



BURSA MALAYSIA DEPOSITORY SDN BHD

**PRINCIPLES FOR FINANCIAL MARKET INFRASTRUCTURES
DISCLOSURE FRAMEWORK**

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Responding Institution:

Bursa Malaysia Depository Sdn Bhd

Jurisdiction(s) in which the FMI operates:

Malaysia

Authority regulating, supervising, or overseeing the FMI:

Securities Commission Malaysia

The date of this disclosure is 30 June 2019

This disclosure can also be found at:

https://www.bursamalaysia.com/trade/risk_and_compliance/pfmi_disclosure

For further information, please contact Bursa Malaysia Depository Sdn Bhd at:

	<u>Name</u>	<u>Email Address</u>
1.	Siti Zaleha Sulaiman	sitizaleha@bursamalaysia.com
2.	Sathyapria Mahaletchumy	sathyapria@bursamalaysia.com

Abbreviations:

ADA	Authorised Depository Agent
ADM	Authorised Depository Member
BCP	Business Continuity Plan
BMD	Bursa Malaysia Derivatives Berhad (the derivatives exchange)
BMDC	Bursa Malaysia Derivatives Clearing Berhad (the derivatives clearing house)
BM Depo	Bursa Malaysia Depository Sdn Bhd (the central depository)
BMS	Bursa Malaysia Securities Berhad
BMSC	Bursa Malaysia Securities Clearing Sdn Bhd (the securities clearing house)
BNM	Bank Negara Malaysia (the central bank of Malaysia)
Board	Bursa Malaysia Board of Directors
Bursa Malaysia	Bursa Malaysia Berhad (the exchange holding company)
CA	Companies Act 2016
CCP	Central Counterparty
CDS	Central Depository System
CEO	Chief Executive Officer
CGF	Clearing Guarantee Fund
CMSA	Capital Market and Services Act 2007
CP	Clearing Participant of BMDC
CPU	Central Processing Unit
CSD	Central Securities Depository
DCS	Derivatives Clearing & Settlement System
DMC	Default Management Committee
DR	Disaster Recovery
DSA	Digital Signature Act 1997
EA	Evidence Act 1950
ED	Executive Director
EHC	Exchange Holding Company
EOD	End of day
ERM	Enterprise Risk Management
FI	Financial Institution
Group	Bursa Malaysia Group
INED	Independent Non-Executive Director
ISP	Internet Service Provider
IT	Information & Technology
ITIL	IT Infrastructure Library
KPI	Key Performance Indicator
MARC	Malaysian Rating Corporation Berhad
MOF	Ministry of Finance

MYR	Malaysian Ringgit
M&A	Memorandum and Articles of Association
NRC	Nomination and Remuneration Committee
NTCP	Non-Trading Clearing Participant
PFMI	CPSS-IOSCO Principle for Financial Markets Infrastructures
PID	Public Interest Director
PLC	Public Listed Company
PO	Participating Organisation
RAM	Rating Agency Malaysia
RENTAS	Real-time Electronic Transfer of Funds and Securities
RMC	Risk Management Committee
RMPF	Risk Management Principles & Framework
RMPG	Risk Management Process & Guidelines
RTO	Recovery Time Objective
SC	Securities Commission Malaysia
SCMA	Securities Commission Malaysia Act 1993
SICDA	Securities Industry (Central Depositories) Act 1991
TIM	Technology & Information Management
TCP	Trading Clearing Participant
TCP/IP	Transmission Control Protocol/Internet Protocol

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I. Executive Summary

BM Depo is an approved Central Depository for the Malaysian securities market under supervision of the Securities Commission Malaysia (“SC”) and is governed primarily under the Securities Industry (Central Depositories) Act 1991 (“SICDA”) and it is a wholly-owned subsidiary of Bursa Malaysia.

The primary duty of BM Depo as the central depository is to take all steps and do all things necessary to ensure orderly dealings in securities deposited or lodged with it and in this regard, BM Depo is responsible for, among others, the recording of deposited securities that are traded on the stock exchange as well as the transfer and withdrawal of such securities. BM Depo also provides ancillary services in relation to the distribution of dividends and other corporate actions that includes processing of bonus issues, share consolidation, payment of cash distribution/dividend to shareholders on behalf of issuer and facilitating electronic rights issue.

This document aims to provide an overview of the relevant disclosure and explains how BM Depo is aligned with and observes:

1. The Principles for Financial Market Infrastructure (“PFMI”) developed by the Committee on Payment and Settlement Systems and the Technical Committee of the International Organization of Securities Commission (“CPSS-IOSCO”).
2. The Securities Commission Malaysia’s Guidelines on Financial Market Infrastructures.

II. Summary of Major Changes Since the Last Update of the Disclosure

This document is an update to the version dated June 2018, published as recommended by the PFMI and to continuously assist understanding of BM Depo’s profiles as well as risk management practices. Changes to BM Depo’s organisation, services, design, markets served and regulatory environment since the last disclosure are as follows:

- Launching of a mobile apps known as Bursa Anywhere on 30 May 2019 (see principle 21).
- Amendments to the Rules of Bursa Malaysia Depository consequential to repeal of Goods and Services Tax pursuant to the Goods and Services Tax (Repeal) Act 2018 with effect from 1 September 2018.

III. BM Depo Background Information

General Description of the FMI And the Market It Serves

BM Depo formerly known as Malaysian Central Depository Sdn Bhd was incorporated in 1987. BM Depo operates and maintains a central depository for all securities and instruments listed that includes securities that have been delisted subsequently, on Bursa Malaysia Securities Berhad ("BMS"), the operator of the stock exchange.

BM Depo provides for central book keeping of securities and facilitates the settlement of securities transactions in scripless manner through the Central Depository System ("CDS"). BM Depo uses a beneficial owner account structure, where the securities accounts are either held under the name of the end client with the depository or where the instructing client is named in the account in the case of nominee account. The investors in the securities market are required to open securities accounts with the BM Depo through its participants i.e. stock brokers before being able to deal in the stock exchange. BM Depo's participants are provided access to the CDS to open and manage securities account and to perform other related transaction in the CDS on behalf of the end clients upon receiving the authorisation from these account holders.

Please refer to the following statistic as at 30 June 2019 for the basic data and performance of the BM Depo:-

- (a) Number of CDS accounts : 2.5 million
- (b) BM Depo Participants:
 - Authorised Depository Agent (ADA) : 32
 - Authorised Depository Member (ADM) : 23
- (c) Total shares immobilised : 1.0 trillion
- (d) Number of lines of securities in the CDS : 2,398
- (e) Number of traded shares settled : 6.2 trillion
- (f) Number of corporate exercise processed : 116,106
- (g) Number of transfer transactions processed : 21.6 million
- (h) Number of record of depositors produced : 387,587

General Organisation of the FMI

BM Depo has adopted the Governance Model of Bursa Malaysia where the governance arrangement within the Group is as set out in the Bursa Governance Model document which is available at the Bursa Malaysia's website. The Governance Model sets out the clear and direct lines of responsibility and accountability of the Board of Bursa Malaysia, Bursa Malaysia Chief Executive Officer ("CEO") and Board Governance Committees for the Group (i.e. Audit Committee ("AC"), Risk Management Committee ("RMC") and Nomination and Remuneration Committee ("NRC")) and the Board Regulatory Committees for the Group (i.e. Regulatory and Conflicts Committee ("RACC"), Market Participants Committee ("MPC") and Appeals Committee ("APC")).

Information regarding the governance, ownership and board and management structure of Bursa Malaysia, including that of BM Depo is publicly available at the website of Bursa Malaysia: www.bursamalaysia.com.

Legal and Regulatory Framework

The legal framework governing BM Depo's activities consists of the SICDA, the Capital Market and Services Act 2007 ("CMSA"), the Rules of BM Depo as well as the contractual agreement between BM Depo and its participants. BM Depo as a central depository is subject to regulatory oversight by the SC.

The BM Depo Rules are approved by the SC except for rule changes that have been specifically exempted from the SC's approval, for example amendments that are consequential to law changes. BM Depo also has a process to seek external legal opinions where necessary, to ensure the enforceability of the relevant rule or contract. These processes ensure that the BM Depo Rules are clear, understandable, enforceable and consistent with the Malaysian legal framework.

Please refer to Principle 1 for the legal basis for each material aspect of BM Depo's activities.

System Design and Operations

BM Depo provides a computer system namely the CDS to custody securities in scripless form to support all the depository related activities by providing real time access to the CDS that is available from 9:00 a.m. till 7:00 p.m. to its participants such as ADAs, ADMs and listed issuers or their agents i.e. share registrars. Among the functionalities provided under the CDS are as follows:

- (a) Opening of securities account.
- (b) Online maintenance of securities accounts that includes updating of account particulars, reactivation of dormant account or inactive accounts and closure of a securities account.
- (c) Deposit of physical certificate, part of the process to dematerialisation from physical to scripless.
- (d) Withdrawal of certificate, option for investor to remove their holdings in scripless form and convert it to physical certificate to be held outside the depository. However, this is only applicable to securities of company that are no longer listed on the stock exchange.
- (e) Transfer of securities, enable account holder to move their holdings in scripless form from one securities account to another with the condition it is within the approved reasons for transfer as prescribed by BM Depo.
- (f) Providing shareholders listing to issuer or their agent i.e. share registrars electronically. These details may also include bank account details to facilitate crediting of any cash entitlement directly into the account holders' bank accounts.

- (g) Performing additional crediting of securities arising from corporate action such as Rights Issue, private placement, shares option to employee, conversion of non-equities securities i.e. loan stock, and from Initial Public Offering.
- (h) Performing corporate action such as share consolidation, share split, bonus issue in CDS by computing the revised holdings and crediting into the entitled shareholders' securities accounts to ensure continuance trading in such securities by shareholders.
- (i) Issuance of monthly CDS statement of account that includes CDS notices arising from changes in account particulars directly to account holders. Such notification is delivered in hardcopy via postal service or sent electronically via email.
- (j) eRights enable accountholders to subscribe for their entitled rights shares electronically. BM Depo has developed a customised solution to nominee accountholders of ADA/ADMs to submit their application electronically via files. Whereas, retailers will apply through banking facility of participating banks and all such applications will be submitted to the relevant issuer via BM Depo.
- (k) Providing end-of-day files consisting of transaction and changes in balances to all participants to perform reconciliation and update their back-office system.

Additionally, BM Depo performs the book entry settlement of trades executed on BMS according to the timing and settlement cycle prescribed by Bursa Malaysia Securities Clearing Sdn Bhd ("BMSC").

Book Entry Settlement Process

BM Depo book entry settlement is an on-going process where it receives trade data from the clearing house by 8:00 p.m. on T day. Thereafter, BM Depo participants are able to generate online reports from the CDS on any potential fail trade and pre-empt their clients to cover any such shortfall in their securities account before the share settlement process take place in the securities accounts of the respective selling and buying clients that is based on the current settlement cycle of T+2 day.

IV. Disclosure of 24 Principles for BM Depo

Principle-by-principle summary narrative disclosure	
<p>Principle 1: Legal basis</p> <p><i>An FMI should have a well-founded, clear, transparent, and enforceable legal basis for each material aspect of its activities in all relevant jurisdictions.</i></p>	
Summary narrative	<p>The high degree of certainty in the legal framework for the relevant material aspects of the BM Depo's activities stems from clear and unambiguous law, rules and contractual arrangements between BM Depo and its participants.</p> <p>The legal framework governing BM Depo's activities consists of the SICDA, the CMSA, the Rules of BM Depo as well as the contractual agreement between BM Depo and its participants.</p> <p>In addition, certain aspects relating to the activities of BM Depo are governed by the provisions of the Evidence Act 1950 ("EA"), Companies Act 2016 ("CA"), Digital Signature Act 1997 ("DSA"), Contracts Act 1950, and SCMA.</p> <p>The legal basis (and consequently the legal certainty) for each material aspect of BM Depo's activities is described below:</p> <p>(a) Immobilisation: Pursuant to section 14 of the SICDA, all securities listed or to be listed for quotation on the Stock Exchange must be deposited with the central depository. Pursuant to the Securities Industry (Central Depositories) (Exemption) Order 2013 and the Securities Industry (Central Depositories) (Retail Debentures and Retail Sukuk) Regulations 2013, exchange traded bonds and sukuk that are listed and traded on BMS are deemed to be deposited with BM Depo where BM Depo has entered into an arrangement with Bank Negara Malaysia ("BNM") or an entity acting on behalf of BNM to hold legal title or physical possession of the physical scrips on behalf of BM Depo as bare trustee for the depositors. Section 24 of the SICDA prohibits withdrawal of securities except in circumstances specified in the BM Depo Rules. The BM Depo Rules (in Chapter 28) sets out the circumstances in which withdrawal of securities are permitted and it includes cases of the company has been removed from the official list of a stock exchange and to facilitate company restructuring process. Currently, over 99% of all securities listed and traded on the stock exchange are immobilised in BM Depo. The SICDA requires lodging of physical scrips with BM Depo and all transfers to be subsequently carried out in electronic book entry form at BM Depo. Subdivision 8, Division 1, Part III of the CA sets out provisions applicable to companies whose securities are deposited with the central</p>

	<p>depository including Section 148 which states that the transfer of any deposited securities shall be by way of book entry by the central depository.</p> <p>(b) Ownership of securities: Pursuant to section 21 of the SICDA, BM Depo is deemed to be a bare trustee. Section 35 of the SICDA deems the persons named in the record of depositors issued by BM Depo as being entitled to all rights and subject to all liabilities in respect of the securities as if they appeared in the relevant records of the issuer of the securities.</p> <p>(c) Applicability of the BM Depo Rules: The BM Depo Rules are binding on the participants of BM Depo (which includes all securities account holders) by virtue of the contractual relationship between the parties.</p> <p>(d) Regulation and oversight of BM Depo: BM Depo is regulated under SICDA and is subject to regulatory oversight by the SC. The SC's role to supervise and monitor the activities of a central depository is stipulated in section 15(1)(f) of the SCMA.</p> <p>(e) Other aspects: The rules for the operational aspects are described in the BM Depo Rules supplemented by the procedure manuals. The SICDA provides for BM Depo to develop the the BM Depo Rules and amendments made to the BM Depo Rules are also subject to the review and approval of the SC (section 7 of the SICDA).</p> <p>(f) Relevant jurisdictions: BM Depo is incorporated in Malaysia as a 100% subsidiary of Bursa Malaysia and the participants of BM Depo, including foreign institutions, are subject to Malaysian laws. Consequently, the relevant jurisdiction is only Malaysia.</p> <p>Amendments to the BM Depo Rules must be approved by the SC except for rule changes which are editorial or consequential in nature pursuant to changes made to other rules approved by the SC and that have been specifically exempted from requiring the SC's approval. Where necessary, BM Depo seeks external legal opinions, to ensure the enforceability of the relevant rule or contract. These processes ensure that the BM Depo Rules are clear, understandable, enforceable and consistent with the Malaysian legal framework.</p> <p>The rule-making process is a robust one, involving benchmarking analysis, review and consultation to ensure that BM Depo arrives at balanced and proportionate rules. Specifically, the rules are formulated based on a multi-tiered internal process which includes:</p>
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	<p>(a) consideration of the regulatory objectives to be achieved, concerns to be addressed and the implications of the proposed rule amendments;</p> <p>(b) benchmarking the proposed rule amendments to those of other more developed markets and which has a similar framework so that the rules are on par with international standards, where applicable;</p> <p>(c) consultation with the relevant stakeholders, including market participants and at times the public to ensure that the rules are clear, practical and are aligned with stakeholders' expectations;</p> <p>(d) review of the proposed rule amendments by qualified staff, senior management and chief regulatory officer prior to review or approval by a management regulatory committee; and</p> <p>(e) for major rule amendments, approval is also required by a board regulatory committee, comprising Bursa Malaysia's board members who are professionals and market experts from various related field of the capital market.</p> <p>BM Depo takes an independent legal opinion on the potential legal issues with respect to immobilisation of the securities of a foreign issuer, in addition, BM Depo requires the issuers to comply with the SICDA.</p> <p>Section 9 of SICDA provides that a user (which includes ADAs and issuers) as well as depositors must comply with the BM Depo Rules and as such, a user who is a foreign participant would similarly be required to comply with the BM Depo Rules.</p>
<p>Principle 2: Governance</p> <p><i>An FMI should have governance arrangements that are clear and transparent, promote the safety and efficiency of the FMI, and support the stability of the broader financial system, other relevant public interest considerations, and the objectives of relevant stakeholders.</i></p>	
Summary narrative	<p>BM Depo is a wholly-owned subsidiary of Bursa Malaysia which is an approved Exchange Holding Company ("EHC") under section 14 of the CMSA. Bursa Malaysia is also a Public Listed Company ("PLC") on the Stock Exchange and as a PLC, it is required to comply with the corporate governance practices as stipulated under the Main Market Listing Requirements of the Stock Exchange. As an EHC, Bursa Malaysia's objectives are reflective of its duties and responsibilities under the CMSA amongst others, to ensure there are orderly dealings in securities deposited with the central depository through the facilities of its subsidiary that is duly approved as a central depository (i.e. BM Depo). The CMSA also requires Bursa Malaysia as an EHC to ensure prudent risk management of its business and operations, and it shall prioritise public interest over its commercial business interests.</p>

	<p>The objectives of BM Depo are documented in the constitution.</p> <p>The governance arrangement within the Group is as set out in the Bursa Malaysia Governance Model document which is available on its website. The Bursa Malaysia Governance Model sets out the clear and direct lines of responsibility and accountability of the Board of Bursa Malaysia, Bursa Malaysia CEO, the Board Governance Committees for the Group (i.e. AC, RMC and NRC); and the Board Regulatory Committees for the Group (i.e. RACC, MPC and APC). As the wholly-owned subsidiary of Bursa Malaysia, BM Depo has adopted the Group Governance Model. The administration and operations of BM Depo are carried out at the Group level.</p> <p>In this respect, BM Depo functionally falls under the purview of the Market Operations Division of Bursa Malaysia. All heads of divisions in Bursa Malaysia including the Chief Operating Officer and Director of Market Operations of Bursa Malaysia participate in monthly meetings with the Bursa Malaysia CEO. This meeting is used for discussion on all business, strategic and operational issues.</p> <p>BM Depo has a nominal Board (Board with minimum number of directors i.e. 2 only) as most of the functions of BM Depo are discharged / carried out at holding company level. The Board of Bursa Malaysia has primary responsibility for the governance and management of the wholly-owned subsidiaries. In addition, the Board of Bursa Malaysia oversees the functioning of the Board Governance and Regulatory Committees of the Group.</p> <p>Information regarding the governance, ownership and board and management structure of Bursa Malaysia, including that of BM Depo is publicly available at the website of Bursa Malaysia: www.bursamalaysia.com.</p> <p>Currently, the Board of Bursa Malaysia consists of 8 directors, of which 3 directors are Public Interest Directors ("PIDs") and also Independent Non-Executive Director ("INEDs"), 4 Directors are INEDs and there is one Executive Director, who is also the CEO. The 3 PIDs are appointed by the Ministry of Finance in line with the requirements under the CMSA for Bursa Malaysia to act in the public interest, having particular regard to the need for the protection of investors in performing its duties as EHC. The Chairman of the Board is also a PID.</p> <p>In addition, section 10 (1) (b) of the CMSA states that no person other than a PID shall accept appointment, re-appointment, election and re-election as a director of Bursa Malaysia unless the concurrence of the SC is obtained.</p>
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	<p>The composition of the Board is governed by the provisions in the CMSA, the constitution of Bursa Malaysia and the Listing Requirements of the Stock Exchange. Section 10 of the CMSA provides that one-third of the directors shall be PIDs appointed by the Ministry of Finance in consultation with the SC to ensure due consideration is given to public interest aspects. One-third of the directors is required to be INED. The remaining Directors are appointed by the Board with the SC's concurrence. The nomination process is undertaken by the NRC. The current size of the Board is 8; 3 PIDs and INEDs (one of whom is the Chairman), 4 INEDs and one Executive Director cum CEO.</p> <p>The Board through the NRC ensures that its composition is refreshed from time to time with new Directors having the right mix of skills/ experience and diversity. The Board has in place the "Protocol for Appointment of Directors and Committee members" which sets out a clear and transparent process for Directors' recruitment. The NRC has been tasked with the responsibility to ensure the incoming INEDs have the requisite expertise, knowledge, integrity and professionalism. Based on the annual Board composition review, the NRC would determine any possible gaps having regard to the objectives and strategic direction of the company. These gaps would be reviewed and may be translated into possible "selection criteria" for new directors in a Board refreshment exercise.</p> <p>The ongoing training needs of the board members are assessed as part of the annual review of the board performance. In general, the programmes are focused on relevant areas for examples; corporate governance, risk and compliance, the trends in global exchanges and capital markets development, cyber threats.</p> <p>The Directors continued independence is assessed as part of the annual board performance evaluation, which includes a peer review by other board members.</p> <p>The recruitment process for all senior positions includes interviews with the senior management, the CEO and HOGAN & Virtual assessment. In addition, detailed reference checks are conducted. The CMSA requires Bursa Malaysia to ensure that the staff has the requisite knowledge. Bursa Malaysia has incorporated this into its Human Resources policies and ensures that all the senior management staff has all the requisite skills. Bursa Malaysia also attempts to maintain a pool of internal successors in the ratio of 1:2 for all senior and critical positions. There is a well-established performance evaluation process against KPIs for all employees. The performance of the CEO is assessed by the Board and that of the senior management by the NRC in consultation with the CEO. The performance evaluation process is used to guide the career growth and if need be any termination.</p>
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	<p>A clear and documented enterprise risk management (“ERM”) framework at the Group level is used to identify and monitor the specific business risk for each business entity. In April 2016, a consolidated division at enterprise level, comprising risk and compliance functions was formed. The Risk & Compliance division ensures that Bursa Malaysia has an effective framework and ability to manage all risks as a fully integrated part of the organisation including its subsidiaries. The Risk & Compliance division reports to the RMC. Internal Audit division is independent from all other functions within the Group and reports directly to the AC.</p> <p>Bursa Malaysia adopts a consultative and inclusive approach to take into account the interest of its participants and other relevant stakeholders in its decision making in relation to its design, rules, overall strategy and major decisions. Prior to initiating changes to its system, services, operations and rules, Bursa Malaysia conducts consultation with its participants and other related users of the system and services. Further, any proposed amendments to rules are subject to the SC’s approval. In practice, all major rules amendment submission to the SC for approval requires Bursa Malaysia to obtain feedback from the industry and other relevant users via a consultation process. All rules and amendments are publicly available at the Bursa Malaysia’s website. Operational procedures for depository participants are disseminated to all depository participants via circulars.</p>
<p>Principle 3: Framework for the comprehensive management of risks <i>An FMI should have a sound risk-management framework for comprehensively managing legal, credit, liquidity, operational, and other risks.</i></p>	
Summary narrative	<p>The Group has put in place an established risk management framework for managing risks affecting its business and operations which are aligned with the ISO 31000:2009 Risk Management – Principles and Guidelines and the IOSCO – PFMI as validated by an external consultant in 2017.</p> <p>The Group’s risk management framework is embedded in the Enterprise Risk Management and Principles & Framework (“ERMPF”) document which is applicable to all the business entities within the Group such as BM Depo. With the establishment of the ERMPF, the accountability, authority and responsibilities of the relevant parties in the Group for managing risk, including implementing and maintaining the risk management process as well as ensuring the adequacy, effectiveness and efficiency of any controls have been clearly outlined. Within the framework, there is an established and structured process for the identification, assessment, communication, monitoring as well as continual review of risks and effectiveness of risk mitigation strategies and controls at the divisional and enterprise levels. The analysis and evaluation of Bursa Malaysia’s risks are guided by the approved risk criteria.</p>

	<p>At the Group level, the Risk & Compliance division is comprised of three key departments namely Enterprise Risk Management, Business Continuity Management and Compliance Management. The objective of the set up was to consolidate the risk management and compliance functions across the Group to provide a holistic and integrated view of risk management and compliance at the enterprise wide level. The Enterprise Risk Management department covers four risk management units namely Operational Risk, Financial Risk (including credit and liquidity risk), Strategic Risk and Legal & Regulatory Risk.</p> <p>The RMC reviews the risk management aspects every quarter and tables all important developments and plans to the Board. In addition, the Internal Audit team reviews the adequacy of the risk management measures periodically. The Risk & Compliance division also conducts continual review of the risk management framework and process for improvement and ensure that they remain relevant to the Group.</p> <p>The Rules of Bursa Malaysia clearly explain the requirements and responsibilities of the participants, and the responsibilities of Bursa Malaysia subsidiaries. Bursa Malaysia has established a group approach to supervise the ongoing compliance of the participants to the requirements of the BM Depo. The Participants Supervision Department of Bursa Malaysia is entrusted with the responsibility for managing this. The supervision approach combines a combination of off-site supervision and onsite inspections. As part of the off-site supervision, weekly, monthly and annual submission of various financial indicators and data is required.</p> <p>Bursa Malaysia has a crisis management framework. This framework has identified four broad categories of scenarios that could significantly impair its operations: data errors, system downtimes, participant failures and operational lapses. There are various measures implemented to mitigate these risks.</p> <p>A key component of the risk management measure related to the system risk is to institute Business Continuity Plans and periodically test and revise them based on new development and the test findings.</p>
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<p>Principle 4: Credit risk</p> <p><i>An FMI should effectively measure, monitor, and manage its credit exposures to participants and those arising from its payment, clearing, and settlement processes. An FMI should maintain sufficient financial resources to cover its credit exposure to each participant fully with a high degree of confidence. In addition, a CCP that is involved in activities with a more-complex risk profile or that is systemically important in multiple jurisdictions should maintain additional financial resources sufficient to cover a wide range of potential stress scenarios that should include, but not be limited to, the default of the two participants and their affiliates that would potentially cause the largest aggregate credit exposure to the CCP in extreme but plausible market conditions. All other CCPs should maintain additional financial resources sufficient to cover a wide range of potential stress scenarios that should include, but not be limited to, the default of the participant and its affiliates that would potentially cause the largest aggregate credit exposure to the CCP in extreme but plausible market conditions.</i></p>	
Summary narrative	Not Applicable
<p>Principle 5: Collateral</p> <p><i>An FMI that requires collateral to manage its or its participants' credit exposure should accept collateral with low credit, liquidity, and market risks. An FMI should also set and enforce appropriately conservative haircuts and concentration limits.</i></p>	
Summary narrative	Not Applicable
<p>Principle 6: Margin</p> <p><i>A CCP should cover its exposure to its participants for all products through an effective margin system that is risk-based and regularly reviewed.</i></p>	
Summary narrative	Not Applicable
<p>Principle 7: Liquidity risk</p> <p><i>An FMI should effectively measure, monitor, and manage its liquidity risk. An FMI should maintain sufficient liquid resources in all relevant currencies to effect same-day and, where appropriate, intraday and multiday settlement of payment obligations with a high degree of confidence under a wide range of potential stress scenarios that should include, but not be limited to, the default of the participant and its affiliates that would generate the largest aggregate liquidity obligation for the FMI in extreme but plausible market conditions.</i></p>	
Summary narrative	Not Applicable

<p>Principle 8: Settlement finality <i>An FMI should provide clear and certain final settlement, at a minimum by the end of the value date. Where necessary or preferable, an FMI should provide final settlement intraday or in real time.</i></p>	
Summary narrative	Not Applicable
<p>Principle 9: Money settlements <i>An FMI should conduct its money settlements in central bank money where practical and available. If central bank money is not used, an FMI should minimise and strictly control the credit and liquidity risks arising from the use of commercial bank money.</i></p>	
Summary narrative	Not Applicable
<p>Principle 10: Physical deliveries <i>An FMI should clearly state its obligations with respect to the delivery of physical instruments or commodities and should identify, monitor, and manage the risks associated with such physical deliveries.</i></p>	
Summary narrative	Not Applicable
<p>Principle 11: Central securities depositories <i>A CSD should have appropriate rules and procedures to help ensure the integrity of securities issues and minimise and manage the risks associated with the safekeeping and transfer of securities. A CSD should maintain securities in an immobilised or dematerialised form for their transfer by book entry.</i></p>	
Summary narrative	<p>BM Depo maintains accounts at the level of beneficial owners. The accounts are, however, tied to a participant of the BM Depo and instructions for transfers can only originate directly from the account holder. Section 35 of the SICDA provides all the rights of securities ownership to the beneficial owner as recorded in the books of a CSD. Securities are created in BM Depo as a result of new public offerings, corporate actions or dematerialisation of listed securities. In all cases this is done based on express instructions of the issuer or its registrar. The BM Depo Rules govern what information is required, how it is to be exchanged and the timelines involved. Similarly, securities can be withdrawn only upon specific instructions by the concerned issuers or their registrars. The eRapid system is used for exchange of information between issuer/registrars and BM Depo.</p> <p>Account holder's interests is protected under section 43 of the SICDA that requires BM Depo as an approved Central Securities Depository ("CSD") to protect the confidentiality of the account owners. Section 26 of the SICDA specifies the obligation of BM Depo to provide statements of accounts and Chapter 32 of the BM Depo Rules require the provision of periodic account statements. The BM Depo Rules further require customer permission for any securities transfers or changes to account particulars of the customer. The BM Depo</p>

	<p>operational controls and the governance model also require maintenance of strict audit trails and periodic audit of all critical procedures.</p> <p>Securities issuers interests are covered under section 28 of the SICDA which requires BM Depo to conduct a quarterly stock-take and reconcile the total securities as recorded in the jumbo certificates and the actual holdings as per the books of the CSD. Upon completion of the stock-take, BM Depo submits a report on details of securities held with the CSD to each of the issuer in addition to submitting a full report to the stock exchange and the SC. The SICDA further requires the CSD to provide in a timely manner requests from the issuer for list of all securities holders and processing of any corporate actions. Internal Audit team of Bursa Malaysia performs an annual audit of the BM Depo operations. In addition, the SC also conducts periodic audits on BM Depo.</p> <p>The relevant rules and procedures for customers of CSD with regards to BM Depo are posted at the website of Bursa Malaysia.</p> <p>BM Depo has instituted very strict maker-checker procedures for all activities that result in creation and removal of securities. In addition, there is a daily automated reconciliation of all securities transactions and detailed audit trails are maintained. Additionally, the computer system of BM Depo system prohibits any overdraft and debit balance in securities accounts of customers.</p> <p>The SICDA mandates immobilisation of all securities listed on the BMS. As of 30 June 2019, 99.91% of securities in existence are immobilised in BM Depo. The ones which are still held in paper form are the ones which were created before 1998.</p> <p>Rule 34 of the BM Depo Rules provides for establishment of a compensation fund that can be used to recompense any loss to clients due to any negligence of BM Depo, internal fraud or because of any computer crimes. The size of the compensation fund currently is RM 50 million. In addition, there is an insurance policy with a limit of indemnity of RM 25 million. The maximum amount of compensation payable to a claimant is RM 100,000 per claim.</p> <p>Additionally, BM Depo framework requires asset of customers to be clearly segregated from the asset of its participants by maintaining accounts at beneficiary level. Transactions such as transfer of securities, withdrawal of securities and any changes to the account particulars of the customer are only performed upon receiving the express permission from the customers via prescribed transaction forms completed and signed by the customer.</p> <p>Account of the customer is directly held under the customer's name and it is clearly separated from the accounts of the participants. Securities Account under section 25 of the</p>
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	<p>SICDA specify the type of account and how accounts are to be maintained with the CSD. BM Depo is prohibited as per the provisions in section 36 of the SICDA from holding, purchasing or dealing in any securities which it immobilises.</p> <p>Lastly, in addition to the primary function of BM Depo of recording of securities issuance, transfer of securities and removal of securities, BM Depo also provides services such as distribution of dividends and handling of corporate actions that includes processing of bonus issues, share consolidation, payment of cash distribution/dividend to shareholders on behalf of issuer and facilitating electronic rights issue. The risks associated with these services are primarily operational risk in nature. BM Depo has instituted appropriate operational controls and agreements to mitigate the risks.</p>
<p>Principle 12: Exchange-of-value settlement systems <i>If an FMI settles transactions that involve the settlement of two linked obligations (for example securities or foreign exchange transactions) it should eliminate principal risk by conditioning the final settlement of one obligation upon the final settlement of the other.</i></p>	
Summary narrative	Not Applicable
<p>Principle 13: Participant-default rules and procedures <i>An FMI should have effective and clearly defined rules and procedures to manage a participant default. These rules and procedures should be designed to ensure that the FMI can take timely action to contain losses and liquidity pressures and continue to meet its obligations.</i></p>	
Summary narrative	<p>BM Depo functions as a CSD only involve movement of securities from seller customer's account to buyer customer's account and is not responsible or have any role in the funds settlement with the participants. The CCP function is performed by BMSC. All the participants of BM Depo are also participants of BMSC. The default of a participant is handled as per the default management procedures of BMSC. As per the default procedures, BM Depo can be required to execute transfer of securities to meet the settlement obligations of the BMSC participants and suspend the participant. Beyond this, BM Depo does not have direct role in the default of a participant. The role of BM Depo is limited to executing specific transfer and suspending the defaulting participants' accounts. BM Depo is operationally well prepared to manage this.</p> <p>The default management procedures describe the roles, obligations, and responsibilities of the various parties, including non-defaulting participants. The first step in these procedures is for the Default Management Committee ("DMC") to convene. The roles defined are:</p> <ul style="list-style-type: none"> (a) Declaration of default by Chairman of DMC. (b) Suspension of accounts by the BM Depo.

	<p>(c) Selection and liquidation of securities by risk management and approved by Chairman of DMC.</p> <p>(d) Panel of non-defaulting participants to assist in the liquidation process.</p> <p>(e) Payment of Clearing Guarantee Fund (“CGF”)/ other financial resources by Finance.</p> <p>(f) Non-defaulting participants to replenish the CGF upon notification by risk management.</p> <p>(g) Communication and press release by Default Recovery Management Committee.</p> <p>The default management procedures are reviewed as and when there are significant local or international developments. Additionally, an annual default handling drill is conducted to ensure effectiveness of the default management procedures.</p> <p>The interests of the participant’s customers are protected by BM Depo. This is provided under Rule 3.01(1)(h) of Rules of BM Depo, which include the following to be followed by BM Depo in the event of a participant default:</p> <p>(a) Establish Task Force Team to monitor CSD operations of the defaulting ADA while waiting for special administrator to be appointed;</p> <p>(b) Special administrator to take over the task of overseeing the CSD operations;</p> <p>(c) Identify new ADA to take over the CSD accounts of the depositors; and,</p> <p>(d) Transfer all CSD accounts to the new ADA.</p>
<p>Principle 14: Segregation and portability <i>A CCP should have rules and procedures that enable the segregation and portability of positions of a participant’s customers and the collateral provided to the CCP with respect to those positions.</i></p>	
Summary narrative	Not Applicable
<p>Principle 15: General business risk <i>An FMI should identify, monitor, and manage its general business risk and hold sufficient liquid net assets funded by equity to cover potential general business losses so that it can continue operations and services as a going concern if those losses materialise. Further, liquid net assets should at all times be sufficient to ensure a recovery or orderly wind-down of critical operations and services.</i></p>	
Summary narrative	<p>As mentioned in Principle 2, BM Depo adopted the Group Governance Model including Group’s ERM framework to identify, monitor and manage its general business risk.</p> <p>Amongst others, the review of the annual business plan which include strategic planning and annual budgeting plays a significant role in the management of both internal and external General Business Risks of Bursa Malaysia. The risk areas relating to General Business Risks under the ERM framework include:</p>

	<ul style="list-style-type: none"> (a) Administration and operation of the Group as a business enterprise which could impair the business of Bursa Malaysia; (b) Potential risks which can cause the decline in Bursa Malaysia's revenue, growth in expenses or loss charges against capital; (c) Business impairment resulting in adverse reputational effects; (d) Poor execution of business strategy; (e) Ineffective response to competition; (f) Fluctuations in macroeconomic and market activities; (g) Ineffective talent management; (h) Lack of technology and product innovation; (i) Legal and regulatory changes to the business landscape. <p>In addition, Bursa Malaysia monitors the general business risk on its financial position for its subsidiaries including BM Depo to ensure quality and sufficient liquid net assets are maintained to meet its obligations. On a stand-alone basis, BM Depo maintains liquid net assets to cover at least 6 months of cash operational expenses. These assets are held in fixed deposits and money market placements with approved financial institutions and liquid money market or fixed income securities which are rated 'AA3' and above by RAM or equivalent rating by MARC. The adequacy of the liquid funds is reviewed on a half-yearly basis. BM Depo's investment policy and practices are further explained in Principle 16 below.</p>
<p>Principle 16: Custody and investment risks <i>An FMI should safeguard its own and its participants' assets and minimise the risk of loss on and delay in access to these assets. An FMI's investments should be in instruments with minimal credit, market, and liquidity risks.</i></p>	
Summary narrative	<p>Under Bursa Malaysia Group's investment policy, BM Depo is only allowed to invest in deposits or placements with pre-approved financial institutions that meet strict credit requirements (and within the counterparty limits), money market and fixed income instruments that meet Bursa Malaysia's stringent credit parameters, and securities issued by or guaranteed by Malaysian government or the Malaysian Central Bank.</p> <p>BM Depo remains conservative by investing all of its cash assets in highly liquid and short-term deposits with pre-approved FIs, and permitted fixed income securities. Around 80% of the BM Depo's assets are invested in deposits with pre-approved FIs, while the remaining 20% are invested in fixed income securities. As for the BM Depo Compensation Fund, 100% of the fund are invested in deposits with pre-approved FIs. All investments are MYR-</p>

	<p>denominated, with the FIs being incorporated in Malaysia and supervised by BNM. BM Depo has prompt access to these assets with low credit, liquidity and market risks.</p> <p>The investment policy sets out stringent credit parameters for approved FIs, and the single counterparty exposure limit in each FI. There is no significant exposure to a single FI, as BM Depo adheres to the exposure limits which aim to spread out exposures to multiple counterparties. In addition, the list of approved banks and exposure limits are reviewed at least, on an annual basis or as and when required (e.g. in adverse financial condition). BM Depo is only permitted to invest in fixed income securities with a minimum rating of 'AA3' as rated by RAM, or the equivalent rating by MARC or minimum foreign rating of 'A-' as rated by Standard & Poor's (or the equivalent rating by Moody's and Fitch).</p>
<p>Principle 17: Operational risk</p> <p><i>An FMI should identify the plausible sources of operational risk, both internal and external, and mitigate their impact through the use of appropriate systems, policies, procedures, and controls. Systems should be designed to ensure a high degree of security and operational reliability and should have adequate, scalable capacity. Business continuity management should aim for timely recovery of operations and fulfilment of the FMI's obligations, including in the event of a wide-scale or major disruption.</i></p>	
Summary narrative	<p>The Risk and Compliance of Bursa Malaysia has established an Enterprise Risk Management Principles & Framework ("ERMPF"), designed based on ISO 31000, Risk Management – Principle and Guidelines, published by the International Organization for Standardization ("ISO"). One of the risk categories classified in the ERMPF is Operational Risk which is defined as risks arising from deficiencies in information systems or internal processes, human errors, management failures, or disruptions from external events that could result in the reduction, deterioration, or breakdown of services provided by the Group. The ERMPF is supported by the Enterprise Risk Management Process & Guidelines ("ERMPG"). The ERMPG serves to guide the Group in identifying, monitoring and managing the risks it faces in the course of achieving its operations, strategic and business objectives. In the contexts of operational risk, the risk assessment process involves identifying major processes, measuring risk events in terms of likelihood of occurrence and impact and management of current mitigation controls that are in place and action plans if needed.</p> <p>The ERMPF which was approved by the Board defines the roles and responsibilities of the relevant parties including the Board, RMC and Management, respectively for managing risks and implementing risk management processes, and ensuring the adequacy and effectiveness of risk mitigation controls. The Board have tasked the RMC with the responsibility of ensuring that the risk management framework of the Group operates</p>

	<p>effectively. Periodically, the Board will receive updates from the RMC on the progress and assessment of risk management of the Group.</p> <p>The operational risk of Bursa Malaysia is strengthened by the following frameworks, amongst others:</p> <p>(a) Operational Risk Framework:</p> <ol style="list-style-type: none"> A common definition and risk categories to enable a uniform understanding and consistent approach of managing operational risk across the Group; A governance and oversight structure for operational risk; Roles and responsibilities including reporting lines; A sound operational risk management approach and process by introducing methodologies/tools and techniques to perform risks assessment/ analysis/ treatment/ monitoring and reporting in a structured, systematic and consistent manner; and Effective communication to cultivate operational risk awareness building. <p>(b) Cyber Security Risk Management Framework:</p> <ol style="list-style-type: none"> To create a common approach for addressing cyber security within Bursa Malaysia; and To ensure cyber security risks are properly managed throughout Bursa Malaysia. <p>(c) Anti-Fraud, Bribery & Corruption Policy:</p> <ol style="list-style-type: none"> To assist Bursa Malaysia to adopt a pragmatic approach to assess, detect, prevent and respond to fraud, bribery and corruption within the organisation. Bursa RSCA questionnaires explicitly probes for potential risk of fraud, bribery and corruption in Bursa staff operational activities within and with external parties. <p>(d) Risk Management Framework on Outsourcing:</p> <ol style="list-style-type: none"> To define the required environment and organizational components for managing outsourcing risk in a structured, systematic and consistent manner within Bursa Malaysia; and The framework describes three key elements for an appropriate outsourcing risk management i.e. Outsourcing Lifecycle, Risk Governance and Oversight Structure, and Risk Management Practices. <p>The CDS is a system that is fully owned and operated by BM Depo. Henceforth, the operational reliability objectives of the BM Depo are dependable on the performance of the CDS. Investors use the CDS to transfer securities from one CDS account to another,</p>
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	<p>provided the transfers are within the reasons approved by BM Depo. Other transactions that depositors can perform via the CDS are registering of bank account information, updating of account particulars, reactivation of dormant CDS account, reactivation of inactive CDS account, depositing of share certificate, withdrawal of shares of delisted company and closing of CDS account. The operational reliability objectives of the Bursa Malaysia are to ensure confidentiality and integrity of the securities accounts and to provide an efficient, reliable and stable provision of depository services. The CDS is maintained regularly to ensure a high degree of security, performance, operational reliability and scalable capacity. This is achieved through the IT initiatives undertaken by Bursa Malaysia's Technology & Information Management ("TIM") together with the ongoing support and maintenance arrangements with the IT vendors. For instance, the performance of the CDS is measured and monitored at its average and peak CPU utilisation level, whereas its capacity is observed via its average and maximum daily transactions processing. The system and the processes are subject to audit by the Internal Audit. The Internal Audit assesses the adequacy and effectiveness of controls to mitigate operational risks in the areas of clearing and settlement.</p> <p>Based on the total number of CDS accounts opened over the last few years, the CDS system is able to sufficiently meet the scalable capacity adequacy to handle increasing volumes and its service-level objectives. There was no breach on the capacity limits of the CDS.</p> <p>To ensure the reliability and availability of the CDS system, the following controls are in place:</p> <ul style="list-style-type: none"> (a) Incident Management and Problem Management procedures are available and in compliance with IT Infrastructure Library ("ITIL"). All incidents are centrally logged into the Enterprise Service Management system and categorised by priority. Incidents are escalated to relevant IT support teams and respective vendors with 24/7 support service for resolution. (b) As one of the Bursa Malaysia's critical systems, all major components of the system are in cluster mode at the main site and it has redundant servers at the Bursa Malaysia Disaster Recovery ("DR") Site. This is to cater for high availability and reliability of the system. (c) Performance of the system is monitored using specific monitoring tools which have alert capabilities to trigger alarms in the event that thresholds are being breached. (d) Quality assurance of the changes to the system undergoes testing by vendors and internal users. For critical and major changes, an industry wide mock testing is conducted with the market participants.
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	<p>(e) Change management process is in place where all changes to the system are centrally logged at the Enterprise Service Management system, managed and assessed in respect of impact and risk of the change to the system.</p> <p>Audit engagements and independent reviews are carried out by the Internal Audit on operational systems, processes, policies and procedures based on an annual audit plan approved by the Audit Committee. All key operational areas and processes are audited within a cycle of 3 years with higher frequency of coverage depending on its criticality and Internal Audit's risk assessment. Using a risk-based audit approach, Internal Audit assesses the selected areas under the audit scope in relation to effective mitigation of risk exposures, compliance towards the approved policies and procedures and relevant laws and regulations as well as improvement to the overall internal control system. As part of the risk-based audit plan, Internal Audit also conducts system readiness reviews to ensure that due process has been complied with prior to the implementation or launch of significant systems development and enhancement projects. Post implementation reviews are also conducted after a predefined period to assess the realised benefits of the implemented significant systems and projects.</p> <p>Physical and information security and policies are in place to ensure the confidentiality, integrity and availability of information and systems. The policies encompass areas of governance, identification, protection, detection, and recovery controls for the organisation.</p> <p>Bursa Malaysia have implemented appropriate protective controls to minimise the likelihood and impact of a cyber-attack on critical business functions and information assets.</p> <p>The controls for physical and logical access are the following:</p> <ul style="list-style-type: none"> (a) Entry into data centers and sensitive areas are controlled using combination of access cards and security identification codes and restricted only to authorised personnel. (b) Super IDs or privilege-IDs are controlled and managed by privilege-ID management system. (c) System and data owners identified and access matrix defined; access to confidential and restricted information on need basis and upon approval. <p>Information Security Management System ("ISMS")</p> <p>Bursa Malaysia is certified with ISMS - ISO 27001:2013 for Depository Services. The ISMS surveillance assessment was completed in February 2019.</p>
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	<p>On 29 April 2019, the Cyber Security Strategy Roadmap (CSSR) was formalised. The CSSR is a 3-year (2019-2021) roadmap and actions designed to continuously improve the cyber security preparedness and resilience of Bursa Malaysia's infrastructure and services. This is in line and to support the overall business strategy and business plans of the Bursa Malaysia Group.</p> <p>Bursa Malaysia has invested and put in place tools and mechanisms to enhance the cyber resilience capabilities to anticipate, withstand, contain and rapidly recover from a cyber incident with the objective of limiting the escalating risks that cyber threats pose to Bursa Malaysia and its stakeholders. Amongst the controls that have been put in place are:</p> <ul style="list-style-type: none"> (a) Vulnerability assessment and penetration test conducted to identify security vulnerabilities in system and appropriate remedial actions taken to address any weaknesses. In addition, Vulnerability Assessment Tool was refreshed to enable detection of potential vulnerabilities automatically and safeguard the systems from potential threats from those vulnerabilities. (b) Firewall and network intrusion prevention system in place to monitor, detect and mitigate malicious activity or suspicious traffic on the network. Security Components was put in place to refresh Firewalls, LAN Access Control Servers with the latest technologies and capabilities to ensure the network is safe from any intrusion of unauthorised access that connects to Bursa Malaysia network. (c) Re-designed staff Internet access to use a separate Network Firewall and Broadband line to minimise Internet bandwidth contention during peak utilisation for business application / traffic and to prevent cyber-attack. (d) Anti-virus software implemented for all desktops, servers, email exchange and gateway. (e) Information leakage control to avoid unauthorised access and data leakage. (f) Independent consultant to conduct Social Engineering Test to evaluate staff awareness in identifying scam (e.g. email phishing and physical tailgating test), granting access permission to restricted areas and sharing of sensitive information.
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	<p>(g) External professional to conduct source code review for in-house developed software to provide comprehensive assurance that Bursa Malaysia's application is secured in terms of application flaw.</p> <p>(h) Established Bursa Malaysia Computer Emergency Response Team ("BMCERT"). The BMCERT is aimed to elevate the operational improvement and instil a culture of cyber risk awareness on incident response to cyber threats.</p> <p>(i) Participated in the Capital Market Cyber Drill Simulation ("CMCDS") organised by the SC in October 2018. Bursa Malaysia was identified as a key participant to participate in the CMCDS with the aim to strengthen the market preparedness in responding and recovering from potential cyber incidents. It is crucial for Bursa Malaysia to remain vigilant and maintain visibility on cyber preparedness and resilience. Bursa Malaysia was categorised in the top 25 percentiles among 38 organisations that participated in 2018 CMCDS.</p> <p>The tools and mechanisms are reviewed and assessed to observe with the Guidance on Cyber Resilience for Financial Market Infrastructures issued by IOSCO as well as to comply with the Guidelines on Management of Cyber Risk issued by the SC.</p> <p>In relation to BM Depo having a business continuity plan ("BCP"), the following are put in place:</p> <p>Business Continuity Plan ("BCP")</p> <p>The overall approach is geared towards ensuring adequate back-up arrangements for all critical office facilities and system components; online data replication from the main site to the DR site and data back-ups to ensure no data loss; and developing business continuity procedures and testing them periodically. The failure of the critical system components is mitigated with clustering and redundant systems/infrastructure facilities at Bursa Malaysia's main site, hence minimising the needs to failover to the Bursa Malaysia's DR site/systems. The systems at the Bursa Malaysia's DR site are capable of running all functionalities that are currently available at the main site.</p> <p>Alternate Site and Backup Systems and Office Facilities</p> <p>The Group's back-up systems and office facilities are housed in its own DR site which is away from the main site. These two different sites are provisioned from different power sub-</p>
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	<p>stations and different telecom exchanges for electricity supply and telecommunication services respectively, to mitigate the risk of concurrent impact to both sites. The DR site is having adequate capacity and as part of the annual BCP testing has been found to be capable of handling the operations for a sustained period of time.</p> <p>BCP and Testing</p> <p>The Group has a comprehensive group wide BCP plan. The BCP is tested annually with the participation of all stakeholders with target RTO of 2 to 4 hours. The BCP test includes participation of the BM Depo participants, they are required to connect to the Bursa Malaysia's DR site and verify their ability to conduct their usual services and the integrity of their data. Appropriate recalibration of the BCP are made and if required these are re-tested. Procedures in the BCP for mitigating business interruption risks are tested at least once a year. These procedures are also subjected to external audits by the SC and the appointed external auditor of Bursa Malaysia.</p> <p>BM Depo's Workflow and Recovery Time Window</p> <p>BM Depo performs the book entry settlement of trades executed on the stock exchange on T+2 (ready basis) and T+1 (designated or immediate basis) respectively by debiting the seller's securities account and crediting the buyers' securities accounts accordingly. The central depository system i.e. CDS business (production) hours are from 8:30 a.m. to 7:00 p.m. Monday to Friday. Upon completion of the book entry settlement process the information will be transmitted to BMSC to compute the fund settlement between BMSC and its members.</p> <p>The end-of-day ("EOD") is from 9:30 p.m. to 1:30 a.m. After the EOD processes, the transaction files, balance files and depository activities related reports are successfully generated and transmitted via eFIX to depository participants that are made of stockbrokers and custodian banks. During the CDS business hours, depository participants amongst others will be opening new securities accounts, updating particulars of securities account holders, executing transfer of securities and performing balance enquiries in relation to their own securities account and securities account of their clients maintained with them.</p> <p>In the event of critical systems disruption and after recovery, BM Depo could extend the production hours of the affected critical systems and delay the EOD processes accordingly so long as the affected EOD processes can be completed at around 8:30 a.m. on the following day.</p> <p>RTO and BCP Test Results</p>
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	<p>Both the securities trading and depository systems are classified as critical systems with RTO of 3 hours and 2 hours respectively. The recovery time achieved for an intraday failure scenario including staff mobilisation and traveling time to DR site for the securities trading and depository systems for year 2018 BCP tests were 1 hour 36 minutes and 1 hour 9 minutes respectively.</p> <p>Market Participant's DR Site, BCP and Testing</p> <p>In addressing the risks of key participants may pose to its operations, Bursa Malaysia requires all market participants to maintain robust BCP and this is ascertained as part of the ongoing supervision activities which includes onsite audits of the DR sites of the participants. The participants are also required to participate in the BCP tests of the Bursa Malaysia.</p>
<p>Principle 18: Access and participation requirements <i>An FMI should have objective, risk-based, and publicly disclosed criteria for participation, which permit fair and open access.</i></p>	
Summary narrative	<p>Criteria and requirements for participation, which are objective and risk-based are set out in the BM Depo Rules which are made available at the Bursa Malaysia website.</p> <p>There are two types of participants of the BM Depo – ADA and ADM. The ADAs are essentially the TCPs of the BMSC and the ADMs are the Non-Trading Clearing Participant (“NTCP”) (custodians) of the BMSC.</p> <p>Application for ADM is open to:</p> <ul style="list-style-type: none"> (a) a bank licensed under the relevant Banking Act (b) a body corporate declared to be a public authority or an instrumentality or agency of the Government of Malaysia or of any State (c) statutory bodies established under an Act of Parliament (d) a management company for a unit trust fund which has been approved by the Commission (e) an asset management company in possession of a valid licence under the Capital Markets and Services Act 2007 (f) a body corporate which is, primarily or, in the ordinary course of its business, engaged in the making of investments in marketable securities, with an aggregate investment fund for trading on the stock market of the Stock Exchange in excess of one hundred million ringgit

	<p>(g) an issuer within the meaning of section 2(1)(c) of the Insurance Act 1963, which has obtained prior approval from the Director General of Insurance to be an authorised direct member.</p> <p>Application for ADA is open to:</p> <ul style="list-style-type: none"> (a) a Stock Exchange (b) a Clearing House (c) a Participating Organisation (PO) of BMS (d) a bank licensed under the relevant Banking Act (e) a body corporate of a type prescribed by the Minister under the Act. <p>The rules pertaining to participation requirements can be found under Part II Chapter 2.0 and Part III Chapter 14 of the BM Depo Rules. In addition, relevant operating manuals are given to new participants and all changes are communicated to the participants.</p> <p>Participants eligibility for admission as participants of BM Depo is assessed based on, amongst others, general criteria for admission which includes financial integrity, absence of convictions or civil liabilities, good reputation and character and operational capability, including adequately trained personnel, data processing capacity and suitable premises.</p> <p>Applicant for ADA of BM Depo is required to undergo a readiness audit before being allowed admission.</p>
<p>Principle 19: Tiered participation arrangements <i>An FMI should identify, monitor, and manage the material risks to the FMI arising from tiered participation arrangements.</i></p>	
Summary narrative	Not Applicable
<p>Principle 20: FMI links <i>An FMI that establishes a link with one or more FMIs should identify, monitor, and manage link related risks.</i></p>	
Summary narrative	<p>BM Depo has links with BMSC and BMDC for settlement of securities and depositing equities collaterals collected from the participants of these clearing houses. Hence, BM Depo effectively carries out instructions issued by BMSC and BMDC.</p> <p>The operational risks arising from this linkage are included in the overall operational reliability planning of the Group.</p>

<p>Principle 21: Efficiency and effectiveness <i>An FMI should be efficient and effective in meeting the requirements of its participants and the markets it serves.</i></p>	
Summary narrative	<p>BM Depo is designed as a CSD. BM Depo's operational procedures, membership and technology arrangements are geared towards achieving efficient operations. BM Depo has enhanced its services for its participants or stakeholders to enable seamless processing and subscription of electronic services offered by BM Depo including corporate actions activities such as cash payments, bonus issue and rights issue. Amongst the initiatives that were introduced are as follows:</p> <ul style="list-style-type: none"> (a) Electronic Share Application: Investors are able to apply Initial Public Offering via participating banks internet portal or automated teller machines fully electronically by making payment directly from their bank account. (b) CDS-STP: Allows participants to have a straight through processing for CDS transactions. This enable BM Depo participants to automate certain process at their end by eliminating the need to perform data entry of transactions into the CDS. (c) Electronic Dividend: Direct crediting of cash entitlement (including dividend) into depositors' bank account instead of payment made using cheques. This ensures fast and convenient way for shareholders to receive their cash entitlement directly into their bank accounts. (d) Electronic Rights Issue: Electronic subscription and payments for rights issue by shareholders using banking facility and in addition BM Depo has developed a solution namely Nominee Rights Subscription for nominee companies to subscribe their rights entitlements electronically. (e) Electronic CDS Statement and Notices: Depositors have the option to receive CDS Statement and CDS Notices electronically by having the statements and notices delivered directly to their email addresses. This ensures fast, safe and timely receipt of such notification from BM Depo. Depositors who have chosen to receive their CDS statements electronically will also receive Marked-to-Market information of their shareholdings in their CDS statements. (f) Electronic Notification: BM Depo has further enhanced its system to facilitate shareholders' notification to be delivered electronically via email by listed issuers. (g) Mobile apps for CDS: On 30 May 2019, BM Depo launched a mobile apps known as Bursa Anywhere that allows the depositors to view their CDS accounts balances with marked to market portfolio information, view their CDS statement of accounts, updates their CDS account information and receive corporate action notifications. BM Depo has planned subsequent releases in the immediate future to include web-based application that will allow the depositors to perform CDS transactions such as no change in beneficial owner transfer of securities, opening of new CDS accounts and subscription of corporate exercises.

	<p>Apart from the above initiatives, BM Depo has also built direct electronic communication channels with issuers/share registrar via eRapid for shareholders' information and corporate action activities and eFIX for data transfer of daily transactions/balances information to its participants to perform reconciliation.</p> <p>On top of that, BM Depo obtains feedback from the participants through the annual survey and other periodic consultations. BM Depo also performs a post implementation review for any new initiatives, which involves consultation with the participants that is the requirement imposed by the SC for any new approved initiatives/projects. The review report is then tabled to the management for their acknowledgement.</p> <p>The goals of BM Depo are to:</p> <ul style="list-style-type: none"> (a) Protect confidentiality of securities accountholders information at all times. (b) Prevent any unauthorised usage of securities accounts. (c) Provide efficient services when dealing with securities accountholders request for any services related to the depository as prescribed in the timeline in the CDS Procedures Manual for the ADA/ADM and the User Guide for Depositors of BM Depo. (d) Continuously monitor all submission by securities accountholders ensuring they have been attended to within the scope of request and authorised by the securities account holders. (e) Ensure adequate risk management measures. (f) Ensure safe custody of securities in accounts of securities holders. (g) Facilitate efficient deposit of securities. (h) Facilitate registration of dealings in securities. (i) Establish a proper and efficient system for recording of all securities held by securities account holders. (j) Provide efficient services when dealing with stakeholders i.e. share registrar for any corporate exercise services. (k) Guard against any falsification of records or accounts maintained with BM Depo. <p>BM Depo has identified and established risk profiles for all risk related to its operations or activities and provides the possible control mechanism on how to mitigate those risks. Furthermore, on a yearly basis, BM Depo conducts quarterly review on its identified risks profiles to ensure the control effectiveness and updates the risk profiles if there is any new risk identified with the introduction of any new services or products by BM Depo.</p> <p>There are Key Performance Indicators ("KPIs") established for tracking achievement of these objectives both at organisational level and at the level of the personnel.</p>
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	<p>In addition, BM Depo has a role to play in the efficient functioning of BMSC and as such the operational indicators of BMSC are applicable for BM Depo as well. BMSC has identified and established targets for key operational indicators as follows:</p> <ul style="list-style-type: none"> (a) Time taken to complete trade processing; (b) Adherence to cut-off times; and (c) System availability. <p>BM Depo like BMSC and BMDC also performs a post implementation review for any new initiatives, which involves consultation with the participants. This requirement is also imposed by the SC for any new initiatives/projects approved by the SC. The review report is tabled to the Management.</p> <p>Industry and/or public consultation is also conducted prior to introduction of any changes to Rules and/or product launching. There is also a formal engagement in the form of Securities Market Operations Committee ("SMOC") that includes members of the Exchange / Clearing House / Depository and participants. The committee meets regularly to discuss market related matters. The operations of the SMOC is governed by clear Terms of Reference.</p>
<p>Principle 22: Communication procedures and standards <i>An FMI should use, or at a minimum accommodate, relevant internationally accepted communication procedures and standards in order to facilitate efficient payment, clearing, settlement, and recording.</i></p>	
Summary narrative	BM Depo uses a proprietary message format and system interfaces built on the industry standard protocols like TCP/IP to communicate with its participants.
<p>Principle 23: Disclosure of rules, key procedures, and market data <i>An FMI should have clear and comprehensive rules and procedures and should provide sufficient information to enable participants to have an accurate understanding of the risks and fees and other material costs they incur by participant in the FMI. All relevant rules and key procedures should be publicly disclosed.</i></p>	
Summary narrative	BM Depo has clear and comprehensive rules to govern its participants, complemented by procedure manuals. The rule-making process is a robust one, involving benchmarking, analysis, review and consultation to ensure that BM Depo arrives at appropriate rules. Specifically, the rules are formulated based on a multi-tiered internal process which includes:

	<p>(a) Consideration of the regulatory objectives to be achieved, concerns to be addressed and the implications of the proposed rule amendments;</p> <p>(b) Benchmarking the proposed rule amendments to those of other more developed markets and which has a similar framework so that the rules are on par with international standards, where applicable;</p> <p>(c) Review of the proposed rule amendments by qualified staff, senior management and chief regulatory officer prior to review or approval by a management regulatory committees;</p> <p>(d) Consultation with the relevant stakeholders including market participants and at times the public to ensure that the rules are clear, practical and are aligned with stakeholders' expectations;</p> <p>(e) For major rule amendments, approval is also by the board regulatory committee, comprising Bursa Malaysia's board members who professionals and market experts from the various related fields of the capital market; and</p> <p>(f) Approval of the SC for all rule changes except for those that are specifically exempted from SC's approval, for example amendments that are consequential to law changes.</p> <p>Where required, BM Depo also has a process to seek external legal opinions to ensure the enforceability of the relevant rule or contract.</p> <p>The BM Depo Rules and operational procedures are available at the Bursa Malaysia website: www.bursamalaysia.com. In addition, all participants of BM Depo are notified of any amendments to the rules and operational procedures via circulars transmitted through eRapid, a web-based solution to facilitate electronic transmission of circulars as well as other notices addressed to the participants.</p> <p>The participants are provided with network connectivity file specifications and message specifications for system connectivity and interface requirements. Technical documents on the system processes and designs are sent to participants through circulars.</p> <p>The fees and charges are provided to all new participants and changes are notified through circulars.</p> <p>The fees and charges structure in respect of CDS services applicable to Investors/ Depositors, ADA, ADM and Issuers are available at the Bursa Malaysia website: www.bursamalaysia.com.</p>
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Principle 24: Disclosure of market data by trade repositories <i>A trade repository should provide timely and accurate data to relevant authorities and the public in line with their respective needs.</i>	
Summary narrative	Not Applicable

V. List of Publicly Available Resources

Relevant information pertaining to BM Depo can be found at:

https://www.bursamalaysia.com/trade/our_products_services/central_depository_system/overview

Links to documents referenced within this Disclosure Framework are below:

Rules of Bursa Malaysia Depository

https://www.bursamalaysia.com/regulation/securities/rules_of_bursa_malaysia_depository

Capital Markets and Services Act 2007

<https://www.sc.com.my/regulation/acts/capital-markets-and-services-act-2007>

Securities Industry (Central Depositories) Act 1991

<https://www.sc.com.my/regulation/acts/securities-industry-central-depositories-act-1991>

Corporate governance model

https://www.bursamalaysia.com/about_bursa/about_us/corporate_governance/governance_model

Fee and Charges

https://www.bursamalaysia.com/trade/our_products_services/central_depository_system/schedule_of_fees