

# The Exchange Fund

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# Report of the Director of Audit



**Audit Commission**  
The Government of the Hong Kong Special Administrative Region

## Independent Audit Report

### To the Financial Secretary

I certify that I have audited the financial statements of the Exchange Fund set out on pages 122 to 203, which comprise the balance sheets of the Exchange Fund and of the Group as at 31 December 2012, and their income and expenditure accounts, statements of comprehensive income, statements of changes in equity and statements of cash flows for the year then ended, and a summary of significant accounting policies and other explanatory information.

#### Monetary Authority's Responsibility for the Financial Statements

The Monetary Authority is responsible for the preparation of financial statements that give a true and fair view in accordance with the directive of the Chief Executive made under section 7 of the Exchange Fund Ordinance (Cap. 66) and Hong Kong Financial Reporting Standards, and for such internal control as the Monetary Authority determines is necessary to enable the preparation of financial statements that are free from material misstatement, whether due to fraud or error.

#### Auditor's Responsibility

My responsibility is to express an opinion on these financial statements based on my audit. I conducted my audit in accordance with the directive of the Chief Executive made under section 7 of the Exchange Fund Ordinance and the Audit Commission auditing standards. Those standards require that I comply with ethical requirements and plan and perform the audit to obtain reasonable assurance about whether the financial statements are free from material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial statements. The procedures selected depend on the auditor's judgment, including the assessment of the risks of material misstatement of the financial statements, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation of financial statements that give a true and fair view in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the entity's internal control. An audit also includes evaluating the appropriateness of accounting policies used and the reasonableness of accounting estimates made by the Monetary Authority, as well as evaluating the overall presentation of the financial statements.

I believe that the audit evidence I have obtained is sufficient and appropriate to provide a basis for my audit opinion.

# Report of the Director of Audit (continued)

## Opinion

In my opinion, the financial statements give a true and fair view of the financial position of the Exchange Fund and of the Group as at 31 December 2012, and of their financial performance and cash flows for the year then ended in accordance with Hong Kong Financial Reporting Standards and have been properly prepared in accordance with the directive of the Chief Executive made under section 7 of the Exchange Fund Ordinance.

### **LAU Sun-wo**

Assistant Director of Audit  
for Director of Audit

8 April 2013

Audit Commission  
26th Floor  
Immigration Tower  
7 Gloucester Road  
Wanchai, Hong Kong

# Exchange Fund – Income and Expenditure Account

for the year ended 31 December 2012

(Expressed in millions of Hong Kong dollars)	Note	Group		Fund	
		2012	2011	2012	2011
<b>INCOME</b>					
Interest income		17,570	21,114	15,971	19,718
Dividend income		10,650	9,507	10,324	9,745
Income from investment properties		253	–	–	–
Net realised and revaluation gains		83,998	3,683	81,082	3,063
Net exchange loss		(1,552)	(8,860)	(1,435)	(9,080)
Investment income	4(a)	110,919	25,444	105,942	23,446
Bank licence fees		132	136	132	136
Other income		641	781	104	93
<b>TOTAL INCOME</b>		<b>111,692</b>	<b>26,361</b>	<b>106,178</b>	<b>23,675</b>
<b>EXPENDITURE</b>					
Interest expense on placements by Fiscal Reserves, HKSAR government funds and statutory bodies	4(b)	(45,757)	(42,589)	(45,757)	(42,589)
Other interest expense	4(c)	(1,662)	(2,043)	(1,221)	(1,779)
Operating expenses	4(d)	(3,252)	(2,963)	(2,884)	(2,659)
Note and coin expenses	4(e)	(346)	(237)	(346)	(237)
Write back of impairment losses on loans/ (Impairment losses on loans)		6	(3)	–	–
<b>TOTAL EXPENDITURE</b>		<b>(51,011)</b>	<b>(47,835)</b>	<b>(50,208)</b>	<b>(47,264)</b>
<b>SURPLUS/(DEFICIT) BEFORE SHARE OF PROFIT OF ASSOCIATE AND JOINT VENTURES</b>					
		60,681	(21,474)	55,970	(23,589)
Share of profit of associate and joint ventures, net of tax		654	89	–	–
Gain from disposal of a joint venture		7	–	–	–
<b>SURPLUS/(DEFICIT) BEFORE TAXATION</b>		<b>61,342</b>	<b>(21,385)</b>	<b>55,970</b>	<b>(23,589)</b>
Income tax		(3)	(185)	–	–
<b>SURPLUS/(DEFICIT) FOR THE YEAR</b>		<b>61,339</b>	<b>(21,570)</b>	<b>55,970</b>	<b>(23,589)</b>
<b>ATTRIBUTABLE TO:</b>					
Owner of the Fund		61,300	(21,585)	55,970	(23,589)
Non-controlling interests		39	15	–	–
		<b>61,339</b>	<b>(21,570)</b>	<b>55,970</b>	<b>(23,589)</b>

The notes on pages 128 to 203 form part of these financial statements.

# Exchange Fund – Statement of Comprehensive Income

for the year ended 31 December 2012

(Expressed in millions of Hong Kong dollars)	Note	Group		Fund	
		2012	2011	2012	2011
<b>SURPLUS/(DEFICIT) FOR THE YEAR</b>		<b>61,339</b>	[21,570]	<b>55,970</b>	[23,589]
<b>OTHER COMPREHENSIVE INCOME</b>					
Available-for-sale securities					
fair value changes on revaluation	29	<b>2,259</b>	[284]	-	-
fair value changes on disposal transferred to income and expenditure account	29	<b>(38)</b>	[51]	-	-
tax effect	29	<b>(53)</b>	[10]	-	-
Cash flow hedges					
fair value changes on revaluation	29	-	3	-	-
fair value changes transferred to income and expenditure account	29	<b>6</b>	10	-	-
tax effect	29	<b>(1)</b>	[2]	-	-
Exchange differences on translation of financial statements of overseas subsidiaries and joint ventures	29	<b>1</b>	2	-	-
Reserves released on disposal of a joint venture	29	<b>(7)</b>	-	-	-
<b>OTHER COMPREHENSIVE INCOME/(LOSS) FOR THE YEAR, NET OF TAX</b>		<b>2,167</b>	[332]	-	-
<b>TOTAL COMPREHENSIVE INCOME/(LOSS) FOR THE YEAR</b>		<b>63,506</b>	[21,902]	<b>55,970</b>	[23,589]
<b>TOTAL COMPREHENSIVE INCOME/(LOSS) FOR THE YEAR ATTRIBUTABLE TO:</b>					
Owner of the Fund		<b>63,467</b>	[21,918]	<b>55,970</b>	[23,589]
Non-controlling interests		<b>39</b>	16	-	-
		<b>63,506</b>	[21,902]	<b>55,970</b>	[23,589]

The notes on pages 128 to 203 form part of these financial statements.

# Exchange Fund – Balance Sheet

as at 31 December 2012

(Expressed in millions of Hong Kong dollars)	Note	Group		Fund	
		2012	2011	2012	2011
<b>ASSETS</b>					
Cash and money at call	6	51,353	60,564	49,978	60,138
Placements with banks and other financial institutions	7	148,042	171,805	138,332	161,529
Derivative financial instruments	8(a)	6,175	4,355	4,429	2,796
Financial assets designated at fair value	9	2,492,917	2,212,397	2,479,796	2,203,217
Available-for-sale securities	10	43,608	23,464	493	493
Held-to-maturity securities	11	9,324	8,365	–	–
Loan portfolio	12	25,895	33,136	–	–
Gold	13	862	817	862	817
Other assets	14	49,313	23,522	48,332	22,526
Investments in subsidiaries	15	–	–	55,699	33,278
Interests in associate and joint ventures	16	5,242	3,264	–	–
Investment properties	17	16,380	3,126	–	–
Property, plant and equipment	18(a)	3,339	3,423	3,176	3,238
<b>TOTAL ASSETS</b>		<b>2,852,450</b>	<b>2,548,238</b>	<b>2,781,097</b>	<b>2,488,032</b>
<b>LIABILITIES AND EQUITY</b>					
Certificates of Indebtedness	19	289,837	258,702	289,837	258,702
Government-issued currency notes and coins in circulation	19	9,934	9,888	9,934	9,888
Balance of the banking system	20	255,851	148,684	255,851	148,684
Derivative financial instruments	8(a)	2,593	935	1,652	672
Placements by banks and other financial institutions	21	–	24,547	–	24,547
Placements by Fiscal Reserves	22	717,536	663,507	717,536	663,507
Placements by Hong Kong Special Administrative Region government funds and statutory bodies	23	167,913	126,249	167,913	126,249
Exchange Fund Bills and Notes issued	24	688,214	655,750	688,484	655,750
Bank loans	25	9,250	1,876	–	–
Mortgage-backed securities issued	26	214	367	–	–
Other debt securities issued	27	36,365	41,058	–	–
Other liabilities	28	33,044	38,639	26,006	32,119
<b>Total liabilities</b>		<b>2,210,751</b>	<b>1,970,202</b>	<b>2,157,213</b>	<b>1,920,118</b>
Accumulated surplus	29	637,268	575,968	623,884	567,914
Revaluation reserve	29	3,917	1,744	–	–
Translation reserve	29	36	42	–	–
Total equity attributable to owner of the Fund		<b>641,221</b>	<b>577,754</b>	<b>623,884</b>	<b>567,914</b>
Non-controlling interests	29	478	282	–	–
<b>Total equity</b>		<b>641,699</b>	<b>578,036</b>	<b>623,884</b>	<b>567,914</b>
<b>TOTAL LIABILITIES AND EQUITY</b>		<b>2,852,450</b>	<b>2,548,238</b>	<b>2,781,097</b>	<b>2,488,032</b>

## Norman T. L. Chan

Monetary Authority  
8 April 2013

The notes on pages 128 to 203 form part of these financial statements.

# Exchange Fund – Statement of Changes in Equity

for the year ended 31 December 2012

(Expressed in millions of Hong Kong dollars)	Note	Attributable to owner of the Fund			Total attributable to owner of the Fund	Non-controlling interests	Total
		Accumulated surplus	Revaluation reserve	Translation reserve			
<b>Group</b>							
At 1 January 2011		597,553	2,078	41	599,672	272	599,944
Surplus/(Deficit) for the year	29	(21,585)	-	-	(21,585)	15	(21,570)
Other comprehensive income/(loss) for the year	29	-	(334)	1	(333)	1	(332)
Total comprehensive income/(loss) for the year		(21,585)	(334)	1	(21,918)	16	(21,902)
Capital injection by non-controlling interests	29	-	-	-	-	4	4
Dividends paid to non-controlling interests	29	-	-	-	-	(10)	(10)
At 31 December 2011		575,968	1,744	42	577,754	282	578,036
At 1 January 2012		<b>575,968</b>	<b>1,744</b>	<b>42</b>	<b>577,754</b>	<b>282</b>	<b>578,036</b>
Surplus for the year	29	<b>61,300</b>	-	-	<b>61,300</b>	<b>39</b>	<b>61,339</b>
Other comprehensive income/(loss) for the year	29	-	<b>2,173</b>	<b>(6)</b>	<b>2,167</b>	-	<b>2,167</b>
Total comprehensive income/(loss) for the year		<b>61,300</b>	<b>2,173</b>	<b>(6)</b>	<b>63,467</b>	<b>39</b>	<b>63,506</b>
Capital injection by non-controlling interests	29	-	-	-	-	<b>167</b>	<b>167</b>
Dividends paid to non-controlling interests	29	-	-	-	-	<b>(10)</b>	<b>(10)</b>
At 31 December 2012		<b>637,268</b>	<b>3,917</b>	<b>36</b>	<b>641,221</b>	<b>478</b>	<b>641,699</b>
<b>Fund</b>							
At 1 January 2011		591,503	-	-	591,503	-	591,503
Deficit and total comprehensive loss for the year	29	(23,589)	-	-	(23,589)	-	(23,589)
At 31 December 2011		567,914	-	-	567,914	-	567,914
At 1 January 2012		<b>567,914</b>	-	-	<b>567,914</b>	-	<b>567,914</b>
Surplus and total comprehensive income for the year	29	<b>55,970</b>	-	-	<b>55,970</b>	-	<b>55,970</b>
At 31 December 2012		<b>623,884</b>	-	-	<b>623,884</b>	-	<b>623,884</b>

The notes on pages 128 to 203 form part of these financial statements.

# Exchange Fund – Statement of Cash Flows

for the year ended 31 December 2012

(Expressed in millions of Hong Kong dollars)	Note	Group		Fund	
		2012	2011	2012	2011
<b>Cash flows from operating activities</b>					
Surplus/(Deficit) before share of profit of associate and joint ventures		<b>60,681</b>	(21,474)	<b>55,970</b>	(23,589)
<b>Adjustments for:</b>					
Interest income	4(a)	<b>(17,570)</b>	(21,114)	<b>(15,971)</b>	(19,718)
Dividend income	4(a)	<b>(10,650)</b>	(9,507)	<b>(10,324)</b>	(9,745)
Change in fair value of investment properties	4(a)	<b>133</b>	134	–	–
Net gains on disposal of available-for-sale securities	4(a)	<b>(1,110)</b>	(719)	–	–
Net gains on disposal of held-to-maturity securities	4(a)	<b>(5)</b>	–	–	–
Interest expense	4(b) & 4(c)	<b>47,419</b>	44,632	<b>46,978</b>	44,368
Depreciation	4(d)	<b>160</b>	151	<b>121</b>	117
Elimination of exchange differences and other non-cash items		<b>389</b>	(422)	<b>350</b>	(542)
Interest received		<b>18,317</b>	21,582	<b>16,680</b>	19,945
Interest paid		<b>(47,370)</b>	(44,857)	<b>(47,043)</b>	(44,421)
Dividends received		<b>10,953</b>	9,317	<b>10,284</b>	9,193
Income tax paid		<b>(131)</b>	(188)	–	–
		<b>61,216</b>	(22,465)	<b>57,045</b>	(24,392)
Change in fair value of derivatives and other debt securities issued		<b>(824)</b>	(2,525)	<b>(655)</b>	(2,648)
Change in carrying amount of:					
– placements with banks and other financial institutions		<b>(8,676)</b>	1,900	<b>(402)</b>	778
– financial assets designated at fair value		<b>(185,848)</b>	(90,337)	<b>(181,907)</b>	(85,560)
– loan portfolio		<b>7,244</b>	2,117	–	–
– gold		<b>(45)</b>	(85)	<b>(45)</b>	(85)
– other assets		<b>(26,610)</b>	(4,016)	<b>(26,836)</b>	(3,794)
– Certificates of Indebtedness, government-issued currency notes and coins in circulation		<b>31,181</b>	33,752	<b>31,181</b>	33,752
– balance of the banking system		<b>107,167</b>	(18)	<b>107,167</b>	(18)
– placements by banks and other financial institutions		<b>(24,547)</b>	1,360	<b>(24,547)</b>	1,360
– placements by Fiscal Reserves		<b>54,029</b>	71,225	<b>54,029</b>	71,225
– placements by Hong Kong Special Administrative Region government funds and statutory bodies		<b>41,664</b>	49,489	<b>41,664</b>	49,489
– Exchange Fund Bills and Notes issued		<b>32,464</b>	2,029	<b>32,734</b>	1,529
– other liabilities		<b>(5,800)</b>	11,007	<b>(6,048)</b>	11,108
<b>Net cash from operating activities</b>		<b>82,615</b>	53,433	<b>83,380</b>	52,744



# Exchange Fund – Statement of Cash Flows (continued)

for the year ended 31 December 2012

(Expressed in millions of Hong Kong dollars)	Note	Group		Fund	
		2012	2011	2012	2011
<b>Cash flows from investing activities</b>					
Net cash outflow from acquisition of a subsidiary	16	(690)	–	–	–
Loans to subsidiaries		–	–	(22,421)	(16,450)
(Increase)/Decrease in investment in joint ventures		(4,292)	303	–	–
Proceeds from sale or redemption of available-for-sale securities		4,327	3,050	–	–
Purchase of available-for-sale securities		(21,138)	(13,805)	–	–
Proceeds from sale or redemption of held-to-maturity securities		971	1,520	–	–
Purchase of held-to-maturity securities		(1,926)	(1,775)	–	–
Proceeds from disposal of a joint venture		137	–	–	–
Purchase of investment properties		(5,191)	(3,421)	–	–
Purchase of property, plant and equipment		(76)	(73)	(59)	(47)
Dividends received from subsidiaries		–	–	363	362
<b>Net cash used in investing activities</b>		<b>(27,878)</b>	<b>(14,201)</b>	<b>(22,117)</b>	<b>(16,135)</b>
<b>Cash flows from financing activities</b>					
Bank loans raised		3,209	1,876	–	–
Proceeds from issue of other debt securities		19,077	28,526	–	–
Redemption of mortgage-backed securities issued		(153)	(1,139)	–	–
Redemption of other debt securities issued		(23,661)	(26,719)	–	–
Capital injection by non-controlling interests		167	4	–	–
Dividends paid to non-controlling interests		(10)	(10)	–	–
<b>Net cash from/(used in) financing activities</b>		<b>(1,371)</b>	<b>2,538</b>	<b>–</b>	<b>–</b>
<b>Net increase in cash and cash equivalents</b>		<b>53,366</b>	<b>41,770</b>	<b>61,263</b>	<b>36,609</b>
<b>Cash and cash equivalents at 1 January</b>		<b>254,791</b>	<b>212,464</b>	<b>244,387</b>	<b>207,236</b>
<b>Effect of foreign exchange rate changes</b>		<b>(344)</b>	<b>557</b>	<b>(350)</b>	<b>542</b>
<b>Cash and cash equivalents at 31 December</b>	30	<b>307,813</b>	<b>254,791</b>	<b>305,300</b>	<b>244,387</b>

The notes on pages 128 to 203 form part of these financial statements.

# Exchange Fund – Notes to the Financial Statements

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 1 PRINCIPAL ACTIVITIES

The Monetary Authority, under delegated authority from the Financial Secretary as Controller of the Exchange Fund (the Fund), manages the Fund in accordance with the provisions of the Exchange Fund Ordinance (Cap. 66). The principal activities of the Fund are safeguarding the exchange value of the currency of Hong Kong and maintaining the stability and integrity of Hong Kong's monetary and financial systems.

The assets of the Fund are managed as three distinct portfolios: the Backing Portfolio, the Investment Portfolio and the Strategic Portfolio. The assets of the Backing Portfolio fully match the Monetary Base, under Hong Kong's Currency Board system. The Strategic Portfolio holds shares in Hong Kong Exchanges and Clearing Limited acquired by the Hong Kong Special Administrative Region (HKSAR) Government for the account of the Fund for strategic purposes. The balance of the Fund's assets constitutes the Investment Portfolio. Operating segment information is set out in note 31.

## 2 SIGNIFICANT ACCOUNTING POLICIES

### 2.1 Statement of compliance

These financial statements have been prepared in accordance with all applicable Hong Kong Financial Reporting Standards (HKFRSs), which is a collective term that includes all applicable individual Hong Kong Financial Reporting Standards, Hong Kong Accounting Standards (HKASs) and Interpretations issued by the Hong Kong Institute of Certified Public Accountants (HKICPA), and accounting principles generally accepted in Hong Kong. A summary of the significant accounting policies adopted by the Fund and its subsidiaries (together referred to as the Group) is set out below.

The HKICPA has issued certain new and revised HKFRSs that are first effective or available for early adoption for the current accounting period. Note 3 provides information on the changes, if any, in accounting policies resulting from initial adoption of these developments to the extent that they are relevant to the Group for the current and prior accounting periods reflected in these financial statements.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 2.2 Basis of preparation of the financial statements

The Group financial statements include the financial statements of the Group as well as the Group's interests in an associate and joint ventures. The principal activities of the principal subsidiaries, the associate and the joint ventures are shown in notes 15 and 16.

The measurement basis used in the preparation of the financial statements is historical cost except that the following assets and liabilities are stated at their fair value as explained in the accounting policies set out below:

- trading financial instruments (note 2.5.2.1);
- financial assets and financial liabilities designated at fair value (note 2.5.2.2);
- available-for-sale securities (note 2.5.2.5);
- gold (note 2.10); and
- investment properties (note 2.11).

The preparation of financial statements in conformity with HKFRSs requires management to make judgements, estimates and assumptions that affect the application of policies and the reported amounts of assets, liabilities, income and expenditure. The estimates and associated assumptions are based on experience and various other factors that are believed to be reasonable under the circumstances, the results of which form the basis for making judgements about carrying values of assets and liabilities that are not readily apparent from other sources. Actual results may differ from these estimates.

The estimates and underlying assumptions are reviewed on an ongoing basis. Revisions to accounting estimates are recognised in the period in which the estimate is revised if the revision affects only that period, or in the period of the revision and future periods if the revision affects both current and future periods.

Note 17 contains information about the assumptions relating to fair value estimation of investment properties. Note 37 contains information about the assumptions relating to fair value estimation of financial instruments. There are no critical accounting judgements involved in the application of the Group's accounting policies except for the valuation of certain financial instruments as set out in note 2.5.3.

## 2.3 Subsidiaries and non-controlling interests

A subsidiary is an entity controlled by the Group. Control exists when the Group has the power to govern the financial and operating policies of an entity so as to obtain benefits from its activities. In assessing control, potential voting rights that are presently exercisable are taken into account.

An investment in a subsidiary is consolidated into the Group financial statements from the date that control commences until the date that control ceases.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

Intra-group balances and transactions together with any unrealised profits and losses arising from intra-group transactions are eliminated in full in preparing the Group financial statements.

Non-controlling interests represent the equity in a subsidiary not attributable directly or indirectly to the Fund, and in respect of which the Group has not agreed any additional terms with the holders of those interests which would result in the Group as a whole having a contractual obligation in respect of those interests that meets the definition of a financial liability. Non-controlling interests are presented in the Group balance sheet within equity, separately from equity attributable to the owner of the Fund. Non-controlling interests in the results of the Group are presented on the face of the Group income and expenditure account and the Group statement of comprehensive income as an allocation of the surplus or deficit and total comprehensive income or loss for the year between non-controlling interests and the owner of the Fund.

In the balance sheet of the Fund, its investments in subsidiaries are stated at cost less impairment losses, if any (note 2.13).

For acquisition of assets that does not constitute a business under HKFRS 3, Business Combinations, the acquisition cost is allocated to the individual identifiable assets acquired and liabilities assumed on the basis of their relative fair values at the date of acquisition and recognised in the Group financial statements. Such acquisition does not give rise to any goodwill.

## **2.4 Associate and joint ventures**

An associate is an entity in which the Group has significant influence, but not control or joint control, over its management, including participation in the financial and operating policy decisions.

A joint venture is an entity which operates under a contractual arrangement between the Group and other parties, where the contractual arrangement establishes that the Group and one or more of the other parties share joint control over the economic activity of the entity.

Investment in an associate or a joint venture is accounted for in the Group financial statements under the equity method and is initially recorded at cost, adjusted for any excess of the Group's share of the acquisition-date fair values of the investee's identifiable net assets over the cost of the investment (if any). Thereafter, the investment is adjusted for the post acquisition change in the Group's share of the net assets of the associate or the joint venture and any impairment loss relating to the investment.

The Group income and expenditure account includes the Group's share of the post-tax results of the associate and the joint ventures for the year. When the Group's share of losses exceeds its interest in the associate or the joint ventures, the Group's interest is reduced to nil and recognition of further losses is discontinued except to the extent that the Group has incurred legal or constructive obligations or made payments on behalf of the associate or the joint ventures. For this purpose, the Group's interest is the carrying amount of the investment under the equity method together with the Group's long-term interests that in substance form part of the Group's net investment in the associate or the joint ventures.

Unrealised profits and losses resulting from transactions between the Group and its associate and joint ventures are eliminated to the extent of the Group's interests in the associate or the joint ventures.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

When the Group ceases to have significant influence over an associate or joint control over a joint venture, it is accounted for as a disposal of the entire interest in the associate or the joint venture, with a resulting gain or loss being recognised in the income and expenditure account. Any interest retained in the associate or the joint venture at the date when significant influence or joint control is lost is recognised at fair value and this amount is regarded as the fair value on initial recognition of a financial asset (note 2.5.1) or, when appropriate, the cost on initial recognition of an investment in an associate.

In the balance sheet of the Fund, its investments in associate and joint ventures are stated at cost less impairment losses, if any (note 2.13).

## **2.5 Financial assets and financial liabilities**

### **2.5.1 Initial recognition**

The Group classifies its financial assets and financial liabilities into different categories at inception, depending on the purpose for which the assets were acquired or the liabilities were incurred. The categories are: trading financial instruments, financial assets and financial liabilities designated at fair value, loans and receivables, held-to-maturity securities, available-for-sale securities and other financial liabilities.

An analysis of the Group's financial assets and financial liabilities by category is set out in note 5.

Financial assets and financial liabilities are measured initially at fair values, which normally equal to the transaction prices plus, in the case of a financial asset or financial liability not at fair value through the income and expenditure account, transaction costs that are directly attributable to the acquisition of the financial assets or the issue of the financial liabilities. Transaction costs on trading financial instruments and financial assets and financial liabilities designated at fair value are expensed immediately.

The Group recognises financial assets and financial liabilities on the date it becomes a party to the contractual provisions of the instrument. Purchases or sales of derivative financial instruments are recognised using trade date accounting. Purchases or sales of trading liabilities and financial assets and financial liabilities designated at fair value, which are settled within the time frame established generally by regulation or convention in the market place concerned, are also recognised using trade date accounting.

### **2.5.2 Categorisation**

#### **2.5.2.1 Trading financial instruments**

The Group does not engage in active trading of financial instruments. However, derivative financial instruments that do not qualify for hedge accounting (note 2.8) and short positions in Exchange Fund Bills and Notes (EFBN) are categorised as "trading" under HKAS 39, Financial Instruments: Recognition and Measurement.

Trading financial instruments are carried at fair value. Changes in the fair value are included in the income and expenditure account in the period in which they arise.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 2.5.2.2 Financial assets and financial liabilities designated at fair value

Financial assets and financial liabilities designated at fair value primarily consist of:

- financial assets and financial liabilities that are managed, evaluated and reported internally on a fair value basis; and
- debt securities issued by the Group through a subsidiary, The Hong Kong Mortgage Corporation Limited (HKMC), which contain embedded derivatives that significantly modify the cash flows that would otherwise be required under the contracts.

Financial assets and financial liabilities under this category are carried at fair value. Changes in the fair value are included in the income and expenditure account in the period in which they arise.

## 2.5.2.3 Loans and receivables

Loans and receivables are non-derivative financial assets with fixed or determinable payments that are not quoted in an active market and which the Group has no intention of trading, other than those that the Group, upon initial recognition, designates as at fair value or as available-for-sale. This category includes placements with banks and other financial institutions, cash and money at call, and the loan portfolio purchased by the Group through the HKMC.

Loans and receivables are carried at amortised cost using the effective interest method less impairment losses, if any (note 2.9).

The effective interest method is a method of calculating the amortised cost of a financial asset or a financial liability and of allocating the interest income or interest expense over the relevant period. The effective interest rate is the rate that exactly discounts estimated future cash payments or receipts through the expected life of the financial instrument or, when appropriate, a shorter period to the net carrying amount of the financial asset or financial liability. When calculating the effective interest rate, the Group estimates cash flows considering all contractual terms of the financial instrument but does not consider future credit losses. The calculation includes all fees paid or received between parties to the contract that are an integral part of the effective interest rate, transaction costs and all other premiums or discounts.

## 2.5.2.4 Held-to-maturity securities

Held-to-maturity securities are non-derivative financial assets with fixed or determinable payments and fixed maturity which the Group has the positive intention and ability to hold to maturity, other than (a) those that the Group, upon initial recognition, designates as at fair value or as available-for-sale; and (b) those that meet the definition of loans and receivables.

Held-to-maturity securities are carried at amortised cost using the effective interest method less impairment losses, if any (note 2.9).

## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

### 2.5.2.5 Available-for-sale securities

Available-for-sale securities are non-derivative securities that are designated as available-for-sale or are not classified in any of the other categories above. They include securities intended to be held for an indefinite period of time, but which may be sold in response to needs for liquidity or changes in the market environment.

Available-for-sale securities are carried at fair value. Unrealised gains and losses arising from changes in the fair value are recognised in other comprehensive income and accumulated separately in the revaluation reserve, except for impairment losses, if any (note 2.9). Foreign exchange gains and losses on monetary items are recognised in the income and expenditure account.

The investment by the Fund in shares of the Bank for International Settlements is held in order to participate in it on a long-term basis. As these shares do not have a quoted market price in an active market and the fair value cannot be reliably measured, they are carried at cost less impairment losses, if any (note 2.9).

When available-for-sale securities are sold, gains or losses on disposal include the difference between the net sale proceeds and the carrying amount, and the accumulated fair value adjustments which are released from equity to the income and expenditure account.

### 2.5.2.6 Other financial liabilities

Other financial liabilities are financial liabilities other than trading liabilities and those designated at fair value.

Other financial liabilities repayable on demand are stated at the principal amount payable. These include Certificates of Indebtedness, government-issued currency notes and coins in circulation (note 2.5.2.7), the balance of the banking system, placements by Fiscal Reserves, placements by the Bond Fund and placements by the Deposit Protection Scheme Fund.

Other financial liabilities with a fixed maturity and a predetermined rate are carried at amortised cost using the effective interest method. These include placements by banks and other financial institutions, other placements by HKSAR government funds and statutory bodies, bank loans, mortgage-backed securities and other debt securities (other than those which contain embedded derivatives) issued by the Group through the HKMC.

### 2.5.2.7 Certificates of Indebtedness and government-issued currency notes and coins in circulation

As backing for the banknote issues, each note-issuing bank is required to hold a non-interest-bearing Certificate of Indebtedness issued by the Financial Secretary, which is redeemable on demand. Payments for the issue and redemption of banknotes against these Certificates are made in US dollars at the fixed exchange rate of US\$1 = HK\$7.80. Consistent with the requirement for backing banknote issues with US dollars, the issue and redemption of government-issued currency notes and coins are conducted with an agent bank against US dollars at the fixed exchange rate of US\$1 = HK\$7.80.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

The Group's liabilities in respect of Certificates of Indebtedness represent the US dollars payable to the note-issuing banks on redemption of the Certificates. The Group's liabilities in respect of government-issued currency notes and coins represent the US dollars payable to the agent bank when they are redeemed. Certificates of Indebtedness in issue and government-issued currency notes and coins in circulation are stated in the financial statements at the Hong Kong dollar equivalent of the US dollars required for their redemption at the closing exchange rate at the balance sheet date.

## 2.5.3 Fair value measurement principles

The fair value of financial instruments is based on their quoted market prices at the balance sheet date without any deduction for estimated future selling costs. Financial assets are priced at current bid prices, while financial liabilities are priced at current asking prices.

If there is no publicly available latest traded price nor a quoted market price on a recognised stock exchange or a price from a broker/dealer for non-exchange-traded financial instruments, or if the market for it is not active, the fair value of that financial asset or financial liability is estimated using valuation techniques that provide a reliable estimate of prices which could be obtained in actual market transactions.

Where discounted cash flow techniques are used, estimated future cash flows are based on management's best estimates and the discount rate used is a market rate at the balance sheet date applicable for an instrument with similar terms and conditions. Where other pricing models are used, inputs are based on market data at the balance sheet date.

The Group's investments in unlisted investment funds and unlisted equity securities, except for the holding of unlisted shares in the Bank for International Settlements (note 10), are stated at fair value by making reference to valuation reports provided by investment managers. The fair values of the investments are computed based on valuation methods and techniques generally recognised within the industry. The Group regularly assesses the appropriateness of assumptions, methods and techniques applied by the investment managers for determining the most suitable and consistent model for valuation.

## 2.5.4 Derecognition

A financial asset is derecognised when the contractual rights to receive the cash flows from the financial asset expire, or where the financial asset together with substantially all the risks and rewards of ownership have been transferred.

The Group uses the weighted average method to determine realised gains and losses to be recognised in the income and expenditure account on derecognition.

A financial liability is derecognised when the obligation specified in the contract is discharged, is cancelled or expires.

Liabilities for EFBN in issue are derecognised when they are repurchased as a result of market making activities. The repurchase is considered a redemption of the debt.



# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 2.5.5 Offsetting

Financial assets and financial liabilities are offset and the net amount is reported in the balance sheet where there is a legally enforceable right to offset the recognised amounts and there is an intention to settle on a net basis, or realise the assets and settle the liabilities simultaneously.

## 2.5.6 Embedded derivatives

An embedded derivative is a component of a hybrid (combined) instrument that includes both the derivative and a host contract with the effect that some of the cash flows of the combined instrument vary in a way similar to a stand-alone derivative.

An embedded derivative is separated from the host contract and accounted for as a derivative when (a) the economic characteristics and risks of the embedded derivative are not closely related to the host contract; and (b) the hybrid (combined) instrument is not measured at fair value with changes in fair value recognised in the income and expenditure account.

Where the embedded derivative is separated, the host contract is accounted for according to its category (note 2.5.2). The embedded derivative is measured at fair value with change in fair value recognised in the income and expenditure account.

## 2.6 Repurchase and reverse repurchase transactions

Securities sold subject to a simultaneous agreement to repurchase these securities at a certain later date at a fixed price (repurchase agreements) are retained on the balance sheet and measured in accordance with the measurement principles as stated in note 2.5.3. The proceeds from the sale are reported as liabilities in “placements by banks and other financial institutions” and are carried at amortised cost.

Conversely, securities purchased under agreements to resell (reverse repurchase agreements) are reported as receivables in “placements with banks and other financial institutions” and are carried at amortised cost.

Interest earned on reverse repurchase agreements and interest incurred on repurchase agreements are recognised as interest income and interest expense respectively, over the life of each agreement using the effective interest method.

## 2.7 Securities lending agreements

Where securities are loaned with the receipt of cash or securities as collateral, they are retained on the balance sheet and measured in accordance with the measurement principles as stated in note 2.5.3. Where cash collateral is received, a liability is recorded in respect of the cash received in “placements by banks and other financial institutions”. Securities received as collateral are not recognised in the financial statements.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 2.8 Hedging

Hedge accounting recognises the offsetting effects on income and expenditure of changes in the fair values of the hedging instrument and the hedged item.

The Group documents, at the inception of the transaction, the relationship between hedging instruments and hedged items, as well as its risk management objective and strategy for undertaking various hedge transactions. The Group also documents its assessment, both at hedge inception and on an ongoing basis, of whether the derivatives that are used in hedging transactions are highly effective in offsetting changes in fair values or cash flows of hedged items.

### 2.8.1 Fair value hedge

A fair value hedge seeks to offset risks of changes in the fair value of a recognised asset or liability that will give rise to a gain or loss being recognised in the income and expenditure account.

Derivatives that are designated and qualify as fair value hedges are measured at fair value, with fair value changes recognised in the income and expenditure account, together with any changes in the fair value of the hedged item attributable to the risk being hedged.

When (a) a hedging instrument expires or is sold, terminated or exercised; (b) a hedge no longer meets the criteria for hedge accounting; or (c) the Group revokes designation of the hedge relationship, any adjustment to the carrying amount of a hedged item for which the effective interest method is used, is amortised to the income and expenditure account over the period to maturity.

### 2.8.2 Cash flow hedge

Where a derivative is designated as a hedge of the variability in cash flows of a recognised asset or liability or a highly probable forecast transaction, the effective portion of any gain or loss from remeasurement of the derivative to fair value is recognised in other comprehensive income and accumulated separately in equity. The ineffective portion of any gain or loss is recognised immediately in the income and expenditure account.

Amounts previously recognised in other comprehensive income and accumulated in equity are recycled to the income and expenditure account in the periods in which the hedged item will affect the income and expenditure account.

When (a) a hedging instrument expires or is sold, terminated or exercised; (b) a hedge no longer meets the criteria for hedge accounting; or (c) the Group revokes designation of the hedge relationship, any cumulative gain or loss existing in equity at that time remains in equity and is recognised when the forecast transaction is ultimately recognised in the income and expenditure account. When a forecast transaction is no longer expected to occur, the cumulative gain or loss that was recognised in equity is immediately transferred to the income and expenditure account.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 2.9 Impairment of financial assets

The carrying amounts of loans and receivables, held-to-maturity securities and available-for-sale securities are reviewed at each balance sheet date to determine whether there is objective evidence of impairment. Objective evidence that a financial asset is impaired includes observable data that comes to the attention of the Group about one or more of the following loss events which has an impact on the future cash flows on the financial asset that can be estimated reliably:

- significant financial difficulties of the issuer or borrower;
- a breach of contract such as default or delinquency in interest or principal payments;
- it becoming probable that the issuer or borrower will enter bankruptcy or other financial reorganisation;
- significant changes in the technological, market, economic or legal environment that have an adverse effect on the issuer or borrower;
- disappearance of an active market for that financial asset; and
- a significant or prolonged decline in the fair value of an investment in an equity instrument below its cost.

The Group first assesses whether objective evidence of impairment exists individually for financial assets that are individually significant. For exposures which are not individually significant, the Group will assess impairment either individually or collectively. If the Group determines that no objective evidence of impairment exists for an individually assessed financial asset, whether significant or not, it includes that asset in a group of financial assets with similar credit risk characteristics and collectively assesses them for impairment. Financial assets that are individually assessed for impairment and for which an impairment loss is or continues to be recognised are not included in a collective assessment of impairment.

If any such evidence exists, the carrying amount is reduced to the estimated recoverable amount and the impairment loss is determined and recognised as described below.

For loans and receivables and held-to-maturity securities, an impairment loss is the difference between the asset's carrying amount and the present value of estimated future cash flows discounted at the asset's original effective interest rate. The carrying amount of the asset is reduced through the use of an allowance account and the impairment loss is recognised in the income and expenditure account.

If in a subsequent period the amount of such impairment loss decreases and the decrease can be linked objectively to an event occurring after the impairment loss was recognised, the impairment loss is reversed through the income and expenditure account. A reversal of impairment losses is limited to the asset's carrying amount that would have been determined had no impairment loss been recognised in prior years.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

For available-for-sale securities carried at fair value, the cumulative loss – measured as the difference between the acquisition cost (net of any principal repayment and amortisation) and the current fair value, less any impairment loss on that financial asset previously recognised in the income and expenditure account – is removed from equity and recognised in the income and expenditure account. Impairment losses for debt securities are reversed if the subsequent increase in fair value can be objectively related to an event occurring after the impairment loss was recognised. Reversals of impairment losses in such circumstances are recognised in the income and expenditure account. Impairment losses for equity securities are not reversed through the income and expenditure account. Any subsequent increase in the fair value of such assets is recognised in other comprehensive income.

For available-for-sale equity securities carried at cost, the impairment loss is measured as the difference between the asset's carrying amount and the present value of estimated future cash flows discounted at the current market rate of return for a similar instrument. Such impairment losses are not reversed.

## **2.10 Gold**

Gold is carried at market value. Changes in the market value of gold are included in the income and expenditure account in the period in which they arise.

## **2.11 Investment properties**

Properties that are held for long-term rental yields or for capital appreciation or both, and that are not occupied by the Group, are classified as investment properties.

Investment properties are recognised initially at cost, including related transaction costs. After initial recognition, investment properties are measured at fair value assessed by independent professional valuers or investment managers, when appropriate, on the basis of open market value. If this information is not available, alternative valuation methods are used such as recent prices on less active markets or discounted cash flow projections.

Any gain or loss arising from change in fair value or disposal of an investment property is recognised directly in the income and expenditure account. Rental income from investment properties is recognised in the income and expenditure account in equal instalments over the periods covered by the lease term, except where an alternative basis is more representative of the pattern of benefits to be derived from the use of the leased asset.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 2.12 Property, plant and equipment

The following items of property, plant and equipment are stated in the balance sheet at cost less accumulated depreciation and any impairment losses (note 2.13):

- a building held for own use situated on freehold land;
- land classified as held under a finance lease and building held for own use situated thereon;
- plant and equipment, including plant, machinery, furniture, fixtures, equipment, motor vehicles and personal computers; and
- computer software licences and system development costs.

Depreciation is calculated to write off the cost of items of property, plant and equipment, less their estimated residual value, if any, on a straight-line basis over their estimated useful lives as follows:

- freehold land not depreciated
- leasehold land classified as held under a finance lease depreciated over the unexpired term of lease
- building situated on freehold land 39 years
- buildings situated on leasehold land depreciated over the shorter of the unexpired term of lease and their estimated useful lives
- plant and equipment 2 to 15 years
- computer software licences and system development costs 3 to 5 years

Gain or loss arising from the disposal of an item of property, plant and equipment is determined as the difference between the net disposal proceeds and the carrying amount of the asset and is recognised in the income and expenditure account on the date of disposal.

## 2.13 Impairment of other assets

The carrying amounts of other assets, including investments in subsidiaries, investments in associate and joint ventures, and property, plant and equipment, are reviewed at each balance sheet date to identify any indication of impairment.

If any such indication exists, an impairment loss is recognised in the income and expenditure account whenever the carrying amount of an asset exceeds its recoverable amount. The recoverable amount of an asset is the greater of its fair value less costs to sell and value in use.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## **2.14 Cash and cash equivalents**

Cash and cash equivalents comprise cash and money at call, placements with banks and other financial institutions and short-term highly liquid investments that are readily convertible to known amounts of cash and subject to an insignificant risk of changes in value, having been within three months of maturity when placed or acquired.

## **2.15 Revenue and expenditure recognition**

### **2.15.1 Interest income and expense**

Interest on the majority of the placements by Fiscal Reserves, placements by HKSAR government funds and statutory bodies is payable at a fixed rate determined annually (notes 22 and 23). Interest on these placements is recognised in the income and expenditure account on an accrual basis, using the effective interest method.

Interest income and expense for all other interest-bearing financial assets and financial liabilities is recognised in the income and expenditure account on an accrual basis, using the effective interest method.

Once a financial asset or a group of similar financial assets has been written down as a result of an impairment loss, interest income is thereafter recognised using the rate of interest used to discount the future cash flows for the purpose of measuring the impairment loss.

### **2.15.2 Net realised and revaluation gains/(losses)**

Realised gains or losses on financial instruments are recognised in the income and expenditure account when the financial instruments are derecognised.

Changes in fair value of trading financial instruments and financial assets and financial liabilities designated at fair value are recognised as revaluation gains or losses in the income and expenditure account in the period in which they arise.

### **2.15.3 Dividend and other income**

Dividend income from listed equity securities is recognised in the income and expenditure account when the share price is quoted ex-dividend. Dividend income from unlisted equity securities is recognised when the shareholder's right to receive payment is established.

Bank licence fees are fees receivable from authorized institutions under the Banking Ordinance (Cap. 155) and are accounted for in the period when the fees become receivable.

Other income includes rental income, income from the sale of withdrawn coins, Central Moneymarkets Unit fee income and net insurance premiums earned from the mortgage insurance business of the HKMC. Rental income is recognised on a straight-line basis over the lease term. The net premiums are recognised on a time-apportioned basis during the time the insurance coverage is effective. Other income is accounted for in the period when it becomes receivable.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 2.15.4 Contributions to staff retirement schemes

The Group operates several defined contribution schemes, including the Mandatory Provident Fund Scheme. Under these schemes, contributions payable each year are charged to the income and expenditure account. The assets of the staff retirement schemes are held separately from those of the Group.

## 2.15.5 Rental payments under operating leases

Leases where substantially all the rewards and risks of ownership remain with the leasing company are classified as operating leases. Rental payments made under operating leases are charged to the income and expenditure account on a straight-line basis over the period of the relevant leases.

## 2.15.6 Income tax

Income tax payable on profits of subsidiaries is recognised as an expense in the period in which profits arise.

Deferred tax assets and liabilities arise from deductible and taxable temporary differences respectively, being the differences between the tax bases of assets and liabilities and their carrying amounts for financial reporting purposes. Deferred tax assets are recognised to the extent that it is probable that future taxable profit will be available against which the assets can be utilised. Deferred tax liabilities are provided in full. For investment properties that are measured at fair value, the amount of deferred tax recognised is measured using the tax rates that would apply on sale of those assets at their carrying value at the reporting date on the presumption that their carrying amounts are recovered entirely through sale. In all other cases, the amount of deferred tax recognised is measured based on the expected manner of realisation or settlement of the carrying amount of the assets and liabilities, using tax rates enacted or substantively enacted at the balance sheet date. Deferred tax assets and liabilities are not discounted.

## 2.16 Foreign currency translation

The financial statements are presented in Hong Kong dollars, which is the Group's and the Fund's functional currency.

Foreign currency transactions during the year are translated into Hong Kong dollars using the spot exchange rates at the transaction dates. Monetary assets and liabilities denominated in foreign currencies are translated into Hong Kong dollars using the closing exchange rate at the balance sheet date.

Non-monetary assets and liabilities that are measured in terms of historical cost in a foreign currency are translated into Hong Kong dollars using the spot exchange rates at the transaction dates. Non-monetary assets and liabilities that are measured at fair value in a foreign currency are translated into Hong Kong dollars using the closing exchange rates at the dates when the fair value is determined.

All foreign currency translation differences are presented in aggregate as "net exchange gains/(losses)" in the income and expenditure account. Although it is not practicable to disclose separately the net exchange gains/(losses) on financial assets and financial liabilities designated at fair value or on trading financial instruments, the majority of the exchange gains/(losses) relate to these two categories of financial instruments.

# Exchange Fund – Notes to the Financial Statements *(continued)*

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 2.17 Related parties

For the purposes of these financial statements, a person or an entity is considered to be related to the Group if:

- (a) the person, or a close member of that person's family:
  - (i) has control or joint control over the Group;
  - (ii) has significant influence over the Group; or
  - (iii) is a member of the key management personnel of the Group.
- (b) any of the following conditions applies to the entity:
  - (i) the entity and the Group are members of the same group (which means that each parent, subsidiary and fellow subsidiary is related to the others);
  - (ii) the entity is an associate or joint venture of the Group (or an associate or joint venture of a member of a group of which the Group is a member);
  - (iii) the entity and the Group are joint ventures of the same third party;
  - (iv) the entity is a joint venture of another entity and the Group is an associate of that entity;
  - (v) the entity is a post-employment benefit plan for the benefit of employees of either the Group or an entity related to the Group;
  - (vi) the entity is controlled or jointly controlled by a person identified in (a); or
  - (vii) a person identified in (a)(i) has significant influence over the entity or is a member of the key management personnel of the entity (or of a parent of the entity).

Close members of the family of a person are those family members who may be expected to influence, or be influenced by, that person in their dealings with the entity.



# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 2.18 Operating segments

Operating segments are reported in a manner consistent with the internal management reports provided to the chief operating decision maker. The Group comprises the following operating segments:

- management of funds under the Currency Board Operations, including the Backing Portfolio;
- management of funds representing the general reserve assets of the Fund, including the Investment Portfolio and the Strategic Portfolio; and
- maintaining the stability and integrity of monetary and financial systems of Hong Kong, which includes banking supervision and monetary management, and the activities of The Hong Kong Mortgage Corporation Limited and Hong Kong Note Printing Limited.

Details of the operating segments of the Group are set out in note 31.

## 3 CHANGES IN ACCOUNTING POLICIES

The HKICPA has issued certain new and revised HKFRSs that are first effective or available for early adoption for the current accounting period. There have been no significant changes to the accounting policies applied in these financial statements for the years presented as a result of these developments.

The Group has not applied any new standard or interpretation that is not yet effective for the current accounting period (note 38).

### 3.1 Amendments to HKAS 12, Income Taxes – Deferred Tax: Recovery of Underlying Assets

The amendments to HKAS 12 introduce a rebuttable presumption that deferred tax on investment property carried at fair value under HKAS 40, Investment Property, shall be measured reflecting the tax consequences of recovering the carrying amount of the investment property through sale. This presumption is rebutted if the investment property is depreciable and is held within a business model whose objective is to consume substantially all of the economic benefits embodied in the investment property over time, rather than through sale.

The Group reviewed its investment properties and concluded that the related deferred tax has been measured on the presumption that their carrying amounts are recovered entirely through sale. There is no material impact on the adoption of the amendments to HKAS 12.

### 3.2 Amendments to HKFRS 7, Financial Instruments: Disclosures – Disclosures – Transfers of Financial Assets

The amendments to HKFRS 7 expand the existing disclosure requirements for transferred financial assets that are not derecognised in their entirety, and introduce new disclosure requirements for transferred financial assets that are derecognised in their entirety where the entities have continuing involvement in them.

The Group did not have any significant transfers of financial assets in previous periods or the current period which require disclosure in the current accounting period under the amendments and these amendments have had no material impact on the contents of the financial statements.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 4 INCOME AND EXPENDITURE

### (a) Investment income

	Group		Fund	
	2012	2011	2012	2011
Interest income:				
– from derivative financial instruments	414	440	414	440
– from financial assets designated at fair value	15,410	19,091	15,060	18,768
– from other financial assets	1,746	1,583	497	510
	<b>17,570</b>	21,114	<b>15,971</b>	19,718
Dividend income:				
– from financial assets designated at fair value	10,114	9,367	9,959	9,367
– from other financial assets	536	140	15	16
– from subsidiaries	–	–	350	362
	<b>10,650</b>	9,507	<b>10,324</b>	9,745
Income from investment properties:				
– rental income	386	134	–	–
– change in fair value on revaluation	(133)	(134)	–	–
	<b>253</b>	–	–	–
Net realised and revaluation gains/(losses):				
– on derivative financial instruments	4,059	(544)	4,057	(487)
– on financial assets and financial liabilities designated at fair value	78,824	3,508	77,025	3,550
– on disposal of available-for-sale securities	1,110	719	–	–
– on disposal of held-to-maturity securities	5	–	–	–
	<b>83,998</b>	3,683	<b>81,082</b>	3,063
Net exchange loss	(1,552)	(8,860)	(1,435)	(9,080)
<b>TOTAL</b>	<b>110,919</b>	25,444	<b>105,942</b>	23,446

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## (b) Interest expense on placements by Fiscal Reserves, HKSAR government funds and statutory bodies

	Group and Fund	
	2012	2011
Interest on placements by Fiscal Reserves:		
– at a fixed rate determined annually <sup>1</sup>	37,749	36,958
– at market-based rates	1	1
Interest on placements by HKSAR government funds and statutory bodies:		
– at a fixed rate determined annually <sup>1</sup>	8,006	5,629
– at market-based rates	1	1
<b>TOTAL</b>	<b>45,757</b>	<b>42,589</b>

<sup>1</sup> This rate has been fixed at 5.6% per annum for 2012 (2011: 6.0% – notes 22 and 23).

## (c) Other interest expense

	Group		Fund	
	2012	2011	2012	2011
Interest on Exchange Fund Bills and Notes issued	1,168	1,667	1,168	1,667
Interest expense on derivative financial instruments	88	47	22	21
Interest expense on other debt securities issued designated at fair value and trading liabilities	17	29	15	26
Interest expense on other financial liabilities	389	300	16	65
<b>TOTAL</b>	<b>1,662</b>	<b>2,043</b>	<b>1,221</b>	<b>1,779</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## (d) Operating expenses

	Group		Fund	
	2012	2011	2012	2011
Staff costs				
Salaries and other staff costs	1,012	917	834	751
Retirement benefit costs	79	67	69	59
Premises and equipment expenses				
Depreciation	160	151	121	117
Rental expenses under operating leases	58	44	45	42
Other premises expenses	59	53	48	45
General operating costs				
Maintenance of office and computer equipment	68	58	60	52
Financial information and communication services	50	46	44	40
External relations	39	38	30	29
Service fees for financial infrastructure	80	51	80	51
Professional and other services	54	48	26	28
Training	9	8	8	7
Others	57	22	39	25
Investment management and custodian fees				
Management and custodian fees	885	825	844	795
Transaction costs	170	202	165	186
Withholding tax	432	399	432	399
Others	40	34	39	33
<b>TOTAL</b>	<b>3,252</b>	<b>2,963</b>	<b>2,884</b>	<b>2,659</b>

The aggregate emoluments of senior staff (Executive Directors and above) of the Group were as follows:

	Group	
	2012	2011
Fixed pay	64.3	60.9
Variable pay	18.1	15.0
Other benefits	7.9	6.9
	<b>90.3</b>	<b>82.8</b>

Other benefits shown above included provident funds, medical and life insurance, gratuity and annual leave accrued during the year. There were no other allowances or benefits-in-kind.

## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

The numbers of senior staff (Executive Directors and above) of the Group whose emoluments including other benefits fell within the following bands were:

HK\$	Group	
	2012	2011
3,500,001 to 4,000,000	–	5
4,000,001 to 4,500,000	6	2
4,500,001 to 5,000,000	2	3
5,000,001 to 5,500,000	2	1
5,500,001 to 6,000,000	1	1
6,000,001 to 6,500,000	1	–
6,500,001 to 7,000,000	–	1
7,000,001 to 7,500,000	1	2
7,500,001 to 8,000,000	1	–
8,000,001 to 8,500,000	1	–
9,000,001 to 9,500,000	1	1
	<b>16</b>	<b>16</b>

### (e) Note and coin expenses

These represent reimbursements to the note-issuing banks in respect of note-issuing expenses and expenses incurred directly by the Fund in issuing government-issued currency notes and coins.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 5 CATEGORIES OF FINANCIAL ASSETS AND FINANCIAL LIABILITIES

	Note	Group – 2012						
		Total	Trading financial instruments and hedging instruments	Financial assets and financial liabilities designated at fair value	Loans and receivables	Held-to-maturity securities	Available-for-sale securities	Other financial liabilities
Cash and money at call	6	51,353	-	-	51,353	-	-	-
Placements with banks and other financial institutions	7	148,042	-	-	148,042	-	-	-
Derivative financial instruments	8(a)	6,175	6,175	-	-	-	-	-
Financial assets designated at fair value	9	2,492,917	-	2,492,917	-	-	-	-
Available-for-sale securities	10	43,608	-	-	-	-	43,608	-
Held-to-maturity securities	11	9,324	-	-	-	9,324	-	-
Loan portfolio	12	25,895	-	-	25,895	-	-	-
Others		49,122	-	-	49,122	-	-	-
<b>FINANCIAL ASSETS</b>		<b>2,826,436</b>	<b>6,175</b>	<b>2,492,917</b>	<b>274,412</b>	<b>9,324</b>	<b>43,608</b>	<b>-</b>
Certificates of Indebtedness	19	289,837	-	-	-	-	-	289,837
Government-issued currency notes and coins in circulation	19	9,934	-	-	-	-	-	9,934
Balance of the banking system	20	255,851	-	-	-	-	-	255,851
Derivative financial instruments	8(a)	2,593	2,593	-	-	-	-	-
Placements by Fiscal Reserves	22	717,536	-	-	-	-	-	717,536
Placements by HKSAR government funds and statutory bodies	23	167,913	-	-	-	-	-	167,913
Exchange Fund Bills and Notes issued	24	688,214	-	688,214	-	-	-	-
Bank loans	25	9,250	-	-	-	-	-	9,250
Mortgage-backed securities issued	26	214	-	-	-	-	-	214
Other debt securities issued	27	36,365	-	340	-	-	-	36,025
Others		32,339	-	-	-	-	-	32,339
<b>FINANCIAL LIABILITIES</b>		<b>2,210,046</b>	<b>2,593</b>	<b>688,554</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>1,518,899</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

	Note	Total	Trading financial instruments and hedging instruments	Financial assets and financial liabilities designated at fair value	Group – 2011			
					Loans and receivables	Held-to- maturity securities	Available- for-sale securities	Other financial liabilities
Cash and money at call	6	60,564	-	-	60,564	-	-	-
Placements with banks and other financial institutions	7	171,805	-	-	171,805	-	-	-
Derivative financial instruments	8(a)	4,355	4,355	-	-	-	-	-
Financial assets designated at fair value	9	2,212,397	-	2,212,397	-	-	-	-
Available-for-sale securities	10	23,464	-	-	-	-	23,464	-
Held-to-maturity securities	11	8,365	-	-	-	8,365	-	-
Loan portfolio	12	33,136	-	-	33,136	-	-	-
Others		23,395	-	-	23,395	-	-	-
<b>FINANCIAL ASSETS</b>		<b>2,537,481</b>	<b>4,355</b>	<b>2,212,397</b>	<b>288,900</b>	<b>8,365</b>	<b>23,464</b>	<b>-</b>
Certificates of Indebtedness	19	258,702	-	-	-	-	-	258,702
Government-issued currency notes and coins in circulation	19	9,888	-	-	-	-	-	9,888
Balance of the banking system	20	148,684	-	-	-	-	-	148,684
Derivative financial instruments	8(a)	935	935	-	-	-	-	-
Placements by banks and other financial institutions	21	24,547	-	-	-	-	-	24,547
Placements by Fiscal Reserves	22	663,507	-	-	-	-	-	663,507
Placements by HKSAR government funds and statutory bodies	23	126,249	-	-	-	-	-	126,249
Exchange Fund Bills and Notes issued	24	655,750	-	655,750	-	-	-	-
Bank loans	25	1,876	-	-	-	-	-	1,876
Mortgage-backed securities issued	26	367	-	-	-	-	-	367
Other debt securities issued	27	41,058	-	892	-	-	-	40,166
Others		38,250	-	-	-	-	-	38,250
<b>FINANCIAL LIABILITIES</b>		<b>1,969,813</b>	<b>935</b>	<b>656,642</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>1,312,236</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

	Note	Fund - 2012						
		Total	Trading financial instruments	Financial assets and liabilities designated at fair value	Loans and receivables	Held-to-maturity securities	Available-for-sale securities	Other financial liabilities
Cash and money at call	6	49,978	-	-	49,978	-	-	-
Placements with banks and other financial institutions	7	138,332	-	-	138,332	-	-	-
Derivative financial instruments	8(a)	4,429	4,429	-	-	-	-	-
Financial assets designated at fair value	9	2,479,796	-	2,479,796	-	-	-	-
Available-for-sale securities	10	493	-	-	-	-	493	-
Others		48,311	-	-	48,311	-	-	-
<b>FINANCIAL ASSETS</b>		<b>2,721,339</b>	<b>4,429</b>	<b>2,479,796</b>	<b>236,621</b>	<b>-</b>	<b>493</b>	<b>-</b>
Certificates of Indebtedness	19	289,837	-	-	-	-	-	289,837
Government-issued currency notes and coins in circulation	19	9,934	-	-	-	-	-	9,934
Balance of the banking system	20	255,851	-	-	-	-	-	255,851
Derivative financial instruments	8(a)	1,652	1,652	-	-	-	-	-
Placements by Fiscal Reserves	22	717,536	-	-	-	-	-	717,536
Placements by HKSAR government funds and statutory bodies	23	167,913	-	-	-	-	-	167,913
Exchange Fund Bills and Notes issued	24	688,484	-	688,484	-	-	-	-
Others		25,913	-	-	-	-	-	25,913
<b>FINANCIAL LIABILITIES</b>		<b>2,157,120</b>	<b>1,652</b>	<b>688,484</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>1,466,984</b>



# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

				Fund – 2011				
	Note	Total	Trading financial instruments	Financial assets and liabilities designated at fair value	Loans and receivables	Held-to-maturity securities	Available-for-sale securities	Other financial liabilities
Cash and money at call	6	60,138	-	-	60,138	-	-	-
Placements with banks and other financial institutions	7	161,529	-	-	161,529	-	-	-
Derivative financial instruments	8(a)	2,796	2,796	-	-	-	-	-
Financial assets designated at fair value	9	2,203,217	-	2,203,217	-	-	-	-
Available-for-sale securities	10	493	-	-	-	-	493	-
Others		22,507	-	-	22,507	-	-	-
<b>FINANCIAL ASSETS</b>		<b>2,450,680</b>	<b>2,796</b>	<b>2,203,217</b>	<b>244,174</b>	<b>-</b>	<b>493</b>	<b>-</b>
Certificates of Indebtedness	19	258,702	-	-	-	-	-	258,702
Government-issued currency notes and coins in circulation	19	9,888	-	-	-	-	-	9,888
Balance of the banking system	20	148,684	-	-	-	-	-	148,684
Derivative financial instruments	8(a)	672	672	-	-	-	-	-
Placements by banks and other financial institutions	21	24,547	-	-	-	-	-	24,547
Placements by Fiscal Reserves	22	663,507	-	-	-	-	-	663,507
Placements by HKSAR government funds and statutory bodies	23	126,249	-	-	-	-	-	126,249
Exchange Fund Bills and Notes issued	24	655,750	-	655,750	-	-	-	-
Others		32,035	-	-	-	-	-	32,035
<b>FINANCIAL LIABILITIES</b>		<b>1,920,034</b>	<b>672</b>	<b>655,750</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>1,263,612</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 6 CASH AND MONEY AT CALL

	Group		Fund	
	2012	2011	2012	2011
At amortised cost				
Balance with central banks	852	25,498	852	25,498
Balance with banks	50,501	35,066	49,126	34,640
<b>TOTAL</b>	<b>51,353</b>	<b>60,564</b>	<b>49,978</b>	<b>60,138</b>

## 7 PLACEMENTS WITH BANKS AND OTHER FINANCIAL INSTITUTIONS

	Group		Fund	
	2012	2011	2012	2011
At amortised cost				
Placements in respect of reverse repurchase agreements:				
– with central banks	38,782	38,863	38,782	38,863
– with banks and other financial institutions	8,461	4,849	8,461	4,849
Other placements with banks	100,799	128,093	91,089	117,817
<b>TOTAL</b>	<b>148,042</b>	<b>171,805</b>	<b>138,332</b>	<b>161,529</b>

## 8 DERIVATIVE FINANCIAL INSTRUMENTS

Derivative financial instruments refer to financial contracts whose value depends on the value of one or more underlying assets or indices with settlement at a future date.

The Group uses derivative financial instruments to manage its exposures to market risk and to facilitate the implementation of investment strategies. The principal derivative financial instruments used are interest rate and currency swap contracts, forward foreign exchange contracts, and currency and bond options contracts, which are primarily over-the-counter derivatives, as well as exchange-traded futures contracts.

Market risk arising from derivative financial instruments is included as part of the overall market risk exposure. The credit risk arising from these transactions is marked against the overall credit exposure to individual counterparties. The financial risk management approaches are outlined in note 36.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## (a) Fair values of derivative financial instruments

An analysis of the fair values of derivative financial instruments held by product type is set out below:

	Group				Fund			
	2012		2011		2012		2011	
	Assets	Liabilities	Assets	Liabilities	Assets	Liabilities	Assets	Liabilities
<b>Derivatives categorised as trading financial instruments</b>								
Interest rate derivatives								
Interest rate swap contracts	1,886	771	1,535	138	1,832	-	1,472	1
Interest rate futures contracts	-	-	1	-	-	-	1	-
Equity derivatives								
Equity contract	303	-	-	-	-	-	-	-
Equity index swaps	-	-	4	-	-	-	4	-
Stock index futures contracts	110	554	529	1	110	554	529	1
Stock index option contracts	43	12	-	-	43	12	-	-
Currency derivatives								
Forward foreign exchange contracts	2,454	1,083	798	662	2,435	1,083	786	649
Bond futures contracts	9	3	4	21	9	3	4	21
	<b>4,805</b>	<b>2,423</b>	<b>2,871</b>	<b>822</b>	<b>4,429</b>	<b>1,652</b>	<b>2,796</b>	<b>672</b>
<b>Derivatives designated as hedging instruments in fair value hedges</b>								
Interest rate derivatives								
Interest rate swap contracts	1,227	-	1,251	19	-	-	-	-
Currency derivatives								
Currency swap contracts	143	170	233	94	-	-	-	-
	<b>1,370</b>	<b>170</b>	<b>1,484</b>	<b>113</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>
<b>TOTAL</b>	<b>6,175</b>	<b>2,593</b>	<b>4,355</b>	<b>935</b>	<b>4,429</b>	<b>1,652</b>	<b>2,796</b>	<b>672</b>

The fair value hedges consist of currency and interest rate swap contracts that are used to protect against changes in the fair value of certain fixed-rate securities due to movements in market interest rates.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## (b) Notional amounts of derivative financial instruments

An analysis of the notional amounts of derivative financial instruments held at the balance sheet date based on the remaining periods to settlement is set out below. The notional amounts of these instruments indicate the volume of outstanding transactions and do not represent the amounts at risk.

	Group									
	Notional amounts with remaining life of									
	Total	2012				Total	2011			
3 months or less		1 year or less but over 3 months	5 years or less but over 1 year	Over 5 years	3 months or less		1 year or less but over 3 months	5 years or less but over 1 year	Over 5 years	
<b>Derivatives categorised as trading financial instruments</b>										
Interest rate derivatives										
Interest rate swap contracts	27,363	1,013	1,004	9,614	15,732	20,726	1,601	1,011	7,000	11,114
Interest rate futures contracts	999	-	-	999	-	3,489	-	843	2,646	-
Equity derivatives										
Equity contract	1,022	-	-	1,022	-	-	-	-	-	-
Equity index swaps	-	-	-	-	-	508	508	-	-	-
Stock index futures contracts	41,380	41,380	-	-	-	37,154	37,154	-	-	-
Stock index option contracts	8,973	8,973	-	-	-	-	-	-	-	-
Currency derivatives										
Forward foreign exchange contracts	168,477	158,593	1,897	7,987	-	172,465	156,340	1,344	14,781	-
Bond futures contracts	9,799	9,799	-	-	-	11,638	11,638	-	-	-
	258,013	219,758	2,901	19,622	15,732	245,980	207,241	3,198	24,427	11,114
<b>Derivatives designated as hedging instruments in fair value hedges</b>										
Interest rate derivatives										
Interest rate swap contracts	16,786	1,532	2,123	9,966	3,165	21,418	1,800	3,827	11,767	4,024
Currency derivatives										
Currency swap contracts	17,465	1,826	6,582	9,057	-	16,503	927	6,244	9,332	-
	34,251	3,358	8,705	19,023	3,165	37,921	2,727	10,071	21,099	4,024
<b>TOTAL</b>	<b>292,264</b>	<b>223,116</b>	<b>11,606</b>	<b>38,645</b>	<b>18,897</b>	<b>283,901</b>	<b>209,968</b>	<b>13,269</b>	<b>45,526</b>	<b>15,138</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

	Fund									
	Notional amounts with remaining life of									
	Total	2012				Total	2011			
3 months or less		1 year or less but over 3 months	5 years or less but over 1 year	Over 5 years	3 months or less		1 year or less but over 3 months	5 years or less but over 1 year	Over 5 years	
<b>Derivatives categorised as trading financial instruments</b>										
Interest rate derivatives										
Interest rate swap contracts	14,532	-	1,000	1,132	12,400	13,400	-	1,000	2,000	10,400
Interest rate futures contracts	999	-	-	999	-	3,489	-	843	2,646	-
Equity derivatives										
Equity index swaps	-	-	-	-	-	508	508	-	-	-
Stock index futures contracts	41,380	41,380	-	-	-	37,154	37,154	-	-	-
Stock index option contracts	8,973	8,973	-	-	-	-	-	-	-	-
Currency derivatives										
Forward foreign exchange contracts	164,986	156,874	1,897	6,215	-	164,575	153,175	1,344	10,056	-
Bond futures contracts	9,799	9,799	-	-	-	11,638	11,638	-	-	-
<b>TOTAL</b>	<b>240,669</b>	<b>217,026</b>	<b>2,897</b>	<b>8,346</b>	<b>12,400</b>	<b>230,764</b>	<b>202,475</b>	<b>3,187</b>	<b>14,702</b>	<b>10,400</b>

## 9 FINANCIAL ASSETS DESIGNATED AT FAIR VALUE

	Group		Fund	
	2012	2011	2012	2011
At fair value				
<b>Debt securities</b>				
<b>Treasury bills and commercial paper</b>				
Listed outside Hong Kong	4,649	18,036	4,649	18,036
Unlisted	775,424	714,828	775,424	714,828
<b>Certificates of deposit</b>				
Unlisted	35,729	-	35,729	-
<b>Other debt securities</b>				
Listed outside Hong Kong	598,138	561,088	596,294	558,932
Unlisted	646,186	559,623	636,439	552,599
<b>Total debt securities</b>	<b>2,060,126</b>	<b>1,853,575</b>	<b>2,048,535</b>	<b>1,844,395</b>
<b>Equity securities</b>				
Listed in Hong Kong	147,971	120,580	147,971	120,580
Listed outside Hong Kong	218,404	183,717	218,404	183,717
Unlisted	66,416	54,525	64,886	54,525
<b>Total equity securities</b>	<b>432,791</b>	<b>358,822</b>	<b>431,261</b>	<b>358,822</b>
<b>TOTAL</b>	<b>2,492,917</b>	<b>2,212,397</b>	<b>2,479,796</b>	<b>2,203,217</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 10 AVAILABLE-FOR-SALE SECURITIES

	Group		Fund	
	2012	2011	2012	2011
<b>Debt securities, at fair value</b>				
Listed outside Hong Kong	334	–	–	–
Unlisted	1,890	294	–	–
	<b>2,224</b>	294	–	–
<b>Equity securities</b>				
Listed in Hong Kong, at fair value	3,318	2,009	–	–
Unlisted, at cost	493	493	493	493
	<b>3,811</b>	2,502	493	493
<b>Investment funds, at fair value</b>				
Unlisted	37,573	20,668	–	–
<b>TOTAL</b>	<b>43,608</b>	23,464	493	493

The Group's investment in unlisted equity securities as at 31 December 2012 represents a holding of 4,285 shares (2011: 4,285 shares) in the Bank for International Settlements. The nominal value of each share is 5,000 Special Drawing Rights and is 25% paid up (also note 34).

## 11 HELD-TO-MATURITY SECURITIES

	Group		Fund	
	2012	2011	2012	2011
At amortised cost				
<b>Debt securities</b>				
Listed in Hong Kong	2,533	1,496	–	–
Listed outside Hong Kong	2,953	3,030	–	–
Unlisted	3,838	3,839	–	–
<b>TOTAL</b>	<b>9,324</b>	8,365	–	–

## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

### 12 LOAN PORTFOLIO

	Group		Fund	
	2012	2011	2012	2011
Mortgage loans, at amortised cost	24,886	31,812	-	-
Non-mortgage loans, at amortised cost	1,013	1,332	-	-
Allowance for loan impairment	(4)	(8)	-	-
<b>TOTAL</b>	<b>25,895</b>	<b>33,136</b>	<b>-</b>	<b>-</b>

### 13 GOLD

	Group and Fund	
	2012	2011
Gold, at market value		
66,798 ounces (2011: 66,798 ounces)	862	817

### 14 OTHER ASSETS

	Group		Fund	
	2012	2011	2012	2011
Interest and dividends receivable	8,591	9,630	8,090	9,120
Unsettled sales and redemption of securities	36,442	5,565	36,442	5,565
Prepayments, receivables and other assets	3,526	7,877	3,138	7,391
Staff housing loans	179	166	179	166
Loan to the International Monetary Fund	483	284	483	284
Deferred tax assets	92	-	-	-
<b>TOTAL</b>	<b>49,313</b>	<b>23,522</b>	<b>48,332</b>	<b>22,526</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 15 INVESTMENTS IN SUBSIDIARIES

	<b>Fund</b>	
	<b>2012</b>	2011
Unlisted shares, at cost	<b>2,145</b>	2,145
Loans to subsidiaries	<b>53,554</b>	31,133
<b>TOTAL</b>	<b>55,699</b>	33,278

The following is a list of the principal subsidiaries as at 31 December 2012:

<b>Name of company</b>	<b>Place of incorporation and operation</b>	<b>Principal activities</b>	<b>Issued equity capital</b>	<b>Group's interest in equity capital</b>
Hong Kong Note Printing Limited	Hong Kong	Banknote printing	HK\$255,000,000	55%
The Hong Kong Mortgage Corporation Limited	Hong Kong	Investment in mortgages and loans, mortgage securitisation and guarantee	HK\$2,000,000,000	100%
Bauhinia HKMC Corporation Limited	People's Republic of China	Mortgage guarantee business	RMB100,000,000	90%
Eight Finance Investment Company Limited	Hong Kong	Investment holding	HK\$1	100%
Drawbridge Investment Limited	Hong Kong	Investment holding	HK\$1	100%
Debt Capital Solutions Company Limited	Hong Kong	Investment holding	HK\$1	100%
Real Gate Investment Company Limited	Hong Kong	Investment properties holding	HK\$1	100%
Stratosphere Finance Company Limited	Hong Kong	Investment holding	HK\$1	100%

Loans to subsidiaries which principally hold investments including properties are unsecured, interest-free and repayable on demand.

The financial statements of these subsidiaries have been audited by firms other than the Audit Commission. The aggregate net assets and income attributed to these companies not audited by the Audit Commission amounted to 2.78% and 4.94% of the Group's respective items.



# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 16 INTERESTS IN ASSOCIATE AND JOINT VENTURES

	Group		Fund	
	2012	2011	2012	2011
<b>Associate</b>				
Unlisted shares, at cost	-	-	-	-
Share of post-acquisition reserves	57	48	-	-
	<b>57</b>	48	-	-
<b>Joint ventures</b>				
Unlisted shares, at cost	-	120	-	-
Due from joint ventures	5,088	3,140	-	-
Share of post-acquisition reserves	110	(66)	-	-
Currency translation differences	(13)	22	-	-
	<b>5,185</b>	3,216	-	-
<b>TOTAL</b>	<b>5,242</b>	3,264	-	-

The Fund holds directly an associate incorporated in Hong Kong (issued share capital: HK\$10,000) which provides interbank clearing services. The Fund holds a 50% (2011: 50%) equity interest.

The Group holds investments in joint ventures through its subsidiaries, the HKMC and Real Gate Investment Company Limited (RG). At the beginning of the year, the HKMC held interest in one joint venture and RG held interest in two joint ventures. During the year:

- the HKMC disposed of its interest in the joint venture;
- RG entered into three more joint ventures with principal activities in holding overseas investment properties; and
- RG increased its interest in one of the joint ventures from 74% to 98% for a total consideration of HK\$781 million, satisfied in cash. The entity became a subsidiary of RG. The transaction was accounted for as purchase of assets and assumption of liabilities and no goodwill was recognised. The major assets of the entity at the date it became a subsidiary of RG included an investment property with fair value of HK\$7,735 million and cash of HK\$91 million, while its major liabilities consisted of bank loans of HK\$4,165 million. Net cash outflow arising from the acquisition is analysed below:

Cash consideration	<b>781</b>
Less: Cash held by the acquired entity	<b>(91)</b>
Net cash outflow	<b>690</b>

At the end of 2012, the Group held equity interest ranging from 48% to 51% (2011: 51% to 74%) in four joint ventures, which are all incorporated outside Hong Kong.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

The Group's share of the joint ventures' assets, liabilities, income and expenses is summarised below:

	<b>Group</b>	
	<b>2012</b>	2011
Current assets	<b>392</b>	442
Non-current assets	<b>10,996</b>	8,241
Current liabilities	<b>252</b>	300
Non-current liabilities	<b>5,951</b>	5,167
Share of income	<b>1,253</b>	955
Share of expenses	<b>608</b>	867

## 17 INVESTMENT PROPERTIES

	<b>Group</b>		<b>Fund</b>	
	<b>2012</b>	2011	<b>2012</b>	2011
At fair value				
At 1 January	<b>3,126</b>	-	-	-
Additions	<b>12,926</b>	3,421	-	-
Change in fair value on revaluation	<b>(133)</b>	(134)	-	-
Exchange difference	<b>461</b>	(161)	-	-
At 31 December	<b>16,380</b>	3,126	-	-

The Group's investment properties were revalued at 31 December 2012 by independent professionally qualified valuers on an open market value basis. The valuers have valued such properties based on market and income approach with reference to comparable market evidence. The market value which is considered as the fair value of each investment property reflects, among other things, rental income from current leases and assumptions about rental income from future leases in light of the current market conditions. The fair value also reflects, on a similar basis, any cash outflows that could be expected in respect of the property.

The Group's investment properties as at 31 December 2011 were revalued by investment managers. The valuation was determined principally using discounted cash flow projections based on estimates of future cash flows, supported by the terms of any existing lease and by external evidence of current market rents for similar properties in the same location.

## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

The carrying amount of the Group's investment properties is analysed as follows:

	Group		Fund	
	2012	2011	2012	2011
Held outside Hong Kong				
on freehold	8,908	3,126	-	-
on long-term lease (over 50 years)	7,472	-	-	-
<b>TOTAL</b>	<b>16,380</b>	<b>3,126</b>	<b>-</b>	<b>-</b>

The Group's investment properties are leased to third parties under operating leases. The gross rental income received and receivable by the Group and the related expenses in respect of these investment properties are summarised as follows:

	Group		Fund	
	2012	2011	2012	2011
Gross rental income	386	134	-	-
Direct expenses	(23)	(1)	-	-
Net rental income	363	133	-	-

The Group's total future minimum lease payments receivable under non-cancellable operating leases are as follows:

	Group		Fund	
	2012	2011	2012	2011
Within one year	954	184	-	-
After one year but not later than five years	3,782	736	-	-
After five years but not later than ten years	4,029	920	-	-
After ten years but not later than fifteen years	2,411	635	-	-
After fifteen years but not later than twenty years	14	-	-	-
<b>TOTAL</b>	<b>11,190</b>	<b>2,475</b>	<b>-</b>	<b>-</b>

At 31 December 2012, investment properties with a fair value of HK\$16,380 million (2011: HK\$3,126 million) were pledged to secure general banking facilities granted to the Group (note 25).

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 18 PROPERTY, PLANT AND EQUIPMENT

(a)

	Group			Total
	Premises	Plant and equipment	Computer software licences and system development costs	
<b>Cost</b>				
At 1 January 2011	3,852	761	262	4,875
Additions	–	56	17	73
Disposals	–	(5)	–	(5)
At 31 December 2011	3,852	812	279	4,943
At 1 January 2012	<b>3,852</b>	<b>812</b>	<b>279</b>	<b>4,943</b>
Additions	–	<b>60</b>	<b>16</b>	<b>76</b>
Disposals	–	<b>(6)</b>	–	<b>(6)</b>
At 31 December 2012	<b>3,852</b>	<b>866</b>	<b>295</b>	<b>5,013</b>
<b>Accumulated depreciation</b>				
At 1 January 2011	633	501	240	1,374
Charge for the year	87	57	7	151
Written back on disposal	–	(5)	–	(5)
At 31 December 2011	720	553	247	1,520
At 1 January 2012	<b>720</b>	<b>553</b>	<b>247</b>	<b>1,520</b>
Charge for the year	<b>89</b>	<b>64</b>	<b>7</b>	<b>160</b>
Written back on disposal	–	<b>(6)</b>	–	<b>(6)</b>
At 31 December 2012	<b>809</b>	<b>611</b>	<b>254</b>	<b>1,674</b>
<b>Net book value</b>				
<b>At 31 December 2012</b>	<b>3,043</b>	<b>255</b>	<b>41</b>	<b>3,339</b>
At 31 December 2011	3,132	259	32	3,423

## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

	Fund			Total
	Premises	Plant and equipment	Computer software licences and system development costs	
<b>Cost</b>				
At 1 January 2011	3,843	268	262	4,373
Additions	–	30	17	47
Disposals	–	(3)	–	(3)
At 31 December 2011	3,843	295	279	4,417
At 1 January 2012	<b>3,843</b>	<b>295</b>	<b>279</b>	<b>4,417</b>
Additions	–	<b>43</b>	<b>16</b>	<b>59</b>
At 31 December 2012	<b>3,843</b>	<b>338</b>	<b>295</b>	<b>4,476</b>
<b>Accumulated depreciation</b>				
At 1 January 2011	629	196	240	1,065
Charge for the year	87	23	7	117
Written back on disposal	–	(3)	–	(3)
At 31 December 2011	716	216	247	1,179
At 1 January 2012	<b>716</b>	<b>216</b>	<b>247</b>	<b>1,179</b>
Charge for the year	<b>88</b>	<b>26</b>	<b>7</b>	<b>121</b>
At 31 December 2012	<b>804</b>	<b>242</b>	<b>254</b>	<b>1,300</b>
<b>Net book value</b>				
<b>At 31 December 2012</b>	<b>3,039</b>	<b>96</b>	<b>41</b>	<b>3,176</b>
At 31 December 2011	3,127	79	32	3,238

**(b) The net book value of premises comprises:**

	Group		Fund	
	2012	2011	2012	2011
In Hong Kong				
Leasehold land and the building situated thereon (leasehold between 10 and 50 years)	<b>3,020</b>	3,109	<b>3,016</b>	3,104
Outside Hong Kong				
Freehold land and the building situated thereon	<b>23</b>	23	<b>23</b>	23
<b>TOTAL</b>	<b>3,043</b>	3,132	<b>3,039</b>	3,127

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 19 CERTIFICATES OF INDEBTEDNESS, GOVERNMENT-ISSUED CURRENCY NOTES AND COINS IN CIRCULATION

	Group and Fund			
	Certificates of Indebtedness		Government-issued currency notes and coins in circulation	
	2012	2011	2012	2011
Carrying amount	<b>289,837</b>	258,702	<b>9,934</b>	9,888
<b>Reconciliation with face value:</b>				
Hong Kong dollar face value	<b>291,675</b>	259,815	<b>9,997</b>	9,930
Linked exchange rate for calculating the US dollars required for redemption	<b>US\$1 = HK\$7.80</b>	US\$1 = HK\$7.80	<b>US\$1 = HK\$7.80</b>	US\$1 = HK\$7.80
US dollars required for redemption	<b>US\$37,394 million</b>	US\$33,310 million	<b>US\$1,282 million</b>	US\$1,273 million
Market exchange rate for translation into Hong Kong dollars	<b>US\$1 = HK\$7.75085</b>	US\$1 = HK\$7.7666	<b>US\$1 = HK\$7.75085</b>	US\$1 = HK\$7.7666
Carrying amount	<b>289,837</b>	258,702	<b>9,934</b>	9,888

## 20 BALANCE OF THE BANKING SYSTEM

Under the interbank payment system based on Real Time Gross Settlement principles, all licensed banks maintain a Hong Kong dollar clearing account with the Hong Kong Monetary Authority (HKMA) for the account of the Fund. The aggregate amount in these clearing accounts, which must not have a negative balance, represents the total level of liquidity in the interbank market.

Under the weak-side Convertibility Undertaking, the HKMA undertakes to convert Hong Kong dollars in these clearing accounts into US dollars at the fixed exchange rate of US\$1 = HK\$7.85. Likewise, under the strong-side Convertibility Undertaking, licensed banks can convert US dollars into Hong Kong dollars in these accounts, as the HKMA undertakes to buy US dollars at the fixed exchange rate of US\$1 = HK\$7.75. Within the Convertibility Zone bounded by the two Convertibility Undertakings, the HKMA may choose to conduct market operations in a manner consistent with Currency Board principles. Such operations can result in matching changes in the balances of these accounts.

The balance of the banking system is repayable on demand, non-interest-bearing and is shown at its Hong Kong dollar amount.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 21 PLACEMENTS BY BANKS AND OTHER FINANCIAL INSTITUTIONS

	Group and Fund	
	2012	2011
At amortised cost		
Placements by central banks	–	24,547

## 22 PLACEMENTS BY FISCAL RESERVES

	Group and Fund	
	2012	2011
<b>Placements with interest payable at a fixed rate determined annually</b>		
General Revenue Account	<b>373,533</b>	342,235
Land Fund	<b>209,267</b>	198,140
Capital Works Reserve Fund	<b>92,103</b>	81,977
Civil Service Pension Reserve Fund	<b>25,742</b>	24,373
Disaster Relief Fund	<b>6</b>	9
Innovation and Technology Fund	<b>2,589</b>	3,067
Lotteries Fund	<b>10,200</b>	9,351
Capital Investment Fund	<b>1,211</b>	1,966
Loan Fund	<b>2,608</b>	2,246
	<b>717,259</b>	663,364
<b>Placements with interest payable at market-based rates</b>		
General Revenue Account	<b>277</b>	143
<b>TOTAL</b>	<b>717,536</b>	663,507

Placements by Fiscal Reserves are repayable on demand. Interest on the majority of the placements by Fiscal Reserves is payable at a fixed rate determined every January. The rate is the average annual investment return of the Fund's Investment Portfolio for the past six years or the average annual yield of three-year Exchange Fund Notes for the previous year subject to a minimum of zero percent, whichever is the higher. This rate has been fixed at 5.6% per annum for 2012 (2011: 6.0%).

## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

### 23 PLACEMENTS BY HONG KONG SPECIAL ADMINISTRATIVE REGION GOVERNMENT FUNDS AND STATUTORY BODIES

	Group and Fund	
	2012	2011
<b>Placements with interest payable at a fixed rate<sup>1</sup> determined annually</b>		
Research Endowment Fund	25,538	19,945
Bond Fund	72,209	50,944
Housing Authority	34,862	33,013
West Kowloon Cultural District Authority	11,756	11,133
Trading Funds	5,028	4,762
Community Care Fund	5,454	5,165
Elite Athletes Development Fund	6,281	–
Samaritan Fund	6,050	–
	<b>167,178</b>	124,962
<b>Placements with interest payable at market-based rates</b>		
Deposit Protection Scheme Fund	735	1,287
<b>TOTAL</b>	<b>167,913</b>	126,249

<sup>1</sup> The rate is the average annual investment return of the Fund's Investment Portfolio for the past six years or the average annual yield of three-year Exchange Fund Notes for the previous year subject to a minimum of zero percent, whichever is the higher. This rate has been fixed at 5.6% per annum for 2012 (2011: 6.0%).

### 24 EXCHANGE FUND BILLS AND NOTES ISSUED

	Group		Fund	
	2012	2011	2012	2011
At fair value				
<b>Exchange Fund Bills and Notes issued</b>				
Exchange Fund Bills	618,263	585,916	618,263	585,916
Exchange Fund Notes	72,721	72,832	72,721	72,832
	<b>690,984</b>	658,748	<b>690,984</b>	658,748
<b>Exchange Fund Bills held</b>	<b>(2,770)</b>	(2,998)	<b>(2,500)</b>	(2,998)
<b>TOTAL</b>	<b>688,214</b>	655,750	<b>688,484</b>	655,750



## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

EFBN issued are unsecured obligations of the Fund and are one of the components of the Monetary Base in the Currency Board Account. Exchange Fund Bills are issued by the Fund for maturities not exceeding one year. Exchange Fund Notes are issued by the Fund with 2-year, 3-year, 5-year, 7-year, 10-year and 15-year maturities. EFBN issued are valued at offer prices derived from the "HKMA EFBN Closing Reference" adjusted by observed market spreads.

Exchange Fund Bills held by the Fund as a result of market making activities are considered as redemption of the bills issued and are derecognised.

The analysis of the nominal value of EFBN issued at the beginning and the end of year is set out below:

	Group				Fund			
	2012		2011		2012		2011	
	Exchange Fund Bills	Exchange Fund Notes	Exchange Fund Bills	Exchange Fund Notes	Exchange Fund Bills	Exchange Fund Notes	Exchange Fund Bills	Exchange Fund Notes
Issued by Currency Board Operations segment								
Nominal value at 1 January	586,113	69,300	583,238	69,900	586,113	69,300	583,238	69,900
Issuance	1,864,764	16,400	1,824,878	16,400	1,864,764	16,400	1,824,878	16,400
Redemption	(1,832,604)	(17,000)	(1,822,003)	(17,000)	(1,832,604)	(17,000)	(1,822,003)	(17,000)
Nominal value at 31 December	618,273	68,700	586,113	69,300	618,273	68,700	586,113	69,300
Long positions held by Financial Stability and Other Activities segment								
Nominal value at 31 December	(2,770)	-	(3,000)	-	(2,500)	-	(3,000)	-
Total nominal value	615,503	68,700	583,113	69,300	615,773	68,700	583,113	69,300
Carrying amount, at fair value	615,493	72,721	582,918	72,832	615,763	72,721	582,918	72,832
Difference	10	(4,021)	195	(3,532)	10	(4,021)	195	(3,532)

The fair value changes of EFBN issued are attributable to changes in benchmark interest rates.

## 25 BANK LOANS

	Group		Fund	
	2012	2011	2012	2011
At amortised cost				
Bank loans repayable:				
After two years but not later than five years	6,120	1,876	-	-
After five years but not later than ten years	3,130	-	-	-
	9,250	1,876	-	-

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 26 MORTGAGE-BACKED SECURITIES ISSUED

	Group		Fund	
	2012	2011	2012	2011
At amortised cost				
Mortgage-backed securities issued	214	367	-	-

The analysis of the nominal value of mortgage-backed securities issued at the beginning and the end of year is set out below:

	Group		Fund	
	2012	2011	2012	2011
Total mortgage-backed securities issued				
Nominal value at 1 January	367	1,506	-	-
Redemption	(153)	(1,139)	-	-
Nominal value at 31 December	214	367	-	-
Carrying amount	214	367	-	-
Difference	-	-	-	-

## 27 OTHER DEBT SECURITIES ISSUED

	Group		Fund	
	2012	2011	2012	2011
Debt securities issued, carried at amortised cost	3,392	3,697	-	-
Debt securities issued, designated as fair value hedge	32,633	36,469	-	-
Debt securities issued, designated at fair value	340	892	-	-
<b>TOTAL</b>	<b>36,365</b>	<b>41,058</b>	<b>-</b>	<b>-</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

The analysis of the nominal value of other debt securities issued at the beginning and the end of year is set out below:

	Group		Fund	
	2012	2011	2012	2011
Total debt securities issued				
Nominal value at 1 January	40,273	38,443	-	-
Issuance	19,098	28,549	-	-
Redemption	(24,149)	(26,719)	-	-
Foreign currency translation difference	7	-	-	-
Nominal value at 31 December	35,229	40,273	-	-
Carrying amount	36,365	41,058	-	-
Difference	(1,136)	(785)	-	-
Debt securities issued, designated at fair value				
Nominal value	389	1,459	-	-
Carrying amount, at fair value	340	892	-	-
Difference	49	567	-	-

The fair value changes of debt securities issued designated at fair value are attributable to changes in benchmark interest rates.

## 28 OTHER LIABILITIES

	Group		Fund	
	2012	2011	2012	2011
Unsettled purchases of securities	25,407	31,467	25,407	31,467
Accrued charges and other liabilities	6,889	6,433	388	376
Interest payable	491	524	211	276
Tax payable	108	136	-	-
Deferred tax liabilities	149	79	-	-
<b>TOTAL</b>	<b>33,044</b>	<b>38,639</b>	<b>26,006</b>	<b>32,119</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 29 EQUITY

	Group		Fund	
	2012	2011	2012	2011
<b>Attributable to owner of the Fund</b>				
<b>Accumulated surplus</b>				
At 1 January	575,968	597,553	567,914	591,503
Surplus/(Deficit) for the year	61,300	(21,585)	55,970	(23,589)
At 31 December	637,268	575,968	623,884	567,914
<b>Revaluation reserve</b>				
At 1 January	1,744	2,078	-	-
Fair value changes on available-for-sale securities:				
– revaluation	2,259	(284)	-	-
– realisation on disposal	(38)	(51)	-	-
– tax effect	(53)	(10)	-	-
Fair value changes on cash flow hedges:				
– revaluation	-	3	-	-
– transferred to income and expenditure account	6	10	-	-
– tax effect	(1)	(2)	-	-
	2,173	(334)	-	-
At 31 December	3,917	1,744	-	-
<b>Translation reserve</b>				
At 1 January	42	41	-	-
Currency translation differences:				
– subsidiaries and joint ventures	1	1	-	-
– reserve released on disposal of a joint venture	(7)	-	-	-
	(6)	1	-	-
At 31 December	36	42	-	-
	641,221	577,754	623,884	567,914
<b>Non-controlling interests</b>				
At 1 January	282	272	-	-
Surplus for the year	39	15	-	-
Other comprehensive income for the year	-	1	-	-
Capital injection by non-controlling interests	167	4	-	-
Dividends paid to non-controlling interests	(10)	(10)	-	-
At 31 December	478	282	-	-
<b>TOTAL</b>	<b>641,699</b>	<b>578,036</b>	<b>623,884</b>	<b>567,914</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 30 ANALYSIS OF CASH AND CASH EQUIVALENTS IN THE STATEMENT OF CASH FLOWS

	Group		Fund	
	2012	2011	2012	2011
Cash and money at call	51,353	60,564	49,978	60,138
Placements with banks and other financial institutions	139,068	171,507	137,930	161,529
Treasury bills and commercial paper	117,392	22,720	117,392	22,720
<b>TOTAL</b>	<b>307,813</b>	<b>254,791</b>	<b>305,300</b>	<b>244,387</b>

### Reconciliation with the balance sheet

	Note	Group		Fund	
		2012	2011	2012	2011
<b>Amounts shown in the balance sheet</b>					
Cash and money at call	6	51,353	60,564	49,978	60,138
Placements with banks and other financial institutions	7	148,042	171,805	138,332	161,529
Financial assets designated at fair value					
Treasury bills and commercial paper	9	780,073	732,864	780,073	732,864
		979,468	965,233	968,383	954,531
Less: Amounts with original maturity beyond 3 months		(671,655)	(710,442)	(663,083)	(710,144)
<b>Cash and cash equivalents in the statement of cash flows</b>		<b>307,813</b>	<b>254,791</b>	<b>305,300</b>	<b>244,387</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 31 OPERATING SEGMENT INFORMATION

The Group determines its operating segments based on the reports reviewed by the chief operating decision maker. As a central banking institution, the HKMA is responsible for managing the Exchange Fund and maintaining the monetary and banking stability of Hong Kong. The Group comprises operating segments as stated in note 2.18.

	Group							
	Currency Board Operations <small>(note 31(a))</small>		Reserves Management		Financial Stability and Other Activities		Total	
	2012	2011	2012	2011	2012	2011	2012	2011
<b>Income</b>								
Interest and dividend income	<b>4,708</b>	5,515	<b>22,196</b>	23,920	<b>1,316</b>	1,186	<b>28,220</b>	30,621
Investment gains/(losses)	<b>(523)</b>	10,914	<b>83,093</b>	[16,217]	<b>129</b>	126	<b>82,699</b>	[5,177]
Other income	-	-	<b>40</b>	21	<b>733</b>	896	<b>773</b>	917
	<b>4,185</b>	16,429	<b>105,329</b>	7,724	<b>2,178</b>	2,208	<b>111,692</b>	26,361
<b>Expenditure</b>								
Interest expense	<b>1,168</b>	1,667	<b>45,890</b>	42,761	<b>361</b>	204	<b>47,419</b>	44,632
Other expenses	<b>811</b>	774	<b>947</b>	858	<b>1,834</b>	1,571	<b>3,592</b>	3,203
	<b>1,979</b>	2,441	<b>46,837</b>	43,619	<b>2,195</b>	1,775	<b>51,011</b>	47,835
<b>Surplus/(Deficit) before share of profit of associate and joint ventures</b>	<b>2,206</b>	13,988	<b>58,492</b>	[35,895]	<b>(17)</b>	433	<b>60,681</b>	[21,474]
Share of profit of associate and joint ventures, net of tax	-	-	<b>642</b>	85	<b>12</b>	4	<b>654</b>	89
Gain from disposal of a joint venture	-	-	-	-	<b>7</b>	-	<b>7</b>	-
<b>Surplus/(Deficit) before taxation</b>	<b>2,206</b>	13,988	<b>59,134</b>	[35,810]	<b>2</b>	437	<b>61,342</b>	[21,385]

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

	Currency Board		Group							
	Operations		Reserves		Financial Stability and		Re-allocation		Total	
	(note 31(a))		Management		Other Activities		(note 31(b) & (c))			
	2012	2011	2012	2011	2012	2011	2012	2011	2012	2011
<b>Assets</b>										
Backing Assets										
Investment in designated US dollar assets	1,317,605	1,183,554	-	-	-	-	-	-	1,317,605	1,183,554
Interest receivable on designated US dollar assets	1,427	1,728	-	-	-	-	-	-	1,427	1,728
Net accounts receivable/(payable)	(3,487)	(13,330)	-	-	-	-	3,487	17,447	-	4,117
Other investments	-	-	1,416,972	1,220,734	61,816	115,648	(2,770)	(2,998)	1,476,018	1,333,384
Other assets	-	-	19,610	17,481	6,375	6,502	31,415	1,472	57,400	25,455
<b>TOTAL ASSETS</b>	<b>1,315,545</b>	<b>1,171,952</b>	<b>1,436,582</b>	<b>1,238,215</b>	<b>68,191</b>	<b>122,150</b>	<b>32,132</b>	<b>15,921</b>	<b>2,852,450</b>	<b>2,548,238</b>
<b>Liabilities</b>										
Monetary Base										
Certificates of Indebtedness	289,837	258,702	-	-	-	-	-	-	289,837	258,702
Government-issued currency notes and coins in circulation	9,934	9,888	-	-	-	-	-	-	9,934	9,888
Balance of the banking system	255,851	148,684	-	-	-	-	-	-	255,851	148,684
Exchange Fund Bills and Notes issued	690,984	658,748	-	-	-	-	(2,770)	(2,998)	688,214	655,750
Interest payable on Exchange Fund Notes	211	276	-	-	-	-	-	-	211	276
Net accounts (receivable)/payable	(31,415)	(1,471)	-	-	-	-	31,415	1,472	-	1
Mortgage-backed securities issued	-	-	-	-	214	367	-	-	214	367
Other debt securities issued	-	-	-	-	36,365	41,058	-	-	36,365	41,058
Placements by banks and other financial institutions	-	-	-	-	-	24,547	-	-	-	24,547
Bank loans	-	-	9,250	1,876	-	-	-	-	9,250	1,876
Placements by Fiscal Reserves	-	-	717,536	663,507	-	-	-	-	717,536	663,507
Placements by HKSAR government funds and statutory bodies	-	-	167,178	124,962	735	1,287	-	-	167,913	126,249
Other liabilities	-	-	25,035	14,977	6,904	6,873	3,487	17,447	35,426	39,297
<b>TOTAL LIABILITIES</b>	<b>1,215,402</b>	<b>1,074,827</b>	<b>918,999</b>	<b>805,322</b>	<b>44,218</b>	<b>74,132</b>	<b>32,132</b>	<b>15,921</b>	<b>2,210,751</b>	<b>1,970,202</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## **(a) Currency Board Operations**

Starting from 1 October 1998, specific US dollar assets of the Fund have been designated to back the Monetary Base, which comprises Certificates of Indebtedness, government-issued currency notes and coins in circulation, the balance of the banking system and EFBN issued. While specific assets of the Fund have been earmarked for backing the Monetary Base, all the Fund's assets have continued to be available for the purpose of supporting the Hong Kong dollar exchange rate under the Linked Exchange Rate system.

In accordance with an arrangement approved by the Financial Secretary in January 2000, assets can be transferred between the Backing Portfolio and general reserves when the Backing Ratio reaches either the upper trigger point (112.5%) or the lower trigger point (105%). This arrangement allows transfer of excess assets out of the Backing Portfolio to maximise their earning potential while ensuring that there are sufficient liquid assets in the Backing Portfolio. The Backing Ratio stood at 108.07% as at 31 December 2012 (2011: 108.92%).

## **(b) Re-allocation of assets and liabilities**

For the purpose of the Currency Board Operations segment, certain liabilities of the Fund are deducted from the Backing Assets and certain assets are deducted from the Monetary Base in order to allow proper computation of the Backing Ratio. This re-allocation adjustment adds back these items in order to reconcile the segmental information to the Group balance sheet.

The Backing Assets are presented on a net basis in the Currency Board Operations. Accounts payable for unsettled purchases of securities are included in "net accounts payable" to offset corresponding investments in the Backing Assets. As at 31 December 2012, deductions from the Backing Assets comprised "other liabilities" of HK\$3,487 million (2011: HK\$17,447 million).

The Monetary Base is also presented on a net basis. As at 31 December 2012, deductions from the Monetary Base comprising "other assets" of HK\$31,415 million (2011: HK\$1,472 million) consisted of two components:

- As Hong Kong dollar interest rate swaps have been used as a means to manage the cost of issuing Exchange Fund Notes, interest receivable of HK\$29 million (2011: HK\$29 million) and revaluation gains of HK\$1,803 million (2011: HK\$1,443 million) on these interest rate swaps are included in "net accounts (receivable)/payable" to reduce the Monetary Base.
- EFBN issued on tender date but not yet settled of HK\$29,583 million (2011: Nil) are included in "net accounts (receivable)/payable" to reduce the Monetary Base.

**(c)** EFBN held by the Financial Stability and Other Activities segment are treated as redemption of EFBN issued in the Currency Board Operations segment.



# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 32 PLEDGED ASSETS

Assets are pledged as margin for stock index and bond futures contracts as well as securities lending agreements, as securities for issuing mortgage-backed securities and as collateral for securing general banking facilities. Securities lent do not include EFBN in issue. There are no financial assets pledged against contingent liabilities.

	Note	Group		Fund	
		2012	2011	2012	2011
<b>Secured liabilities</b>					
Stock index futures contracts – notional amount	8(b)	<b>41,380</b>	37,154	<b>41,380</b>	37,154
Bond futures contracts – notional amount	8(b)	<b>9,799</b>	11,638	<b>9,799</b>	11,638
Interest rate futures contracts – notional amount	8(b)	<b>999</b>	3,489	<b>999</b>	3,489
Bank loans	25	<b>9,250</b>	1,876	–	–
Mortgage-backed securities issued	26	<b>214</b>	367	–	–
<b>Assets pledged</b>					
Financial assets designated at fair value		<b>4,726</b>	5,157	<b>4,726</b>	5,157
Investment properties		<b>16,380</b>	3,126	–	–
Mortgage loans		<b>210</b>	529	–	–

During the year, the Group entered into collateralised reverse repurchase agreements, repurchase agreements and securities lending transactions that may result in credit exposure in the event that the counterparty to the transaction is unable to fulfil its contractual obligations. The Group controls credit risk associated with these activities by monitoring counterparty credit exposure and collateral values on a daily basis and requiring additional collateral to be deposited with or returned to the Group when deemed necessary.

These transactions are conducted under terms that are usual and customary to standard lending, and securities borrowing and lending activities.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 33 COMMITMENTS

### (a) Capital commitments

Capital expenditure authorised but not provided for in the financial statements at the balance sheet date was as follows:

	Group		Fund	
	2012	2011	2012	2011
Contracted for	38	1	34	1
Authorised but not yet contracted for	276	165	168	151
	314	166	202	152

### (b) Credit facility to the International Monetary Fund

The Fund has participated in the New Arrangements to Borrow (NAB), a standby credit facility provided to the International Monetary Fund (IMF) for the purpose of managing instability in the international monetary system. The facility is subject to periodic review and renewal. As at 31 December 2012, the Fund had an undertaking under the NAB to lend foreign currencies to the IMF up to HK\$4,050 million equivalent (2011: HK\$4,054 million equivalent), in the form of a loan bearing prevailing market interest rates. The outstanding principal due from the IMF under the NAB amounted to HK\$483 million equivalent with a repayment term of five years (2011: HK\$284 million equivalent).

### (c) Credit facility to the Hong Kong Deposit Protection Board

The Fund has provided the Hong Kong Deposit Protection Board (HKDPB) with a standby credit facility of HK\$120 billion (2011: HK\$120 billion) at prevailing market interest rates for meeting the necessary liquidity required for payment of compensation in the event of a bank failure. As at 31 December 2012, there was no outstanding balance due from the HKDPB under this facility (2011: Nil).

### (d) Credit facility to The Hong Kong Mortgage Corporation Limited

The Fund has provided the HKMC with a revolving credit facility of HK\$30 billion (2011: HK\$30 billion) at prevailing market interest rates. As at 31 December 2012, there was no outstanding balance due from the HKMC under this facility (2011: Nil).

### (e) Repurchase agreements with other central banks

The Fund has entered into bilateral repurchase agreements with various central banks in Asia and Australasia amounting up to HK\$44,567 million equivalent (2011: HK\$44,658 million equivalent). The arrangement allows each organisation to enhance the liquidity of its foreign reserve portfolio with minimal additional risk. As at 31 December 2012, there was no outstanding transaction with any central bank under this arrangement (2011: Nil).

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## (f) Chiang Mai Initiative Multilateralisation Agreement

The Chiang Mai Initiative Multilateralisation (CMIM) was established under the aegis of the 10 Association of Southeast Asian Nations (ASEAN) member countries together with China, Japan and Korea (ASEAN+3) to provide short-term US dollars through currency swap transactions to participants facing balance-of-payments and liquidity difficulties with a total size of US\$120 billion. Hong Kong, through the HKMA, participates in the CMIM and has undertaken to commit up to US\$4.2 billion out of the Fund. Hong Kong has the right to request liquidity support up to US\$2.1 billion from the CMIM in case of emergency. Up to 31 December 2012, there had been no request to activate the CMIM.

## (g) Bilateral swap agreement

The People's Bank of China (PBoC) and the HKMA signed a bilateral swap agreement in November 2011 for a term of three years. This currency swap agreement, with a size of RMB400 billion/HK\$490 billion, helps facilitate the development of offshore renminbi business in Hong Kong. There was no outstanding transaction with the PBoC at 31 December 2012 (2011: RMB20 billion).

## (h) Investment commitments

The Group's subsidiaries with principal activities for holding investment including properties had investment commitment of HK\$63,813 million equivalent as at 31 December 2012 (2011: HK\$56,024 million equivalent).

## (i) Lease commitments

As at 31 December 2012, the total future minimum lease payments payable under non-cancellable operating leases of premises were as follows:

	Group		Fund	
	2012	2011	2012	2011
Within one year	57	56	43	42
After one year but not later than five years	141	52	128	25
<b>TOTAL</b>	<b>198</b>	108	<b>171</b>	67

## (j) Financial Dispute Resolution Centre Limited

The Financial Services and the Treasury Bureau (FSTB), the HKMA and Securities and Futures Commission (SFC) have agreed to contribute the set-up costs and the operating costs of the Financial Dispute Resolution Centre Limited (FDRCL) for the first three years from 1 January 2012 to 31 December 2014. The HKMA signed a Memorandum of Understanding regarding the relevant funding arrangement with the FSTB and SFC on 21 December 2011. During the year, the Fund had contributed HK\$14 million to FDRCL (2011: HK\$4 million). The outstanding commitment of the Fund to contribute to FDRCL as at 31 December 2012 was HK\$28 million (2011: HK\$42 million).

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 34 CONTINGENT LIABILITIES

As at 31 December 2012, the Fund had a contingent liability of up to 16.1 million Special Drawing Rights or HK\$191 million equivalent (2011: 16.1 million Special Drawing Rights or HK\$192 million equivalent), in respect of the uncalled portion of its 4,285 shares (2011: 4,285 shares) in the Bank for International Settlements (note 10).

## 35 MATERIAL RELATED PARTY TRANSACTIONS

Transactions with related parties are conducted at rates determined by the Monetary Authority taking into account the nature of each transaction on a case-by-case basis.

In addition to the transactions and balances disclosed elsewhere in these financial statements, during the year, the Group, through the HKMC, purchased HK\$127 million (2011: HK\$118 million) of mortgage loans from the HKSAR Government.

The Exchange Fund Advisory Committee (EFAC) through its Sub-Committees advises the Financial Secretary in his control of the Fund. Members of the EFAC and its Sub-Committees are appointed in a personal capacity by the Financial Secretary for the expertise and experience that they can bring to the Committees. Transactions with companies related to members of the EFAC and its Sub-Committees, if any, have been conducted as a normal part of the operation of the Group and on terms consistent with its ongoing operations.

## 36 FINANCIAL RISK MANAGEMENT

This note presents information about the nature and extent of risks to which the Group is exposed, in particular those arising from financial instruments, and the risk management framework of the Group. The principal financial risks the Group is exposed to are credit risk, market risk and liquidity risk.

### 36.1 Governance

The Financial Secretary is advised by the EFAC in his control of the Fund. The EFAC is established under section 3(1) of the Exchange Fund Ordinance, which requires the Financial Secretary to consult the Committee in his exercise of control of the Fund. Members of the EFAC are appointed in a personal capacity by the Financial Secretary under the delegated authority of the Chief Executive of the HKSAR for the expertise and experience that they can bring to the Committee. Such expertise and experience include knowledge of monetary, financial and economic affairs and of investment issues, as well as of accounting, management, business and legal matters.

The EFAC is assisted in its work by five Sub-Committees, which monitor specific areas of the HKMA's work and report and make recommendations to the Financial Secretary through the EFAC.

Among these Sub-Committees, the Investment Sub-Committee (ISC) monitors the HKMA's investment management activities and makes recommendations on the investment policy and strategy of the Fund and on risk management and other related matters. Operating within the policies and guidelines endorsed by the EFAC, the Reserves Management Department of the HKMA conducts the day-to-day investment management of the Fund while the Risk Management and Compliance Division (RMC Division), which is independent of the Reserves Management Department, carries out the risk management activities of the Fund.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 36.2 Investment management and control

Investment activities of the Fund are conducted in accordance with the investment benchmark derived from the Fund's investment objectives. The investment benchmark directs the strategic asset allocation of the Fund and is reviewed on a regular basis to ensure that it consistently meets the investment objectives. Changes to the investment benchmark, if required, must be endorsed by the EFAC.

The Fund's target asset and currency mix were as follows:

	2012	2011
<b>Asset type</b>		
Bonds	75%	75%
Equities and related investments	25%	25%
	100%	100%
<b>Currency</b>		
US dollar and Hong Kong dollar	79%	81%
Others <sup>1</sup>	21%	19%
	100%	100%

<sup>1</sup> Other currencies included mainly Australian dollar, Canadian dollar, euro, sterling and yen.

In addition to the investment benchmark, the EFAC determines the tactical deviation limits governing the extent to which the Fund's asset and currency mix may deviate from the investment benchmark. The tactical deviation limits are used to guide the medium term investments for the Fund. The tactical deviation limits are derived from a risk-based approach, taking into account the risk tolerance level set by the EFAC and risk contributions of the asset classes and markets that the Fund is allowed to invest in. These risk contributions reflect the neutral allocations of asset markets within the investment benchmark, and the volatility of and correlation across asset markets. Authority to take medium term investment decisions is delegated to senior management of the HKMA down to the Executive Director level.

The RMC Division is responsible for risk management and compliance monitoring regarding the investments of the Fund. The RMC Division monitors the risk exposure of the Fund, checks compliance of investment activities against established guidelines and reports and follows up any identified breaches.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 36.3 Credit risk

Credit risk is the risk of financial loss when a counterparty or a borrower fails to meet its contractual obligations. The Group's credit risk arises principally from the investments of the Fund and the loan portfolio of the HKMC.

### 36.3.1 Management of credit risk

The HKMA maintains effective credit risk management over the investments of the Fund. Based on the delegated authority of the EFAC, the Credit Review and Compliance Committee (CRCC) was established within the HKMA with the following responsibilities: (i) to establish and maintain the Credit Exposure Policy to govern the investments of the Fund; (ii) to review the adequacy of the existing credit risk management practices and, where necessary, formulate proposals for amendments; (iii) to conduct analysis of credit risk issues; (iv) to establish and review credit limits for the approved issuers and counterparties; and (v) to monitor the compliance of the investments of the Fund with the established policies and limits, and report and follow up any identified breaches. The CRCC is chaired by the Deputy Chief Executive (Monetary) whose responsibilities are independent of the day-to-day investment activities of the Fund, and includes representatives from the Reserves Management Department, the Monetary Management Department, the Research Department and the RMC Division of the HKMA.

In light of the rapidly evolving risk environment, the HKMA will remain vigilant in monitoring and managing the Fund's credit risk exposure, and will sustain the impetus for better credit risk management practices to support the investment activities of the Fund.

Credit limits are established in accordance with in-house methodologies as set out in the Exchange Fund Investment Policy and Credit Exposure Policy to control the exposures to counterparty, issuer and country risks arising from the investments of the Fund.

#### (a) Counterparty risk

The Fund selects its counterparties in lending, placement, derivatives and trading transactions prudently and objectively. Since the Fund conducts transactions with a counterparty for a range of financial instruments, credit limits are established to control the overall exposure to each authorised counterparty based on its credit ratings, financial strength, the size of its total assets and capital, and other relevant information.

Counterparty credit exposures are measured according to the risk nature of financial products involved in the transaction. Counterparty credit exposures of derivatives include an estimate for the potential future credit exposure of the derivative contracts, in addition to their positive mark-to-market replacement value.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## (b) Issuer risk

Issuer risk arises from investments in debt securities. Credit limits for approved issuers are set on both individual and group levels to control the risk of loss caused by the default of debt securities issuers and to prevent undue risk concentration.

Moreover, to be qualified as an approved investment, a new market or financial instrument must meet the minimum credit, security and liquidity requirements of the Fund.

## (c) Country risk

Country risk is broadly defined to include both the transfer risk and the sovereign risk. Under the existing framework, country limits are established to control the Fund's overall credit risk exposures to the countries endorsed by the EFAC. These country limits are set to reflect the status of a country's sovereign credit quality and the default risks of the debt issued by its government.

The above credit limits are reviewed regularly. Credit exposure is monitored against these limits on a daily basis. To ensure prompt identification, proper approval and consistent monitoring of credit risk, the Fund has implemented a unified automated credit monitoring system which provides fully-integrated straight-through-processing linking the front, middle and back office functions. The pre-deal checking takes place in the front office prior to the commitment of any transaction to ensure that the intended transaction will not exceed the credit limits. The end-of-day compliance checking further verifies that the Fund complies with the established credit policies and procedures.

Any breaches of credit limits are reported to the CRCC, the ISC and the EFAC, and are followed up by the RMC Division in a timely manner. The approval authorities to sanction these breaches are set out in the Credit Exposure Policy.

To manage the exposure to credit risk arising from the loan portfolio and mortgage insurance business, a four-pronged approach is established for (i) selecting Approved Sellers carefully, (ii) adopting prudent mortgage purchasing criteria and insurance eligibility criteria, (iii) conducting effective due diligence reviews and (iv) ensuring adequate protection for higher-risk mortgages.

## Exchange Fund – Notes to the Financial Statements *(continued)*

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

### 36.3.2 Exposure to credit risk

The maximum exposure to credit risk of the financial assets of the Group and the Fund are equal to their carry amounts. The maximum exposures to credit risk of off-balance sheet exposures are as follows:

	Note	Group		Fund	
		2012	2011	2012	2011
Risk in force – mortgage insurance	36.6	<b>16,615</b>	16,624	-	-
Risk in force – other guarantee and insurance		<b>1,152</b>	875	-	-
Loan commitments and other credit related commitments		<b>264,533</b>	257,119	<b>230,720</b>	231,095
<b>TOTAL</b>		<b>282,300</b>	274,618	<b>230,720</b>	231,095

The loan portfolio is secured by mortgages on properties. Reserve funds and deferred considerations are also used as an additional form of credit enhancement.



# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 36.3.3 Credit quality

The Group predominantly invests in liquid Organisation for Economic Co-operation and Development (OECD) government bonds and other quasi-government debt securities issues. As at 31 December 2012, approximately 90% (2011: 92%) of the debt securities held by the Group were rated “double-A” or above by both Moody’s and Standard & Poor’s. The credit quality of major financial assets is analysed below:

	Group		Fund	
	2012	2011	2012	2011
<b>Cash and money at call, placements with banks and other financial institutions, by credit rating<sup>1</sup></b>				
AAA	708	697	708	697
AA- to AA+	109,257	99,452	108,360	98,127
A- to A+	85,346	105,714	76,273	97,336
Lower than A- or un-rated <sup>2</sup>	4,084	26,506	2,969	25,507
	<b>199,395</b>	232,369	<b>188,310</b>	221,667
<b>Debt securities, by credit rating<sup>1</sup></b>				
AAA	493,163	531,990	490,040	529,543
AA- to AA+	1,361,834	1,172,266	1,355,254	1,166,838
A- to A+	46,202	9,432	44,356	8,648
Lower than A- or un-rated <sup>2</sup>	170,475	148,546	158,885	139,366
	<b>2,071,674</b>	1,862,234	<b>2,048,535</b>	1,844,395
<b>Loan portfolio</b>				
Neither past due nor impaired (note 36.3.3(a))	25,518	32,707	-	-
Past due but not impaired (note 36.3.3(b))	379	432	-	-
Impaired (note 36.3.3(c))	2	5	-	-
Allowance for loan impairment	(4)	(8)	-	-
	<b>25,895</b>	33,136	-	-
<b>TOTAL</b>	<b>2,296,964</b>	2,127,739	<b>2,236,845</b>	2,066,062

<sup>1</sup> This is the lower of ratings designated by Moody’s and Standard & Poor’s.

<sup>2</sup> These included mainly balances with central banks and debt securities issued by the Bank for International Settlements which are not rated.

## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

### (a) Loans that are neither past due nor impaired

An internal rating system is used for assessing the credit quality of the loan portfolio. Grades 1 to 3 include loans with no previous past due experience and with different levels of credit enhancements in addition to the collateral. Grade 4 includes loans with previous past due experience and with different levels of credit enhancements in addition to the collateral. Grade 5 includes loans with previous past due experience and collateral but without further credit enhancement. The credit quality of loans that were neither past due nor impaired at the balance sheet date is analysed below:

	Group		Fund	
	2012	2011	2012	2011
Grades				
1 to 3	25,500	32,693	-	-
4	-	-	-	-
5	18	14	-	-
<b>TOTAL</b>	<b>25,518</b>	<b>32,707</b>	<b>-</b>	<b>-</b>

### (b) Loans that are past due but not impaired

These are loans where contractual interest or principal payments are past due but the Group believes that recognising an impairment loss is not appropriate on the basis of the level of collateral held. The loans that were past due but not impaired at the balance sheet date are analysed below:

	Group		Fund	
	2012	2011	2012	2011
Loans that were past due				
90 days or less	376	430	-	-
91 to 180 days	-	1	-	-
over 180 days	3	1	-	-
<b>TOTAL</b>	<b>379</b>	<b>432</b>	<b>-</b>	<b>-</b>
Fair value of collateral and other credit enhancements	2,531	2,358	-	-

### (c) Impaired loans

These are loans where the Group determines on an individual basis that it is probable that it will be unable to collect all principal and interest due according to the contractual terms of the loan agreements. As at 31 December 2012, the fair value of related collateral held and credit enhancement was HK\$8 million (2011: HK\$14 million).

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 36.3.4 Concentration of credit risk

The majority of the Group's debt holdings are highly liquid securities issued or guaranteed by OECD governments and other quasi-government entities. The maximum credit risk exposure by industry groups is analysed below:

	Group		Fund	
	2012	2011	2012	2011
Governments and government agencies <sup>1</sup>	<b>1,755,383</b>	1,681,766	<b>1,754,458</b>	1,680,862
Supra-nationals	<b>171,433</b>	115,688	<b>171,411</b>	115,665
States, provinces and public-sector entities <sup>2</sup>	<b>176,283</b>	175,424	<b>204,720</b>	204,530
Financial institutions	<b>221,984</b>	188,087	<b>203,944</b>	171,892
Others <sup>3</sup>	<b>314,566</b>	272,409	<b>239,326</b>	180,663
<b>TOTAL</b>	<b>2,639,649</b>	2,433,374	<b>2,573,859</b>	2,353,612

<sup>1</sup> These included debt securities guaranteed by governments.

<sup>2</sup> These included debt securities guaranteed by states.

<sup>3</sup> These included debt securities issued by the Bank for International Settlements.

## 36.4 Market risk

Market risk is the risk that changes in market variables such as interest rates, exchange rates and equity prices may affect the fair values or cash flows of investments.

### 36.4.1 Types of market risk

#### (a) Interest rate risk

Interest rate risk refers to the risk of loss arising from changes in market interest rates. This can be further classified into fair value interest rate risk and cash flow interest rate risk.

Fair value interest rate risk is the risk that the fair value of a financial instrument will fluctuate because of changes in market interest rates. The Group is exposed to fair value interest rate risk since a substantial portion of its investments is in fixed-rate debt securities. These securities are subject to interest rate risk as their fair values will fall when market interest rates increase. Other significant financial assets and financial liabilities with a fixed interest rate and therefore subject to interest rate risk include placements with banks and other financial institutions and EFBN issued.

Cash flow interest rate risk is the risk that future cash flows of a financial instrument will fluctuate because of changes in market interest rates. Because the Group has no significant floating-rate investments and liabilities, the Group's future cash flows are not materially affected by potential changes in market interest rates.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## (b) Currency risk

Currency risk is the risk of loss arising from changes in foreign exchange rates. A large portion of the Group's foreign currency assets is held in US dollars with the remaining mainly in other major international currencies. When the exchange rates of the relevant foreign currencies against the Hong Kong dollar fluctuate, the value of these foreign currency assets expressed in Hong Kong dollar will vary accordingly.

Due to the linked exchange rate of the US dollar relative to the Hong Kong dollar, the Group's currency risk principally arises from its assets and liabilities denominated in foreign currencies other than the US dollar.

## (c) Equity price risk

Equity price risk is the risk of loss arising from changes in prices and valuation. The Group's equity and related investments are subject to price risk since the value of these investments will decline if market prices or valuation fall.

The majority of the equity securities held by the Group are constituent stocks of major stock market indexes and companies with large market capitalisation.

### 36.4.2 Management of market risk

The market risk of the Fund as a whole is regularly measured and monitored to prevent excessive risk exposure. The investment benchmark and tactical deviation limits of the Fund govern the asset allocation strategies. This, together with the volatility of asset markets, will affect the Fund's market risk exposure. The Fund uses derivative financial instruments to manage its exposures to market risk and to facilitate the implementation of investment strategies. The market risk of the Fund is mainly measured and monitored using the Value-at-Risk (VaR) methodology.

VaR is calculated using the parametric approach based on a 95% confidence level and one-month time horizon. The result represents the maximum expected loss of the Fund over a one-month period under normal market conditions, with a 5% chance that the actual loss may exceed the calculated VaR. The Fund's absolute VaR and the relative VaR (i.e. the VaR of the Fund relative to its investment benchmark), expressed in dollar amounts, are measured by the RMC Division and reported to management, the ISC and the EFAC on a regular basis.

The relative VaR of the Fund is also used to calculate the actual tracking error of the Fund against its investment benchmark. This is regularly monitored against the tracking error limit endorsed by the EFAC to ensure that the market risk exposure of the Fund is within its limit. The tracking error of a portfolio indicates how well the portfolio tracks its investment benchmark. The smaller the tracking error, the better the portfolio tracks its benchmark. The tracking error limit is established to prevent the Fund from taking unduly large market risk with respect to its investment benchmark. The actual tracking error of the Fund is regularly reported to the ISC and the EFAC, and any breach of the limit is followed up in a timely manner.

## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

VaR is a widely accepted measure of market risk within the financial services industry. It provides users with a single amount to measure market risk and takes into account multiple risks. VaR should however be assessed in the context of some of its inherent limitations. The calculation of VaR involves a number of assumptions that may or may not be valid in a real life scenario, in particular in extreme market conditions. The calculation of VaR assumes that future events can be predicted by historical data, and that changes in risk factors follow a normal distribution. The end-of-day basis does not reflect intraday exposures. In addition, the confidence level on which calculation of VaR is based needs to be taken into account as it indicates the possibility that a larger loss could be realised.

To compensate for some of the limitations of VaR, the HKMA also conducts stress tests to estimate the potential losses under extremely adverse market conditions. This serves to identify the major attributes of market risk under extreme market conditions, and helps to prevent the Fund from being exposed to excessive market risk. The results of the stress tests are also reported to the ISC and the EFAC on a regular basis.

In addition, to manage the interest rate risk arising from the fixed-rate debt securities issued by the Group to fund the purchase of portfolios of loans, a major portion of the risk is hedged using fair value hedges in the form of interest rate swaps by swapping into floating-rate funding to better match the floating-rate assets.

The Fund's investment in less liquid assets (e.g. real estates) is grouped under the Long-Term Growth Portfolio. The investment risks of the less liquid assets are controlled at the aggregate level through such measures as asset class approval, allocation limit, country concentration limit and aggregate counterparty exposure. As determined by the EFAC, the maximum size of the Long-Term Growth Portfolio is at one-third of the Accumulated Surplus of the Exchange Fund.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 36.4.3 Exposure to market risk

### (a) Interest rate risk

The interest rate gap position in respect of the Group's major interest-bearing assets and liabilities, including the net repricing effect of interest rate derivatives is shown below. The assets and liabilities are stated at carrying amounts at the balance sheet date and categorised by the earlier of contractual repricing dates or maturity dates.

	Group – 2012							Non-interest-bearing financial instruments
	Repricing period of interest-bearing financial instruments							
	1 month or less	3 months or less but over 1 month	1 year or less but over 3 months	5 years or less but over 1 year	10 years or less but over 5 years	Over 10 years	Total	
<b>Assets</b>								
Cash and money at call	50,976	-	-	-	-	-	50,976	377
Placements with banks and other financial institutions	137,051	5,941	5,050	-	-	-	148,042	-
Financial assets designated at fair value	230,737	346,738	478,597	568,608	250,646	170,705	2,046,031	446,886
Available-for-sale securities	868	703	653	-	-	-	2,224	41,384
Held-to-maturity securities	144	50	1,563	3,804	3,763	-	9,324	-
Loan portfolio	24,657	1,169	37	24	8	-	25,895	-
<b>Interest-bearing assets</b>	<b>444,433</b>	<b>354,601</b>	<b>485,900</b>	<b>572,436</b>	<b>254,417</b>	<b>170,705</b>	<b>2,282,492</b>	
<b>Liabilities</b>								
Placements by Fiscal Reserves with interest payable at market-based rates <sup>1</sup>	277	-	-	-	-	-	277	-
Placements by HKSAR government funds and statutory bodies with interest payable at market-based rates <sup>1</sup>	735	-	-	-	-	-	735	-
Exchange Fund Bills and Notes issued	171,980	282,947	176,467	39,967	9,694	7,159	688,214	-
Bank loans	9,250	-	-	-	-	-	9,250	-
Mortgage-backed securities issued	214	-	-	-	-	-	214	-
Other debt securities issued	5,973	12,124	2,136	12,118	3,270	744	36,365	-
<b>Interest-bearing liabilities</b>	<b>188,429</b>	<b>295,071</b>	<b>178,603</b>	<b>52,085</b>	<b>12,964</b>	<b>7,903</b>	<b>735,055</b>	
<b>Net interest-bearing assets/(liabilities)</b>	<b>256,004</b>	<b>59,530</b>	<b>307,297</b>	<b>520,351</b>	<b>241,453</b>	<b>162,802</b>	<b>1,547,437</b>	
<b>Interest rate derivatives (net position, notional amounts)</b>	<b>1,272</b>	<b>(23,374)</b>	<b>3,119</b>	<b>6,441</b>	<b>5,791</b>	<b>6,722</b>	<b>(29)</b>	
<b>Interest rate sensitivity gap</b>	<b>257,276</b>	<b>36,156</b>	<b>310,416</b>	<b>526,792</b>	<b>247,244</b>	<b>169,524</b>	<b>1,547,408</b>	

<sup>1</sup> Placements by Fiscal Reserves, HKSAR government funds and statutory bodies with interest payable at a fixed rate determined annually are excluded because their interest rate is not fixed directly on the basis of market interest rates (notes 22 and 23). The fixed rate is determined every January. As at 31 December 2012, such placements amounted to HK\$884,437 million (2011: HK\$788,326 million).

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

	Group – 2011							Non-interest-bearing financial instruments
	Repricing period of interest-bearing financial instruments							
	1 month or less	3 months or less but over 1 month	1 year or less but over 3 months	5 years or less but over 1 year	10 years or less but over 5 years	Over 10 years	Total	
<b>Assets</b>								
Cash and money at call	35,658	-	-	-	-	-	35,658	24,906
Placements with banks and other financial institutions	166,212	5,593	-	-	-	-	171,805	-
Financial assets designated at fair value	216,774	248,887	393,380	562,752	244,535	178,047	1,844,375	368,022
Available-for-sale securities	-	294	-	-	-	-	294	23,170
Held-to-maturity securities	-	144	780	3,967	3,474	-	8,365	-
Loan portfolio	30,645	2,389	63	25	14	-	33,136	-
<b>Interest-bearing assets</b>	<b>449,289</b>	<b>257,307</b>	<b>394,223</b>	<b>566,744</b>	<b>248,023</b>	<b>178,047</b>	<b>2,093,633</b>	
<b>Liabilities</b>								
Placements by banks and other financial institutions	-	-	-	-	-	-	-	24,547
Placements by Fiscal Reserves with interest payable at market-based rates <sup>1</sup>	143	-	-	-	-	-	143	-
Placements by HKSAR government funds and statutory bodies with interest payable at market-based rates <sup>1</sup>	1,287	-	-	-	-	-	1,287	-
Exchange Fund Bills and Notes issued	134,702	320,349	145,132	40,547	8,763	6,257	655,750	-
Bank loans	1,876	-	-	-	-	-	1,876	-
Mortgage-backed securities issued	367	-	-	-	-	-	367	-
Other debt securities issued	10,804	4,204	7,290	13,828	3,637	1,295	41,058	-
<b>Interest-bearing liabilities</b>	<b>149,179</b>	<b>324,553</b>	<b>152,422</b>	<b>54,375</b>	<b>12,400</b>	<b>7,552</b>	<b>700,481</b>	
<b>Net interest-bearing assets/(liabilities)</b>	<b>300,110</b>	<b>(67,246)</b>	<b>241,801</b>	<b>512,369</b>	<b>235,623</b>	<b>170,495</b>	<b>1,393,152</b>	
<b>Interest rate derivatives (net position, notional amounts)</b>	<b>(10,367)</b>	<b>(25,765)</b>	<b>8,257</b>	<b>13,451</b>	<b>8,685</b>	<b>5,837</b>	<b>98</b>	
<b>Interest rate sensitivity gap</b>	<b>289,743</b>	<b>(93,011)</b>	<b>250,058</b>	<b>525,820</b>	<b>244,308</b>	<b>176,332</b>	<b>1,393,250</b>	

<sup>1</sup> Placements by Fiscal Reserves, HKSAR government funds and statutory bodies with interest payable at a fixed rate determined annually are excluded because their interest rate is not fixed directly on the basis of market interest rates (notes 22 and 23). The fixed rate is determined every January. As at 31 December 2012, such placements amounted to HK\$884,437 million (2011: HK\$788,326 million).

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

	Fund – 2012							Non-interest-bearing financial instruments
	Repricing period of interest-bearing financial instruments							
	1 month or less	3 months or less but over 1 month	1 year or less but over 3 months	5 years or less but over 1 year	10 years or less but over 5 years	Over 10 years	Total	
<b>Assets</b>								
Cash and money at call	49,788	-	-	-	-	-	49,788	190
Placements with banks and other financial institutions	136,000	2,332	-	-	-	-	138,332	-
Financial assets designated at fair value	229,541	345,753	478,310	568,065	249,345	170,705	2,041,719	438,077
<b>Interest-bearing assets</b>	<b>415,329</b>	<b>348,085</b>	<b>478,310</b>	<b>568,065</b>	<b>249,345</b>	<b>170,705</b>	<b>2,229,839</b>	
<b>Liabilities</b>								
Placements by Fiscal Reserves with interest payable at market-based rates <sup>1</sup>	277	-	-	-	-	-	277	-
Placements by HKSAR government funds and statutory bodies with interest payable at market-based rates <sup>1</sup>	735	-	-	-	-	-	735	-
Exchange Fund Bills and Notes issued	171,980	283,217	176,467	39,967	9,694	7,159	688,484	-
<b>Interest-bearing liabilities</b>	<b>172,992</b>	<b>283,217</b>	<b>176,467</b>	<b>39,967</b>	<b>9,694</b>	<b>7,159</b>	<b>689,496</b>	
<b>Net interest-bearing assets/(liabilities)</b>	<b>242,337</b>	<b>64,868</b>	<b>301,843</b>	<b>528,098</b>	<b>239,651</b>	<b>163,546</b>	<b>1,540,343</b>	
<b>Interest rate derivatives (net position, notional amounts)</b>	<b>-</b>	<b>(14,400)</b>	<b>1,000</b>	<b>1,000</b>	<b>6,400</b>	<b>6,000</b>	<b>-</b>	
<b>Interest rate sensitivity gap</b>	<b>242,337</b>	<b>50,468</b>	<b>302,843</b>	<b>529,098</b>	<b>246,051</b>	<b>169,546</b>	<b>1,540,343</b>	

<sup>1</sup> Placements by Fiscal Reserves, HKSAR government funds and statutory bodies with interest payable at a fixed rate determined annually are excluded because their interest rate is not fixed directly on the basis of market interest rates (notes 22 and 23). The fixed rate is determined every January. As at 31 December 2012, such placements amounted to HK\$884,437 million (2011: HK\$788,326 million).



# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

	Fund – 2011							Total	Non-interest-bearing financial instruments
	Repricing period of interest-bearing financial instruments								
	1 month or less	3 months or less but over 1 month	1 year or less but over 3 months	5 years or less but over 1 year	10 years or less but over 5 years	Over 10 years			
<b>Assets</b>									
Cash and money at call	35,280	-	-	-	-	-	35,280	24,858	
Placements with banks and other financial institutions	157,685	3,844	-	-	-	-	161,529	-	
Financial assets designated at fair value	215,675	248,108	393,321	562,106	243,034	178,039	1,840,283	362,934	
<b>Interest-bearing assets</b>	<b>408,640</b>	<b>251,952</b>	<b>393,321</b>	<b>562,106</b>	<b>243,034</b>	<b>178,039</b>	<b>2,037,092</b>		
<b>Liabilities</b>									
Placements by banks and other financial institutions	-	-	-	-	-	-	-	24,547	
Placements by Fiscal Reserves with interest payable at market-based rates <sup>1</sup>	143	-	-	-	-	-	143	-	
Placements by HKSAR government funds and statutory bodies with interest payable at market-based rates <sup>1</sup>	1,287	-	-	-	-	-	1,287	-	
Exchange Fund Bills and Notes issued	134,702	320,349	145,132	40,547	8,763	6,257	655,750	-	
<b>Interest-bearing liabilities</b>	<b>136,132</b>	<b>320,349</b>	<b>145,132</b>	<b>40,547</b>	<b>8,763</b>	<b>6,257</b>	<b>657,180</b>		
<b>Net interest-bearing assets/(liabilities)</b>	<b>272,508</b>	<b>(68,397)</b>	<b>248,189</b>	<b>521,559</b>	<b>234,271</b>	<b>171,782</b>	<b>1,379,912</b>		
<b>Interest rate derivatives (net position, notional amounts)</b>	<b>-</b>	<b>(13,400)</b>	<b>1,000</b>	<b>2,000</b>	<b>5,600</b>	<b>4,800</b>	<b>-</b>		
<b>Interest rate sensitivity gap</b>	<b>272,508</b>	<b>(81,797)</b>	<b>249,189</b>	<b>523,559</b>	<b>239,871</b>	<b>176,582</b>	<b>1,379,912</b>		

<sup>1</sup> Placements by Fiscal Reserves, HKSAR government funds and statutory bodies with interest payable at a fixed rate determined annually are excluded because their interest rate is not fixed directly on the basis of market interest rates (notes 22 and 23). The fixed rate is determined every January. As at 31 December 2012, such placements amounted to HK\$884,437 million (2011: HK\$788,326 million).

## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

### (b) Currency risk

The currency exposure of the Group is summarised below:

	<b>Group</b>			
	2012		2011	
	Assets (in HK\$ billion)	Liabilities (in HK\$ billion)	Assets (in HK\$ billion)	Liabilities (in HK\$ billion)
Hong Kong dollar	228.4	1,854.5	216.0	1,649.1
US dollar	2,143.1	334.6	1,970.4	315.1
	<b>2,371.5</b>	<b>2,189.1</b>	2,186.4	1,964.2
Others <sup>1</sup>	481.0	21.7	361.8	6.0
<b>TOTAL</b>	<b>2,852.5</b>	<b>2,210.8</b>	2,548.2	1,970.2

	<b>Fund</b>			
	2012		2011	
	Assets (in HK\$ billion)	Liabilities (in HK\$ billion)	Assets (in HK\$ billion)	Liabilities (in HK\$ billion)
Hong Kong dollar	193.3	1,830.3	186.4	1,619.2
US dollar	2,122.1	323.6	1,945.6	299.7
	<b>2,315.4</b>	<b>2,153.9</b>	2,132.0	1,918.9
Others <sup>1</sup>	465.7	3.3	356.0	1.2
<b>TOTAL</b>	<b>2,781.1</b>	<b>2,157.2</b>	2,488.0	1,920.1

<sup>1</sup> Other currencies included mainly Australian dollar, Canadian dollar, euro, renminbi, sterling and yen.

### (c) Equity price risk

As at 31 December 2012 and 2011, the majority of equity investments were reported as “financial assets designated at fair value” as shown in note 9.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 36.4.4 Sensitivity analysis

The Value-at-Risk positions of the Fund at 31 December and during the year, based on a 95% confidence level and one-month time horizon, were as follows:

	Fund	
	2012	2011
<b>Value-at-Risk</b>		
At 31 December <sup>1</sup>	<b>21,059</b>	40,224
During the year		
Average	<b>29,811</b>	35,358
Maximum	<b>39,827</b>	49,553
Minimum	<b>21,059</b>	27,374

<sup>1</sup> The amount represented 0.8% of the Fund's investments which were subject to VaR measurement as at 31 December 2012 (2011: 1.7%).

## 36.5 Liquidity risk

Liquidity risk refers to the risk that the Group may not have sufficient funds available to meet its liabilities as they fall due. In addition, the Group may not be able to liquidate its financial assets at a price close to fair value within a short period of time.

### 36.5.1 Management of liquidity risk

To ensure sufficient liquidity to meet liabilities and the ability to raise funds to meet exceptional needs, the Group invests primarily in liquid financial markets and instruments that are readily saleable to meet liquidity needs. There are internal investment restrictions to prevent undue concentrations in individual debt securities issues, debt securities issuers, and groups of closely related debt securities issuers. Such restrictions are derived based on various factors such as the nature or maturity of the securities. There are also limitations on the maximum proportion of assets that can be placed in fixed term deposits and less liquid assets, and requirements regarding the ability to convert foreign currency assets into cash. All these restrictions and limits are designed to promote the liquidity of assets and consequently minimise the liquidity risk. The liquidity risk for the Exchange Fund investment is monitored on an aggregate basis through appropriate portfolio mix with sufficient liquidity assets to balance off investments of less liquid assets. Compliance with these limits is monitored by the RMC Division and any breaches are reported to the ISC and the EFAC and are promptly followed up.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 36.5.2 Exposure to liquidity risk

The remaining contractual maturities at the balance sheet date of major financial liabilities, commitments and derivative financial liabilities, which are based on contractual undiscounted cash flows and the earliest date on which the Group can be required to pay, are shown below:

	Group – 2012						Total
	Remaining maturity						
	1 month or less	3 months or less but over 1 month	1 year or less but over 3 months	5 years or less but over 1 year	10 years or less but over 5 years	Over 10 years	
<b>Non-derivative cash outflows</b>							
Certificates of Indebtedness	289,837	-	-	-	-	-	289,837
Government-issued currency notes and coins in circulation	9,934	-	-	-	-	-	9,934
Balance of the banking system	255,851	-	-	-	-	-	255,851
Placements by Fiscal Reserves	717,536	-	-	-	-	-	717,536
Placements by HKSAR government funds and statutory bodies	83,763	-	-	67,150	17,000	-	167,913
Exchange Fund Bills and Notes issued	171,980	283,201	177,272	40,846	9,802	6,346	689,447
Bank loans	104	-	309	7,722	3,338	-	11,473
Mortgage-backed securities issued	4	210	-	-	-	-	214
Other debt securities issued	667	3,590	11,610	18,369	3,138	612	37,986
Other liabilities	31,529	314	5	-	-	-	31,848
Loan commitments and other credit related commitments	264,533	-	-	-	-	-	264,533
<b>TOTAL</b>	<b>1,825,738</b>	<b>287,315</b>	<b>189,196</b>	<b>134,087</b>	<b>33,278</b>	<b>6,958</b>	<b>2,476,572</b>
<b>Derivative cash (inflows)/outflows</b>							
Derivative financial instruments settled:							
- on net basis	541	(90)	(243)	(891)	(218)	(4)	(905)
- on gross basis							
Total outflows	46,259	34,540	8,441	13,127	-	-	102,367
Total inflows	(45,632)	(34,176)	(8,507)	(13,477)	-	-	(101,792)
<b>TOTAL</b>	<b>1,168</b>	<b>274</b>	<b>(309)</b>	<b>(1,241)</b>	<b>(218)</b>	<b>(4)</b>	<b>(330)</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

	Group – 2011						Total
	Remaining maturity						
	1 month or less	3 months or less but over 1 month	1 year or less but over 3 months	5 years or less but over 1 year	10 years or less but over 5 years	Over 10 years	
<b>Non-derivative cash outflows</b>							
Certificates of Indebtedness	258,702	-	-	-	-	-	258,702
Government-issued currency notes and coins in circulation	9,888	-	-	-	-	-	9,888
Balance of the banking system	148,684	-	-	-	-	-	148,684
Placements by banks and other financial institutions	-	24,547	-	-	-	-	24,547
Placements by Fiscal Reserves	663,507	-	-	-	-	-	663,507
Placements by HKSAR government funds and statutory bodies	59,099	-	-	47,550	19,600	-	126,249
Exchange Fund Bills and Notes issued	134,708	320,760	146,239	41,829	9,271	5,835	658,642
Bank loans	22	-	64	2,175	-	-	2,261
Mortgage-backed securities issued	8	16	131	215	-	-	370
Other debt securities issued	3,693	1,028	12,272	21,311	3,702	1,088	43,094
Other liabilities	37,469	227	30	-	-	-	37,726
Loan commitments and other credit related commitments	257,119	-	-	-	-	-	257,119
<b>TOTAL</b>	<b>1,572,899</b>	<b>346,578</b>	<b>158,736</b>	<b>113,080</b>	<b>32,573</b>	<b>6,923</b>	<b>2,230,789</b>
<b>Derivative cash (inflows)/outflows</b>							
Derivative financial instruments settled:							
- on net basis	24	-	(9)	18	27	-	60
- on gross basis							
Total outflows	21,661	71,409	5,000	8,346	-	-	106,416
Total inflows	(21,541)	(70,913)	(4,978)	(8,240)	-	-	(105,672)
<b>TOTAL</b>	<b>144</b>	<b>496</b>	<b>13</b>	<b>124</b>	<b>27</b>	<b>-</b>	<b>804</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

	Fund – 2012						Total
	Remaining maturity						
	1 month or less	3 months or less but over 1 month	1 year or less but over 3 months	5 years or less but over 1 year	10 years or less but over 5 years	Over 10 years	
<b>Non-derivative cash outflows</b>							
Certificates of Indebtedness	289,837	-	-	-	-	-	289,837
Government-issued currency notes and coins in circulation	9,934	-	-	-	-	-	9,934
Balance of the banking system	255,851	-	-	-	-	-	255,851
Placements by Fiscal Reserves	717,536	-	-	-	-	-	717,536
Placements by HKSAR government funds and statutory bodies	83,763	-	-	67,150	17,000	-	167,913
Exchange Fund Bills and Notes issued	171,980	283,471	177,272	40,846	9,802	6,346	689,717
Other liabilities	25,438	259	5	-	-	-	25,702
Loan commitments and other credit related commitments	230,720	-	-	-	-	-	230,720
<b>TOTAL</b>	<b>1,785,059</b>	<b>283,730</b>	<b>177,277</b>	<b>107,996</b>	<b>26,802</b>	<b>6,346</b>	<b>2,387,210</b>
<b>Derivative cash (inflows)/outflows</b>							
Derivative financial instruments settled:							
- on net basis	569	-	-	-	-	-	569
- on gross basis							
Total outflows	44,917	32,000	969	3,147	-	-	81,033
Total inflows	(44,280)	(31,590)	(940)	(3,165)	-	-	(79,975)
<b>TOTAL</b>	<b>1,206</b>	<b>410</b>	<b>29</b>	<b>(18)</b>	<b>-</b>	<b>-</b>	<b>1,627</b>

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

	Fund – 2011 Remaining maturity						Total
	1 month or less	3 months or less but over 1 month	1 year or less but over 3 months	5 years or less but over 1 year	10 years or less but over 5 years	Over 10 years	
<b>Non-derivative cash outflows</b>							
Certificates of Indebtedness	258,702	-	-	-	-	-	258,702
Government-issued currency notes and coins in circulation	9,888	-	-	-	-	-	9,888
Balance of the banking system	148,684	-	-	-	-	-	148,684
Placements by banks and other financial institutions	-	24,547	-	-	-	-	24,547
Placements by Fiscal Reserves	663,507	-	-	-	-	-	663,507
Placements by HKSAR government funds and statutory bodies	59,099	-	-	47,550	19,600	-	126,249
Exchange Fund Bills and Notes issued	134,708	320,760	146,239	41,829	9,271	5,835	658,642
Other liabilities	31,502	227	30	-	-	-	31,759
Loan commitments and other credit related commitments	231,095	-	-	-	-	-	231,095
<b>TOTAL</b>	<b>1,537,185</b>	<b>345,534</b>	<b>146,269</b>	<b>89,379</b>	<b>28,871</b>	<b>5,835</b>	<b>2,153,073</b>
<b>Derivative cash (inflows)/outflows</b>							
Derivative financial instruments settled:							
- on net basis	23	(3)	(7)	(13)	27	-	27
- on gross basis							
Total outflows	20,839	69,682	680	5,091	-	-	96,292
Total inflows	(20,725)	(69,182)	(668)	(5,001)	-	-	(95,576)
<b>TOTAL</b>	<b>137</b>	<b>497</b>	<b>5</b>	<b>77</b>	<b>27</b>	<b>-</b>	<b>743</b>

## 36.6 Mortgage insurance risk

In providing mortgage insurance cover to authorized institutions in respect of mortgage loans originated by such authorized institutions and secured by residential properties, the Group faces insurance risk of the possibility of the insured event occurring and the uncertainty of the amount of the resulting claim.

Under the Mortgage Insurance Programme, the Group, through the HKMC, offers mortgage insurance that covers approved sellers for credit losses of up to 25% to 30% of the value of properties financed under mortgage loans with loan-to-value ratio below 90% at origination. The Group reinsures the exposure with approved reinsurers. As at 31 December 2012, the total risk-in-force was HK\$16.6 billion (2011: HK\$16.6 billion), of which HK\$13.8 billion (2011: HK\$14.1 billion) was retained by the Group after reinsurance.

For a portfolio of insurance contracts where the theory of probability is applied to pricing and provisioning, the principal risk that the Group faces under its insurance contracts is that the actual claims exceed the carrying amount of the insurance liabilities. This could occur because the frequency or severity of claims is greater than estimated. The actual number and amount of claims and benefits will vary from year to year from the estimate established using statistical techniques.

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

Experience shows that the larger the portfolio of similar insurance contracts, the smaller the relative variability about the expected outcome will be. In addition, a more diversified portfolio is less likely to be affected across the board by a change in any subset of the portfolio. The Group has developed a business strategy to diversify the type of mortgage insurance risks accepted and within each of the key categories to achieve a sufficiently large population of risks to reduce the variability of the expected outcome.

The frequency and severity of claims can be affected by several factors. The most significant are a downturn in the economy and a slump in local property market. Economic downturn, which may cause a rise in defaulted payment, affects the frequency of claims. A drop in property prices, where the collateral values fall below the outstanding balance of the mortgage loans, will increase the severity of claims.

The Group manages these risks by adopting a set of prudent insurance eligibility criteria. To ensure sufficient provision is set aside for meeting future claim payments, the Group calculates technical reserves on prudent liability valuation assumptions and the methods prescribed in the regulatory guidelines. The Group also takes out quota-share reinsurance from its approved mortgage reinsurers and excess-of-loss reinsurance arrangement in an effort to limit its risk exposure. The reinsurers are selected according to prudent criteria and their credit ratings are reviewed regularly.

## **36.7 Operational risk**

Operational risk is the risk of direct and indirect loss resulting from inadequate or failed internal processes, people and systems or from external events. Operational risks arise from all of the Group's operations and are faced by all business segments.

The Group's objective is to manage operational risk so as to balance the avoidance of financial losses and damage to the Group's reputation with overall cost-effectiveness and to avoid control procedures that are overly restrictive.

The primary responsibility for the development and implementation of controls to address operational risk rests with an internal high-level Risk Committee. The Committee is chaired by the Chief Executive of the HKMA and the three Deputy Chief Executives serve as members. The Risk Committee provides direction and guidance for line management in managing operational risk.

The HKMA's operational risk management is supported by a formal risk assessment process. This is conducted on an annual basis and requires each division to assess and rank the potential impact and likelihood of occurrence of financial and operational risks. It also requires the relevant divisions to review the procedures and controls in place to address the identified risks. The assessment and ranking is reviewed by Internal Audit for consistency and reasonableness before being submitted to the Risk Committee, which has the responsibility for ensuring that the identified risks are properly addressed. This risk assessment forms an important basis for the annual Internal Audit plan. Internal Audit will audit the risk areas at various frequencies depending on the levels of risks and the results of past audits.

Internal Audit reports its findings to the EFAC Audit Sub-Committee and the Chief Executive of the HKMA. It also follows up on outstanding issues to ensure that they are resolved in a proper manner.



# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 37 FAIR VALUES OF FINANCIAL ASSETS AND FINANCIAL LIABILITIES

The fair values of financial instruments traded in active markets are based on quoted market prices at the balance sheet date. In the absence of such quoted market prices, fair values are estimated using present value or other valuation techniques, using inputs based on market conditions existing at the balance sheet date. The fair values of unlisted investment funds and unlisted equity securities are estimated by investment managers. These fair values are computed based on valuation methods and techniques generally recognised within the industry. Depending on the redemption and liquidity features of the investments, the fair values may not necessarily represent the amounts that can be ultimately realised by the Group.

- (a) The fair values of held-to-maturity securities, mortgage-backed securities and other debt securities issued that were not designated at fair value are shown below:

	Note	Group			
		Carrying value		Fair value	
		2012	2011	2012	2011
<b>Financial assets</b>					
Held-to-maturity securities	11	<b>9,324</b>	8,365	<b>9,836</b>	8,637
<b>Financial liabilities</b>					
Mortgage-backed securities issued	26	<b>214</b>	367	<b>214</b>	366
Other debt securities issued	27	<b>36,025</b>	40,166	<b>36,029</b>	40,172

All other financial instruments of the Group and the Fund are stated at fair value or carried at amounts not materially different from their fair values as at 31 December 2012 and 2011.

## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

- (b) The carrying value of financial instruments measured at fair value at the balance sheet date across the three levels of the fair value hierarchy is shown below:

	Group – 2012			Total
	Level 1	Level 2	Level 3	
<b>Assets</b>				
Derivative financial instruments	119	5,753	303	6,175
Financial assets designated at fair value	1,952,426	512,660	27,831	2,492,917
Available-for-sale securities	3,972	1,571	37,572	43,115
	<b>1,956,517</b>	<b>519,984</b>	<b>65,706</b>	<b>2,542,207</b>
<b>Liabilities</b>				
Derivative financial instruments	557	2,036	–	2,593
Exchange Fund Bills and Notes issued	–	688,214	–	688,214
Other debt securities issued, designated at fair value	–	340	–	340
	<b>557</b>	<b>690,590</b>	<b>–</b>	<b>691,147</b>

	Group – 2011			Total
	Level 1	Level 2	Level 3	
<b>Assets</b>				
Derivative financial instruments	534	3,821	–	4,355
Financial assets designated at fair value	1,708,280	482,130	21,987	2,212,397
Available-for-sale securities	2,009	294	20,668	22,971
	<b>1,710,823</b>	<b>486,245</b>	<b>42,655</b>	<b>2,239,723</b>
<b>Liabilities</b>				
Derivative financial instruments	22	913	–	935
Exchange Fund Bills and Notes issued	–	655,750	–	655,750
Other debt securities issued, designated at fair value	–	892	–	892
	<b>22</b>	<b>657,555</b>	<b>–</b>	<b>657,577</b>

## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

	Fund – 2012			Total
	Level 1	Level 2	Level 3	
<b>Assets</b>				
Derivative financial instruments	119	4,310	–	4,429
Financial assets designated at fair value	1,952,426	508,956	18,414	2,479,796
	1,952,545	513,266	18,414	2,484,225
<b>Liabilities</b>				
Derivative financial instruments	557	1,095	–	1,652
Exchange Fund Bills and Notes issued	–	688,484	–	688,484
	557	689,579	–	690,136
<b>Fund – 2011</b>				
	Level 1	Level 2	Level 3	Total
<b>Assets</b>				
Derivative financial instruments	534	2,262	–	2,796
Financial assets designated at fair value	1,708,280	478,428	16,509	2,203,217
	1,708,814	480,690	16,509	2,206,013
<b>Liabilities</b>				
Derivative financial instruments	22	650	–	672
Exchange Fund Bills and Notes issued	–	655,750	–	655,750
	22	656,400	–	656,422

The three levels of the fair value hierarchy are:

Level 1 – fair values of financial instruments are quoted prices (unadjusted) in active markets for identical assets or liabilities;

Level 2 – fair values of financial instruments are determined involving inputs other than quoted prices included in Level 1 that are observable for the asset or liability, either directly (as prices) or indirectly (derived from prices); and

Level 3 – fair values of financial instruments are determined with inputs that are not based on observable market data (unobservable inputs).

During the year, there were no transfers of financial instruments between Level 1 and Level 2 of the fair value hierarchy.

## Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

An analysis of the movement between opening and closing balances of Level 3 financial instruments, measured at fair value using a valuation technique with significant unobservable inputs, is shown below:

	Group					
	Designated at fair value		Available-for-sale		Derivatives	
	2012	2011	2012	2011	2012	2011
At 1 January	21,987	20,774	20,668	8,929	-	-
Net gains/(losses) recognised in the income and expenditure account	3,143	(758)	19	-	303	-
Net gains/(losses) recognised in other comprehensive income	-	-	1,901	(392)	-	-
Purchases	11,667	10,912	17,246	13,160	-	-
Sales	(7,675)	(5,994)	(2,262)	(1,029)	-	-
Transfers into Level 3	576	268	-	-	-	-
Transfers out of Level 3	(1,867)	(3,215)	-	-	-	-
At 31 December	27,831	21,987	37,572	20,668	303	-
Net gains/(losses) recognised in the income and expenditure account relating to those assets held at the balance sheet date	2,866	(653)	-	-	303	-

  

	Fund			
	Designated at fair value		Available-for-sale	
	2012	2011	2012	2011
At 1 January	16,509	19,711	-	-
Net gains/(losses) recognised in the income and expenditure account	1,671	(786)	-	-
Purchases	7,257	6,210	-	-
Sales	(5,745)	(5,679)	-	-
Transfers into Level 3	539	268	-	-
Transfers out of Level 3	(1,817)	(3,215)	-	-
At 31 December	18,414	16,509	-	-
Net gains/(losses) recognised in the income and expenditure account relating to those assets held at the balance sheet date	1,401	(674)	-	-

During the year, certain financial instruments were transferred between Level 2 and Level 3 of the fair value hierarchy reflecting changes in transparency of observable market data for these instruments.

For financial instruments classified under Level 3 of the fair value hierarchy, if the prices of investments were increased/decreased by 10%, these would have resulted in an increase/decrease in the Group's surplus for the year of HK\$2,813 million (2011: HK\$2,199 million) and in other comprehensive income of HK\$3,757 million (2011: HK\$2,067 million).

# Exchange Fund – Notes to the Financial Statements (continued)

(Amounts expressed in millions of Hong Kong dollars, unless otherwise stated.)

## 38 POSSIBLE IMPACT OF AMENDMENTS, NEW STANDARDS AND INTERPRETATIONS ISSUED BUT NOT YET EFFECTIVE FOR THE YEAR ENDED 31 DECEMBER 2012

Up to the date of issue of the financial statements, the HKICPA has issued a number of amendments and new standards which are not yet effective for the year ended 31 December 2012 and which have not been early adopted in the financial statements.

The Group is in the process of making an assessment of what the impact of these amendments and new standards is expected to be in the period of initial adoption. So far it has concluded that the adoption of them is unlikely to have a significant impact on the Group's results of operations and financial position.

The following developments may result in new or revised disclosures in future financial statements:

	<b>Effective for accounting periods beginning on or after</b>
Amendments to HKAS 1, Presentation of Financial Statements – Presentation of Items of Other Comprehensive Income	1 July 2012
HKAS 19 (2011), Employee Benefits	1 January 2013
HKAS 27 (2011), Separate Financial Statements	1 January 2013
HKAS 28 (2011), Investments in Associates and Joint Ventures	1 January 2013
Amendments to HKAS 32, Financial Instruments: Presentation – Offsetting Financial Assets and Financial Liabilities	1 January 2014
Annual Improvements to HKFRSs 2009 – 2011 Cycle	1 January 2013
Amendments to HKFRS 7, Financial Instruments: Disclosures – Disclosures – Offsetting Financial Assets and Financial Liabilities	1 January 2013
HKFRS 9, Financial Instruments	1 January 2015
HKFRS 10, Consolidated Financial Statements	1 January 2013
HKFRS 11, Joint Arrangements	1 January 2013
HKFRS 12, Disclosure of Interests in Other Entities	1 January 2013
HKFRS 13, Fair Value Measurement	1 January 2013
Amendments to HKFRS 10, Consolidated Financial Statements, HKFRS 11, Joint Arrangements and HKFRS 12, Disclosure of Interests in Other Entities – Transition Guidance	1 January 2013
Amendments to HKFRS 10, Consolidated Financial Statements, HKFRS 12, Disclosure of Interests in Other Entities and HKAS 27 (2011), Separate Financial Statements – Investment entities	1 January 2014

## 39 APPROVAL OF FINANCIAL STATEMENTS

The financial statements were approved by the Financial Secretary on the advice of the Exchange Fund Advisory Committee on 8 April 2013.