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# EXECUTIVE SUMMARY

The Asia Pacific Regional Committee ('APRC") of the International Organization of Securities Commissions in February 2004 gave a mandate to the Financial Services Agency of Japan and the Securities and Exchange Commission of Thailand to study current development of domestic bond markets in member jurisdictions. It is expected that the results of the study will provide useful information for further development of both domestic and regional bond markets in the Asia Pacific. This paper is prepared to report the study results.

The study reveals that issuance regulatory framework for corporate and government bonds are varied. Though all jurisdictions have their securities regulators responsible for corporate bond issuance, some use the commercial law as their governing law while some use the securities law. In addition, most jurisdictions seem to move from merit-based to disclosure-based approach in which regulatory focuses are the full disclosure of material information and the eligibility of the issuers. On the contrary, in most jurisdictions, the central bank and/or the ministry of finance are responsible for the issuance of government bonds with the system of multiple governing laws in place.

Similar to the issuance regulatory framework in the primary market, securities regulators in all jurisdictions oversee the secondary market for corporate bonds; whilst some jurisdictions have securities regulators accompanied with central banks oversee secondary markets for government bonds. Additionally, various jurisdictions also have self-regulatory organisations playing significant roles in promoting best market practices, executing disciplinary actions, and acting as bond information centres.

There are secondary trading facilities available for corporate and government bonds both on exchanges and alternative trading systems in all jurisdictions. However, the majority of trades occur in the over-the-counter (OTC) market. In addition, some jurisdictions arrange particular systems for corporate bond trading.

Regarding market intermediaries, most jurisdictions have a system of single licence which accommodates all brokerage/dealing and underwriting businesses. The licensing requirements usually focus on capital adequacy, capacity to carry out the business, and fits and proper of management. Also, the systems of primary dealers and of inter-dealer brokers exist in several jurisdictions to help enhance market liquidity and to facilitate trades among dealers respectively.

All jurisdictions impose listing requirements for corporate bonds to be traded on exchanges. On the contrary, most jurisdictions grant a waiver from compliance with listing rules for government bonds.

Bond settlement systems depend on the trading place: on exchanges or in OTC markets. For all bonds traded on exchanges, the settlement system is multi-lateral netting with a clearinghouse acting as central counterparty for all trades. In OTC markets, government bonds are usually settled on a delivery versus payment, real time trade-by-trade basis, through central banks' infrastructures whilst the settlement of corporate bonds in some OTC markets still occurs through the delivery of physical certificates.

In most jurisdictions, the levels of accessibility to trade information differ between those of market intermediaries and general public, especially for bonds traded in OTC markets where subscribers of alternative trading systems and information providers are permitted the accessibility to more information on specific bond issues.

All jurisdictions have their own accounting and auditing standards applied to corporate bonds issuers. However, some jurisdictions provide flexibility in which an international standard is either conditionally or unconditionally accepted. Lastly, several jurisdictions have impediments in the forms of transaction tax and stamp duty, which hinder transactions in the bonds markets. On the other hand, some jurisdictions have used taxation policy as investment incentives.

In conclusion, domestic bond markets in the region are in different development stages. Some are more advanced than others. However, there is still a large room for every single market to be further developed till each market can function effectively. To do so, the proper identification and prioritisation of necessary measures to put in place by each market are of essence to achieve effective results. More importantly, strong regional cooperation through sharing of information and experiences, and technical assistance given to less developed markets would help shorten the development period each of those markets may take on its own naturally.

# I. INTRODUCTION

### Background

Development of effective domestic bond markets in the Asia Pacific region has been realised as an urgent and important task since the Asian financial crisis in 1997. It is analysed that effective domestic bond markets could function as cushion to prevent the shock resulting from a huge amount of money outflows. In addition, domestic bond markets could provide alternatives for investment and fund raising to those in needs. Moreover, these markets could also provide means for monetary policy operations by central banks.

In February 2004, securities regulators under the Asia Pacific Regional Committee ("APRC") of the IOSCO met together in Wellington, New Zealand. At that meeting, the Asian bond market initiatives were discussed. All recognised that bond market situations and conditions in other jurisdictions in the region were not known well, as a result, an agreement to conduct a survey for both domestic corporate and government bond markets was reached.

### Questionnaire and Answers

The Financial Services Agency of Japan and the Securities and Exchange Commission of Thailand prepared a questionnaire for the survey with the assistance of the Monetary Authority of Singapore and the Securities Commission of Malaysia. The questionnaire, consisting of 34 questions in asking for both quantitative and qualitative information, was circulated to member jurisdictions where bond markets exist. There are responses from 13 jurisdictions<sup>1</sup>.

China:	China Securities Regulatory Commission
Chinese Taipei	Financial Supervisory Commission
Hong Kong:	Securities and Futures Commission
Indonesia:	Indonesian Capital Market Supervisory Agency (Bapepam)
Japan:	Financial Services Agency
Korea:	Financial Supervisory Service
Malaysia:	Securities Commission
New Zealand:	Securities Commission
Pakistan	Securities and Exchange Commission of Pakistan
The Philippines	Securities and Exchange Commission
Singapore:	Monetary Authority of Singapore
Sri Lanka:	Securities and Exchange Commission of Sri Lanka
Thailand:	Securities and Exchange Commission

### Survey Result

Since answers from each jurisdiction are very informative, covering each topic in detail, this finding paper therefore attempts to provide a summary together with charts, of significant matters. Though the summary was initially planed for the corporate bond market and the government bond market separately, the answers from the survey reveal common features of both markets in various aspects. As such, a single paper was prepared with highlights on particular topics.

<sup>&</sup>lt;sup>1</sup> For limitation on information provided, see Note 1 on page 43.

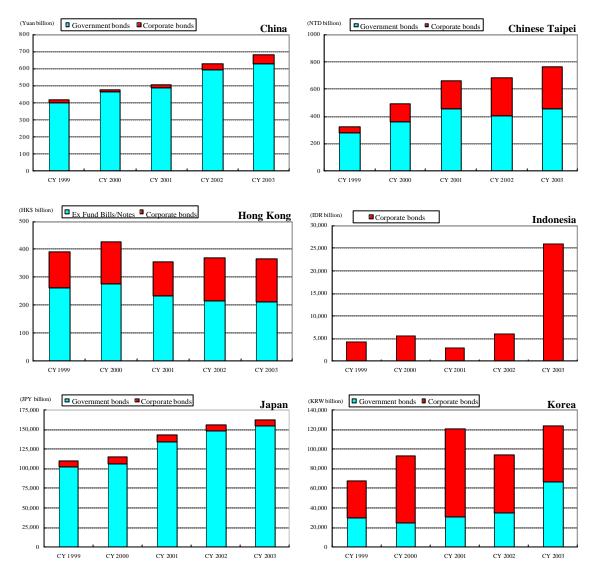
# II. PRIMARY MARKET

## 1. Primary Market at a Glance

### Issue Amounts

Here are charts indicating the issue amount of  $corporate^2$  and government bonds<sup>3</sup> in each jurisdiction in local currencies for the past five years.

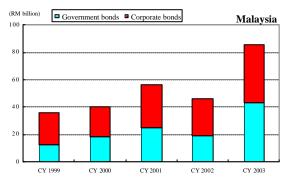
In general, the issue amounts increased in many jurisdictions for the past five years.

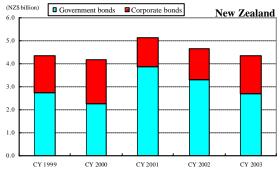


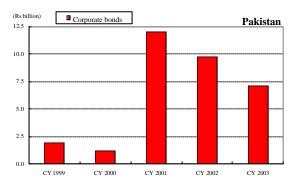
#### [Chart 1] Issue amounts

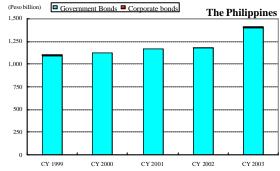
<sup>2</sup> For description of corporate bonds, see Note 2 on page 43.

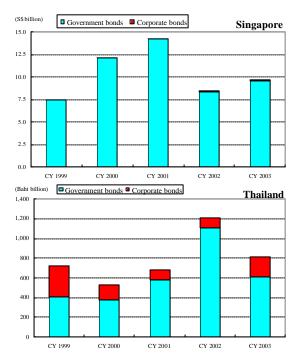
<sup>3</sup> The data of Exchange Fund Bills/Notes are used as the one of government bonds in Charts 1 and 2, and Tables 1 and 2, but, strictly speaking, it is not treated as the government bonds in Hong Kong. See also page 14.

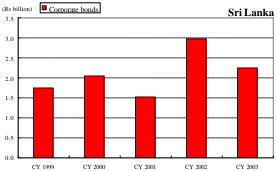












Here is the table of the issue amounts (aggregated amounts of figures provided by each regulator) converted into US dollars<sup>4</sup>; this is just for a benefit of comparison.

 $<sup>^{\</sup>rm 4}\,$  The yearly average exchange rate at the time is used for conversion.

#### [Table 1] Issue amounts in US dollar

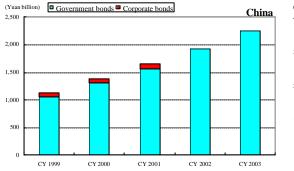
(Unit:	USD	million)
(Unit.	USD	mmon)

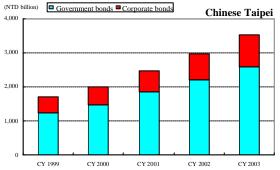
								(Ont. Or		
Jurisdiction		Co	rporate boi	nds		Government bonds				
Jurisalcuon	CY1999	CY2000	CY2001	CY2002	CY2003	CY1999	CY2000	CY2001	CY2002	CY2003
China	2,090	1,353	1,776	4,434	6,512	48,500	56,255	59,007	71,693	75,873
Chinese Taipei	1,274	4,086	6,009	8,037	7,993	8,769	11,605	13,517	11,765	1,274
Hong Kong	16,604	19,633	15,422	19,660	19,499	33,702	35,300	30,000	27,726	27,387
Indonesia	2,656	8,598	2,236	6,441	3,081	-	-	-	-	-
Japan	70,459	79,345	72,887	63,929	67,155	895,887	983,540	1,102,365	1,178,977	1,334,309
Korea	31,745	60,846	69,297	47,790	47,698	24,657	21,837	23,913	27,559	55,676
Malaysia	2,656	8,598	2,236	6,441	3,081	32,521	47,462	38,501	42,721	47,143
New Zealand	847	892	526	638	957	1,456	1,029	1.641	1,532	1,571
Pakistan	38	23	194	164	124	-	-	-	-	-
The Philippines	177	N.A.	N.A.	58	140	28,089	25,569	22,905	22,788	25,882
Singapore	12	29	40	21	39	4,384	7.019	7,925	4,691	5,510
Sri Lanka	24	25	17	31	23	-	-	-	-	-
Thailand	8,385	3,852	2,399	2,350	4,731	10,830	9,278	13,023	25,723	14,733

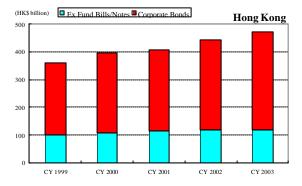
## **Outstanding Amounts**

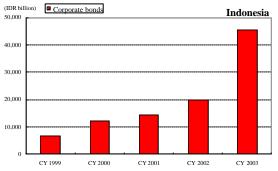
Here are charts indicating the outstanding amounts in local currencies for the past five years.

## [Chart 2] Outstanding amounts<sup>5</sup>

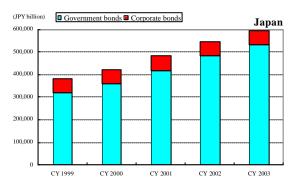


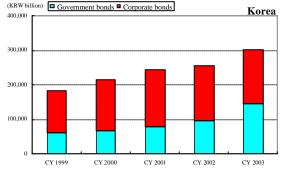


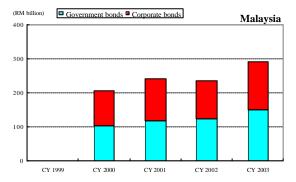


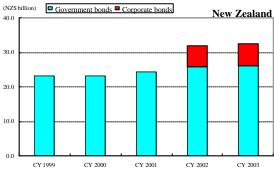


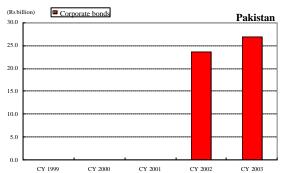
<sup>5</sup> The data of Pakistan in CY2003 are as of 30<sup>th</sup> June 2003.

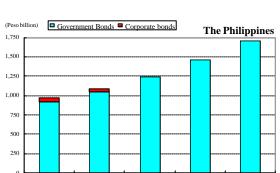








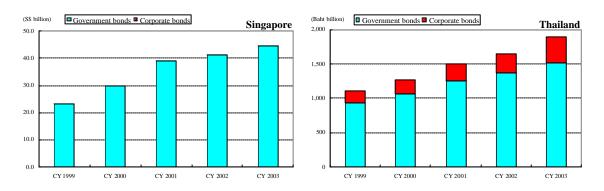




CY 2001

CY 2002

CY 2003

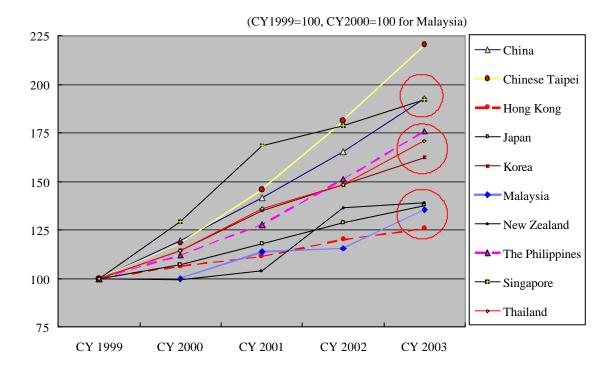


CY 1999

CY 2000

The local currency base outstanding amounts increased over the past five years: approximately 30% in Hong Kong, Japan, Malaysia and New Zealand (Malaysia's data is for the past *four* years); around 60% to 70% in Korea, the Philippines and Thailand; and almost doubled in China and Singapore. Whilst the outstanding amount steadily increased year each year in Chinese Taipei until up to 220% over the past five years

#### [Chart 3] Increase of outstanding amount<sup>6</sup>



The pace of market expansion varies from jurisdiction to jurisdiction, but such expansion indicates that the basis of the secondary markets, which are benchmarks for new issues, has been being established.

Here is a table of outstanding amounts (aggregated amounts of figures provided by each regulator) converted into US dollars<sup>7</sup>; this is just for a benefit of comparison.

									(Unit: US	SD million)
Traindiction		Co	Corporate bonds Government bonds			onds				
Jurisdiction	CY1999	CY2000	CY2001	CY2002	CY2003	CY1999	CY2000	CY2001	CY2002	CY2003
China	9,410	10,413	12,190	N.A.	N.A.	127,345	157,277	188,692	233,611	273,094
Chinese Taipei	14,387	15,767	17,131	21,833	27,425	39,618	44,687	53,131	63,887	76,180
Hong Kong	33,331	36,676	37,545	41,770	45,469	13,110	13,930	14,589	15,065	15,478
Indonesia	1,997	1,952	1,811	2,404	5,496	-	-	-	-	-
Japan	577,113	544,040	482,316	521,780	561,744	3,136,062	3,125,646	3,172,858	4,018,369	4,966,004
Korea	109,565	115,735	124,847	133,934	131,229	52,858	54,087	60,218	81,603	122,168
Malaysia	N.A.	26,971	32,529	29,350	37,835	N.A.	27,071	30,861	32,729	39,232
New Zealand	N.A.	N.A.	N.A.	3,141	4,223	12,235	10,217	10,089	13,647	17,023
Pakistan	N.A.	N.A.	N.A.	401	470	-	-	-	-	-
The Philippines	1,128	1,066	0	N.A.	N.A.	22,942	20,878	24,112	27,613	30,704
Singapore	26	29	44	51	61	13,890	17,245	21,059	23,783	26,105
Thailand	4,781	4,851	5,692	6,483	9,524	24,800	24,495	28,375	31,570	38,319

#### [Table 2] Outstanding amount in US dollar

<sup>&</sup>lt;sup>6</sup> This is based on the aggregated outstanding amounts of bonds, which data were reported by each securities regulator. This does not always mean the total size of the domestic bond market in each jurisdiction. See Note 3 on page 43. <sup>7</sup> The exchange rate at the end of the year is used for conversion.

# 2. Corporate Bonds

## (1) Corporate Bond Issuers

This table shows the number of corporate bond issuers in each jurisdiction over the past five years. Significant increase in number of corporate bond issuers can be seen in Indonesia and Malaysia.

Jurisdiction	CY1999	CY2000	CY2001	CY2002	CY2003
China	N.A.	5	6	12	15
Chinese Taipei	37	41	39	60	59
Hong Kong	8	12	9	5	6
Indonesia	6	15	3	7	34
Japan	386	404	401	384	368
Korea	419	290	341	304	267
Malaysia	N.A.	28	83	114	87
New Zealand	N.A.	N.A.	N.A.	30	30
Pakistan	4	6	17	17	15
The Philippines	6	0	0	1	4
Singapore (in S\$)	53	70	79	79	63
(in non-S\$)	29	28	31	38	20
Sri Lanka	5	4	3	5	1
Thailand	54	48	26	30	51

## [Table 3] Number of corporate bond issuers<sup>8</sup>

## (2) Outstanding Amounts of Straight Bonds

Lack of sufficient data does not avail good analysis of the corporate bond market situation, but it can be said that (i) outstanding amounts of straight (or plain vanilla) corporate bonds increased, especially in Indonesia (tripled), Chinese Taipei (doubled) and Thailand (doubled), (ii) the market for asset backed securities ("ABS"), which are notable instruments to give liquidity to illiquid assets, sharply increased in Korea for the past five years, which was close to the size of the straight bond market.

### [Table 4] Outstanding amounts of straight bonds

Jurisdiction	Unit	CY 1999	CY 2000	CY 2001	CY 2002	CY 2003
China	Yuan billion	78	86	101	N.A.	N.A.
Chinese Taipei	NTD billion	386	443	517	651	800
Indonesia	IDR billion	6,737	11,802	14,037	19,360	44,653
Japan	JPY billion	45,656	49,989	52,369	53,121	53,219
Korea	KRW billion	110,527	92,581	81,074	73,519	73,454
Pakistan	Rs million	N.A.	N.A.	N.A.	23,499	26,898
The Philippines	Peso billion	45	43	0	N.A.	N.A.
Thailand	Baht million	179,387	209,883	251,720	280,342	377,259

<sup>&</sup>lt;sup>8</sup> The data of Pakistan in CY2001 and 2002 include 2 issuers which issued second tranche during the year.

Jurisdiction	Unit	CY 1999	CY 2000	CY 2001	CY 2002	CY 2003
Chinese Taipei	NTD billion	-	-	-	-	9
Japan	JPY billion	750	879	889	1,092	1,195
Korea	KRW billion	4,552	43,727	67,329	68,070	64,324
Malaysia	RM billion	N.A.	102	124	112	144
Thailand	Baht million	N.A.	N.A.	N.A.	N.A.	N.A.

#### [Table 5] Outstanding amounts of asset backed securities

## (3) Standards of Bond Issuance

There are two major sorts of laws governing corporate bond issuance: one is a commercial code/act (China, Hong Kong, Japan, Korea, Sri Lanka and Pakistan) and the other is a securities industry act (Indonesia, Malaysia, Singapore, the Philippines and Thailand); the actual names of the laws in the latter case in some jurisdictions differ. In Chinese Taipei, it is described under both a commercial code/act and a securities industry act.

In general, standards of issuance approval are varied. However, most jurisdictions appear to move from merit-based approach to disclosure-based approach in which regulators no longer spell out detailed specific criteria for the approval, but instead focus on full disclosure and good corporate governance of the issuers.

Some jurisdictions impose requirements on rating (China, Korea, Malaysia, Pakistan and Thailand) and restriction or limit of total issue amount per issuer (Chinese Taipei and Korea). Meanwhile, in all jurisdictions, there are no requirements on the size of issuers' assets, issuers' profits and losses, and collaterals for the issue, except for China and Chinese Taipei. The Philippines imposes capital requirements on commercial paper issuers.

The approval and allotment periods revealed by some jurisdictions are quite varied. In Malaysia and Thailand, the approval period for general bonds takes about two weeks after receiving full application details while in Singapore the whole process takes (from pre-marketing to payment) about three to five weeks. Meanwhile, in Chinese Taipei, Hong Kong, Japan and Korea, the allotment can take place after the registration date three to eight days. Pakistan and the Philippines have longer periods for approval and issuance. China currently has two phases for corporate bond issuance: Phase I for approval of quota, which takes 12 to 15 months, and Phase II for approval of issuance procedures scheme, which takes 2 months.

Except for underwriting fees and other fees levied by a trustee and other private agencies, no charge shall be paid to regulators on issuance of corporate bonds in Indonesia, Japan and Singapore. On the contrary, in other jurisdictions, namely Hong Kong, Korea, Malaysia, Pakistan, the Philippines and Thailand, a sort of registration fee shall be paid to the regulatory bodies, as stipulated by relevant laws and regulations. In Korea, the amount of fees scaled by the maturity and amount of new issue bonds, which regarded as a part of the working expenses of the Financial Supervisory Service.

Listing fee at exchanges is levied subject to each exchange's rules.

#### [Table 6] Approval periods and timing for allotment and fee related to corporate bond issuance

Jurisdiction	Approval period and timing for allotment	Fee related to bond issuance
China	-Phase I for approval of quota; 12 to 15	-No provision concerning cost under any laws
	months	and regulations
	-Phase II for approval of issuance procedures	-
	scheme; 2 months	

Jurisdiction	Approval period and timing for allotment	Fee related to bond issuance
Chinese Taipei	-Registration of straight bonds shall be	-Cost for guarantee, trustee etc is applicable
-	effective 7 business days after the registration	
	is received by the SFB	
Hong Kong	-Allotment is 3 days after the date of issue of	-Fee for authorisation of a prospectus:
	a duly registered prospectus	HK\$30,000 (paid to the exchange if proposed
		to be listed, or paid to the Securities and
		Futures Commission if not)
		-Fee paid to the Registrar of Companies:
		HK\$1,415
Indonesia	-No specific period	-No registration fee to be paid to the Capit al
		Market Supervisory Agency, but paid to the
		exchange if proposed to be listed
Japan	-Allotment is 8 business days after filing of a	-There are no laws and regulations regarding
	shelf registration	fees
Korea	-Allotment is 3 to 7 days after the registration,	-Issuers of shelf-registration pay 1/10,000 of
	depending on bond types (guaranteed/secured	total issue amount
	bonds, or other bonds)	
Malaysia	-Approval is granted within 14 days upon	-No specific figures, but regulatory fees of
	receiving full application details and lasts for 6 months after that	issuance are fixed and depend on the issue size
	-For shelf-registration, the initial drawdown	-Other issuance costs involve recurring and
	must be made within 2 years after the	non-recurring fee, which are based on market
	approval	conventions dependent on the size and
	approvar	structure of the issue
New Zealand	N.A.	N.A.
	11.21.	1.1.2 1.
Pakistan	-Bond issuers are required to complete the	-Fee charged by SEC depends on the issue
	issuance requirements within 60 days after	amount: up to Rs250 mil - Rs25,000, more
	approval was granted by SEC	than Rs250 mil up to Rs1,000 mil – Rs50,000,
		and more than Rs1,000 mil - Rs100,000
The Philippines	-SEC shall declare whether the registration	-Upon filing of the registration statement, a
	statement is effective or rejected within 45	fee paid to SEC, which is not more than
	days after the filing	one-tenth of one per centum of the maximum
		aggregate price at which such securities
		proposed to be offered
Singapore	-For MTN programme, the whole process	-Fee paid to investment banks for origination
	(from pre-marketing to payment) takes about	and arranging of bonds could range between:
	3 weeks for bonds to be issued off	20-40 basis point for plain vanilla issue
	-A stand-alone issue might take about 5 weeks	<ul> <li>50-100 basis point for a structured bond issue</li> </ul>
Thailand	-The result of approval in general is granted	-Registration fee paid to the SEC: 10,000 baht
Thanana	within 15 days and of private placement is	-Listing fee paid to ThaiBDC: 20,000 baht for
	within 7 days	application plus 0.01 of issue size for upfront
	wrann / duys	fee (but not exceeding 350,000 baht) plus
		maintenance fee per year
L		mannenance rec per year

In most jurisdictions, those who wish to engage in underwriting corporate bonds must hold a securities licence from their securities authorities. Nonetheless, some jurisdictions allow certain financial institutions to engage in such activity without holding a securities license. In China, though securities firms are usually major underwriters of corporate bonds, the State Development Bank is also an eligible underwriter. In Malaysia, financial institutions licensed by the central bank may also engage in underwriting business. Singaporean banks may engage in underwriting business as well with exemption from the licensing requirement.

In the Philippines, all expanded commercial banks or universal banks shall comply with the registration/licensing requirements by the SEC in conducting underwriting business. In Chinese Taipei, underwriters and issuers should not hold over 50% shares of each counterparty or have relative conditions, which means 50% or more directors/supervisors do not have the positions in the two companies concurrently, or are not from members of the family in a certain degree. In Japan,

those who engage in securities business, including underwriters of corporate bonds, shall be registered with the Financial Services Agency.

## 3. Government Bonds

## (1) General

Although the regulatory framework for standards of government bond issuance differs from jurisdiction to jurisdiction, there are some similarities, which can be grouped below.

Firstly, most jurisdictions appear to have both the monetary authority/central bank and the ministry of finance involved with government bond issuance.

Secondly, several jurisdictions appear to have the system of multiple governing laws, depending upon purposes of issuance or classifications of government securities. For example, Japan has separate laws for issuance of four types of JGBs according to the issuance purpose, such as public works/capital subscription, finance of shortage of revenue or redemption of government bonds. Singapore has the Government Securities Act and the Local Treasury Bills Act, governing government bonds and Treasury bill issuance respectively. Only New Zealand and Chinese Taipei reveal a system of single governing law, which are the Public Finance Act 1989, and the Central Government Development Bonds and Loans Act, respectively.

Lastly, most jurisdictions have the monetary authority/central bank conduct the operation of government bond issuance on behalf of the governments.

In Hong Kong, Exchange Fund Bills and Notes are issued by the Hong Kong Monetary Authority for the account of the HKSAR Government Exchange Fund. Strictly speaking, Exchange Fund Bills and Notes are not treated as government bonds. They are included in the following discussion for reference only. In July 2004, HKSAR government started issuing government bonds on a need basis.

Unlike corporate bonds, there are no regulations in any form on the government bond issuance, rating requirements, filing prospectus, size of assets of issuers, collateral for issuance. The governments unconditionally and fully guarantee the bonds.

Interestingly, only Singapore issues government bonds for the sole purpose of developing a deep and liquid bond market, while most jurisdictions do it to finance and refinance the budget deficits, public work projects, etc.

## (2) Mechanisms for the Issuance of Government Bonds

Several jurisdictions have systematic patterns for the issuance of government bonds in terms of regular calendars for issuance and auctions, and frequency of issuance. China, Chinese Taipei, Korea, Malaysia, New Zealand, and Singapore provide the annual issuance plans mostly by the end or beginning of each year, or at the budget time each year. The annual issuance plans cover at least issuance size and potential new issues for the year while other details will be announced later on. Hong Kong, the Philippines and Thailand provide issuance calendars quarterly. An issuance calendar for the next three months is always available in Japan.

Jurisdiction	Issuance calendar / frequency	Auction schedule and its announcement	Detail of bonds
China	-MoF usually works out the annual issuance calendars and publicizes them at the beginning of the year		
Chinese Taipei	-MoF, by the end of each year, announces next year plan (issuance amount, maturity, and issued month) while exact issue size and date is announced quarterly, and issuance terms and conditions are announced 10 days before each issuing -Average frequency of issuance is once a month		
Hong Kong	-Exchange Fund Bills and Notes 91-day Bills: weekly 182-day Bills: bi-weekly 364-day Bills: every 4 weeks 2-,3-,5-,7-year Notes: quarterly -10-year Notes: quarterly/ semi-annually -HKSAR government notes/bonds ranging 2 to 15 years: on a demand basis	-Quarterly tentative schedule announced by 6 weeks in advance -No regular issuance schedule	-Announce at least 4 business days, in advance of each tender, the issue amount/date and bond maturities
Indonesia	N.A.	-Bank Indonesia announces the plans for auction of government securities consisting of all necessary details	N.A.
Japan	-0.5,1-year T-Bills: monthly -2-,5-,10-,20-year JGBs: monthly -15-year floating rate JGBs: every two months -30-year JGBs, JGBs for Individual Investors, Inflation-Indexed bonds: 4 times a year	-MOF normally announces an auction schedule for the next three months	-MOF announces the expected issue amount/date about a week prior to the auction
Korea	-MOFE announces the monthly and annual plans	-MOFE announces the auction plans by the last day of the month preceding the issuance date	-MOFE announces three days before the bidding the issuance amount, coupon rate, and method of payment
Malaysia	-Announced through a yearly auction calendar	-Announced through a yearly auction calendar	-Announced through yearly auction calendar
New Zealand	-The Crown announces tender program (size, tender dates, potential new issues) for the next financial year at budget time each year (in May) with a formal review of size and timing of tenders held in Dec. and May of each financial year		
The Philippines	-The schedule of issuance (tenor and volume) for the quarter is announced 1 month prior to issuing quarter	-Auction date is 2 days before the issue date.	-The Secretary of Finance, in consultation with the Monetary Board, shall prescribe features of bonds and T-bills
Singapore	-3-month T-Bills: weekly -1-year T-Bills, 2-,5-,7-,10-,15-year -SGS bonds are issued according to a pre-announced issuance calendar published at the beginning of the calendar year		

[Table 7] Patterns of government bond issuance

Jurisdiction	Issuance calendar / frequency	Auction schedule and its announcement	Detail of bonds
Thailand	-Issuance schedule for government	-No systematic pattern for	-No systematic pattern
	bonds is pre-announced each quarter,	bonds	
	but there is no systematic pattern for	-T-Bills are auctioned	
	frequencies, amounts or maturities	monthly	

Most jurisdictions issue bonds with a wide rage of maturities, which help facilitate the construction of government benchmark yields for private sectors to use as reference rates for their financing and investment. Chinese Taipei and Japan issue bonds with widest range of maturities up to 30 years.

Most jurisdictions employ both competitive and non-competitive auctions, except only Chinese Taipei and Malaysia where the latter is clearly stated unavailable. Chinese Taipei abolished non-competitive auction in July 2004. Some jurisdictions have the system of non-competitive auction for retail investors only such as Hong Kong and Korea while some do so for cooperatives and non-profit organisations as well and set aside a certain amount of issue or quota for this auction.

All jurisdictions appear to use the average price from all bids in non-competitive auction. In case of competitive auction, some employ Dutch-style auction where all winning bidders with the best prices will be allocated bonds based on a cut off single-price of that auction. Some employ American auction where multiple prices will be used in the allocation of bonds in accordance with the price each participant bids in the auction. China and Japan make use of both multiple- and single-price auctions. Anyhow, priority in allocation of bonds to winning bidders in all types of competitive auction starts from the highest to less highest bid (this is because not all bidders are allocated bonds) till all the bonds are allocated.

Eligible participants in the auctions in all jurisdictions are mostly selected participants or registered bidders either appointed by the central bank or the ministry of finance. General investors can normally participate in the bidding through primary dealers.

Jurisdiction	Maturity	Auction methods	Eligible participants
China	-2, 5, and 7 years bonds are used as benchmarked bonds	-Combination of competitive (American or Dutch-style is applied) and non-competitive bidding (use quota) -Public tender is adopted for the issuance of book-entry Bonds while underwriting or proxy underwriting is used fro Certificate Bonds	N.A.
Chinese Taipei	-2,5, 10,20, 30 years	-From July 2004, single rate has been replaced multiple rate competitive bidding and non-competitive bidding was abolished	-PDs (including banks, securities firms, insurance companies, and bill finance companies)
Hong Kong	-91-day, 182-day, 364-day (Exchange Fund Bills) -2,3,5,7,10 years (Exchange Fund Notes)	-Combination of competitive and non-competitive auctions (though RDs appointed as Retail Exchange Fund Notes Distributors)	-RDs
Indonesia	N.A.	-Combination of competitive and non-competitive auctions; bidders can only place a competitive bid for their own account	-Eligible bidders selected by Bank Indonesia based on the MOF's criteria
Japan	-0.5,1,2,5,10,15,20,30 years	-Combination of competitive auction using both multiple- and single-price (depend on maturities of bonds) and non-competitive auction	-Only auction participants decided by the Finance Minister

### [Table 8] Maturities of government bonds, auction methods and eligible participants

Jurisdiction	Maturity	Auction methods	Eligible participants
Korea	-3,5,10 years (bonds of other maturities may be issued depending on financing needs or market conditions)	-Combination of regular and non-regular biddings	-PDs, financial institutions and investors
Malaysia	-3,5,7,10,15 years (Government has plans to issue more longer dated bonds with maturity period from 20 to 25 years)	-Combination of auctions using multiple-price and private placement	-PDs
New Zealand		-Tenders	-Registered bidders
The Philippines	-91-day, 182-day, 364-day (T-Bills) -2, 4, 5, 7, 10, 20 years (T-Bonds)	-Combination of competitive and non-competitive auction through Automated Debt Auction Processing System (ADAPS)	-Government Securities Eligible Dealers (GSED)
Singapore	-3-month, 1,2,5,7,10,15 years	-Combination of both competitive (T-Bills using multiple-prices, Bonds using a single-price) and non-competitive auctions	-PDs
Thailand	-Ranging from approximately 1-18 years	-Combination of both competitive auction using multiple-price and non-competitive auction using average price	-PDs, financial institutions and institutional investors

# 4. Disclosure of Information Relating to Bond Issuance

## Corporate Bonds

Issuers in all jurisdictions are required to disclose quite the same sort of information when issuing corporate bonds though some jurisdictions may use different approaches for issuance approval, *i.e.* disclosure-based or merit-based approach. The information to be disclosed includes information relating to the terms of the bonds, business situations and financial conditions of the issuer, as well as other risk factors involved.

Unlike merit-based approach, jurisdictions with disclosure-based approach seem to issue disclosure guidelines rather than impose specific requirements for the information to be disclosed.

In addition, where bonds are proposed to be listed, the issuer will need to comply with the listing rules of the exchange in connection with those mentioned above.

The information that issuers are required to disclose over the period since issuing till expiration of the bonds can be classified into two categories: one is material information that may affect the bonds' risks, such as potential default events and substantial changes in nature of the issuers' businesses, which are normally as ad hoc reports; the other is a kind of periodic financial statements and auditor's reports.

### Government Bonds

There are no laws or regulations in any jurisdictions that require the disclosure of information relating to the issuance of government bonds.

# **III. SECONDARY MARKET**

## 1. Secondary Market at a Glance

## Trading Volumes

Here are charts indicating the trading volume of corporate and government bonds<sup>9</sup> in each jurisdiction in local currencies for the past five years.

In general, in most jurisdictions, the issue and outstanding amounts increased over the past five years, which led to an increase in trading volume. In some jurisdictions (Indonesia, Japan and Thailand), trading volumes of government bonds are extremely larger than those of corporate bonds. The most extreme case occurred in Japan where there was two-digit difference between trading volumes of government bonds and corporate bonds.

Jurisdiction	Market	CY 1999	CY 2000	CY 2001	CY 2002	CY 2003	Unit
China	Exchange	480	929	688	703	27,170	Yuan billion
Chinese Taipei	OTC	98	203	264	852	2,153	NTD billion
Indonesia	OTC	4,894	8,794	1,115	6,092	13,511	IDR billion
Japan	OTC	21,875	23,350	24,165	24,244	24,968	JPY billion
Korea	OTC	218,455	136,152	131,303	110,355	80,833	KRW billion
Malaysia	Exchange	12	30	33	59	108	RM billion
New Zealand	Exchange	486	1,023	877	794	758	NZ\$ million
The Philippines	Exchange	-	-	78	74	2	Peso million
Sri Lanka	Exchange	180	341	152	425	551	Rs million
Thailand	OTC	32,819	60,011	68,152	75,942	184,914	Baht million

#### [Table 9] Trading volumes of corporate bonds

#### [Table 10] Trading volumes of government bonds

Jurisdiction	Market	CY 1999	CY 2000	CY 2001	CY 2002	CY 2003	Unit
China	Exchange	181,914	188,912	203,032	331,283	587,560	Yuan billion
Chinese Taipei	OTC	6,942	16,203	52,366	59,613	129,822	NTD billion
Hong Kong	OTC	16,100	23,800	21,200	22,300	20,800	HK\$ million
Indonesia	OTC	N.A	13,217	66,222	130,787	327,692	IDR billion
Japan	OTC	1,470,368	1,851,301	2,050,834	2,220,225	2,497,530	JPY billion
- V	OTC	197,157	287,304	480,691	363,903	494,051	KRW billion
Korea	Exchange	278,189	20,593	10,100	43,306	208,716	KRW billion
Malaysia	OTC	75	155	291	312	347	RM billion
New Zealand	OTC	252,833	197,958	201,135	167,958	157,890	NZ\$ million
Singapore	OTC	106,742	154,489	337,704	446,980	619,278	S\$ million
Thailand	OTC	398,378	1,283,722	1,500,920	2,054,950	2,392,452	Baht million

In most jurisdictions, bonds are mainly traded in the OTC market. Only in Korea, a significant proportion of about 30% of government bonds is traded on the exchange. The government has made the benchmark bonds mandatory for primary dealers to trade on the exchange since October 2002.

<sup>&</sup>lt;sup>9</sup> See note 1 above.

## Turnover Ratio<sup>10</sup>

The following charts are the turnover ratios, which indicate liquidity of such products, of selected major bonds in each jurisdiction.

Inviadiation	Iurisdiction Market Corporate bonds		Government bonds								
Jurisdiction	магке	CY 1999	CY 2000	CY 2001	CY 2002	CY 2003	CY 1999	CY 2000	CY 2001	CY 2002	CY 2003
China	Exchange	-	-	-	-	-	0.72	0.48	0.45	0.82	1.80
Chinese Taipei	OTC	0.22	0.39	0.44	1.13	2.34	5.58	10.96	28.20	26.94	50.18
Hong Kong	OTC	-	-	-	-	-	0.16	0.22	0.19	0.19	0.17
Indonesia	OTC	0.72	0.73	0.08	0.31	0.33	N.A	0.03	0.17	0.33	0.84
Japan	OTC	0.38	0.38	0.39	0.39	0.42	4.59	5.15	4.90	4.61	4.70
V	OTC	1.75	0.93	0.80	0.69	0.52	3.28	4.20	6.08	3.76	3.39
Korea	Exchange	-	-	-	-	-	4.52	0.28	0.12	0.44	1.52
Malaysia	Exchange	N.A	0.20	0.18	0.39	0.75	-	-	-	-	-
Malaysia	OTC	-	-	-	-	-	N.A	1.50	2.48	2.51	2.33
New Zealand	Exchange	N.A	N.A	N.A	0.12	0.15	-	-	-	-	-
New Zealand	OTC	-	-	-	-	-	10.81	8.53	8.28	6.48	6.07
Singapore	OTC	-	-	-	-	-	4.61	5.17	8.66	10.82	13.95
Thailand	OTC	0.18	0.29	0.27	0.27	0.49	0.43	1.21	1.20	1.51	1.58

### [Table 11] Turnover ratio

# 2. Trading Facilities

## (1) General

The survey shows that all jurisdictions have their secondary trading facilities available for corporate and government bonds either on exchanges or electronic trading platforms ('ETPs'')/alternative trading systems ("ATSs"), or both. Even though the trades occur on exchanges in most jurisdictions, the trading volumes are relatively small; the majority of trades are in OTC markets, except in Korea where the government makes it mandatory for primary dealers to trade benchmark bonds on the exchange.

Corporate bonds are listed on exchanges in most jurisdictions. Some jurisdictions arrange particular systems for trading of corporate bonds only such as Chinese Taipei, Indonesia and Thailand. Indonesia has a system so-called OTC-FIS (Over the counter – Fixed Income System) for corporate bond trading in the OTC market. The OTC-FIS system provides bid and offer quotations, transactions and trade reporting on a real-time basis. Chinese Taipei has automated trade matching system for corporate bonds. Thailand has the Bond Electronic Exchange ("BEX"), launched by the Stock Exchange of Thailand. BEX provides trading service only for retail investors through automatic matching system in the same manner as equity trading. Also Thailand has another ATS system namely Ideal System, originally developed by the Thai Bond Dealing Centre ("ThaiBDC") to provide trading facilities not only for corporate bonds but also for government bonds for all investors which later has been bought by the Stock Exchange of Thailand

The Philippine Stock Exchange ("PSE") achieves a one-price, one-market exchange through the Mak Trade System. This is a single-order-book system that tallies all orders into one computer and ensures that these orders match with the best bid/best offer regardless of which floor the orders were placed. Mak Trade allows PSE to facilitate the trading of securities in a broker-to-broker market through automatic order and trade routing confirmation. It can also detect any transaction irregularity in compliance with market regulations and surveillance database.

<sup>&</sup>lt;sup>10</sup> This is calculated by the following formula: annual trading volume / outstanding amount at the end of the year.

Government bonds, in addition to OTC trading, are traded on exchanges in some jurisdictions, *i.e.* China, Hong Kong, Japan, Korea, and New Zealand. Chinese Taipei, Indonesia, and Korea arrange particular systems for government bond trading. In Indonesia, IGSTS (Indonesian Government Securities Trading System) is a computerised trading system for government securities using remote technology. This system is designed for dealers who are member of the Inter Dealer Market Association of Government Securities to operate in their dealing rooms. It interacts with the information provider's systems to allow them to disclose real time trading data and it is also connected to OTC-FIS which enables non-members of the Association to monitor the trading of government securities actively through IGSTS.

Korea is an interesting case where the Korean Stock Exchange ("KSE") provides three trading markets for bonds depending on their types: (i) Ordinary Bonds market ('OBM") for corporate bonds, equity-related bonds and government and municipal bonds issued in small amounts; (ii) Government Bonds Market ('GBM") for wholesale trading of government bonds; and (iii) Repo market for government bond trading under repurchase agreements.

Chinese Taipei has the inter-dealer Electronic Bond Trading System ("EBTS") for government bonds, which is counted for 90% of bond market trading volume.

## (2) Listing Standards

## Listing Requirements for Corporate Bonds

Listing requirements for exchange-traded corporate bonds in most jurisdictions differ from one to another at least to some extent. Among those, Japan and the Philippines seem to have more stringent requirements than others. In case of Japan, standards of both the issuers and the issues are taken into consideration in many aspects such as listing status of the issuer, outstanding amount of the bonds, the number of bonds holders, time elapsed since issuance, and the number of issues allowed per issuer. The Philippines, meanwhile, appears to be the only one using the same listing standards for bonds and equities. The standards mention basic guidelines, track record requirements, numerical criteria and operating history, which are imposed differently for each trading board (First Board, Second Board, and SME Board). In Sri Lanka, eligible corporate bonds to be listed on the exchange's Main Board shall be guaranteed by banks authorised by the central bank, or shall be secured against collateral of real estate, or shall have an investment grade rating from a rating agency registered with the SEC, while corporate bond listed on the Second Board shall be issued by issuers with at least 3-year business experience.

In this regard, common listing requirements imposed by several jurisdictions are the outstanding amount of bonds, time to maturities, and the number of bondholders. In addition, many jurisdictions (China, Chinese Taipei, Hong Kong, Korea, New Zealand and Thailand) do not require the bond issuer to be a listed company. However, in case that the issuer is a non-listed company, Hong Kong requires minimum shareholders' funds and issue size. In Korea, an issuer for bond listing on the exchange is also required to have a minimum capital stock. In Thailand, corporate bonds may be listed on both BEX and ThaiBDC. Both listing requirements are quite relaxed and state that bonds must be granted public offering approval from the SEC prior to seeking listing status. ThaiBDC may no longer hold a trading centre license though. Indonesia is the only jurisdiction that imposes rating requirements for bonds seeking listing status.

### Listing Requirement for Government Bonds

Government bonds are listed on exchanges in several jurisdictions, *i.e.* China, Hong Kong, Indonesia, Japan, Korea, New Zealand and Thailand. Nonetheless, China allows only book-entry (scripless)

treasury bonds ('TBs'') to be listed and traded on its exchange. Meanwhile, only Malaysia and Singapore state clearly that they have government bonds traded in the OTC markets only. Among those with listed government bonds, their exchanges grant a waiver from compliance with listing rules, except only Japan. Listing of Japanese Government Bonds is based upon examination procedures similar to those for corporate bonds. Thailand may be a rare case where all government bonds are automatically listed on the ThaiBDC (which holds licence of a trading centre but does not operate as the one) for the purpose of market monitoring and surveillance while trading actually occurs elsewhere in the OTC market.

## (3) Disclosure of Trading Information

In general, the information on secondary market bond trading in all jurisdictions is fairly accessible to the public. However, the levels of accessibility to such information vary between those of market participants and public in general. The disclosure of information on secondary market bond trading is as follows. Firstly, for bonds traded in OTC in most jurisdictions, post-trade information (*e.g.* executed prices, trading volume, etc.) is generally more accessible than pre-trade information vendors' subscribers such as dealers or market makers. Secondly, unlike in case of corporate bond trading, the information of government bond trading is more accessible in most jurisdictions because of its higher liquidity and more facility providers. For example, the Central Bank of Malaysia uses its website to disclose trade information to the public. Lastly, the information of exchange-traded bonds is more transparent; it is disclosed to the public in the same manner as in case of equity trading.

Jurisdiction	Market	Corpo	rate bonds	Government bonds		
		Pre-trade	Post-trade	Pre-trade	Post-trade	
China	Exchange	No	Yes, announced	No	Yes, announced	
			real time via system		real time via	
			of the exchanges		system of the	
					exchanges	
	Interbank	Not available	Not available	No	Announced via	
	market				China Foreign	
					Exchange Trading	
					Center& National	
					Interbank	
					Funding Center	
					(CFETS)	
	OTC	Not available	Not available	No	Announced via	
					CGSDTC	
					information	
					release center	
Chinese		Most listed in	Both listed and	GreTai Securities M		
Taipei		GreTai and	non-listed, disclosed	quotation and tradin		
		announced	on " Market	through website and	information	
		through GreTai	Observation Post	vendors e.g. Reuters	s, Bloomberg	
		Securities Market	System "			
		website and				
		information				
		vendor				

#### [Table 12] Availability of pre- and post-trade information in bond trading

Jurisdiction	Market	Corpo	rate bonds	Governme	Government bonds		
		Pre-trade	Post-trade	Pre-trade	Post-trade		
Hong Kong	OTC	No, in general Yes, via informatio	Yes, but subject to the type of ATS. Information vendors also provide post-trade information on certain bonds	-Exchange Fund: Bills and Notes: Yes, but only indication prices by some market makers through Reuters and Bloomberg -Government bonds: Yes, published by information vendors e basis and the Exchar	Yes, through Reuters, Bloomberg Telerate, and HKMA's website		
	-	delayed basis			-		
Indonesia	OTC Exchange	Yes, via OTC-FIS system	Yes, available in newspaper	Yes, available from Bloomberg	Yes available in newspaper		
	Exchange						
Japan	OTC	Member of the brokers' broker may obtain, but not available in public	Yes, but limited to some statistical data, which are available via JSDA's website	Member of the brokers' broker may obtain, but not available in public	Yes, but limited to some statistical data, which are available via JSDA's website		
	Exchange		on vendors on a real tim	e basis and trading vol	ume is also		
Korea	OTC	announced daily Yes, available thro	ugh KSDA				
	Exchange	Yes, available for on the KTS	both one-way and two-w	way quotations, the lat	ter is shown to PD		
Malaysia	OTC	Yes, via BIDS, only available to those approved by the central bank	Yes, available to the public via the central bank's website and information providers	Yes, via BIDS, only available to those approved by the central bank	Yes, available to the public via the central bank's website and information providers		
	Exchange	Yes, available to the time basis through information provide	ne public on a real the exchange and				
New Zealand	OTC	Very little informa	tion is released	Available on electron RBNZ website	nic media and the		
	Exchange	Trades through the system are reporte screens					
The Philippines		Available through the exchange website at "www.pse.com.ph"		Yes, electronically a the Bloomberg page	t Yes, electronically through Moneyline Telerate		
Singapore	OTC	No	Yes, but only prices of liquid bonds which my be available via private trading platforms	Yes, both bid/offer p prices are available t information provider Bloomberg and Reut	hrough rs such as		
	Exchange	Yes, the exchange exchange traded be	may post prices of the onds				

Jurisdiction	Market	Corpo	rate bonds	Government bonds	
		Pre-trade	Post-trade	Pre-trade	Post-trade
Thailand	OTC	Generally, no	Yes, accessible to the subscribers of ATSs on issue-by-issue basis and to the public on a ThaiBDC's website and website for retails	Yes, prices of liquid bonds are accessible to subscribers of Reuters, Bloomberg and other ATSs	Yes, accessible to the subscribers of ATSs on issue-by-issue basis and to the public on a ThaiBDC's website and website for retails
	Exchange	Yes, available through the exchange's broad and ThaiBDC's website and website for retails			

## 3. Market Intermediaries

## (1) Special Requirement to Become a Broker/Dealer of Corporate Bonds

Similar to the requirements to become a bond underwriter, most jurisdictions do not have special requirements to become a broker/dealer of corporate bonds. In fact, it appears that, except for Thailand, all jurisdictions have a system of single licence which accommodates all brokerage/dealing and underwriting businesses. Though the two licences are separated in Thailand, the same sort of licensing requirements are in place.

In general, one that engages in securities business, either brokering or holding himself out as being ready to buy/sell all types of securities, needs to be licensed or authorised by securities regulators under securities laws. However, regulated institutions in some jurisdictions that are not under the supervision of securities regulators may seek an authorisation to act as a securities broker/dealer from their lead regulators, such as banks and financial institutions under the Banking Act in Hong Kong and Malaysia. Singapore exempted banks from securities licensing scheme.

In case of China, a broker/dealer of corporate bonds must be a member of stock exchange or inter-bank market. Securities firms and banks are relatively active in the inter-bank market while securities brokers usually dominate the exchange market.

Malaysia also requires brokers/dealers to be members of the systems operated by the central bank, namely the Fully Automated System for Issuing/Tendering ("FAST"), Bond Information and Dissemination System ('BIDS") and the Real Time Electronic Transfer of Funds and Securities ("RENTAS").

In New Zealand, a broker/dealer in bonds quoted on the New Zealand Exchange's Debt market ("NZDX") must be accredited by the exchange as an NZDX Advisor.

In the Philippines, only dealers who have an access to the Registry of Scripless Securities ("RoSS") may engage in the regular businesses in buying and selling Government Securities.

In Chinese Taipei, requirements are minimum capital of NTD 200 million, the trading floor and related systems that meet the SRO's standards, as well as the system linkage to securities central depository and the exchange.

Thailand allows banks to hold brokerage/dealing licences limited for bonds only while securities firms hold full licences to deal with all types of securities. Criteria for this type of limited licence

mainly focus on prudential requirements (their capital adequacy), capacity to provide service, effective accounting and auditing system, and fit and proper of the management.

There are certain circumstances in some jurisdictions whereby those acting as a broker/dealer of corporate bonds do not need to hold the licence, such as in Hong Kong where a firm conducts dealing activities with professional investors, or as a principal and bond dealers in Singapore that only deal with accredited investors.

## (2) Market Maker/Primary Dealer System

The system of primary dealers exists in several jurisdictions namely China, Chinese Taipei, Hong Kong, Japan, Korea, Malaysia, the Philippines, Singapore and Thailand, though some name it differently (*e.g.* Hong Kong: Recognised Dealers, Malaysia: Principal Dealers).

China has underwriters for book-entry TBs act as primary dealers while its market maker system is still in its infancy.

Japan launched the so-called JGB Market Special Participants Scheme, which is similar to the primary dealer system, on a step-by-step basis starting from October 2004.

Indonesia has not yet implemented the primary dealer system. However, Bank Indonesia and the Capital Market Supervisory Agency are in the process of adopting the primary dealer system.

New Zealand does not have market maker or primary dealer system for government bonds; those wishing to participate in government bond tenders must register with the Reserve Bank of New Zealand. Meanwhile, its exchange has introduced the market maker system for corporate bonds since May 2004, for which clear obligations are specified, but no market participants have been designated yet. These obligations are, for example, to maintain bids and offers in designated bonds, to adjust and reinstate the two-way quotations, to satisfy orders delivered to the market maker's posted quotes, etc.

Notably, Chinese Taipei has abolished non-competitive bidding as well as switched competitive bidding from multiple to single rate since July 2004.

The system of primary dealers has contributed to the development of bond market especially in helping to enhance market liquidity. However, each jurisdiction may benefit differently from the system since the rights and obligations of primary dealers in each jurisdiction are varied. Some have primary dealers obliged to act as market markers with the requirement of making two-way price quotations (bid-offer prices) while some do not, for instance. That makes such system more stringent in one place than another.

Jurisdiction	Rights	Obligations
China	-	-
Chinese Taipei	-Participate in the government bond auctions	-
Hong Kong	-In relation to the Exchange Fund Bills and Notes, recognised dealers are permitted to participate in the tenders	-Quote bid/offer prices during normal market -Promote Bills and Notes programme -Be active in the primary and secondary markets
Indonesia	Not available yet	Not available yet

#### [Table 13] Rights and obligations of primary dealers

Jurisdiction	Rights	Obligations
Japan	<ul> <li>-Participate in regular meetings</li> <li>-Participate in buy-back auctions</li> <li>-Apply for stripping and reconstruction of STRIPS</li> <li>-Participate in "Non-price Competitive Auction I &amp; II"</li> <li>-Participate in "Interest Rate swap Transactions"</li> <li>-Participate in "Liquidity Supply Auctions"</li> <li>-Have exclusively rights to purchase a</li> </ul>	-Carry out bidding/purchasing responsibilities -Maintain and enhance liquidity in the JGB market -Report to the Ministry the trends on JGB transactions -Facilitate a regular issuance of government
	portion of the newly issued government bonds for resale	bonds -Quote two-way prices under all market conditions -Retain government bonds of more than 100 billion won semi-annually -Trade most recently issued benchmark government bonds each with maturities of 3,5,10 years only on the exchange
Malaysia	-Participate exclusively in the government bond auctions	-Act as market markets in the OTC market by providing two-way quotes
New Zealand	N.A.	N.A.
The Philippines	-Participate in the primary auction and secondary trading of government securities	-Regular participation in the electronic auction of government securities at reasonable and current market bid rates -Position taking and market-making in government securities
Singapore	<ul> <li>-Exclusive dealing with MAS in money market and foreign exchange operations</li> <li>-Exclusive access to the MAS Repo Facility to borrow SGS issues to facilitate its market making</li> <li>-Exclusive right to submit applications for SGS auctions and reverse auctions</li> <li>-Higher non-competitive tender limit and overall allocation limit at SGS auctions</li> <li>-Tax exemption on trading income derived from SGS</li> <li>-Close consultation and dialogue with MAS on SGS auctions and market-related issues</li> </ul>	-Quote two-way prices under all market conditions -Underwrite issuance at SGS auctions -Provide market feedbacks to MAS -Assist in the development of the SGS market
Thailand	-Participate in the primary auctions of government bonds -Access first-had information related to the new issuance of government bonds before other market participants	<ul> <li>-Quote indicative prices of all benchmark issues for the construction of government bond yield curve</li> <li>-Quote two-way prices on certain benchmark issues</li> <li>-Provide market feedbacks to BOT</li> </ul>

## (3) Other Intermediaries Playing Significant Role in the Secondary Market

Several jurisdictions also have other intermediaries playing significant roles in the secondary market for bond trading.

Hong Kong has foreign exchange and money brokers playing an active role in the bills and notes market by providing broker services to inter-bank players.

Korea and Thailand also have inter-dealer brokers ("IDBs") to facilitate trades among dealers for both corporate and government bonds. IDBs in Korea operate based on a screen-based system; those in Thailand provide services through both telephone and electronic systems.

Singapore has the systems of Singapore Government Securities ("SGS") brokers and secondary dealers in addition to the primary dealer system. In fact, SGS brokers have similar functions to IDBs' in Korea and Thailand as they provide the same brokerage services in the inter-bank market, but SGS brokers' functions cover only outright and repo transactions for SGS securities. Singapore's secondary dealers consist of approved banks, merchant banks, and brokerage companies.

New Zealand has two brokers active in the government secondary market while the Philippines has Government Securities Eligible Dealers.

## (4) Investment Restrictions

In case of corporate bonds, pension monies in Singapore are restricted to buy corporate bonds with minimum rating requirements due to investor's protection. In Thailand, the same restrictions on repo and lending transactions of corporate bonds are imposed on non-residents. There are also some restrictions on transactions of corporate bonds by investors' category in Thailand. These restrictions exist mainly for the purpose of prudential regulations of institutional investors, set by their respective regulators other than the market restrictions. For example, mutual funds and provident funds may invest in certain corporate bonds with (i) designated ratings, (ii) guarantee by certain enterprises such as state enterprises and banks (iii) company limit of not exceeding either 15% or 20%, according to an issuer. Government pension funds have restrictions on company limit of not exceeding either 10%, or 20%, or the minimum rating requirement as BBB+ or above. Insurance companies may invest in any bonds without restrictions, if the bonds are guaranteed by the Ministry of Finance. If not, company limit of not exceeding either 15% or 20%, depending on issuers (either state enterprises or limited companies), shall be imposed. Also, financial institutions in Korea, such as mutual funds and investment trust companies, are restricted to buy corporate bonds whose ratings are BBB- or above as minimum rating requirements. There also exist restrictions on repo and SBL transactions, and investing securities issued by identical groups.

In other jurisdictions, there are no restrictions on purchase or trade of corporate bonds.

As for the government bonds are concerned, there are no restrictions on purchase or trade in any country except Japan and Thailand, where the central bank prohibits repo or lending of government bonds through securities firms or commercial banks for non-residents.

In Japan, certain government bonds have a limited restriction for investors; STRIPS (Separate Trading of Registered Interest and Principal of Securities; fixed coupon and principal may be separated and traded separately) is held only by juridical persons; Inflation-Indexed Bonds are held only by financial institutions in Japan and foreign governments and qualified foreign corporations, etc. JGBs for Individual Investors are held only by individual investors, and have no secondary market. Since one year after the issuance, it can be redeemed, provided a certain penalty is deducted.

# IV. MARKET INFRASTRUCTURES

# 1. Settlement System/Depository Structure

## (1) Government Bonds

The settlement system depends on the places where the bonds are traded; exchanges or OTC markets. For government bond trading in the OTC market, the settlement is usually done on RTGS-DVP basis with electronic fund transfer using central bank infrastructure. In most jurisdictions, the transfer is done through book-entry system (scripless) except in Thailand where participants may choose to transfer ownership through physical delivery of certificates. The settlement period usually varies between T+0 in Malaysia to T+3 in Japan.

In certain jurisdictions, *i.e.* Hong Kong, Japan and Korea, government bonds are also traded on exchanges. The settlement system is multilateral netting where a clearinghouse acts as a central counterparty.

A central bank usually acts as a registrar and central securities depositary for government bonds. The exception is in Korea, where Korea Securities Depository ("KSD") is the single depository for all securities including government bonds. The depository system is usually a computerised book-entry system except in Thailand, where there is still a physical certificate available.

Eligible participants to settlement system for trading in the OTC market usually are financial institutions authorised by the central banks except in Korea, where participants are approved by KSD and in Indonesia where participants are approved by inter-dealer market association. For bond trading on exchange, eligible participants to the settlement system also include securities firms and other institutions approved by the exchanges. In New Zealand, all Delivery and Settlement Participants must be connected to FASTER. In Korea, Primary Dealers and Preliminary Primary Dealers are required to trade benchmark government bonds on the exchange, contributing to higher trading volume.

Jurisdiction	Settlement	Clearing and settlement system	Depository structure
	period	(C&S)	
China	T+1 for trades	China Government Securities	CGSDTC acts as registrar and
	in interbank	Depository Trust (CGSDTC) and	custodian of TBs and of interbank
	market and on	China Securities Depository &	TBs while CSDC is responsible for
	exchange, and	Clearing Co. Ltd. (CSDC) are	custody of exchange-traded TBs
	T+N for tiny	involved in C&S of TBs	
	proportion		
Chinese Taipei	T+2	EBTS Trading:	95% of bonds are registered in
		Settle through GreTai Securities	Central Bank while another 5% are
		Market	still in physical form and could be
			kept in every bank
	T+2	OTC Trading:	Clearing banks handles book-entry
		Clearance through central register	and payment matters
		system of Central Bank	

#### [Table 14] Clearing and settlement system and depository structure for government bonds

Jurisdiction	Settlement period	Clearing and settlement system (C&S)	Depository structure
Hong Kong	T+0 for morning trades T+1 for afternoon	OTC: C&S are effected through a computerised book entry -system operated by the CMU of the HKMA	Bills and Notes are issued and registered in a computerised book-entry form
	T+2	or other depositories <u>Exchange</u> : C&S through HKSCC, which has an account with CMU to facilitate settlement	With regard to government bonds, the USD institutional notes are deposited in global form with the book-entry facilities of DTC and the HKD institutional notes and retail bonds are deposited in global form with a sub-custodian of CMU
Indonesia	N.A.	C&S is done by book-entry on a DVD basis (gross to gross and gross to net) (BI-SKRIP)	Registration is in scripless form by means of book-entry with availability of central registry and sub-registry through (BI-SSSS)
Japan	T+3	Both listed and non-listed JGBs are settled under the JGB book-entry transfer system of the BOJ (BOJ-NET)	BOJ is the transfer agent which operates the JGB book-entry transfer system
Korea	T+0 T+1	Ordinary bond markets (government bonds issued in small amounts): Settlement of bonds is done though book-entry transfer system at KSD while the settlement of fund is done through electronic fund transfer of commercial banks; the method used is multilateral netting Government bond markets (benchmark): Settlement of bonds is done though book-entry transfer system at KSD while the settlement of fund is done through electronic fund transfer of	Most of government bonds are registered at the BOK
Malaysia	T+1 to T+30 T+0	the central bank; the method used is multilateral netting OTC bonds: Settlement of bonds goes to KSD while settlement of funds goes to the Central Bank; the method used is gross-to-gross RTGS system Government bonds are scripless and	The central bank acts as the central
Malaysia	1+0	deposited under RENTAS, which operates DVP system on a trade-by-trade basis	depository
New Zealand	T+2	Appears to be DVP-RTGS where each member has a security account with NZCSD and cash account provided by a registered New Zealand Bank. Settlement information is checked if each party has sufficient cash/credit or bonds to be settled and it is irrevocable once settled	NZCSD, fully owned by the Reserve Bank of New Zealand, is the legal owner of securities held on behalf of beneficial owners (the inventory of securities now stands around NZD 80 billion)
Pakistan	-	-	-
The Philippines	T+0	Generally DVP-RTGS is applied, however, pending full electronic interface by GSED to RoSS and to the settlement bank, RoSS shall net all trades of all dealers for final settlement by the settlement bank,	None. Only a registry of Scripless Securities

Jurisdiction	Settlement period	Clearing and settlement system (C&S)	Depository structure
		provided that settlement shall be on the same day	
Singapore	T+1	DVP-RTGS system through MEPS, designed for high value funds transfers and settlement of scripless SGS (book-entry clearing system)	Primary and secondary dealers can hold SGS bonds in custody for investors without a MEPS accounts
Thailand	T+2	Bonds are settled mainly through BOT's BAHTNET system on DVP-RTGS basis; physical settlement may be chosen	BOT acts as the sole registrar with a system of single-tier structure; the system supports the book-entry system

## (2) Corporate Bonds

The settlement system depends on the places where the bonds are trading; on exchanges or in the OTC market. Generally, the infrastructure is the same as that of the government bonds except that the registrar or depository may not be the central bank.

For the OTC market, corporate bonds are settled through book-entry system on a DVP basis with a central securities depository ("CSD") except in Thailand in Japan. In Thailand, corporate bonds are not totally scripless and there is no central depository for corporate bonds. In Japan, the book-entry system for corporate bonds with a CSD will start in January 2006, but bearer bonds and registered bonds, whose the holders' name is transferred on a book at a registration agent remain in the markets for a while after the book-entry system starts. In Hong Kong, participants use not only a domestic CSD but also international central depositories ("ICSD"), such as Euroclear and Clearstream.

For corporate bond trading on the exchange, the settlement system is multilateral netting where the exchange's clearing house acts as a central counterparty. The settlement periods vary from T+0 to T+3.

Eligible participants to the settlement system for trading in the OTC market are usually financial institutions authorised by the central banks except in Korea where participants are approved by KSD and in Indonesia where participants are approved by Central Securities Depository Institution. For bond trading on exchanges, eligible participants also include securities firms and other institutions approved by the exchanges.

Jurisdiction	Settlement period	Clearing and settlement system (C&S)	Depository structure
China	N.A.	C&S of bonds traded in the interbank and exchange markets are effected through bookentry transfer from the bearers' accounts at China Government Securities Depository Trust (CGSDTC) to their accounts at China Securities Depository & Clearing Co. Ltd. (CSDC) bonds	CGSDTC and CSDC support bookentry transfer of corporate bonds
Chinese Taipei	T+2	Trades occurs on trading system are settled through TSCD. Whilst trades occurs in OTC are settled as counterparties agree	TSCD acts as depository and support book-entry transfer
Hong Kong	Negotiated between parties	OTC: C&S are effected through a computerised book entry-system operated by the CMU of the HKMA or ICSD	Corporate bonds are issued in form of Global Note and transfers of interests are effected through book

### [Table 15] Clearing and settlement system and depository structure for corporate bonds

Jurisdiction	Settlement period	Clearing and settlement system (C&S)	Depository structure
	T+2	Exchange: C&S through HKSCC, which has an account with CMU to facilitate settlement	entry systems operated by the CMU and/or ICSD
Indonesia	Up to the counterparties	All bonds are scripless; C&S of OTC trades is conducted by book-entry between accounts at PT KSEI	PT KSEI conducts depository function through book-entry system
Japan	T+3	The settlement occurs at each registration agent through the linkage between JB NET and BOJ Net, which enables DVP settlement The reform of relevant laws in 2003 enables bonds to be settled on book-entry system	JSDC, a transfer agent of the book-entry transfer system will start paperless settlement of bonds from January 2006
Korea	T+0 T+1 to T+30	Listed bonds:         Settlement of bonds is done though         book-entry transfer system at KSD while         the settlement of fund is done through         electronic fund transfer of commercial         banks; the method used is multilateral         netting         OTC bonds:         Settlement of bonds goes to the book-entry         system at KSD while settlement of funds         goes to the Central Bank; the method used         is RTGS system	Registration occurs at KSD
Malaysia	T+0	Unlisted bonds: Scripless and deposited under RENTAS, which operates DVP system on a trade by trade basis	<u>Unlisted bonds</u> : The central bank act as the central depository using RENTAS
	T+3	Listed bonds: Settlement occurs through the electronic central clearing house	Listed bonds: The exchange's clearing house
New Zealand	T+3	<b>Exchange:</b> Bonds traded on NZDX can be settled through FASTER settlement system or Austraclear (see settlement of government bonds above)	NZCSD, fully owned by the Reserve Bank of New Zealand, is the legal owner of securities held on behalf of beneficial owners
	Within T+15	For OTC trades not settled through FASTER	
Pakistan	T+3	At the exchanges through National Clearing and Settlement System (NCSS) maintained by National Clearing Company of Pakistan Limited (NCCPL)	Central Depository Company of Pakistan Limited
The Philippines	T+0	There shall be no physical transfer of bond certificates. SDT Bonds are transferred electronically by the BTr's Registry of Scripless Securities (RoSS) while cash settlement are done through two Philippine Stock Exchange's settlement banks (Equitable-PCI Bank and Rizal Commercial Banking Corporation)	Done through book-entry system by the Philippines Depository and Trust Corporation (PDTC)
Singapore	T+3	Corporate bonds can be settled through the local central depository through the linkage between DCSS (Securities) and MEPS (funds)	CDP, a subsidiary of Singapore Exchange, is a central depository.
Sri Lanka	T+1	Settlement takes place at the settlement bank appointed by the Central Depository System (CDS)	Deposited in the Central Depository System (CDS)

Jurisdiction	Settlement period	Clearing and settlement system (C&S)	Depository structure
Thailand	T+3 T+2	Exchange: Settlement is done through the same system as equity, <i>i.e.</i> multilateral netting system in which steps in as a central counterparty OTC: There is no centre for C&S and registration of bonds, but counterparties may use TSD's facility to make securities transfer electronically	The system of multi-tier structure and multiple registrars exists. Bond transfer can occur either via book-entry system at TSD or physical certificates

# 2. Hedging Facilities

Hedging instruments in the OTC market are widely available in most jurisdictions except Indonesia and the Philippines. In addition, most jurisdictions also have futures exchanges except for China, Indonesia, the Philippines and Thailand. Thailand, nonetheless, plans to establish its futures exchange for financial derivatives in 2005. Thus, investors may also hedge their risks with the exchange-traded derivatives.

There are also floating interest benchmarks present in various jurisdictions, but the rates used as benchmarks vary widely among jurisdictions. The benchmarks are six-month Thai Baht implied swap rate or local bank's minimum lending rate or deposit rate for Thailand, 90-day bank bill rate for New Zealand, certificate of deposit rate for Korea, and inter-bank lending rate for Hong Kong (HIBOR); Japan (TIBOR or yen LIBOR); Malaysia (KLIBOR); Pakistan (KIBOR); and Singapore (SIBOR). In Thailand, different groups of market players use different short-term benchmarks, *e.g.* foreign branch banks prefer the implied swap rate (BIBOR) was introduced in January 2005. There is no floating interest rate benchmark in China, Indonesia, and the Philippines. In Chinese Taipei, floating interest rate is not available either, but 90-day CP rate is used as the currency market benchmark.

Jurisdiction	Corporate bonds	Government bonds	
China	Hedging facilities are far from adequate	Only outright repo and pledged repo,	
		introduced early 2004, are available now	
Chinese Taipei	-Convertible bond asset swap	-Futures (30-day and 10-year)	
	-Bond option	-Bond option	
	-Forward	-Interest rate swap/option	
		-Forward	
Hong Kong	-A wide range of hedging instruments is available, <i>i.e.</i> forward rate agreement, interest rate swap, interest rate futures, and Exchange Fund Notes futures -SBL and repo are permitted but not active		
Indonesia	N.A.	N.A.	
Japan	-Futures and options on corporate bonds are not available on exchanges. -SBL and repo are permitted	<ul> <li>There are JGB futures, options on JGB futures and yen-swap futures traded on exchanges</li> <li>In OTC market, JGB options and interest rate options as well as interest rate swaps are available</li> <li>SBL and repo are permitted</li> </ul>	
Korea	-Government bond and CD interest rate futures are available -SBL is available but not very active		

## [Table 16] Hedging enhancement facilities

Jurisdiction	Corporate bonds Government bonds		
	-Repo market was opened in 2002 by KSE, however, repo transactions occur mainly in OTC		
Malaysia	<ul> <li>No specific corporate bonds derivative instruments are available for hedging purposes</li> <li>Only few issued of unlisted corporate bonds are available for SBL transactions</li> <li>The repo for corporate bond is significantly more active than SBL</li> </ul>	-Short-term hedging, the three month KLIBOR futures is offered by the Malaysian Securities Exchange -Long-term hedging, Malaysian government securities futures are also offered by the exchange -Government bonds deposited under RENTAS are available for both SBL and repo market activities	
New Zealand	N.A.	Swap is primarily used for hedging; also the repo market is very active. This makes bond futures market almost non-existent	
Pakistan	Regulations for SBL was recently approved by SEC	-	
The Philippines	-Commercial papers can be treated just like government securities for hedging purposes -They can be the underlying assets for a financial transaction	-GS can be used as underlying assets for derivative transactions and other financial structures under such arrangements -Hedging mechanism can be availed from the market mostly from foreign banks -The usual hedge facility available is the currency hedge facility and size varies but tenor is limited to short-term, <i>i.e.</i> 1-2 years since long term hedge are very costly	
Singapore	<ul> <li>-Investors may hedge through repo, interest rate swap, interest rate futures, and bond futures markets</li> <li>-There are no formal SBL facilities established, but some banks lend Singaporean dollar denominated securities</li> </ul>	-Investors may hedge through repo, interest rate swap, interest rate futures, and bond futures markets -Primary dealers have exclusive access to MAS repo facility to help PDs do market making activities	
Sri Lanka	-SBL available though a number of trades is limited since its inception	-	
Thailand	<ul> <li>In OTC market, interest rate swaps up to 5 years are liquid in which the Thai Baht implied swap rate is the most tradable benchmark</li> <li>Bond forwards and bond options are permissible for commercial banks.</li> <li>Futures exchange is expected to be introduced in 2005</li> <li>SBL and repo are also permissible</li> </ul>		

# 3. Liquidity Facilities

Liquidity facilities such as securities borrowing and lending ("SBL") and repo are available in all jurisdictions except in Indonesia where the authority is about to launch a repo facility for government bonds. Only in Thailand, a licence to operate a securities borrowing and lending business is required. Central facilities for SBL and repo are present in some jurisdictions, *e.g.* Chinese Taipei, and the Philippines. Thailand Securities Depository Company Ltd. ("TSD") is going to provide central facility for SBL and repo.

Generally, commercial banks, securities companies and primary dealers are eligible to utilise liquidity facilities. Certain jurisdictions such as Malaysia and Thailand do have restrictions on securities borrowing and lending transactions with non-residents.

## [Table 17] Liquidity facilities

Jurisdiction	Corporate bonds	Government bonds	
China	N.A.	-Only outright repo and pledged repo are available now.	
Chinese Taipei	-Repo market -Both SBL and repo are available. Repo trades count		
chinese Tuiper		45% of total bond trading volume. SBL system and SBL	
		Centre are implemented in Jan. 2004.	
Hong Kong	-There is no restriction for market	-There is no restriction for market participants to utilize	
0 0	participants to utilize liquidity	liquidity facilities.	
	facilities.		
Indonesia	N.A.	-At present, liquidity facilities are not available for	
		government bonds. In the near future, the central bank	
		and Bapepam are going to provide repo facility for	
		government bond market.	
Japan	-Bond lending transactions are limited	to juridical persons.	
Korea		et management companies, national institutional investors	
		owed to participate in SBL market without any special	
	requirements, but a foreign institution		
		e government bond dealers (bond specialised dealers are	
	excluded).		
	-For OTC market: trade is conducted directly between participants or a third party.		
Malaysia	-SBL: only principal dealers are authorised to participate as both lender and borrower in an SBL		
	transaction while all approved dealers and non-licensed institutions may participate only as lender. Moreover, the securities that may be borrowed must be specified by the central bank.		
	-Repo: principal dealers and licensed financial institutions are eligible participants.		
New Zealand	-Kepo. principal dealers and needsed	-Well-developed repo market, which has larger turnover	
	than the physical market.		
Pakistan	Regulations for SBL was recently	-	
i ukistuli	approved by SEC.		
The	N.A.	-No repo markets.	
Philippines		-BSP has put in place an intra-day liquidity facility,	
ff ···		which is collateralized by government securities and	
		available for all banks and non-banks having	
		quasi-banking licence.	
Singapore	-No formal securities borrowing and	-Only primary dealers are allowed to utilise the MAS	
	lending facilities established for	repo facilities.	
	corporate bonds		
Thailand	-SBL: SEC requires one operating SBL business as an intermediary to have a SBL license. For		
	mutual funds, they can engage in SBL only for lending side and the exposure is limited to no		
	more than 25% of its NAV. Private fund and provident fund are also allowed to do so on		
	lending side, too.		
	-Repo: banks, securities/insurance companies and government pension fund can engage in repo		
	transactions. But commercial banks and securities firms may not de repo with non-residents.		

# V. OTHERS

## 1. Tax Treatments

Tax treatments on bond investment are varied from jurisdiction to jurisdiction. It is, however, observed that most jurisdictions do not impose stamp duty, except for China, Pakistan and the Philippines; capital gain is imposed in a few jurisdictions; and withholding tax on coupon interests is imposed by half of the respondents. There are also few different tax treatments between corporate bonds and government bonds.

Here is a summary table of relevant tax rates in each jurisdiction.

Juris	sdiction	Coupon interest	Capital gain	Stamp duty
China		20%*	No	Yes
Chinese Tai	pei	See below	No	No
Hong Kong		No	No	No
Indonesia		20%	No	No
Japan		20%	No	No
Korea		15%	No	No
Malaysia		28%	No	No
Pakistan		10%	10%	Yes
The Philippi	ines	20%	See below	Yes
Singapore		10%**	No	No
Thailand	Retail	15%	15%	No
	Institutional	1%	No	No

#### [Table 18] Tax treatments

(Note) Tax treatment for non-residents is not mentioned in this summary because it varies, due to a bilateral tax treaty each jurisdiction has with its counterpart.

\* This is applied to corporate bonds. No interest tax is levied on Treasury Bonds. \*\*Concessionary tax rate for Qualified Debt Securities. See detail below.

Here are notes to each jurisdiction:

**Chinese Taipei:** Individuals have NTD270,000 tax exemption. 20% withholding tax is applied to institutional investors and 25% to foreign investors.

Hong Kong: Profits tax may need to be paid if applicable.

**Indonesia**: 20% tax rate has been applied to both interest bearing and discount bonds traded on or reported to the Exchange under the new regulation on income tax since  $f^{t}$  May 2002, due to encouragement of reporting to the Exchange in order to enhance transparency.

**Japan**: Withholding tax on coupon is 20%, which consists of 15% income tax (national tax) and 5% local tax. Securities transaction tax, which was imposed on sale of securities, was abolished in 1999. 18% tax rate is applied to the redemption profit for discount-issued bonds.

**New Zealand**: Coupon on corporate bonds is considered income and subject to income tax. Government bonds are subject to non-residential withholding tax ("NRWT") for local investors. Off-shore investors are exempt from NRWT.

**Pakistan**: 0.01% capital value tax on purchase of bonds and 0.005% withholding tax on sale of bonds are imposed.

**The Philippines**: Trading gain for the government bonds is subject to 5% Gross Receipt Tax. Gross income arising from the sales of the corporate bonds in the Philippines, which are made by Philippine-registered securities dealers, is subject to 10% value-added tax.

**Singapore**: Interest income that residential institutional investors earned from investment in debt securities qualified as 'Qualified Debt Securities ("QDS")' would be taxed at a concessionary tax rate of 10%. Interest income from QDS, earned by non-residential institutional investors, is exempt from withholding tax. If the debt securities fail to be qualified as a QDS, the corporate tax rate of 20% is applied to the interest income.

Thailand: Financial institutions are subject to 3.3% SBT on coupon interest, discount and capital gain.

## 2. Ratings

Every jurisdiction has credit rating agencies domiciled, either a local one, or an international one, or both. In some jurisdictions *i.e.* Korea, Malaysia, Sri Lanka and Thailand, rating agencies aforementioned shall be authorised by the securities regulators.

Here is the list of rating agencies in each jurisdiction.

Jurisdiction	Rating agencies	
China	China Chengxin International Credit Rating	
	Shanghai Fareast Credit Rating	
Chinese Taipei	Taiwan Rating	
	Fitch (Taiwan)	
	S&P (Taiwan)	
	Moody's	
	Fitch Inc.	
	S&P Corp.	
Hong Kong	Moody's	
	Standard & Poor's	
	Fitch Ratings	
Indonesia	PT. PEFINDO	
	PT. KASNIC	
Japan	Rating and Investment Information (R&I)	
	Japan Credit Rating Agency (JCR)	
	Moody's Japan	
	Standard & Poor's	
	Fitch Ratings Japan	
Korea	Korea Ratings Corporation (KR)	
	Korea Investors Service (KIS)	
	National Information & Credit Evaluation Inc (NICE)	
	Seoul Credit Rating & Information Inc (SCI)*	
Malaysia	Rating Agency Malaysia (RAM)	
	Malaysia Rating Corporation (MRAC)	

### [Table 19] Rating agencies and number of rated issuers

Jurisdiction	Rating agencies
New Zealand	S&P
Pakistan	Pakistan Credit Rating Agency (PACRA)
	JCR-VIS
The Philippines	Philrating, Inc
Singapore	Moody's
	Standard & Poor's
	Fitch Ratings
Sri Lanka	Fitch Ratings Lanka Limited
Thailand	TRIS Rating Co. Ltd.
	Fitch Rating (Thailand) Ltd.

\*SCI can do rating business only on CP and ABS.

China, Chinese Taipei, Korea, Malaysia, Pakistan and Thailand require ratings on corporate bond offering and such rating shall be disclosed to the public through registration statements or prospectus, except a very small bond issue (? 100 million baht) to be sold to limited investors (? 10 investors) in Thailand. In Sri Lanka, the investment grade rating is one of the criteria for Main Board listing of the exchange. Hong Kong does not require ratings. In Singapore, similar to in Hong Kong, ratings and their disclosure are not required unless issuers wish to tap funds in the retail market. In Japan, issuers who request their bonds to be rated (limited to the ratings obtained from the designated rating agencies by the FSA) are required to disclose their ratings obtained in the written registration statements for all such requested issues.

There is little information about the number of rated issuers in each jurisdiction except for Indonesia, Japan and Korea. The number of issuers rated by such rating agencies is as follows: Indonesia: PT PEFINDO (200 issuers), Japan: R&I (623), JCR (618), Moody's (298), S&P (334) and Fitch (58), and Korea: KR (250), KIS (219), NICE (230) and SCI (86).

# 3. Accounting and Auditing Standards

## (1) Accounting Standards Applied to Bond Issuers

Although all jurisdictions have their own accounting standards applied to corporate bond issuers, there is flexibility in several judicious where accounting standards in other jurisdictions or internationally recognised accounting standards, such as US GAAP or IAS/IFRS, are also acceptable, some of which treat international accounting standards as equally acceptable as their own standards while some require additional information or prior approval. Examples of the former cases are Chinese Taipei, Indonesia, Singapore and the Philippines, whilst of the latter are Japan and Korea. Additionally, Singapore is open to other standards than US GAAP and IAS/IFRS, but approval is required on a case-by-case basis. Japan recognises financial statements of foreign companies, which are disclosed in their home/third-jurisdiction based on their home/third-jurisdiction's standards, if the FSA approves it as not lacking in pubic interests or investor's protection. Korea also recognises US GAAP and IAS/IFRS whereby foreign issuers may be waived from submitting additional documents when applying for the issuance of Won currency denominated bonds, if any of those standards is applied and audited pursuant to the securities statutes of the home jurisdiction.

The accounting standards in most jurisdictions are set by professional bodies, of which Hong Kong, Malaysia, Pakistan and Thailand indicate the adoption from the international accounting standards. China and the Philippines appear to present a different approach whereby the standard setting and supervisory bodies are authorities. For the standards set by professional bodies, nonetheless, some securities regulators preserve their rights to interfere when deemed necessary. Indonesian Capital Market Supervisory Agency may set the rules with respect to capital market. The Financial Supervisory Commission ("FSC") of Korea may request Korea Accounting Institute ("KAI") to amend the standards upon the deliberation of the Securities and Futures Commission of the FSC. As a result, KAI shall comply with the request of the FSC unless there is a justifiable reason.

Jurisdiction	Accounting standard to be applied to bond issuers	Organisations that set the accounting standards
China	-Chinese Corporate Accounting Standards and accounting standards for relevant industries	-MoF sets the standards, and both MoF and CSRC are supervisors
Chinese Taipei	-US GAAP is accepted	-Set by Accounting Research and Development Foundation, and supervised by Securities and Futures Bureau
Hong Kong	-In case of unlisted bonds, Hong Kong Financial Reporting Standards (HKFRS) -In case of listed bonds: Either HKFRS or International Financial Reporting Standards (IFRS) with additional requirements	-Hong Kong Institute of Certified Public Accountants (HKICPA), which adopts the standards towards IFRS issued by the International Accounting Standards Board
Indonesia	-Indonesia Accounting Standard, US GAAP and IFRS are also acceptable	-Indonesia Institute of Accountant Bapepam may set accounting rules on the capital market area
Japan	-Japanese GAAP -Financial statements of foreign issuers, which are disclosed in their home/third jurisdiction based on their home/ third- jurisdiction's standards, if approved by the FSA as not lacking in public interests or investor's protection	-Accounting Standards Board of Japan (ASBJ)
Korea	-Korea GAAP -Unless otherwise IFRS or US GAAP is applied, additional documents are required in case of foreign issuers	-The Korea Accounting Institute (KAI), but FSC may request amendments if deemed necessary
Malaysia	-Malaysia Accounting Standard Board, which is based on and consistent with IFRS	-Malaysia Accounting Standard Board (MASB), which is overseen by the Financial Reporting Foundation (FRF)
New Zealand	-New Zealand GAAP	-Accounting Standards Review Board
Pakistan	-IAS as per Companies Ordinance 1984, except those which are not deemed relevant for Pakistani economy	-Institute of Charted Accountants of Pakistan (ICAP)
The Philippines	-International Accounting Standards (corporate bonds) and New Government Accounting System which moving towards IAS (government bonds)	-SEC (corporate bonds) and Commission on Audit (COA)
Singapore	-Singapore's Financial Reporting Standards, IFRS or US GAAP Others may be approved on a case-by-case basis	-Council on Corporate Disclosure and Governance, under the supervision of the Accounting and Corporate Regulatory Authority
Sri Lanka	-Sri Lanka Accounting Standards	-Sri Lanka Institute of Chartered Accountants, which is supervised by the Sri Lanka Accounting & Auditing Standards Monitoring Board (SLAASMB)
Thailand	-Thai Accounting Standards (TAS), which based on IFRS	-Institution of Certified Accountants and Auditors of Thailand (ICAAT), under the approval of the Board of Accounting, which is under the Ministry of Commerce

#### [Table 20] Accounting standards and setting bodies

## (2) Auditing Standards

Similar to accounting standards, most auditing standards are set up by professional bodies while auditors are subject to oversight by self-regulatory bodies (except in the Philippines and Chinese Taipei where only regulator does oversight function), as well as securities regulators in case of China, Indonesia, Japan and Thailand. China is the only jurisdiction where auditors are jointly overseen by three agencies *i.e.* MoF, CSRC, and CICPA. In Hong Kong, the qualified accountants conduct the auditing in accordance with the Statements of Auditing Standards ("SASs") under the Professional Accountants Ordinance. Also Hong Kong is in the process of setting up and Independence Investigation Board ("IIB") to investigate complaints of alleged accounting and auditing. Indonesia uses Public Accountant Professional Standards as its auditing standards; Indonesian Capital Market Supervisory Agency together with Directorate General of Financial Institution oversight auditors. Japan requires that the auditing should be conducted based on the standards set by the Business Accounting Council and the guidelines prepared by the Japan Institute of Certified Public Accountants ("IICPA"); the Certified Public Accountants and Auditing Oversight Board ("CPAAOB") and the FSA are responsible for oversight of auditors. Thailand also requires auditors of public issuers to register with the Securities and Exchange Commission.

Many auditing standards, such as those in Hong Kong, Japan, Korea and Thailand, are set consistently with international auditing standards. Hong Kong's SASs is closely modelled on International Standards of Auditing ("ISA"). Korea's and Thailand's standards, meanwhile, follow the standards of the International Federation of Accountants ('IFAC"). The Korean Institute of Certified Public Accountants establishes Korea Auditing Standards with an approval of the FSC.

The Philippines and Singapore are more open to accepting international auditing standards, *i.e.* IAS (the Philippines), and US GAAP and ISA (Singapore), directly. The Accounting and Corporate Regulatory Authority is responsible for oversight on auditors and the accounting standards in Singapore, whilst the SEC and Commission on Audit do so in the Philippines.

Jurisdiction	Auditing standards	Organisations that set the auditing standards	Organisations that oversight auditors
China	Independent Auditing Standards	Chinese Institute of Certified Public Accounts	MoF, CSRC, and CICPA jointly oversee auditors
Chinese Taipei	Follows "Statements of Financial Accounting Standards"	Accounting Research and Development Foundation	Securities and Futures Bureau
Hong Kong	Statements of Auditing Standards (SASs)	Hong Kong Institute of Certified Public Accountants (HKICPA)	HKICPA is a self-regulatory organisation
Indonesia	Public Accountants Professional Standard (SRAP)	Indonesian Accounting Standard (IAI) and Bapepam	Bapepam and Directorate General of Financial Institution (DJFI)
Japan	Auditing standard set by the Business Accounting Council	Business Accounting Council	Certified Public Accountants and Auditing Oversight Board (CPAAOB) and FSA
Korea	Korean Auditing Standards	Korean Institute of Certified Public Accountants (KICPA)	Financial Supervisory Commission
Malaysia	Malaysian Approved Standards on Auditing (MASA)	Malaysian Institute of Accountants (MIIA)	Malaysian Institute of Accountants (MIIA)
New Zealand	New Zealand Auditing Standards	Institute of Chartered Accountants of New Zealand (ICANZ)	ICANZ

[Table 21]	Auditing standards,	setting bodies and	oversight bodies
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Jurisdiction	Auditing standards	Organisations that set the	Organisations that
		auditing standards	oversight auditors
Pakistan	Relevant provisions of	IAS set by International	Institute of Charted
	Companies Ordinance 1984	Auditing and Assurance	Accountants of Pakistan
	and International Standards	Standards Board	(ICAP)
	of Auditing		
The Philippines	International Accounting	SEC (corporate bonds), and	SEC (corporate bonds), and
	Standards (corporate bonds),	COA (government bonds)	COA (government bonds)
	and New Government		
	System (government bonds)		
Singapore	Singapore, US GAS or	Institute of Certified Public	Accounting and Corporate
	International Standards of	Accountants of Singapore	Regulatory Authority
	Auditing		
Sri Lanka	Sri Lanka Auditing	Institute of Chartered	Sri Lanka Accounting &
	Standards	Accountants of Sri Lanka	Auditing Standards
			Monitoring Board
			(SLAASMB)
Thailand	Thai Auditing Standard	Institute of Certified	Board of Auditing
		Accountant and Auditors of	
		Thailand	

# 4. Regulations and Oversight

## (1) Regulatory and Oversight Bodies

Regulatory bodies responsible for market supervision and oversight of government and corporate bond markets vary from one jurisdiction to another. Classifications of their supervision can be seen from the dimensions of either 1) government bond vs. corporate bond markets, 2) primary vs. secondary markets, or 3) over-the-counter vs. exchange-traded markets. However, most jurisdictions use a combination of some of those mentioned (see Table 22 Regulators of bond markets).

Some jurisdictions have the same regulatory bodies responsible for market supervision, based on the functional work, irrespective of market segments-government or corporate bond market. For instance, Japan has the Financial Services Agency responsible for planning, supervision and inspection, and the Securities and Exchange Surveillance Commission responsible for inspection and market surveillance. Korea has the Ministry of Finance responsible for legislation and revision of bond market regulations, and the Financial Supervisory Commission/the Financial Supervisory Service responsible for revision of subordinate regulations including KSE's regulations.

Whilst a model of China somewhat combines the functional work and market segment, *i.e.* there is NDRC responsible for corporate bond issuance approval, MoF responsible for drafting policies and regulations on Tbills, PBoC responsible for setting corporate bond interests and interbank market regulations, and CSRC responsible for the trading of all exchange-traded bonds, both corporate and government bonds.

Jurisdiction	Corporate bonds		Governm	ent bonds
	Primary market Secondary market		Primary market	Secondary market
China	National Development and Reform		MoF, PboC, and CSR	2
	Commission (NDRC), China Securities			
	Regulatory Commission (CSRC), and			
	People's Bank of China (PboC) joint regulate			
	the corporate bond m	arket.		

### [Table 22] Regulators of bond markets

Jurisdiction	Corpor	rate bonds	Governm	nent bonds
	Primary market	Secondary market	Primary market	Secondary market
Chinese Taipei	Securities and Future Market	es Bureau under Financial	Supervisory Committee	and GreTai Securities
Hong Kong	Unlisted bonds: Securities and Futures Commission Listed bonds: The Stock Exchange of Hong Kong Limited	Exchange traded transactions: Securities and Futures Commission and Stock Exchange of Hong Kong OTC transactions are not regulated	Hong Kong Monetary Authority	OTC transactions: Hong Kong Monetary Authority Exchange traded transactions: Securities and Futures Commission and Stock Exchange of Hong Kong
Indonesia	Bapepam		Bank Indonesia	Bapepam
Japan	Financial Services Agency and Securities and Exchange Surveillance Commission			Commission
Korea	Ministry of Finance and Economy, Financial Sup Supervisory Service		upervisory Commission	and Financial
Malaysia	Supervisory service           Securities         Securities           Commission         Commission and Bank Negara Malaysia		Bank Negara Malaysi	a
New Zealand	Securities Commission and NZX, the latter regulates issuers that have bonds quoted on the NADX		Securities Commissio	n
Pakistan	Stock exchanges as t and SEC as the apex	he frontline regulators regulator	-	
The Philippines	Securities and Exchange Commission		Securities and Exchar the Central Bank	nge Commission, and
Singapore	Monetary Authority of Singapore		Monetary Authority of	f Singapore
Sri Lanka	Securities and Exchange Commission		-	-
Thailand	Securities and Exchange Commission		Bank of Thailand and Ministry of Finance	Securities and Exchange Commission

## (2) Self-Regulatory Organisations

There is absence of self-regulatory organisation (SRO) in four jurisdictions *i.e.* Hong Kong, Malaysia, New Zealand and Singapore. Meanwhile, the rest that SROs exist are China, Chinese Taipei, Indonesia, Japan, Korea, Pakistan, the Philippines and Thailand. Having said that, China and the Philippines have SROs for one market segment only, *i.e.* for government bond market, and for corporate bond market, respectively.

China's SRO is the National Debt Association of China. Surabaya Stock Exchange ("SSX") and HUMDASUN are the SROs in Indonesia. In Japan, Japan Securities Dealers Association ("JSDA") and three exchanges (in Tokyo, Nagoya and Osaka) where corporate and government bonds may be listed, act as SROs. In Korea, the Korea Stock Exchange ("KSE"), the Korea Securities Dealers Association ("KSDA") and the Korea Securities Depository ("KSD") are the SROs. The Philippine Stock Exchange is an SRO in the Philippines, likewise the Chinese Securities Association in Chinese Taipei. In Thailand, Thai Bond Dealing Centre ("ThaiBDC") has been encouraged to enhance its role as an SRO in monitoring and performing market surveillance and field examination.

Stock exchanges in Pakistan primarily regulate compliance with listing requirements for bonds and trading activities in the secondary market.

Most of SROs perform as the industry forum in promoting best market practices, executing self-regulatory disciplinary actions, as well as acting as information centres.

Jurisdiction	Corporate bonds	Government bonds	
China	-	National Debt Association of China	
Chinese Taipei	Chinese Securities Association, with mission development, and coordinates among gover	on to protect investors, promotes national economic rnment and members.	
Hong Kong	-	-	
Indonesia	Surabaya Stock Exchange	HUMDASUN	
Japan	Japan Securities Dealers Association, stock	exchanges (Tokyo, Osaka and Nagoya)	
Korea	Korea Stock Exchange, Korea Securities Dealers Association, Korea Securities Depository		
Malaysia	-	-	
New Zealand	-	-	
Pakistan	Stock exchanges (Karachi, Lahore and Islamabad)	-	
The Philippines	Philippine Stock Exchange	-	
Singapore	-	-	
Sri Lanka	Colombo Stock Exchange for listed corporate bonds of listed companies		
Thailand	Thai Bond Dealing Centre being encourage	ed to increase SRO roles	

[Table 23] Self-regulatory organisations of bond markets

# VI. CONCLUSION

In general, the survey findings reveal that levels of the development of domestic bond markets in the Asia Pacific region vary. There are many areas that need to be improved in several jurisdictions.

In the primary market, some jurisdictions do not have systematic patterns for the issuance of government bonds while some do. The systematic patterns in which the regular issuance with pre-announced calendar for auctions and issuance plans available are significant. This facilitates the construction of government bond benchmark yield in each market so that corporate issuers and investors can use this benchmark yield as their reference rates in financing and investing respectively.

Next, in the secondary market where market liquidity is of essence, infrastructures and mechanisms in place in some jurisdiction may not be sufficiently efficient. The effect of settlement system especially for corporate bonds traded in some OTC markets still relies on physical certificates, not electronic book-entry transfer, with no centre for clearing and settlement. This could materially obstruct transactions in which majority of trades occur in the OTC market.

The existing system of primary dealers in most jurisdictions is varied both in terms of their obligations and privileges. Some jurisdictions have them performed as market makers with the requirement of making two-way firm price quotation while some do not. Additionally, only primary dealers in some jurisdictions have exclusive right to access the government auction market. Such variation in the primary dealer system results in different benefits each jurisdiction obtains from the system.

Also, information transparency in some bond markets could be viewed insufficient. Bond markets are a wholesale market where most players are intermediaries and institutional investors. These groups of market participants access more information than retail investors. Only a few jurisdictions have relieved this problem by arranging public facilities.

Finally, the structure of supervision and oversight in most jurisdictions seems rather complex as each domestic bond market is fragmented into the market for corporate and government bonds with multiple authorities, multiple governing laws and private organisations involved.

In conclusion, domestic bond markets in the region are in different development stages. Some are more advanced than others. However, there is still much more room for every single market to be further developed till each market can function effectively. To do so, the proper identification and prioritisation of necessary measures to put in place by each market are of essence to achieve effective results. More importantly, strong regional cooperation through sharing of expertise and experiences would possibly help shorten the development periods each of those markets may take on its own naturally.

#### (Note 1)

Pakistan and Sri Lanka provided information on corporate bonds only.

#### (Note 2)

Corporate bonds include straight bonds, equity bonds (*e.g.* convertible bonds) and ABS, where available, unless otherwise stated. Here is the further special classification of corporate bonds in each jurisdiction:

China:	Central corporations and sub-national corporations.
Hong Kong:	Authorised institutions, local corporations and non-MDB overseas borrowers.
Indonesia:	Syariah bonds are also included in the category of corporate bonds.
Japan:	Bank debenture is not in the category of corporate bonds here.
Malaysia:	In the category of "corporate bonds" include ABS, loan notes, loan stocks, medium term notes and others. In the breakdown of the corporate bonds, equity bonds include bonds with warrants, convertible bonds and Islamic bonds; and ABS includes ABS and medium term
	notes.
The Dhilingings	
The Philippines:	Small Denominated Treasury (SDT) bonds, straight bonds

The data of government bonds in Hong Kong in the charts and table in this report are the one of the "exchanges fund bills and notes".

#### (Note 3)

The data of each jurisdiction are constituted by the following categories of bonds.

China:	Government bonds, government agency bonds and corporate bonds.
Chinese Taipei:	Government bonds, financial debentures, corporate bonds and foreign bonds.
Hong Kong:	Exchange fund bills and notes, statutory bodies (including government-owned corporate),
	multilateral development banks (MDBs), non-MDB overseas borrowers, corporate (authorized
	institutions and local corporate) bonds.
Japan:	Government bonds, government agency bonds, municipal bonds, corporate bonds and others
	(samurai bonds, bank debentures, etc). The Japan's figures indicate the total size of the
	market.
Korea:	Government bonds, municipal bonds, government agency bonds (special purpose bonds,
	monetary stabilization bonds by BOK), financial institution bonds and corporate bonds.
Malaysia:	Government bonds (Malaysian government securities, government investment issues which is
	the government bills issued according to Islamic principles, Malaysian treasury bills, Bank
	Negara bills, Malaysian savings bonds), government agency bonds (Khazanah bonds,
	Danamodal bond and Danaharata bonds), corporate bonds and others (bonds, notes and
	Islamic financial instruments issued by Cagamas Bhd., etc.)
The Philippines:	Government bonds and corporate bonds

Alphabet	Abbreviation	Jurisdiction	Full Name
А	ABS	General	Asset-backed securities
А	ACRA	Singapore	The Accounting and Corporate Regulatory Authority
А	ADAs	Malaysia	Authorised depository Agents
А	ADI	Malaysia	Authorised depository Institution
А	ASBJ	Japan	Accounting Standards Board of Japan
А	ASRB	New Zealand	Accounting Standards Review Board
В	BAHTNET	Thailand	Bank of Thailand High Value Fund Transfer Network
В	BAP	The Philippines	Bankers Association of the Philippines
В	BEX	Thailand	Bond Electronic Exchange
В	BI	Indonesia	Bank Indonesia
В	BIDS	Malaysia	Bond Information and Dissemination System
В	BI-SKRIP	Indonesia	Bank Indonesia-Scripless Securities Settlement System
В	BI-SSSS	Indonesia	the Bank Indonesia Scripless Securities Settlement System
В	BOJ	Japan	Bank of Japan
В	BOJ-Net	Japan	Bank of Japan Financial Network System
В	BOT	Thailand	Bank of Thailand
В	BSP	The Philippines	Bangko Sentral ng Pilipinas
В	BTr	The Philippines	Bureau of the Treasury
С	CCASS	Hong Kong	Central Clearing and Settlement System
C	CDC	Pakistan	Central Depository Company of Pakistan Limited
C	CDS	General	Central Depository System
C	CDS	Pakistan	Central Depository System
C	CFETS	China	China Foreign Exchange Trading Center & National Interbank Funding Center
С	CGSDTC	China	China Government Securities Depository Trust & Clearing Co. Ltd
С	CICPA	China	Chinese Institute of Certified Public Accounts
С	CMU	Hong Kong	Central Moneymarkets Unit
С	COA	The Philippines	Commission on Audit
С	COD	New Zealand	Claim of Delivery
С	CSDC	China	China Securities Depository & Clearing Co. Ltd
С	CSE	Sri Lanka	Colombo Stock Exchange
С	CSRC	China	China Securities Regulatory Commission
С	CVT	Pakistan	Capital Value Tax
D	DA	Singapore	Depository Agent
D	DBR	Malaysia	Disclosure-based regulation
D	DCSS	Singapore	Debt Securities Clearing Settlement System
D	DJFI	Indonesia	Directorate General of Financial Institution
D	DTA	General	Double Taxation Agreement
D	DTC	Hong Kong	the Depositary Trust Company
D	DVP	General	Delivery-versus-payment
Е	EBTS	Chinese Taipei	Electronic Bond Trading System
F	FASF	Japan	Financial Accounting Standards Foundation
F	FAST	Malaysia	The Fully Automated System for Issuing/Tendering
F	FILP Bond	Japan	Fiscal Investment and Loan Program Bonds
F	FRF	Malaysia	The Financial Reporting Foundation
F	FRS(S)	Singapore	Financial Reporting Standards (Singapore)
F	FSA	Japan	Financial Services Agency
F	FSC	Korea	The Financial Supervisory Commission
Т.	FSS	Korea	The Financial Supervisory Service

# [Appendix] Abbreviation List

Alphabet	Abbreviation	Jurisdiction	Full Name
G	GBM	Korea	Government Bonds Market
G	GS	The Philippines	Government securities
G	GS	The Philippines	Government securities
G	GSEDs	The Philippines	Government Securities Eligible Dealers
Н	HIBOR	Hong Kong	Hong Kong Interbank Offered Rate
Н	HIMDASUN	Indonesia	Inter Dealer Market Association Government Securities
Н	HKFRS	Hong Kong	Hong Kong Financial Reporting Standards
Н	HKICPA	Hong Kong	Hong Kong Institute of Certified Public Accountants
Н	НКМА	Hong Kong	The Hong Kong Monetary Authority
Н	HKSA	Hong Kong	Hong Kong Society of Accountants
Н	HKSCC	Hong Kong	The Hong Kong Securities Clearing Company
Ι	IAASB	Pakistan	International Auditing and Assurance Standards Board
Ι	IAI	Indonesia	Indonesian Accounting Standard
Ι	ICAAT	Thailand	The Institute of certified accountants and auditors of Thailand
Ι	ICANZ	New Zealand	Institute of Chartered Accountants of New Zealand
I	ICAP	Pakistan	Institute of Chartered Accountants of Pakistan
Ι	ICSD	General	international central securities depositories
Ι	IDBs	General	Inter-dealer brokers
Ι	IDMA GS	Indonesia	Inter dealer market association government securities
Ι	IFAC	General	International Federation of Accountants
I	IFCT	Thailand	The Industrial Finance Corporation of Thailand
I	IFRS	General	International Financial Reporting Standard
Ι	IGSTS	Indonesia	Indonesian Government Securities Trading System
I	IIB	Hong Kong	Independent Investigation Board
I	IRS	General	interest rate swap
I	ISE	Pakistan	Islamabad Stock Exchange
J	JB Net	Japan	Japan Bond Settlement Network Co., Ltd.
J	JGB	Japan	Japanese Government Bond
J	JICPA	Japan	Japan Institute of Certified Public Accountants
J	JSDA	Japan	Japan Securities Dealers Association
J	JSDC	Japan	Japan Securities Depository Center
K	KAI	Korea	The Korea Accounting Institute
K	KBW	Singapore	Keefe. Bruvette & Woods
K	KIBOR	Pakistan	Karachi Inter Bank Offered Rate
K	KICPA	Korea	The Korean Institute of Certified Public Accountants
K	KSD	Korea	Korea Securities Depositary
K	KSDA	Korea	The Korea Securities Dealers Association
K	KSE	Korea	Korean Stock Exchange
K	KSE	Pakistan	Karachi Stock Exchange
L	LIBOR	General	London interbank offered rate
L	LISE	Pakistan	Lahore Stock Exchange
M	MART	The Philippines	Money Market Association of the Philippines
M	MAS	Singapore	Monetary Authority of Singapore
M	MASA	Malaysia	The Malaysian Approved Standards on Auditing
M	MASB	Malaysia	The Malaysian Accounting Standard Board
M	MCD	Malaysia	The Malaysian Central Depository
M	MEPS	Singapore	MAS Electronic Payment System
M	MGS	Malaysia	Malaysian government securities
M	MIA	Malaysia	Malaysian Institute of Accountants
M	MLR	General	Minimum lending rate
M	MoF	China	Ministry of Finance
141	10101	Cinna	ministry of I manee

Alphabet	Abbreviation	Jurisdiction	<b>Full Name</b>
М	MOF	Japan	Ministry of Finance
М	MOFE	Korea	The Ministry of Finance and Economy
М	MRAC	Malaysia	Malaysia Rating Corporation
М	MTN	General	Medium Term Note
N	NAV	General	Net Asset Value
N	NCB	General	Non-competitive bid
N	NCCPL	Pakistan	National Clearing Company of Pakistan Limited
N	NCSS	Pakistan	National Clearing and Settlement System
N	NDAC	China	National Debt Association of China
N	NDRC	China	National Development and Reform Commission
N	NGAS	The Philippines	New Government Accounting System
N	NPC	China	National People's Congress
N	NRWT	New Zealand	Non-resident withholding tax
N	NZCSD	New Zealand	New Zealand Central Securities Depository Limited
N	NZDMO	New Zealand	The New Zealand Debt Management Office
N	NZDX	New Zealand	New Zealand Exchange's Debt market
N	NZX	New Zealand	New Zealand Exchange
0	OBM	Korea	Ordinary Bonds Market
0	OTC	General	Over-the-counter
Р	PACRA	Pakistan	Pakistan Credit Rating Agency
Р	PAO	Hong Kong	The Professional Accountants Ordinance
Р	PBoC	China	People's Bank of China
Р	PD	Singapore	Primary Dealers
Р	PDS	Malaysia	Private Debt Securities
Р	PDTC	The Philippines	Philippine Depository and Trust Corporation
Р	PIPU	Indonesia	The Money Market Center
Р	PSAK	Indonesia	Financial Accounting Standard
Р	PT KSEI	Indonesia	Indonesian Central Securities Depository (also CSD)
Q	QDS	Singapore	Qualifying Debt Securities
R	RA	The Philippines	Republic Act
R	RAM	Malaysia	Rating Agency Malaysia
R	RBNZ	New Zealand	The Reserve Bank of New Zealand
R	RD	General	Recognised Dealer
R	RENTAS	Malaysia	The Real Time Electronic Transfer of Funds and Securities
R	Ross	The Philippines	Registry of Scripless Securities
R	RTGS	General	Real Time Gross Settlement
S	SASs	Hong Kong	Statements of Auditing Standards
S	SBL	General	Securities borrowing and lending
S	SC	Malaysia	The Securities Commission
S	SCA	Malaysia	Securities Commission Act
S	SDT Bonds	The Philippines	Small Denominated Treasury Bonds
S	SEC	Thailand	Securities and Exchange Commission
S	SEC Act	Thailand	The Securities and Exchange Act B.E. 2535
S	SECP	Pakistan	Securities and Exchange Commission of Pakistan
S	SEHK	Hong Kong	the Stock Exchange of Hong Kong
S	SEL	Japan	Securities and Exchange Law
S	SET	Thailand	Stock Exchange of Thailand
S	SFA	Singapore	The Securities and Futures Act
S	SFB	Chinese Taipei	Securities and Futures Bureau
S	SFC	Hong Kong	The Securities and Futures Commission
S	SFC	Korea	The Securities and Futures Commission
S	SGS	Singapore	Singapore Government Security

Alphabet	Abbreviation	Jurisdiction	Full Name
S	SIA	Malaysia	The Securities Industries Act 1983
S	SLAASMB	Sri Lanka	Sri Lanka Accounting & Auditing Standards Monitoring Board
S	SPAP	Indonesia	Public Accountant Professional Standard
S	SPV	General	special purpose vehicle
S	SRC	The Philippines	Securities Regulation Code
S	SRO	General	Self-regulatory organisation
S	SSX	Indonesia	Surabaya Stock Exchange
Т	TAS	Thailand	Thai Accounting Standard
Т	ТВ	China	Treasury Bond
Т	ThaiBDC	Thailand	Thai Bond Dealing Centre
Т	TRIS	Thailand	TRIS Rating Co. Ltd.
Т	TSCD	Chinese Taipei	Taiwan Securities Central Depository
Т	TSE	Chinese Taipei	Taiwan Stock Exchange
W	WDP	Indonesia	Audited Financial Report with Qualified Opinion