,
**TP**            is the Total Penalty.

# Annex 6 – Overnight Repo Formula

**Determination of Interest Amount**

Interest Payable = Loan Amount x OLF rate x $\dfrac{n}{365}$

> where
> n = tenor of the loan normally 1 day

**Determination of the required value of the Treasury bills if used as Collateral**

**Step 1**: Determination of Margin Cover (required Present Value/Market Value) of securities is as follows:

$$MV = Loan\ Amount \times (1 + Haircut\ Margin)$$

Where:
Loan Amount is the amount of the overnight loan the commercial bank wants to borrow.
Haircut is the amount of haircut to be applied on the loan.

**Step 2**: Determination of the required face value of securities. The market value of the collateral calculated in Step 1 above is then used to calculate the required face value as follows:

$$FV = MV \times \left(1 + \frac{rn}{365}\right)$$

Where:

| | |
|---|---|
| **MV** | is the required market value of the security being repoed and is calculated as above; |
| **r** | is the *current* weighted average yield rate in decimal obtaining on the most recent Treasury bill auction; |
| **n** | is the number of days between settlement date and maturity date of the repoed security; and |
| **FV** | is the face value of the security to be repoed. |

**Determination of the required value of the Government Bonds if used as Collateral**

**Step 1:** The calculation of the MV for government bonds is the same as Step 1 under Treasury bills above.

**Step 2:** The required face value (F) of Government bonds shall be determined by application of the following formula:

$$F = \left[ \frac{MV}{\left( \frac{C/2}{\left(1 + \frac{r}{2}\right)^{w}} + \frac{C/2}{\left(1 + \frac{r}{2}\right)^{1+w}} + \frac{C/2}{\left(1 + \frac{r}{2}\right)^{2+w}} + \cdots + \frac{1 + C/2}{\left(1 + \frac{r}{2}\right)^{n+w}} \right)} \right]$$

where

**MV** *is* the required market value of the security being pledged

**C** is the coupon rate originally applied to the bond at issue date

**r** is the *current* weighted average yield rate obtaining on the most recent Government bonds auction;

**n** is the total number of coupon periods remaining after the next coupon payment;

**w** is number of days between settlement date and the next coupon payment date divided by the original number of days in coupon period; and

**F** is the face value of the security to be pledged as collateral

**Determination of the required value of the BoZ OMO Term Deposits are used as Collateral**

**Step 1:** The required value (*V*) of OMO instruments shall be determined by application of the following formula:

$$V = MV \times \left(1 + \frac{r \times d}{365}\right)$$

where

**MV** is the required market value (see **Step 1** under Treasury bills) for the calculation)

**r** is the *previous* business day's weighted average interbank rate; and

**d** is number of days between settlement date and the maturity date of the Repo/Term Deposit(s) so pledged.

# Annex 7 – Formula for Required Securities for a Repo under OMO

Determination of the required **Government securities** will be done as follows:

**Step 1:** Calculation of the repurchase price:

$RP = PP + AI$
*where:*
*RP = Repurchase price*
*PP = Purchase price*
*AI = Accrued interest*

**Step 2:** Determination of Current Cover
The Current Cover is 100% when the BoZ is borrowing funds, that is, no haircut will be applied while when BoZ is lending a haircut is applied.

$MC = RP \ x \ CC$

*where:*
*MC = Margin cover*
*RP = Repurchase price*
*CC = Current cover*

**Step 3:** Determination of the face value of securities. The formula to be applied will be as follows:

$FV = PV \ [(1 + (\dfrac{RxN}{365})]$
*where:*
*FV = Face value*
*PV = Present value*
*R = Latest yield rate of the security being pledged*
*N = Number of days remaining to maturity of repoed securities*

# Annex 8 – Formula for Required Securities for a Secured Loan under OMO

Determination of the required **Government securities** will be done as follows:

For each secured loan, a haircut will be applied to the securities which will be used as collateral.

**Government Securities**

**Step 1:** Calculate the interest amount.

$$I = P \times R \times (\frac{D}{365})$$

*where*
*I = Interest Amount*
*P = Principal*
*R = Bid Rate*
*D = Number of Days*

**Step 2:** Determination of the required Present Value of securities. The relevant Current Cover will be used when the BoZ is lending funds and the securities pledged are Treasury bills or Government bonds, respectively.

$$MC = [P + I] \times CC$$

*where:*
*MC = Margin cover*
*P = Principal*
*I = Interest amount*
*CC = Current cover*

**Step 3**: Determination of the future (face) value of securities. The formula to be applied will be as follows:

$$FV = PV [(1 + (\frac{RxN}{365}))]$$

*where:*
*FV = Face value*
*PV = Present value*
*R = Latest yield rate of the security being pledged*
*N = Number of days remaining to maturity of the pledged securities*

**OMO Term deposits**

**Step 1:** Determination of the required value of **OMO deposit** will be done by the application of the following formula:

$$V = MV \times \left(1 + \frac{R \times N}{365}\right)$$

V = Required value

MV = Market value

R = Previous day's weighted average interbank rate

N = Number of days between settlement date and maturity date of the Instrument.

**Step 2:** Application of appropriate haircut on the OMO Term deposit.

# Annex 9 – Provisional Timetable

The table below shows the events that occur during the CSD day and the activities which can be performed at different stages.

| CSD Event | Time | Activities | How is Activity Initiated? |
|---|---|---|---|
| Start of Day | 8.00 hrs | The business date is moved to current system date. Housekeeping functions can be undertaken such as maintenance of parameters, participant details, user maintenance | Initially it will be manual and then subsequently automated. |
| Start of Business Day | 8.15 hrs | The system is ready to process available future transactions and new transactions. | Initially it will be manual and then subsequently automated |
| Intraday Auction Cut Off | 16.00 hrs | The system processes auction related transactions only when the intraday auction window is open. No auction related transactions can be undertaken after the intraday auction cut-off. | Initially it will be manual and then subsequently automated |
| DvP Cut Off | 16.20 hrs | The system processes DvP Transactions only when DvP service is open. When DvP is executed, all DvP transactions that are not in final status are cancelled. Also all DvP transactions that are not matched will be automatically cancelled. | Initially it will be manual and then subsequently automated |
| FOP Cut Off | 16.25 hrs | The system processes FoP Transactions only when FoP service is open. When FoP is executed, all FoP transactions that are not in final status are cancelled. Also all FoP transactions that are not matched will be automatically cancelled. | Initially it will be manual and then subsequently automated |
| End of Business Day | 16.30 hrs | All business transactions cannot be processed beyond this time. Housekeeping functions can take place. | Initially it will be manual and then subsequently automated |
| End of Day | 16.35 hrs | CSD system closes. Back-up and archiving can take place. | Initially it will be manual and then subsequently automated |

The BoZ reserves the right to change the Timetable as and when deemed necessary.

# Annex 10 – Annual Audit Form

**Participant: [Name]**
**Self-Assessment for [Year]**

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**Please respond to the following questions**

### A.  CSD-related fraud

1)      Has your organisation experienced any CSD-related actual or attempted fraud during the year?

2)      If so, was this reported to Bank of Zambia in accordance with the CSD Rules?

3)      Was the means of the fraud identified and rectified?

4)      Did the fraud result in any financial loss to your organisation or to its customers?

5)      If so, is recovery still being sought?

### B.  Contingency planning and contingency facilities

1)      Does you organisation have a documented contingency plan for its CSD operations?

2)      Does the plan satisfactorily cover significant potential contingency scenarios?

3)      Does your organisation maintain fallback computer facilities and/or fallback communications for the VPN interface used for CSD communications?

4)      If your organisation does maintain a fallback computer facility, is it at a separate site to your main computer facility?

5)      Have your contingency plans been tested during the year and business continuity risks identified?

6)      Are you satisfied that potential business continuity risks have been analysed and addressed?

### C.  System down time and resilience

1)      Have your CSD operations been subject to significant or recurring downtime or disruption?

2)      If so, were these reported to the Bank of Zambia and recorded in a Contingency Event Log in accordance with the CSD procedures?

Are you satisfied that your CSD-related systems have sufficient capacity and resilience to service your CSD payment traffic in a timely and safe manner?

# Annex 11 - Help desk

BoZ has been designated to provide the help desk services.

Contact details are as follows:

Telephone:          233553/222932

Fax:                226707

Email:              csd@boz.zm

Postal address:     CSD Help Desk
                    Financial Markets Department
                    Bank of Zambia
                    P O Box 30080
                    LUSAKA

# Annex 12 – Notification

Any notice pursuant to these Rules (unless otherwise specified) be conveyed by mail, e-mail, fax or delivery by messenger and shall be effective upon receipts.

Any notice shall be delivered to:

The Director
Financial Markets Department
Bank of Zambia
P O Box 30080
Lusaka
Zambia

Or

Emailed to csd@boz.zm

Faxed to 221189/226707

# References

1. Arbitration Act Number 19 of 2000

2. Bank for International Settlements and International Organization of Securities Commissions (2012) Principles for Financial Market Infrastructures

3. Bank of Zambia Act No 43 of 1996

4. Bank of Zambia (2014) Operating Rules and Guidelines for Government Securities Tender and Off Tender Transactions

5. Bank of Zambia (2014) "Operating Rules and Guidelines for Open Market Operations" National Payment Systems Act of 2007

6. Bank of Zambia (2014) Operating Rules and Guidelines for the Overnight Lending Facility

7. Electronic Communications and Transactions Act of 2009.

8. Electronic Communications and Transactions Act of 2009.

9. National Payment Systems Act of 2007

10. Securities Act Cap 354 of 1993

# Central Securities Depository Participation Agreement

**1.0** THIS AGREEMENT is made and entered into at _____, this _____ day of _____, 20_____, by and between Bank of Zambia(Name And Address) and _____
_____
(Name And Address) (hereafter referred to as the "Participant")

NOW THEREFORE, in consideration of the promises and mutual covenants made one to The other, be it and it is hereby agreed as follows:

This Agreement shall form part of and be incorporated in the Rules and therefore the terms and conditions set out in the Rules shall unless otherwise excluded or varied hereunder, apply to this Agreement.

The Parties agree that in the event of a conflict, the terms of this Agreement shall prevail.

Unless otherwise specified herein all words and phrases defined in the Rules shall have the same meaning in this Agreement.

## 2.0 Authority

## Representations, warranties and covenants:

The Participant hereby represents and warrants as of the date that any part of this Agreement is executed and any Service is used or delivered that:

iv. it is duly organised, validly existing and in good standing in every jurisdiction where it is legally required so to be

v. it has the power and authority to execute and deliver, and to perform its obligations under, the Agreement;

vi. the Agreement is duly authorized, executed and delivered and is enforceable, legal, valid and binding obligation.

The Participant further represents and warrants, as of the date that this Agreement is executed and any Service is used or delivered, that:

i. all necessary consents, authorisations and instructions have been provided to and/or by each third party, if any, involved in reporting, receiving or transmitting instructions, funds transfers and/or data in connection with these Services;

ii. all necessary approvals, authorisations and consents, if any, have been obtained and all necessary filings or registrations have been made (and the same will be renewed if necessary) as are required by any governmental or other authority in connection with the execution and performance of the Agreement; and

iii the performance of the Agreement and delivery and use of the services will not violate or offend any applicable requirement, law, decree, regulation, order or judgment.

iv Upon request by BoZ, the Participant agrees to supply BoZ with copies of any such consents, instructions and authorizations required of the Participant under (iv) or (v).

v The Participant further agrees to immediately notify BoZ if it suspects or knows of any circumstances that could or would cause a breach of any representation or warranty hereunder.

## 3.0 Authorised Persons

3.1 The Participant shall deliver upon execution of this Agreement and from time to time, as appropriate, the names and specimen signatures of persons duly authorised by all necessary action to access data and to provide instructions with respect to bank accounts, funds transfers and other financial transactions by electronic means ("instructions"), and/or to designate persons to access such data and to provide instructions, on behalf of the Participant in connection with the Services and the limitations, if any, upon such authority (each, an Authorized Person), accompanied by a certificate signed by the appropriate officer, or equivalent documentation, attesting to the authorization of each Authorized Person and the authenticity of the signature. The Participant hereby authorizes BoZ to act in reliance thereon in executing instructions. Any change in the name or other relevant information about Authorized Persons shall be delivered to BoZ at least 2 business days prior to the effective date of such change.

IN WITNESS WHEREOF, the parties hereto have set their hands and seal the date and place first above mentioned.

_____
Signature of Participant


_____
Signature of BoZ Representative

IN WITNESS WHEREOF, the parties hereto have set their hands and seals the date and place first above mentioned

1. For **Bank of Zambia**

   Name…………………………………………………………………………………
   Position………………………………………………………………………………
   Signature……………………………………………………………………………..

2. For **AB Bank**

   Name…………………………………………………………………………………
   Position………………………………………………………………………………
   Signature……………………………………………………………………………..

3. For **Access Bank Zambia**

   Name…………………………………………………………………………………
   Position………………………………………………………………………………
   Signature……………………………………………………………………………..

4. For **BancABC**

   Name…………………………………………………………………………………
   Position………………………………………………………………………………
   Signature……………………………………………………………………………..
5. For **Bank of China**

   Name…………………………………………………………………………………
   Position………………………………………………………………………………
   Signature……………………………………………………………………………..

6. For **Barclays Bank Zambia PLC**

   Name…………………………………………………………………………………
   Position………………………………………………………………………………
   Signature……………………………………………………………………………..

7. For **Cavmont Capital Bank**

   Name…………………………………………………………………………………
   Position………………………………………………………………………………
   Signature……………………………………………………………………………..

8. For **Citibank**

   Name…………………………………………………………………………………
   Position………………………………………………………………………………
   Signature……………………………………………………………………………..

9. For **Ecobank Zambia**

Name…………………………………………………………………………………
Position………………………………………………………………………………
Signature……………………………………………………………………………..

10. For **Finance Bank**

Name…………………………………………………………………………………
Position………………………………………………………………………………
Signature……………………………………………………………………………..

11. For **First Alliance Bank**

Name…………………………………………………………………………………
Position………………………………………………………………………………
Signature……………………………………………………………………………..

12. For **First Capital Bank**

Name…………………………………………………………………………………
Position………………………………………………………………………………
Signature……………………………………………………………………………..

13. For **First National Bank**

Name…………………………………………………………………………………
Position………………………………………………………………………………
Signature……………………………………………………………………………..

14. For **Indo Zambia Bank**

Name…………………………………………………………………………………
Position………………………………………………………………………………
Signature……………………………………………………………………………..

15. For **Intermarket Bank**

Name…………………………………………………………………………………
Position………………………………………………………………………………
Signature……………………………………………………………………………..

16. For **Investrust**

Name…………………………………………………………………………………
Position………………………………………………………………………………
Signature……………………………………………………………………………..

17. For **Stanbic Bank**

   Name……………………………………………………………………………………
   Position…………………………………………………………………………………..
   Signature………………………………………………………………………………..

18. For **Standard Chartered Bank**

   Name……………………………………………………………………………………
   Position…………………………………………………………………………………
   Signature………………………………………………………………………………..

19. For **United Bank for Africa**

   Name……………………………………………………………………………………
   Position…………………………………………………………………………………
   Signature………………………………………………………………………………..

20. For **Zanaco**

   Name……………………………………………………………………………………
   Position…………………………………………………………………………………
   Signature………………………………………………………………………………..