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#### Section 1

#### Introduction

National Australia Bank Limited (ABN 12 004 044 937) (NAB) applies the Basel framework as a cornerstone of the NAB Group's risk management framework and capital strategy, and recognises that it is critical for achieving the NAB Group's strategic agenda.

In Australia, the Australian Prudential Regulation Authority (APRA) has regulatory responsibility for the implementation of the Basel Accord through the release of prudential standards.

This Pillar 3 Report is designed to provide the NAB Group's stakeholders with detailed information about the approach the NAB Group takes to manage risk and to determine capital adequacy, having regard to the operating environment. The report also addresses the requirements of APRA's *Prudential Standard APS 330: Public Disclosure (APS 330)*.

All figures in this report are in Australian dollars (AUD) unless otherwise noted. Disclosures in this report are based on the APRA Basel III standards that have applied since 1 January 2013, except for market risk Risk-Weighted Assets (RWA), which are calculated on a Basel 2.5 basis for each period presented.

#### **Capital Ratio Summary**

The NAB Group's Common Equity Tier 1 (CET1) Capital ratio of 9.77% at 30 September 2016 is consistent with the NAB Group's objective of maintaining a strong capital position.

	As at		
	30 Sep 16	31 Mar 16	
Capital ratios	%	%	
Common Equity Tier 1 capital ratio	9.77	9.69	
Tier 1	12.19	11.77	
Total	14.14	13.25	

The NAB Group maintains a strong capital, funding and liquidity position, in line with its ongoing commitment to maintain balance sheet strength.

Over the six months ended 30 September 2016, the NAB Group has accessed a diverse range of funding and capital options across various senior, subordinated and secured debt markets, as well as the domestic retail hybrid market.

The NAB Group remains vigilant in its evaluation of the economic and regulatory environment, with the objective of ensuring that the NAB Group's balance sheet remains strong to enable it to respond to changing market and regulatory conditions.

On 30 September, MLC Limited was deconsolidated from the NAB Group as a result of the sale of 80% of the NAB Group's interest in it to Nippon Life Insurance Company. The transaction increased the Group's CET1 ratio by approximately 45 basis points.

# 1.1 The NAB Group's Capital Adequacy Methodologies

The NAB Group operates in Australia, Asia, New Zealand, the United Kingdom and North America. The following table sets out the NAB Group's approach to applying measures resulting from the Basel Accord, as applied across the NAB Group as at 30 September 2016.

The NAB Group's Basel Methodologies 1,2,3,4

Methodology Approach	Credit Risk	Operational Risk	Non-Traded Market Risk	Traded Market Risk
National Australia Bank Limited	Advanced IRB	AMA	IRRBB	Standardised and IMA
Bank of New Zealand	Advanced IRB	AMA	IRRBB	Standardised and IMA

- (1) IRB: Internal Ratings Based Approach
- (2) AMA: Advanced Measurement Approach
- (3) IRRBB: Interest Rate Risk in the Banking Book
- (4) IMA: Internal Models Approach

Bank of New Zealand (BNZ), the NAB Group's main operating subsidiary in New Zealand, is regulated by the Reserve Bank of New Zealand (RBNZ). Credit risk exposures consolidated in the NAB Group position are calculated under RBNZ requirements.

#### 1.2 APS 330 Disclosure Governance

The NAB Group's Disclosure and External communications Policy defines Board and management accountabilities for *APS 330* disclosure, including processes and practices to ensure the integrity and timeliness of prudential disclosures and compliance with NAB Group policies.



### 1.3 Regulatory Reform

The NAB Group remains focused on areas of regulatory change. Key reforms that may affect its capital and funding include:

#### Basel III:

- The September 2016 Leverage Ratio is disclosed on pages 71 to 72 of this Report. The minimum Leverage Ratio is yet to be determined by APRA.
- In January 2016, the Basel Committee on Banking Supervision (BCBS) released a revised market risk framework, which is due to come into effect internationally on 1 January 2019, with regulatory reporting to commence by 31 December 2019. The Credit Valuation Adjustment (CVA) framework is currently in consultation.
- In September 2016, APRA released an additional discussion paper on the Net Stable Funding Ratio (NSFR). A required NSFR of at least 100% is proposed on both a Level 1 and 2 basis from 1 January 2018.

#### Federal Government's Financial System Inquiry (Inquiry):

- In July 2016, APRA released an update to its 2015 study comparing the capital position of the Australian major banks against their international peers.
- In line with previous statements by APRA, from 1 July 2016 risk weights applicable to mortgage loans increased.

#### Total Loss-absorbing Capacity (TLAC)

 The Financial Stability Board (FSB) issued the TLAC standard in November 2015 for global systemically important banks (G-SIBs). In line with the recommendations in the Inquiry, APRA could implement a loss absorbing capacity framework in accordance with emerging international practice. At this stage, APRA has not yet issued guidance on how TLAC might be implemented.

#### Revised BCBS standards:

- Themes driving the BCBS's revision of standards include improving transparency, consistency and credibility of internal ratings based (IRB) models. Draft proposals include revisions to the standardised approaches for calculating regulatory capital for credit risk and operational risk, revisions to IRB approaches for credit risk and the introduction of a capital floor framework. Final Basel Standards are expected by calendar year end, with APRA's response expected sometime thereafter.
- In April 2016, the BCBS released the revised interest rate risk in the banking book (IRRBB) framework, which is due to come into effect internationally by 2018.

#### Other regulatory changes

 The Group is progressing with a transition to a revised Level 2 Group structure following clarification of the ADI Level 2 Group definition by APRA. In the interim period, CET1 capital reflects the transition arrangements granted by APRA on the removal of capital benefits arising from debt issued directly by National Wealth Management Holdings Limited (NWMH).

- APRA's consultation on the revisions to *Prudential Standard APS 120: Securitisation*. This brings together proposals to simplify securitisation for originating ADIs and the updated BCBS securitisation framework.
- APRA's standards on the non-capital components of the supervision of conglomerate groups (Level 3 framework) will be effective from 1 July 2017. Level 3 capital requirements are expected to be determined following the finalisation of other domestic and international policy initiatives, with APRA advising implementation will be no earlier than 2019. APRA's quantitative impact analysis suggests no additional capital will be required as a result of the implementation.



#### Section 2

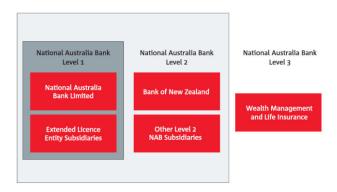
# **Scope of Application**

APRA measures the NAB Group's capital adequacy by assessing financial strength at three levels:

- Level 1: comprises NAB and its subsidiary entities approved by APRA as part of the Extended Licensed Entity (ELE)
- Level 2: comprises NAB and the entities it controls, subject to certain exceptions set out below
- Level 3: comprises the conglomerate NAB Group.

This report applies to the Level 2 consolidated group (the Level 2 Group).

#### **NAB Group Consolidation for Regulatory Purposes**



The controlled entities in the Level 2 Group include BNZ and other financial entities (e.g. finance companies and leasing companies).

Wealth management and life insurance activities are excluded from the calculation of RWA and the related controlled entities are deconsolidated from the Level 2 Group for the purposes of calculating capital adequacy. Capital adequacy deductions are applied to the investments in, and profits of, these activities. NWMH has not been treated as part of the Level 2 Group for the purposes of this report.

The NAB Group is progressing with a transition to the revised Level 2 Group following a clarification of the ADI Level 2 Group definition by APRA.

In the interim period, CET1 Capital reflects the transition arrangements granted by APRA on the removal of capital benefits arising from debt issued directly by NWMH.

In addition, certain securitisation special purpose vehicles (SPVs) to which assets have been transferred in accordance with APRA's requirements as set out in *APS 120* have been deconsolidated from the Level 2 Group for the purposes of this disclosure. For regulatory purposes, credit risk is removed from the sold assets and there is no requirement to hold capital against them.

# Differences in Consolidation Arising Between the Regulatory and Accounting Approaches

For financial reporting, the NAB Group applies International Financial Reporting Standards (IFRS) and consolidates all

entities in which it has the power to govern the financial and operating policies so as to obtain benefit from their activities. This includes life insurance, wealth management and securitisation SPVs used to house securitised assets. As noted above, these entities may receive a different treatment for Level 2 regulatory consolidation purposes. A list of material controlled entities included in the consolidated NAB Group for financial reporting purposes can be found in the NAB Group's 2016 Annual Financial Report.

#### **Basis of preparation**

Prior period historical information has not been restated on a continuing basis following the CYBG PLC (CYBG) demerger.

# Restrictions on the Transfer of Funds and Regulatory Capital within the NAB Group

Limits are placed on the level of capital and funding transfers and on the level of exposure (debt and equity) that the NAB Group may have to a related entity. These limits are subject to the NAB Group Balance Sheet and Liquidity Risk (GBSLR) Policy which requires that contagion risk be managed under regulatory requirements APRA *Prudential Standard APS 222 Associations with Related Entities* and the Board's risk appetite for intragroup exposures.

Each banking subsidiary works with the NAB Group to manage capital to target capital ranges approved by their respective boards. Any capital transfer is subject to maintaining adequate subsidiary and parent company capitalisation.

#### Disclosure 2A: Scope of Application

There were no capital deficiencies in non-consolidated subsidiaries of the NAB Group as at 30 September 2016 or 31 March 2016.

## **Bank of New Zealand**

BNZ is a wholly owned subsidiary of the NAB Group and operates as a regionally autonomous, full-service bank in New Zealand. The BNZ board of directors is responsible for BNZ's corporate governance and derives its authority from the Constitution of BNZ, within the NAB Group Framework and applicable New Zealand legislation.

BNZ is subject to the Basel Accord capital adequacy requirements applicable in New Zealand, mandated by the RBNZ. The capital ratios for BNZ presented in this report have been derived under the RBNZ's Capital Adequacy Framework (Internal Models Based Approach). Full Basel disclosures for BNZ are published separately under the Disclosure Statement regime applicable to banks incorporated in New Zealand.



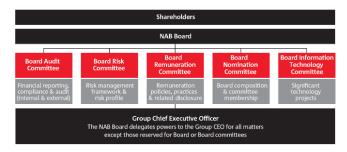
#### Section 3

### **Risk Governance and Management**

The corporate governance framework (the structure of which is set out below) applies across both APRA and non-APRA regulated entities, and provides guidance for effective decision making on how authority is exercised in all areas of the NAB Group through:

- strategic and operational planning
- · risk management and compliance
- · financial management and external reporting
- succession planning and culture.

The NAB Group's corporate governance framework is supported by the Delegated Authority Framework and Remuneration Framework.



#### **Board and its committees**

The NAB Board (the Board) represents the company's shareholders and is responsible for directing and overseeing the NAB Group's affairs. Its central role is to create and deliver value by effectively governing the NAB Group, while meeting the interests of shareholders and other stakeholders through transparent reporting and active engagement.

To help carry out its responsibilities, the Board has established a number of committees, as shown in the diagram above.

The Board Risk Committee (BRC) supports the framework for risk management across the NAB Group by undertaking the following key activities:

- overseeing the risk profile of the NAB Group within the context of the Board approved risk appetite
- making recommendations to the Board concerning the NAB Group's current and future risk appetite and particular risks or risk management practices
- reviewing management's plans for mitigation of material risks faced by the NAB Group
- overseeing the implementation and operation of the risk management framework and internal compliance and control systems throughout the NAB Group
- overseeing stress testing of the NAB Group risk portfolio, including both scenario analysis and sensitivity analysis
- promoting awareness of a risk-based culture throughout the NAB Group and the establishment by management of a balance between risk and reward for risks accepted

The BRC Charter is available on nabgroup.com.au. The Corporate Governance Statement is available in the 2016 Annual Financial Report.

#### **Executive Governance**

Outside the authorities and powers reserved by the Board, the NAB Group CEO is responsible for the management and operations of the NAB Group. Key management decisions below Board level are made by the NAB Group CEO with support from management committees and individual members of management who hold delegated authority from the NAB Group CEO.

NAB manages risk across all its divisions, and each first line division has a Risk Management Committee (RMC) or an equivalent regular leadership team meeting, chaired by the relevant Executive Leadership, to support them in executing their risk management accountabilities. This includes leading the relevant first line division in respect of risk matters as they relate to risk culture, risk appetite and risk monitoring. In addition, cross Divisional governance of material risk is supported by group risk management committees, chaired by senior executives from across the NAB Group. The following diagram outlines the key management risk governance bodies, the escalation process and the interactions between those bodies. These group risk management committees provide oversight and management of the NAB Group's material risks.



#### **Risk Management**

Risk exists in every aspect of the NAB Group's business and operating environment. Risk management is about understanding and managing the potential for volatility of earnings, loss of access to reliable deposits and wholesale funding and depletion of capital arising from the NAB Group's business activities, whilst pursuing its strategic objectives.

Maintaining focus on risk and compliance is a 'non-negotiable', with risk being one of the three foundations of the One NAB Plan.

The NAB Group's objectives are achieved through the formation and execution of the NAB Group's strategy, which is defined and agreed to by the Board. Formulating the strategy requires the NAB Group to consider and respond to various internal and external uncertainties. The annual strategic planning process establishes the strategic objectives and risk appetite, translating these into directions and specific performance targets for the NAB Group, Divisions and Performance Units (PUs). Stress testing and scenario analysis is used to support formulation of our risk appetite (including the determination of our risk capacity), and limits for capital management, funding and liquidity. The key outputs of the strategic planning process include the:

- · Group Strategic Plan
- · Group Financial Plan
- Group Risk Appetite Statement (RAS) and Legal Entity RAS
- Group Capital Management Strategy (CMS) and Internal Capital Adequacy Assessment Process (ICAAP)
- · Group Funding Strategy

Together, these documents constitute the NAB Group's Business Plan.

The NAB Group's Risk Management Framework (RMF) articulates the NAB Group's approach to managing risk. It is the totality of systems, structures, policies, processes and people that manage all material internal and external sources of identified material risks facing the NAB Group.

The NAB Group's approach to risk management is based on a Three Lines of Defence model, which provides the foundation for effective risk management. The overarching principle of this model is that risk management capability must be embedded within the business to be effective.

Accountabilities for risk management activities across each Line of Defence is articulated in the Risk Management Accountability Model, which is applicable across all entities of the NAB Group.

Further details of risks associated with the NAB Group are set out in in the NAB 2016 Annual Financial Report.



#### Section 4

# Capital

# 4.1 Capital Adequacy

#### **Capital Objectives**

The NAB Group assesses capital adequacy to support its overarching capital management objectives:

- · a credit rating in the AA range
- · meeting regulatory capital requirements
- · meeting internal economic capital requirements
- · maintaining flexibility to deal with unexpected events
- · efficiency in the amount and type of capital
- · effective deployment of capital

#### **Risk Identification and Measurement**

The process of assessing capital adequacy begins with the identification of all the material risks of the NAB Group within the NAB Group Risk Inventory (GRI). The GRI includes consistent definitions and the approach to measurement, including for capital adequacy purposes.

The NAB Group measures all material risks and where appropriate, generates a capital adequacy requirement. In managing the business, the NAB Group considers both regulatory and economic capital requirements.

	Regulatory Capital	Economic Capital
Purpose	Regulatory view of the capital required to be held to protect against risks associated with business activities.	Management's view of the capital required to be held to support the specific risk characteristics of the business and its portfolio.
Calculation	Driven by RWA which is calculated under regulatory requirements.	Internal risk-based models.
Risk types	Credit risk, market risk, operational risk and interest rate risk in the banking book.	As per regulatory capital requirements, plus other material risks, including business/strategic risk.

#### **Capital Planning**

Along with the Risk Appetite Statement, the CMS is an integral part of the NAB Group's strategic planning process which considers how the NAB Group will meet its capital requirements over a three-year plan period. The CMS covers the NAB Group's:

- · capital outlook, including capital forecast
- · risks and potential upsides to the forecast
- · capital initiatives over the plan period
- · dividend outlook and sustainability
- · profits test obligations
- other strategic initiatives.

In addition to a base case, the planning process also considers stressed scenarios and sensitivities to ensure the NAB Group maintains capital adequacy in these situations and adjusts plans if these stress tests highlight a need to. Within certain risk categories, the NAB Group performs regular sensitivity and stress tests across

material models and businesses to test the veracity of assumptions and to determine the sensitivity of key risk measures (including capital) to management actions and potential changes in the external environment. The NAB Group then develops plans to mitigate risks in the event of a stressed scenario.

The Board sets capital targets above the internal risk-based assessment of capital. Target ranges are set by reference to factors such as the NAB Group's Risk Appetite Statement, market, regulatory and rating agencies expectations. The NAB Group's CET1 Capital ratio operating target is between 8.75% and 9.25% and is regularly reviewed in the contest of the external economic and regulatory outlook with the objective of maintaining balance sheet strength. The NAB Group is at a comfortable buffer to the Board target as at 30 September 2016.

APRA advises the NAB Group of its Prudential Capital Requirements (PCR) which represent the minimum ratios of regulatory capital to total RWA. The PCRs are not publicly disclosed.

The NAB Group's capital position is monitored on a monthly basis and reported to management and Board committees.

# **Embedding Capital Requirements in Business Decisions**

Capital requirements are taken into consideration in:

- · product and facility pricing decisions
- · business development, including acquisitions
- strategy and strategic planning
- performance measurement and management, including short and long-term incentive determination
- setting of risk appetite and risk limits, including large exposure limits, industry limits and country limits.

#### **Additional Tier 1 Capital Initiatives**

On 7 July 2016 NAB issued \$1,499 million of Capital Notes, which will mandatorily convert into Ordinary Shares on 8 July 2024 (subject to the mandatory conversion conditions being satisfied).

Two Additional Tier 1 instruments were called during the half year to September 2016:

- Perpetual Capital Notes of US\$600 million, originally issued on 24 September 2009.
- EUR National Capital Instruments (NCI) of €400 million, originally issued on 29 September 2006.

In line with the CYBG Demerger Scheme Booklet, on 22 September 2016 the Group's holding of CYBG Additional Tier 1 instruments were sold for a total value of £419 million.

#### **Tier 2 Capital Initiatives**

The Group's Tier 2 Capital initiatives over the half year to September 2016 include the issuance of the following Subordinated Notes:

- 17 May 2016, HK\$1,137 million due 2026.
- 19 May 2016, SG\$450 million due 2028.
- 16 September 2016, JPY10 billion due 2026.
- 21 September 2016, \$800 million due 2026.

For these transactions, the Subordinated Notes convert into fully paid ordinary shares of NAB where APRA determines this to be necessary on the grounds that NAB would otherwise become non-viable.

In line with the CYBG Demerger Scheme Booklet, on 22 September 2016 the Group's holding of CYBG Tier 2 instruments were sold for a total value of £460 million.

#### Governance, Reporting and Oversight

A number of risks related to the management of the NAB Group's capital position which, if not appropriately managed, could lead to the NAB Group not holding sufficient capital and reserves to achieve its strategic aspirations, cover the risks to which it is exposed and protect against unexpected losses.

The annual Internal Capital Adequacy Assessment Process (ICAAP) describes the NAB Group's framework for assessing its capital adequacy. Key features include:

- understanding risks and ensuring they are appropriately mitigated
- capital management
- · use of capital in the business
- · risk appetite and planning process
- capital adequacy assessment on a current and forward looking basis, including the impact of stress and scenario testing.

The NAB Group's ICAAP document, CMS, Risk Appetite Statement and Strategic Plan cover the governance, reporting and oversight of the NAB Group's capital adequacy. These documents and plans are reviewed and endorsed by key management committees, including the Group Capital Committee (GCC), the Group Asset and Liability Committee (GALCO) and the GRRMC, and are ultimately approved by the Board.

The ICAAP is also supported by the NAB's Group Capital Policy which defines the framework for the management, monitoring and governance of the NAB Group's capital position. The framework is built around the Board's guiding principles, including preserving the NAB Group's credit rating, maintaining capital adequacy and an efficient capital mix.

Group Treasury is responsible for managing capital risk. The NAB Group and subsidiary Treasuries each prepare an annual Capital Management Strategy (incorporating capital targets) and execute the Board-approved strategies outlined in the CMS.

GBSLR is responsible for capital oversight and is independent of Group Treasury. GBSLR maintains a risk framework for effective oversight, supports stress testing of the NAB Group's capital position, supports capital planning

and forecasting, and monitors capital activities to ensure compliance with the requirements of the NAB Group's capital framework.

# Table 4.1A: Risk-Weighted Assets

The following table provides the Basel Accord RWA for the Level 2 Group.

	As a	at
	30 Sep 16	31 Mar 16 RWA
	RWA	
	\$m	\$m
Credit risk <sup>(1)</sup>		
IRB approach		
Corporate (including SME) (2)	124,765	126,757
Sovereign	1,596	1,684
Bank	11,269	11,381
Residential mortgage	90,143	62,504
Qualifying revolving retail	3,925	3,897
Retail SME	6,182	6,188
Other retail	3,666	3,631
Total IRB approach	241,546	216,042
Specialised lending (SL)	57,900	59,498
Standardised approach		
Australian and foreign governments	-	-
Bank	-	-
Residential mortgage	2,706	2,804
Corporate	4,219	4,172
Other	554	558
Total standardised approach	7,479	7,534
Other		
Securitisation	3,435	3,351
Credit Value Adjustment	13,871	12,257
Central counterparty default fund contribution guarantee	473	393
Other (3)	6,806	4,383
Total other	24,585	20,384
Total credit risk	331,510	303,458
Market risk	7,299	7,250
Operational risk	37,500	40,000
Interest rate risk in the banking book	12,136	10,725
Total risk weighted assets	388,445	361,433

<sup>(1)</sup> RWA which are calculated in accordance with APRA's requirements under the Basel Accord are required to incorporate a scaling factor of 1.06 to assets that are not subject to specific risk weights

<sup>&</sup>lt;sup>(2)</sup> Corporate (including SME) consists of corporations, partnerships or proprietorships not elsewhere classified and includes non-banking entities held by banks.

<sup>(3) &#</sup>x27;Other' includes non-lending asset exposure.



# **Table 4.1B: Capital Ratios**

The table below provides the key capital ratios for each significant ADI or overseas bank subsidiary.

	A	As at		
	30 Sep 16	31 Mar 16		
Capital ratios (1)	<u> </u>	%		
Level 2 Common Equity Tier 1 capital ratio	9.77	9.69		
Level 2 Tier 1 Capital ratio	12.19	11.77		
Level 2 total capital ratio	14.14	13.25		
Level 1 National Australia Bank Common Equity Tier 1 capital ratio	9.99	9.68		
Level 1 National Australia Bank Tier 1 capital ratio	12.71	11.89		
Level 1 National Australia Bank total capital ratio	14.80	13.42		
Significant subsidiaries				
BNZ Common Equity Tier 1 capital ratio	10.21	10.41		
BNZ Tier 1 capital ratio	10.54	11.03		
BNZ Total capital ratio	12.04	12.58		

<sup>(1)</sup> Level 1 Group represents the extended licence entity. The Level 2 Group represents the consolidation of the NAB Group and all of its subsidiary entities, other than non-consolidated subsidiaries as outlined in Section 2 Scope of Application of this report. Capital ratios for offshore banking subsidiaries reflect local regulatory standards.

Leverage ratio		As at			
	30 Sep 16	30 Jun 16	31 Mar 16	31 Dec 15	
	\$m	\$m	\$m	\$m	
Tier 1 Capital	47,336	41,901	42,535	49,267	
Total exposures	827,644	855,681	810,505	910,473	
Leverage ratio (%)	5.72%	4.90%	5.25%	5.41%	



# 4.2 Capital Structure

The NAB Group's capital structure comprises of various forms of capital. CET1 Capital comprises of paid-up ordinary share capital, retained earnings plus certain other items recognised as capital. The ratio of such capital to risk-weighted assets is called the CET1 Capital Ratio. Additional Tier 1 Capital comprises certain securities with required loss absorbing characteristics. Together, CET1 Capital and Additional Tier 1 Capital make up Tier 1 Capital and the ratio of such capital to RWA is called the Tier 1 Capital ratio.

CET1 Capital contains the highest quality and most loss absorbent components of capital, followed by Additional Tier 1 Capital and then Tier 2 Capital. Tier 2 Capital mainly consists of subordinated instruments.

Further details of Additional Tier 1 and Tier 2 securities are disclosed in the Capital Instruments section of the NAB Group's website at: http://capital.nab.com.au/disclaimer-area/capital-instruments.phps.

#### **Table 4.2A: Regulatory Capital Structure - Summary**

The table below provides the structure of Regulatory Capital for the NAB Group. A detailed breakdown is shown in Section 12 of this report. Regulatory Capital has been calculated in accordance with APRA definitions in APRA Prudential Standard APS 111 Capital Adequacy: Measurement of Capital. The regulatory approach to calculating capital differs from the accounting approach as defined under IFRS.

	As	As at	
	30 Sep 16	31 Mar 16	
	\$m	\$m	
Common Equity Tier 1 Capital before regulatory adjustments	48,809	47,784	
Total regulatory adjustments to Common Equity Tier 1 Capital	10,862	12,748	
Common Equity Tier 1 Capital (CET1)	37,947	35,036	
Additional Tier 1 Capital before regulatory adjustments	9,390	8,208	
Total regulatory adjustments to Additional Tier 1 Capital	1	709	
Additional Tier 1 Capital (AT1)	9,389	7,499	
Tier 1 Capital (T1 = CET1 + AT1)	47,336	42,535	
Tier 2 Capital before regulatory adjustments	7,692	6,219	
Total regulatory adjustments to Tier 2 Capital	83	875	
Tier 2 Capital (T2)	7,609	5,344	
Total Capital (TC = T1 + T2)	54,945	47,879	

#### Section 5

#### **Credit Risk**

#### 5.1 General Disclosure

Credit is any transaction that creates an actual or potential obligation for a counterparty to pay the NAB Group.

Credit risk is the potential that a customer and/or counterparty will fail to meet their obligations to the NAB Group under agreed terms.

The NAB Group's approach to credit risk management is designed to:

- inform future direction and broader strategic priorities
- achieve effective credit risk management through maintaining exposure to credit risk within acceptable parameters while maximising the NAB Group's risk-adjusted rate of return and ensuring alignment to risk appetite
- be embedded in every aspect of the NAB Group's dayto-day business.

#### **Structure and Organisation**

The Board delegates credit decision-making authority to the BRC and then through the organisation via the NAB Group CEO and NAB Group Chief Risk Officer (CRO), who set the Delegated Commitment Authority (DCA). The DCA is cascaded via the NAB Group Chief Credit Officer to the Transactional Credit Committee (TCC) and the NAB Group's business units.

The GRRMC and its subcommittees oversee the NAB Group's credit risk appetite, principles, policies, models and systems for the management of credit risk across the NAB Group.

Business unit risk management committees are responsible for implementing these disciplines at a business unit level.

Either the BRC or its delegates set limits on the amount of risk accepted concerning one counterparty or group of counterparties, and geographic and industry segments. These limits are consistent with the NAB Group's risk appetite. Such risks are monitored on a regular basis and are subject to annual or more frequent reviews.

#### Management

Exposure to credit risk is managed by regularly analysing the ability of counterparties and potential counterparties to meet interest and capital repayment obligations, and by changing lending limits and lending conditions where appropriate.

Group Credit Policy applies globally and encompasses the NAB Group's:

- · credit risk appetite and principles
- credit underwriting standards
- approach to ensure compliance with regulatory standards.

Senior management and line management within each business unit have primary responsibility to ensure their respective areas follow the NAB Group's credit policies, processes and standards.

The Credit Risk functions at the NAB Group and business unit levels are charged with implementing a sound risk framework to maintain appropriate asset quality across the NAB Group in line with credit risk appetite, credit risk underwriting standards and policy.

Group Credit Risk plays a key role in managing risk appetite, portfolio measurement, assisting businesses with portfolio management, and measuring compliance with strategic targets and limits. Group Credit Risk also:

- owns and is accountable for the credit risk policies and systems, concentration limits, large counterparty credit approvals and the management of large underperforming loans
- ensures that such policies and systems comply with the various regulatory and prudential requirements
- owns and monitors the performance of Group-wide models and methodology.

A key assurance area across non-retail banking activities is the Asset Quality Assurance function. This function is responsible and accountable for the independent review and reporting of asset quality, lending process standards and credit policy compliance across transaction-managed lending portfolios. The function operates independently from the credit approval process and reports its findings to the respective business units and risk management committees highlighting adverse trends and required remedial action.

Retail lending teams undertake independent reviews and report these results to senior management in the respective business and risk management committees.

#### Measurement

Later sections of this report detail the credit risk measurement approaches.

#### **Monitoring and Reporting**

The NAB Group has a comprehensive process for reporting credit and asset quality.

The NAB Group and business unit CROs receive regular reports covering credit risk, credit quality, asset concentrations, asset quality, ESG risk, material exposures and defaults and assurance outcomes for both business and retail credit. These reports incorporate key credit risk measures including economic capital and detailed analysis of concentration risk, TCC approvals and updates on defaulted counterparties. Key reports are provided to the internal committees and the BRC.



On a monthly basis, the NAB Group and business unit Credit Risk Committees receive a detailed analysis of asset quality measures. Periodically, the business unit and Group Credit Risk functions provide the BRC and the GRRMC with portfolio and industry reviews, as well as the outcome of portfolio stress testing.

#### **Definitions of Default and Impairment**

Default occurs when a loan obligation is 90 days or more past due, or when it is considered unlikely that the credit obligation to the NAB Group will be paid in full without recourse to actions, such as realisation of security.

A facility is classified as impaired when the ultimate ability to collect principal and interest and other amounts (including legal, enforcement and realisation costs) in a timely manner is compromised.

Impaired facilities consist of:

- retail loans (excluding unsecured portfolio-managed facilities) which are contractually 90 days or more past due with security insufficient to cover principal and arrears of interest revenue
- unsecured portfolio-managed facilities which are 180 days past due (if not written off)
- non-retail loans that are contractually 90 days or more past due and/or sufficient doubt exists about the ability to collect principal and interest in a timely manner
- off-balance sheet credit exposures where current circumstances indicate that losses may be incurred.

# Creation of Specific Provisions, Collective Provisions and the General Reserve for Credit Losses

### Specific provisions

Specific provisions are raised for impaired facilities for which a loss is expected and represent the estimated shortfall between the face value of the asset and the estimated future cashflows, including the estimated realisable value of securities after costs.

#### **Collective provisions**

Collective provisions are raised for facilities that are performing or facilities in default but for which no loss is expected. This process involves grouping financial assets with similar credit risk characteristics and collectively assessing them for expected loss in accordance with the requirements of IFRS.

The assessment of collective provisions for retail assets relies on the portfolio delinquency profile and historical loss experience while the non-retail assessment relies on the risk characteristics of credit rating models.

Collective provisions also incorporate an estimate of the expected loss using management's forward looking assessment of macroeconomic and industry specific factors. This process includes the NAB Group's judgements and reasonable estimates in line with the requirements of IFRS.

The NAB Group's collective provision is disclosed in the NAB 2016 Annual Financial Report.

Effective 1 October 2014, the NAB Group early adopted the requirements of AASB 9 'Financial Instruments'. The transitional impacts of this adoption are highlighted in Note 1 to the NAB Group's 2015 Annual Financial Report.

Provisions for facilities in default but for which no loss is expected are reported as additional regulatory specific provisions within this report.

#### General reserve for credit losses

APRA *Prudential Standard APS 220 Credit Quality* requires a reserve to be held to cover credit losses estimated but not certain to arise in the future over the full life of all individual facilities. The general reserve for credit losses (GRCL) represents an appropriation of retained profits to non-distributable reserves.

The GRCL is calculated as a collective provision for doubtful debts, excluding securitisation and provisions on default-no-loss assets. The difference between the GRCL and accounting collective provisions is covered with an additional top up, created through a deduction from retained earnings to reflect losses expected as a result of future events that are not recognised in the NAB Group's collective provision for accounting purposes.

#### Write-offs

When an asset is considered uncollectible, it is written off against the related provision. Such assets are written off after all the necessary recovery procedures have been completed and the amount of the loss has been determined. Subsequent recoveries of amounts written off reduce the amount of the expense in the income statement.

#### **Table 5.1A: Credit Risk Exposures Summary**

This table provides the amount of gross credit risk exposure subject to the Standardised and Advanced IRB approaches. The Level 2 Group has no credit risk exposures subject to the Foundation IRB approach. Gross credit risk exposure refers to the potential exposure as a result of a counterparty default before the application of credit risk mitigation. It is defined as the outstanding amount on drawn commitments plus a credit conversion factor on undrawn commitments on a given facility. For derivatives, the exposure is defined as the mark-to-market value plus a potential value of future movements.

For the IRB approach, Exposure at Default (EaD) is reported gross of specific provisions and partial write-offs and before the application of on-balance sheet netting and credit risk mitigation. For the Standardised approach, EaD is reported net of any specific provision and before the application of on-balance sheet netting and credit risk mitigation. Exposures exclude non-lending assets, securitisation and Credit Value Adjustment (CVA).

Definitions of impairment and past due facilities are based on APS 220. This standard also provides guidance for Provisioning, estimated future credit losses and the General Reserve for Credit Losses.

	As at 30 Sep 16				6 months ended 30 Sep 16	
	Total exposure (EaD)	Risk weighted assets	Regulatory expected loss	Impaired facilities <sup>(2)</sup>	Specific provision s <sup>(3)</sup>	Net write- offs <sup>(4)</sup>
Exposure Type	\$m	\$m	\$m	\$m	\$m	\$m
IRB approach						
Corporate (including SME)	262,099	124,765	1,756	1,978	487	135
Sovereign	80,462	1,596	2	-	-	-
Bank	61,650	11,269	15	-	-	-
Residential mortgage	357,831	90,143	935	371	90	42
Qualifying revolving retail	11,651	3,925	181	-	-	75
Retail SME	16,286	6,182	153	86	47	26
Other retail	4,614	3,666	143	3	2	63
Total IRB approach	794,593	241,546	3,185	2,438	626	341
Specialised lending (SL)	67,011	57,900	906	194	78	22
Standardised approach						
Australian and foreign governments	-	-	-	-	-	-
Bank	-	-	-	-	-	-
Residential Mortgage	4,768	2,706	-	9	3	0
Corporate	60,190	4,219	-	1	5	4
Other	1,182	554	-	-	-	(1)
Total standardised approach	66,140	7,479	-	10	8	3
Total	927,744	306,925	4,091	2,642	712	366

Total credit risk exposure is EaD estimates of potential exposure, according to product type, for a period of one year.

<sup>[2]</sup> Impaired facilities includes \$nil million of restructured loans (March 2016: \$1 million).

Corporate (incl SME) impaired facilities includes \$785 million (NZ\$823 million) of BNZ dairy exposures currently assessed as no loss based on security held. (March 2016: \$522 million (NZ\$579 million)).

Impaired facilities includes \$14 million of gross impaired loans at fair value (March 2016: \$14 million).

<sup>(3)</sup> Specific provisions for prudential purposes include all provisions for impairment assessed on an individual basis in accordance with IFRS excluding securitisation. For regulatory reporting collective provisions on defaulted or otherwise non-performing assets, regardless of expected loss, such as those for 90+ days past due retail and in default with no loss non-retail exposures, are treated as regulatory specifics and total \$411 million (March 2016: \$403 million). This value is in addition to the \$712 million of specific provisions (March 2016: \$602 million) shown above. Specific provisions includes \$6 million (March 2016: \$6 million) of specific provisions on gross impaired loans at fair value.

<sup>(4)</sup> Net write-offs includes net write-offs of fair value loans.

	As at 31 Mar 16					6 months ended
						31 Mar 16
	Total exposure (EaD)	Risk- weighted Assets	Regulatory expected loss	Impaired facilities	Specific provisions	Net write- offs
Exposure Type	\$m	\$m	\$m	\$m	\$m	\$m
IRB approach						
Corporate (including SME)	261,531	126,757	1,696	1,551	424	76
Sovereign	71,351	1,684	3	-	-	-
Bank	75,690	11,381	17	-	-	-
Residential mortgage	347,493	62,504	885	325	83	32
Qualifying revolving retail	11,557	3,897	189	-	-	73
Retail SME	16,238	6,188	143	95	41	23
Other retail	4,522	3,631	146	3	1	50
Total IRB approach	788,382	216,042	3,079	1,974	549	254
Specialised lending (SL)	67,701	59,498	974	176	45	13
Standardised approach						
Australian and foreign governments	-	-	-	-	-	-
Bank	-	-	-	-	-	-
Residential Mortgage	4,954	2,804	-	20	-	1
Corporate	58,996	4,172	-	4	8	23
Other	1,173	558	-	-	-	12
Total standardised approach	65,123	7,534	-	24	8	36
Total	921,206	283,074	4,053	2,174	602	303

<sup>(1)</sup> Net write-offs includes net write-offs of fair value loans and discontinued operations of CYBG.



### **Credit Exposures by Measurement Approach**

## Table 5.1B: Total and Average Credit Risk Exposures

This table provides the amount of gross credit risk exposure subject to the Standardised and Advanced IRB approaches. The Level 2 Group has no credit risk exposures subject to the Foundation IRB approach. Gross credit risk exposure refers to the potential exposure as a result of a counterparty default prior to the application of credit risk mitigation. It is defined as the outstanding amount on drawn commitments plus a credit conversion factor on undrawn commitments on a given facility. For derivatives, the exposure is defined as the mark-to-market value plus a potential value of future movements. The average credit risk exposure is the sum of the gross credit risk exposure at the beginning of the reporting period plus the gross credit risk exposure at the end of the reporting period divided by two.

For the IRB approach, EaD is reported gross of specific provisions and partial write-offs and prior to the application of onbalance sheet netting and credit risk mitigation. For the Standardised approach, EaD is reported net of any specific provision and prior to the application of on-balance sheet netting and credit risk mitigation. Exposures exclude non-lending assets, securitisation and CVA

		As at 30 S	ep 16		6 months ended 30 Sep 16
	On-balance sheet exposure	Non-market related off- balance sheet	off-balance	Total exposure	Average total exposure
Exposure type	\$m	\$m	\$m	\$m	\$m
IRB approach					
Corporate (including SME) (1)	137,853	63,496	60,750	262,099	261,815
Sovereign (1)	64,069	537	15,856	80,462	75,907
Bank (1)	23,151	3,481	35,018	61,650	68,670
Residential mortgage	308,642	49,189	-	357,831	352,663
Qualifying revolving retail	5,907	5,744	-	11,651	11,604
Retail SME	12,476	3,810	-	16,286	16,263
Other retail	3,347	1,267	-	4,614	4,568
Total IRB approach	555,445	127,524	111,624	794,593	791,490
Specialised lending (SL)	55,574	10,022	1,415	67,011	67,356
Standardised approach					
Australian and foreign governments	-	-	-	-	-
Bank	-	-	-	-	-
Residential mortgage	4,636	132	-	4,768	4,861
Corporate (1)	6,497	545	53,148	60,190	59,593
Other	1,181	1	-	1,182	1,177
Total standardised approach	12,314	678	53,148	66,140	65,631
Total exposure (EaD)	623,333	138,224	166,187	927,744	924,477

<sup>10</sup> Total credit risk exposure, net of eligible financial collateral is \$793,594 million. For materially impacted asset classes, exposure net of collateral is as follows:

 Corporate (including SME)
 215,497

 Sovereign
 68,252

 Bank
 37,754

 Corporate (Standard)
 9,530

963,938

		As at 31 Mar 16				
					31 Mar 16	
	On-balance sheet exposure	Non-market related off- balance sheet	Market related off-balance sheet	Total exposure	Average total exposure	
Exposure type	\$m	\$m	\$m	\$m	\$m	
IRB approach						
Corporate (including SME (1)	136,232	63,060	62,239	261,531	261,435	
Sovereign (1)	58,261	525	12,565	71,351	71,414	
Bank (1)	22,821	3,640	49,229	75,690	78,373	
Residential mortgage	297,717	49,776	-	347,493	344,135	
Qualifying revolving retail	5,979	5,578	-	11,557	11,415	
Retail SME	12,398	3,840	-	16,238	16,233	
Other retail	3,289	1,233	-	4,522	4,477	
Total IRB approach	536,697	127,652	124,033	788,382	787,482	
Specialised lending (SL)	55,184	11,174	1,343	67,701	66,870	
Standardised approach						
Australian and foreign governments	-	-	-	-	7,250	
Bank	-	-	-	-	579	
Residential mortgage	4,835	119	-	4,954	29,192	
Corporate (1)	5,686	536	52,774	58,996	69,979	
Other	1,172	1	-	1,173	2,586	
Total standardised approach	11,693	656	52,774	65,123	109,586	

139,482

178,150

921,206

603,574 Total credit risk exposure, net of eligible financial collateral is \$774,186 million. For materially impacted asset classes, exposure net of collateral is as follows:

\$m 212,209 Corporate (including SME) Sovereign 62,326 37,754 Bank Corporate (Standard) 8,749

Total exposures (EaD)

## Table 5.1C: Exposures by Geography

This table provides the total gross credit risk exposures, by major geographical areas, derived from the booking office where the exposure was transacted. Exposures exclude non-lending assets, securitisation and CVA.

As at 30 Sep 16 Australia<sup>(1)</sup> United New Other(2) Total Kingdom<sup>(1)</sup> Zealand exposure **Exposure type** \$m \$m \$m \$m \$m IRB approach Corporate (including SME) 36,556 26,236 262,099 166,451 32,856 Sovereign 50 818 4 552 5 043 20,049 80.462 Bank 34,585 17,043 3,773 6,249 61,650 357,831 Residential mortgage 321,005 36,826 Qualifying revolving retail 11,651 11,651 Retail SME 14,446 1,840 16,286 Other retail 2.464 2.150 4,614 Total IRB approach 601,420 54,451 86,188 52,534 794,593 Specialised lending (SL) 57,992 793 7,630 596 67,011 Standardised approach Australian and foreign governments Bank Residential mortgage 2,442 39 2,287 4.768 Corporate 6,990 7,308 690 45,202 60,190 Other 1,182 1,095 87 Total standardised approach 47,576 66,140 10.527 7.308 729 Total exposure (EaD) 669,939 62,552 94,547 100,706 927,744

<sup>(2)</sup> Other comprises North America and Asia.

		As	at 31 Mar 16		
	Australia	United Kingdom	New Zealand	Other	Total exposure
Exposure type	\$m	\$m	\$m	\$m	\$m
IRB approach		1		,	
Corporate (including SME)	167,482	35,560	33,515	24,974	261,531
Sovereign	46,054	7,678	4,076	13,543	71,351
Bank	33,352	29,139	3,659	9,540	75,690
Residential mortgage	313,989	-	33,504	-	347,493
Qualifying revolving retail	11,557	-	-	-	11,557
Retail SME	14,468	-	1,770	-	16,238
Other retail	2,474	-	2,048	-	4,522
Total IRB approach	589,376	72,377	78,572	48,057	788,382
Specialised lending (SL)	58,988	1,363	6,675	675	67,701
Standardised approach					
Australian and foreign governments	-	-	-	-	-
Bank	-	-	-	-	-
Residential mortgage	2,541	-	50	2,363	4,954
Corporate	4,957	6,279	634	47,126	58,996
Other	1,085	-	-	88	1,173
Total standardised approach	8,583	6,279	684	49,577	65,123
Total exposures (EaD)	656,947	80,019	85,931	98,309	921,206

<sup>(1)</sup> From September 2016, derivative exposures that form part of a netting group are allocated to major geographical areas based on the booking office where the pre-netting exposure was transacted

## **Table 5.1D: Exposures by Industry**

This table provides the distribution of gross credit risk exposures, excluding non-lending assets, securitisation and CVA, by major industry type. Industry classifications follow ANZSIC Level 1 classifications. To provide for a meaningful differentiation and quantitative estimates of risk that are consistent, verifiable, relevant and soundly based, exposures are disclosed based on the counterparty to which the NAB Group is exposed to credit risk, including guarantors and derivative counterparties.

As at 30 Sep 16 Accommodation Agriculture, Business Commercial Construction Finance Manufacturing Personal Residential Retail and Transport Other<sup>(1)</sup> Total cafes, pubs and forestry, services property and mortgages wholesale and restaurants fishing and and insurance trade storage mining property services \$m \$m \$m **Exposure type** \$m IRB approach Corporate (including SME) 13.386 79.210 262.099 7.905 45.357 15.956 7.862 18.910 148 27.522 16.896 28.947 Sovereign 40,159 2 40,301 80,462 Bank 59,946 1,704 61,650 Residential mortgage 357,831 357,831 Qualifying revolving retail 11,651 11,651 Retail SME 839 3,971 2,004 471 1,839 971 130 2,673 818 16,286 974 1,596 Other retail 4,614 4,614 Total IRB approach 8.744 49,328 17,960 13,857 180,286 19,884 16,543 357,831 30,195 17,716 72,548 794,593 9,701 Specialised lending (SL) 355 733 105 60,636 403 416 3 1,713 2,647 67,011 Standardised approach Australian and foreign governments Bank Residential mortgage 4,768 4,768 Corporate 54 68 2 331 24 66 56,101 276 252 739 97 2,180 60,190 Other 1,161 21 1,182 **Total standardised** 1,229 66,140 2 54 331 24 66 56,101 276 5,041 739 97 2,180 approach Total exposure (EaD) 9.101 50.115 18.396 74.517 10.170 236.803 20.160 17.775 362.872 30.934 19.526 77.375 927.744

<sup>(1)</sup> Remaining categories are grouped collectively under 'Other'.

Δs	at	31	M	ar 1	ı

	Accommodation cafes, pubs and restaurants	forestry, fishing and	services	Commercial property	Construction	Finance and insurance	Manufacturing	Personal	Residential mortgages	Retail and wholesale trade	Transport and storage	Other	Total
Exposure type	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m	\$m
IRB approach													
Corporate (including SME)	8,142	43,439	15,806	12,276	7,524	80,076	20,833	166	-	28,125	16,471	28,673	261,531
Sovereign	-	-	-	-	-	31,754	-	-	-	-	1	39,596	71,351
Bank	-	-	-	-	-	74,270	-	-	-	-	-	1,420	75,690
Residential mortgage	-	-	-	-	-	-	-	-	347,493	-	-	-	347,493
Qualifying revolving retail	-	-	-	-	-	-	-	11,557	-	-	-	-	11,557
Retail SME	856	3,977	1,991	480	1,824	926	986	127	-	2,684	806	1,581	16,238
Other retail	-	-	-	-	-	-	-	4,522	-	-	-	-	4,522
Total IRB approach	8,998	47,416	17,797	12,756	9,348	187,026	21,819	16,372	347,493	30,809	17,278	71,270	788,382
Specialised lending (SL)	113	732	106	61,439	391	364	-	51	-	-	1,471	3,034	67,701
Standardised approach													
Australian and foreign governments	-	-	-	-	-	-	-	-	-	-	-	-	-
Bank	-	-	-	-	-	-	-	-	-	-	-	-	-
Residential mortgage	-	-	-	-	-	-	-	-	4,954	-	-	-	4,954
Corporate	2	50	329	21	58	54,993	277	86	233	707	101	2,139	58,996
Other	-	-	-	-	-	-	-	1,154	19	-	-	-	1,173
Total standardised approach	2	50	329	21	58	54,993	277	1,240	5,206	707	101	2,139	65,123
Total exposure (EaD)	9,113	48,198	18,232	74,216	9,797	242,383	22,096	17,663	352,699	31,516	18,850	76,443	921,206



## Table 5.1E: Exposures by Maturity

This table sets out the residual contractual maturity breakdown of gross credit risk exposures, excluding non-lending assets, securitisation and CVA. Overdraft and other similar revolving facilities are allocated to the category that most appropriately captures the maturity characteristics of the product.

As at 30 Sep 16 <12 months >5 years 1 - 5 years No specified  $maturity^{\scriptscriptstyle (1)}$ **Exposure type** \$m \$m \$m \$m **IRB** approach Corporate (including SME) 107,385 117.282 31.204 6.228 Sovereign 41,027 16,113 23,238 84 364 Bank 33,154 13,738 14,394 Residential mortgage 36,541 7,381 313,473 436 Qualifying revolving retail 11,651 5,211 Retail SME 7,381 3,072 622 Other retail 266 1,090 1,090 2,168 Total IRB approach 223,584 162,985 386,471 21,553 Specialised lending (SL) 24,656 37,712 3,873 770 Standardised approach Australian and foreign governments Bank Residential mortgage 225 431 4,105 7 1,628 214 Corporate 54,344 4,004 Other 225 942 15 Total standardised approach 55,511 2,284 8,124 221 Total exposure (EaD) 303.751 202.981 398.468 22,544

<sup>(1)</sup> No specified maturity includes exposures related to credit cards, on demand facilities and guarantees given by the Level 2 Group with no fixed maturity date.

		As at 31 N	/lar 16	
	<12 months	1 – 5 years	>5 years	No specified maturity
Exposure type	SME	\$m	\$m	\$m
IRB approach				
Corporate (including SME)	112,021	112,409	30,904	6,197
Sovereign	34,913	15,437	20,937	64
Bank	46,295	13,465	15,767	163
Residential mortgage	38,180	7,519	301,234	560
Qualifying revolving retail	1	-	-	11,556
Retail SME	5,175	7,184	3,244	635
Other retail	284	1,120	1,052	2,066
Total IRB approach	236,869	157,134	373,138	21,241
Specialised lending (SL)	23,653	38,668	4,725	655
Standardised approach				
Australian and foreign governments	-	-	-	-
Bank	-	-	-	-
Residential mortgage	210	507	4,225	12
Corporate	53,581	1,526	3,697	192
Other	929	225	19	-
Total standardised approach	54,720	2,258	7,941	204
Total exposures (EaD)	315,242	198,060	385,804	22,100



#### **Credit Provisions and Losses**

#### Table 5.1F: Provisions by Asset Class

The following tables set out information on credit risk provision by Basel Accord asset class, excluding non-lending assets and securitisation exposures. Definitions of impairment and past due facilities are based on APS 220. This standard also provides guidance for Provisioning, estimated future credit losses and the GRCL.

	As	at 30 Sep 16	5		hs ended ep 16
	Impaired facilities <sup>(1)</sup>	Past due facilities ≥90 days	Specific provisions <sup>(2)</sup>	Charges for specific provisions	
Exposure type	\$m	\$m	\$m	\$m	\$m
IRB approach					
Corporate (including SME)	1,978	181	487	202	135
Sovereign	-	-	-	-	-
Bank	-	-	-	-	-
Residential mortgage	371	1,470	90	44	42
Qualifying revolving retail	-	64	-	85	75
Retail SME	86	91	47	32	26
Other retail	3	51	2	54	63
Total IRB approach	2,438	1,857	626	417	341
Specialised lending (SL)	194	110	78	55	22
Standardised approach					
Australian and foreign governments	-	-	-	-	-
Bank	-	-	-	-	-
Residential mortgage	9	8	3	-	-
Corporate	1	-	5	2	4
Other	-	-	-	-	(1)
Total standardised approach	10	8	8	2	3
Total	2,642	1,975	712	474	366
Additional regulatory specific provisions (2)			411		

<sup>(1)</sup> Impaired facilities includes \$nil million of restructured loans (March 2016: \$1 million).

Corporate (incl SME) impaired facilities includes \$785 million (NZ\$823 million) of BNZ dairy exposures currently assessed as no loss based on security held. (March 2016: \$522 million (NZ\$579 million)).

Impaired facilities includes \$14 million of gross impaired loans at fair value (March 2016: \$14 million).

<sup>&</sup>lt;sup>(2)</sup> Specific provisions for prudential purposes include all provisions for impairment assessed on an individual basis in accordance with IFRS excluding securitisation. For regulatory reporting collective provisions on defaulted or otherwise non-performing assets, regardless of expected loss, such as those for 90+ days past due retail and in default with no loss non-retail exposures, are treated as regulatory specifics and total \$411 million (March 2016: \$403 million). This value is in addition to the \$712 million of specific provisions (March 2016: \$602 million) shown above. Specific provisions includes \$6 million (March 2016: \$6 million) of specific provisions on gross impaired loans at fair value.

<sup>(3)</sup> Net write-offs includes net write-offs of fair value loans.

	As	at 31 Mar 16	i .	6 months 31 Mar	
	Impaired facilities	Past due facilities ≥90 days	Specific provisions	Charges for specific provisions	Write-offs <sup>(2</sup>
Exposure type	\$m	\$m	\$m	\$m	\$m
IRB approach					
Corporate (including SME)	1,551	232	424	267	76
Sovereign	-	-	-	-	-
Bank	-	-	-	-	-
Residential mortgage	325	1,436	83	30	32
Qualifying revolving retail	-	65	-	68	73
Retail SME	95	98	41	16	23
Other retail	3	54	1	36	50
Total IRB approach	1,974	1,886	549	417	254
Specialised lending (SL)	176	111	45	8	13
Standardised approach					
Australian and foreign governments	-	-	-	-	-
Bank	-	-	-	-	-
Residential mortgage	20	4	-	-	1
Corporate	4	2	8	14	23
Other	-	-	-	13	12
Total standardised approach	24	6	8	27	36
Total	2,174	2,003	602	452	303
Additional regulatory specific provisions			403		

- (1) Charges for specific provisions includes discontinued operations of CYBG.
- (2) Net write-offs includes net write-offs of fair value loans and discontinued operations of CYBG.

# Factors Impacting Loss Experience in the Preceding Period

#### 90+ Days Past Due Loans

Group 90+DPD facilities decreased during the September 2016 half year due to improvements in the Advanced IRB Corporate (including SME) portfolio partly offset by the IRB Residential Mortgages portfolio within Australian Banking impacted by economic conditions resulting from the mining slowdown.

#### Impaired facilities

Impaired facilities increased during the September 2016 half year within the Advanced IRB Corporate (inc SME Corp) portfolio mainly driven by the inclusion of additional New Zealand dairy exposures currently assessed as no loss based on security held and the new impairment of a small number of large single names in Australian Banking.

#### **Specific Provision**

Specific provisions increased during the September 2016 half year, due to the Australian Banking IRB Corporate (Inc SME Corp) and specialised lending portfolios due to provisions associated to the impairment of a small number of large single names.

# **Charges for Specific Provisions**

The total specific provision charge for the September 2016 half year was \$474m, \$22m higher than the March 2016 half year. This increase was primarily due to higher specific provision charges within the Australian Banking IRB Residential Mortgages portfolio & Qualifying Revolving Retail portfolio, partly offset by movements associated to the demerger of CYBG.

#### **Net Write-Offs**

Net write-offs increased from \$303 million for the March 2016 half year to \$366 million for the September 2016 half year. The increase was due to a small number of large single names being written-off in the Advanced IRB Corporate (inc SME Corp) portfolio within Australian Banking, partly offset by the non-recurring write-offs associated to the demerger of CYBG.



#### Table 5.1G (i): Loss Experience

Table 5.1G (i) provides the regulatory expected loss (which is Through The Cycle (TTC) loss estimates) compared to the realised actual losses calculated as an exposure weighted average since 30 September 2009.

Actual losses (net write-offs) measured over the short-term will differ to regulatory expected loss estimates as actual losses are a lag indicator of the quality of the assets in prior periods. Other differences between these measures are:

- actual losses do not take into account modelled economic costs such as internal workout costs factored into estimates of loss
- regulatory expected loss is based on the quality of exposures at a point-in-time (PiT) using long run Probability of Default (PDs) and stressed Loss Given Default (LGDs). In most years actual losses would be below the regulatory expected loss estimate
- regulatory expected loss includes expected losses on non-defaulted assets which is a function of long-run PDs and downturn stressed LGDs. For defaulted exposures, regulatory expected loss is based on the NAB Group's best estimate of expected loss

	30 S	Sep 16	
Exposure type	Exposure weighted average actual loss (net write- offs)(7) \$m	Exposure weighted average regulatory expected loss <sup>(2)</sup>	
IRB approach	<b></b>	<del></del>	
Corporate (including SME)	596	2,595	
Sovereign	-	7	
Bank	7	54	
Residential mortgage	102	866	
Qualifying revolving retail	177	210	
Retail SME	77	267	
Other retail	94	145	
Total IRB approach	1,053	4,144	

<sup>(1)</sup> Calculated as an exposure weighted average of actual losses (net write-offs) experienced through each respective 12 monthly period since 30 September 2009.

<sup>(2)</sup> Calculated as an exposure weighted average of regulatory expected loss covering each respective 12 monthly period since 30 September 2009.

	31 Mar 16	
	actual loss regula (net write- expe	hted rage atory
Exposure type	\$m	\$m
IRB approach		
Corporate (including SME)	584	2,734
Sovereign	-	2
Bank	3	55
Residential mortgage	104	919
Qualifying revolving retail	174	219
Retail SME	77	275
Other retail	89	142
Total IRB approach	1,031	4,346

<sup>(1)</sup> Calculated as an exposure weighted average of actual losses (net write-offs) experienced through each respective 12 monthly period since 31 March 2011.

<sup>(2)</sup> Calculated as an exposure weighted average of regulatory expected loss covering each respective 12 monthly period since 31 March 2011.



#### **Accuracy of Risk Estimates**

The following tables have been provided to summarise and compare across asset classes, the estimates of credit risk factors used within the calculation of regulatory capital with actual outcomes. Estimates for Specialised Lending have not been included as these exposures are subject to the Supervisory Slotting Criteria approach, which relies upon the application of supervisory risk weights.

A full explanation of the Internal Ratings Process and the application of credit risk models to calculate PD, EaD and LGD is provided within Section 5.3 of this report.

#### Table 5.1G (ii): Accuracy of Risk Estimates - PD and EaD

This table provides a comparison of internal estimates of long-run PD with actual default rates averaged over a period of seven years to 30 September 2016. Averages of actual and estimated PD are calculated from the cohort that is not in default at the beginning of the financial year and averaged out over the seven year observation period. The EaD ratio compares the estimated downturn EaD at the beginning of the financial year against the actual default amount.

		As at 30 Sep 16			
	Average Estimated PD	Average Actual PD <sup>(1)</sup>	Ratio of estimated to actual EAD		
Exposure type	%	%			
IRB approach					
Corporate (including SME)	1.77	1.88	1.1		
Sovereign (2)	0.42	0.13	1.3		
Bank (2)	0.39	0.18	1.1		
Residential mortgage (3)	0.91	0.89	1.0		
Qualifying revolving retail	1.50	1.59	1.1		
Retail SME	2.02	2.21	1.1		
Other retail	2.14	2.91	1.0		

<sup>(1)</sup> These values provide a comparison of internal estimates of long-run PD with actual default rates averaged over a period of seven years to 30 September 2016.

<sup>(3)</sup> Estimated PDs includes BNZ assets subject to RBNZ calibration overlay.

	As a	As at 31 Mar 16		
	Average Estimated PD <sup>(†)</sup>	Average Actual PD <sup>(1)</sup>	Ratio of estimated to actual EAD	
Exposure type	%	%		
IRB approach				
Corporate (including SME)	1.76	1.94	1.1	
Sovereign	0.43	0.09	1.1	
Bank	0.39	0.24	1.0	
Residential mortgage	0.96	0.86	1.0	
Qualifying revolving retail	1.56	1.31	1.1	
Retail SME	2.01	2.22	1.1	
Other retail	2.23	2.90	1.0	

<sup>(1)</sup> These values provide a comparison of internal estimates of long-run PD with actual default rates averaged over a period of five years to 31 March 2016.

<sup>(2)</sup> Average actual PDs for Sovereign and Bank exposures are based on a low number of observed defaults.

#### Table 5.1G (iii): Accuracy of Risk Estimates - LGD

This table provides comparison of internal estimates of downturn LGD with actual losses which were evidenced during the seven years to 30 September 2016. Actual LGD was calculated using net write-offs from defaults during the seven year observation period with the most recent defaults excluded to allow sufficient time for the workout of the asset and recognition of any losses. For defaults relating to qualifying revolving retail and other retail, this period is the most recent 12 months and for all other asset classes the period is the most recent two years. Estimates are calculated using the downturn LGD at the beginning of the financial year.

	As at 3	0 Sep 16	
	Average estimated downturn LGD	Average actual LGD	
Exposure type	%	%	
IRB approach			
Corporate (including SME) (2)	38.6	31.1	
Sovereign (3)	45.0	-	
Bank (3)	51.1	-	
Residential mortgage (4)	20.6	4.1	
Qualifying revolving retail	87.1	66.8	
Retail SME	36.2	20.5	
Other retail	75.9	54.0	

<sup>(1)</sup> These values provide a comparison of internal estimates of downturn LGD with actual losses which were evidenced during the seven years to 30 September 2016.

<sup>(4)</sup> Estimated downturn LGD subject to APRA and RBNZ imposed regulatory floors.

	As at 31	As at 31 Mar 16	
	Average estimated downturn LGD <sup>(1)</sup>	Average actual LGD	
Exposure type	%	%	
IRB approach			
Corporate (including SME)	38.3	31.7	
Sovereign	45.0	-	
Bank	52.9	-	
Residential mortgage	20.5	3.9	
Qualifying revolving retail	87.2	67.7	
Retail SME	36.5	19.5	
Other retail	75.7	55.2	

<sup>(1)</sup> These values provide a comparison of internal estimates of downturn LGD with actual losses which were evidenced during the five years to 31 March 2016.

<sup>(2)</sup> Estimated downturn LGD includes BNZ assets subject to RBNZ regulatory floors.

<sup>(3)</sup> Average actual and estimated downturn LGDs for Sovereign and Bank exposures have historically been excluded from this table in the instances where a low number of defaults have been observed.



# **Table 5.1H: Provisions by Industry**

This table shows provisioning information by industry. Industry classifications follow ANZSIC Level 1 classifications. Totals do not include amounts relating to non-lending assets, securitisation and CVA.

	As at 30 Sep 16		6 months ended 30 Sep 16		
	Impaired facilities	Past due facilities ≥90 days	Specific provisions	Charges for specific provisions	Net write-offs
	\$m	\$m	\$m	\$m	\$m
Industry sector					
Accommodation, cafes, pubs and restaurants	67	11	24	19	13
Agriculture, forestry, fishing and mining	1,370	55	175	43	51
Business services and property services	122	33	51	15	17
Commercial property	148	110	54	26	22
Construction	71	29	32	15	7
Finance and insurance	61	8	39	6	(1)
Manufacturing	145	36	89	50	9
Personal	4	125	3	136	134
Residential mortgages	380	1,478	93	42	41
Retail and wholesale trade	172	40	90	81	65
Transport and storage	31	19	17	6	3
Other	71	31	45	35	5
Total	2,642	1,975	712	474	366

	As at 31 Mar 16			6 months 31 Mar	
	Impaired facilities	Past due facilities	Specific provisions	Charges for specific provisions	Write-offs
	\$m	≥90 days \$m	\$m	\$m	\$m
Industry sector		ΨIII	φm	<b>ə</b> m	ΨIII
Accommodation, cafes, pubs and restaurants	63	17	19	13	35
Agriculture, forestry, fishing and mining	1,036	80	188	157	25
Business services and property services	117	30	51	21	9
Commercial property	182	108	50	10	18
Construction	67	34	25	13	10
Finance and insurance	55	13	32	(1)	(1)
Manufacturing	101	32	44	13	6
Personal	4	131	1	114	139
Residential mortgages	344	1,441	83	31	34
Retail and wholesale trade	148	54	73	67	23
Transport and storage	29	19	14	6	3
Other	27	44	20	8	2
Total	2,174	2,003	602	452	303

Table 5.1I: Provisions by Geography

	As at 30 Sep 16				
	Impaired facilities	Past due facilities ≥90 days	Specific provisions	General reserve for credit losses	
	\$m	\$m	\$m	\$m	
Geographic region					
Australia	1,558	1,806	582	2,338	
United Kingdom	7	3	4	13	
New Zealand	1,028	165	95	436	
Other (1)	49	1	31	24	
Total	2,642	1,975	712	2,811	
Regulatory specific provisions			411	(411)	
Plus reserve created through retained earnings				75	
General reserve for credit losses (2)				2,475	

<sup>(1) &#</sup>x27;Other' comprises North America and Asia.

The GRCL balance allocated across geographic regions of \$2,811 million includes \$2,408 million of provisions on loans at amortised cost and \$403 million of provisions held on assets at fair value and other debt instruments. Disclosure of the General Reserve for Credit Losses by geographic area is reflective of internal risk transfers within the NAB Group.

	As at 31 Mar 16					
	Impaired facilities	Past due facilities ≥90 days	Specific provisions	General reserve for credit losses		
		\$m	\$m	\$m		
Geographic region						
Australia	1,399	1,794	485	2,285		
United Kingdom	20	16	10	243		
New Zealand	728	190	91	402		
Other	27	3	16	48		
Total	2,174	2,003	602	2,978		
Danulatan, an aife annisina			402	(402)		
Regulatory specific provisions			403	(403)		
Plus reserve created through retained earnings				130		
General reserve for credit losses (1)		·		2,705		

<sup>(1)</sup> The GRCL balance allocated across geographic regions of \$2,978 million includes \$2,453 million of provisions on loans at amortised cost and \$525 million of provisions held on assets at fair value and other debt instruments.on assets at fair value and other debt instruments.



# **Table 5.1J: Movement in Provisions**

This table discloses the movements in the balance of provisions over the reporting period for both specific provisions and the general reserve for credit losses. Totals do not include amounts relating to non-lending assets, securitisation and CVA.

	6 months ended	6 months ended 31 Mar 16	
	30 Sep 16		
	\$m	\$m	
General reserve for credit losses			
Collective provision balance at start of period	2,453	2,883	
Total charge to income statement	143	138	
Net transfer to specific provision	(188)	(130)	
Disposal of controlled entities	-	(401)	
Foreign currency translation and other adjustments	-	(37)	
Collective provision on loans at amortised cost	2,408	2,453	
Plus provisions held on assets at fair value and other debt instruments (1)	403	525	
Less additional regulatory specific provisions	(411)	(403)	
Plus reserve created through retained earnings	75	130	
General reserve for credit losses	2,475	2,705	
Specific provisions			
Balance at start of period	596	637	
Net transfer from general reserve for credit losses	188	130	
Bad debts recovered	56	63	
Bad debts written off	(420)	(358)	
Total charge to income statement	284	318	
Disposal of controlled entities	-	(174)	
Foreign currency translation and other adjustments	2	(20)	
Specific provisions excluding provisions for assets at fair value	706	596	
Specific provisions held on assets at fair value	6	6	
Additional regulatory specific provisions	411	403	
Total regulatory specific provisions	1,123	1,005	
Total provisions	3,598	3,710	

<sup>(1)</sup> Provisions held on assets at fair value are presented gross of \$18 million regulatory specific provisions for assets held at fair value (March 2016: \$14 million).



# 5.2 Standardised and Supervisory Slotting Portfolios

#### **Standardised Credit Risk Portfolios**

The NAB Group uses the standardised methodology in the Basel Capital Framework, as interpreted by APRA, for the calculation of Basel credit RWA.

Fitch, Moody's and Standard & Poor's credit ratings are used to determine the risk weights within the APRA standardised approach, as presented in the table below. APRA's external rating grades table is used to map external ratings into an "external rating grade" or Credit Rating Grade that defines the appropriate risk weight as outlined in APRA *Prudential Standard APS 112 Capital Adequacy Standardised Approach to Credit Risk*.

#### **External Rating Grade Classification**

External rating grade	S & P	Moody's	Fitch
1	AAA, AA+, AA, AA-	Aaa, Aa1, Aa2, Aa3	AAA, AA+, AA, AA-
2	A+, A, A-	A1, A2, A3	A+, A, A-
3	BBB+, BBB, BBB-	Baa1, Baa2, Baa3	BBB+, BBB, BBB-
4	BB+, BB, BB-	Ba1, Ba2, Ba3	BB+, BB, BB-
5	B+, B, B-	B1, B2, B3	B+, B, B-
6	CCC+, CCC, CCC-, CC, C, D	Caa1, Caa2, Caa3, Ca, C	CCC+, CCC, CCC-, CC, C, D

#### Table 5.2A: Standardised Exposures by Risk Weight

The following table shows the credit exposure amount before and after risk mitigation (1) in each risk category, subject to the standardised approach.

	As at 30 Sep 16		As at 31 Mar 16	
	Credit exposure before risk mitigation	Credit exposure after risk mitigation	Credit exposure before risk mitigation	Credit exposure after risk mitigation
Standardised approach – risk weights	\$m	\$m	\$m	\$m
0%	64	64	-	_
2%	52,964	2,628	52,270	2,322
4%	2,227	1,931	1,923	1,638
20%	-	1,515	-	1,493
35%	2,161	2,119	2,248	2,209
50%	594	593	573	573
75%	1,323	1,322	1,492	1,492
100%	6,643	4,978	6,507	4,904
150%	14	13	16	15
Default Fund Contributions (1)	150	150	94	94
Total standardised approach (EaD)	66,140	15,313	65,123	14,740

<sup>(1)</sup> Default fund contributions to qualifying central clearing counterparties are shown separately as they do not align to the risk weights above.



Table 5.2B: Standardised Exposures by Risk Grade

	As at 30	As at 30 Sep 16		Mar 16
	Credit exposure before risk mitigation	Credit exposure after risk mitigation	Credit exposure before risk mitigation	Credit exposure after risk mitigation
Asset class by rating grade	\$m	\$m	\$m	\$m
Australian and foreign governments				
Credit rating grade 1	-	-	-	-
Credit rating grade 2	-	-	-	-
Unrated	-	-	-	-
Sub-total	-	-	-	-
Bank				
Credit rating grade 1	-	-	-	-
Credit rating grade 2	-	-	-	-
Credit rating grade 3	-	-	-	-
Credit rating grade 4	-	-	-	-
Unrated	-	-	-	-
Sub-total	-	-	-	-
Residential mortgage				
Unrated	4,768	4,711	4,954	4,900
Sub-total	4,768	4,711	4,954	4,900
Corporate				
Credit rating grade 1	-	-	-	-
Credit rating grade 2	873	800	767	635
Credit rating grade 3	-	-	-	-
Unrated (1)	59,317	8,719	58,229	8,107
Sub-total	60,190	9,519	58,996	8,742
Other				
Unrated	1,182	1,083	1,173	1,098
Sub-total	1,182	1,083	1,173	1,098
Total standardised approach (EaD)	66,140	15,313	65,123	14,740



# Portfolios Subject to Supervisory Risk Weights in the IRB Approaches

Specialised Lending is represented by the following four sub-asset classes:

- · Project Finance Exposures
- Income-Producing Real Estate Exposures
- · Object Finance Exposures
- · Commodities Finance Exposures.

The NAB Group maps its internal rating grades for Specialised Lending to the five supervisory slotting categories of strong, good, satisfactory, weak and default. The criteria to map these exposures are found in APRA Prudential Standard APS 113 Capital Adequacy: Internal Ratings-based Approach to Credit Risk (Attachment F).

For Income-Producing Real Estate, the NAB Group maps a combination of internal rating grade and loss given default to the supervisory slotting categories. Each slotting category is associated with a specific risk weight for unexpected loss that broadly corresponds to a range of external credit assessments as detailed below.

Supervisory category	Risk weight	External rating equivalent
Strong	70%	BBB- or better
Good	90%	BB+ or BB
Satisfactory	115%	BB- or B+
Weak	250%	B to C
Default	0%	N/A

## Table 5.2C: Supervisory Slotting by Risk Weight

The following table shows the credit exposure, reported after risk mitigation, in each risk bucket for Specialised Lending products subject to supervisory slotting.

	As at	
	30 Sep 16	31 Mar 16
	Exposure after risk mitigation	Exposure after risk mitigation
IRB supervisory slotting – unexpected loss risk weights	\$m	\$m
70%	25,380	24,615
90%	32,107	32,052
115%	7,494	9,077
250%	883	1,045
Default	535	563
Total IRB supervisory slotting (EaD)	66,399	67,352



# 5.3 Internal Ratings Based Portfolios

# General Disclosure on the Internal Rating Based System (IRB)

The NAB Group has been accredited by APRA to use its internal credit models and processes in determining RWA for its retail and non-retail credit portfolios across its Australian, New Zealand (1) and Product & Markets operations.

The NAB Group's internal ratings system measures credit risk using: PD, LGD, and EaD. Distinct PD, EaD and LGD

models exist for the retail and non-retail credit portfolios, based on asset categories and customer segments.

Non-retail customers are assessed individually using a combination of expert judgement and statistical risk rating tools. For retail customers, operational scorecards are the primary method of risk rating. The following table summarises exposures type and rating approach for each asset class.

Basel Asset Class	Type of exposures	Rating approach
Non-Retail		
Corporate (including SME)	Companies, including investment banks and non-government entities.	Statistical risk model, external credit rating and expert judgement
Sovereign	Sovereign and Australian dollar claims on the Reserve Bank of Australia.  Sovereign includes government guaranteed exposures.	Statistical risk model, external credit rating and expert judgement
Bank	ADIs and overseas banks.	Statistical risk model, external credit rating and expert judgement
Specialised lending	Exposures associated with the financing of individual projects where the repayment is highly dependent on the performance of the underlying pool or collateral, rather than the obligor's creditworthiness. Includes project finance, income-producing real estate, object finance and commodities finance.	Statistical risk model, expert judgement, supervisory slotting
Retail		
Residential mortgage	Exposures partly or fully secured by residential properties.	Statistical risk model
Qualifying revolving retail	Consumer credit cards excluding BNZ credit cards (which are classified as Other Retail under RBNZ rules).	Statistical risk model
Retail SME	Small business and agriculture exposures where the total aggregated business related exposures of the obligor and its related entities are less than \$1 million.	Statistical risk model
Other retail	Retail exposures other than Residential Mortgage, Qualifying revolving retail and Retail SME. Includes personal loan products, overdrafts, transaction account exposures and BNZ credit cards.	Statistical risk model

# **Internal Risk Rating and External Ratings**

The structure of the internal risk rating system and its relationship with external ratings is detailed below.

Description	Internal rating	Probability of default (%)
Super senior investment grade	1, 2	0<0.03
Senior investment grade	3, 4, 5	0.03<0.11
Investment grade	6, 7, 8, 9, 10, 11	0.11<0.55
Acceptable	12, 13, 14, 15, 16, 17, 18, 19	0.55<5.01
Weak/doubtful	20, 21, 22, 23	5.01<99.99
Default	98, 99	100
Description	S&P rating	Moody's rating
Super senior investment grade	AAA, AA+, AA, AA-	Aaa, Aa1, Aa2, Aa3
Senior investment grade	A+, A, A-	A1, A2, A3
nvestment grade	BBB+, BBB, BBB-	Baa1, Baa2, Baa3
Acceptable	BB+, BB, BB-, B+	Ba1, Ba2, Ba3, B1
Weak/doubtful	B, B-, CCC+, CCC, CCC-	B2, B3, Caa,Ca
Default	D	С

<sup>(1)</sup> RBNZ IRB discretions are used for the New Zealand (BNZ) portfolio.



#### **Internal Ratings Process Overview**

#### **Probability of Default**

PD measures the likelihood that an obligor will default within a 12 month period. The NAB Group uses two types of PD estimates:

- PiT, which estimates the likelihood of default in the next 12 months taking account of the current economic conditions. PiT PDs are used for management of the portfolio and the collective provision calculation.
- TTC, which estimates the likelihood of default through a full credit cycle. TTC PDs are used for regulatory and economic capital calculation.

The NAB Group has a common masterscale across all counterparties (non-retail and retail) for PD.

#### **Loss Given Default**

LGD measures the portion of the exposure owed to the NAB Group that would be lost in the event of the customer defaulting. LGD is calculated by using a set of estimated parameters including Loss Given Realisation (LGR), post-default path rates and the bank value of collateral.

The NAB Group applies stresses to the model factors to obtain downturn LGD estimates using internal data, external reference data and benchmarks, and by applying expert judgement.

# **Exposure at Default**

EaD is calculated according to the facility type. The NAB Group's EaD models predict the dollar amount that is outstanding if the obligor defaults. This amount includes principal, fees and interest owed at the time of default.

The NAB Group applies stresses to the model factors to obtain downturn EaD estimates using internal data, benchmark studies and expert judgement.

#### Use of PD, LGD and EaD

PD, LGD and EaD estimates are used for various regulatory and internal Credit Risk calculations, such as Regulatory Expected Loss, RWA, economic capital and provisioning.

#### **Credit Rating System Control**

In addition to monthly performance reporting, credit models are reviewed at least annually in accordance with the NAB Group's Model Risk Policy. Regular independent reviews are also conducted.

The outcomes of the model validation process, including proposed actions, are presented to the authorised Risk Committees for review and endorsement of any actions for implementation.

#### Non-Retail Credit - Internal Ratings Process

#### Non-Retail - PD Models

The NAB Group has a number of PD models that differentiate by industry or segment, counterparty size and

incorporate regional variances. The rating model used is dependent on:

- · industry, based on ANZSIC classification
- · financial information available
- · qualitative information
- · exposure and product.

The quantitative (financial) factors consist of financial ratios and indicators (e.g. profitability, leverage and debt service coverage). The qualitative (non-financial) factors are based on qualitative data using the expert judgement of the lender and credit officer (e.g. management ability and industry outlook).

While factors predictive of default have broad similarities across segments (e.g. debt service capability and management quality) and are inherently correlated, the modelling process establishes those factors that are most robustly predictive for each segment, along with their relative weightings. External benchmarking is used for certain segments that have insufficient internal data, a small population and/or low defaults. This is the case for externally rated banks and sovereigns, where external rating agency data is used. The resulting rating is updated at least annually.

#### Non-Retail - EaD Models

EaD is calculated according to the facility type.

EaD = Balance + Credit Conversion Factor x Undrawn Limit

Conversion factors are used for estimating off-balance sheet exposures into an equivalent on-balance sheet amount, based on internal data.

#### Non-Retail - LGD Models

LGD for the non-retail portfolio is calculated by using a set of estimated parameters including post default path relativities, secured and unsecured loss experience as well as bank value of collateral. LGD is segmented by customer type, customer size and nature of facility.

As the market value of the collateral and unsecured recoveries is affected by credit cycle changes, the impact of a credit cycle downturn on LGD has been incorporated.

The NAB Group also uses the following factors for non-retail credit LGD models:

- · relevant external benchmarks
- · secured and unsecured recovery rates
- · time value of money
- · principal and interest write-offs.

Where limited internal default data exists, data is supplemented by external benchmarks, market data and expert judgement.



#### **Retail Credit - Internal Ratings Process**

#### Retail Credit - PD Models

Retail PD models are developed using the following:

- application data and scorecards, including external credit bureau data
- customer and account level behavioural data (for example delinquency or limit utilisation) as well as behaviour scorecards that are updated monthly.

Each account is "scored" to assign a PD. This process allows groups of accounts with similar scores to be pooled together and mapped to the PD masterscale.

Appropriate long run adjustments have been made to the models to account for performance over an economic cycle.

#### Retail Credit - EaD Models

Retail EaD models use a combination of Credit Conversion Factors (CCFs) similar to those used in non-retail, and scaling factors.

CCFs have been developed mainly for revolving credit products, such as credit cards and overdrafts and estimate the amount of unutilised credit a customer may draw in the lead up to default.

Scaling factors have been applied mainly to term lending products, where the customer has less availability of unutilised credit from which to draw in the lead up to default.

# Retail Credit - LGD Models

Key account variables, such as months exposure held and balance, are identified and modelled to provide an estimate of the probability that a loan that has defaulted would return to full performance (i.e. cure).

For accounts that do not cure and are written off, internal recovery data is used to assess the ultimate loss (i.e. initial loss less recoveries achieved plus costs of recovery).

Adjustments based on external data and expert judgement are made to the LGD to account for a downturn in the economic cycle, and are applied by varying the cure and recovery rates.

In Australia, the only credit risk mitigation measure applies to the residential mortgage portfolio, where Lenders Mortgage Insurance (LMI) is generally required for borrowing above 80% Loan to Value Ratio at origination. For loans secured by residential property, APRA has mandated the use of a supervisory floor of 20% for RWA purposes.

**Note:** LMI does not currently influence the retail LGD metrics used.

# **Portfolios Subject to IRB Approach**

# Table 5.3A: Non-Retail Exposure by Risk Grade

This table provides a breakdown of gross non-retail credit exposures by PD risk grade, categorised into bands that broadly correspond to externally recognised risk grades. Moody's risk grades have been included as a reference point. Exposures have been categorised into PD grades as assessed by the Level 2 Group's own internal ratings system and exclude non-lending assets, securitisation, CVA and Specialised Lending.

			As a	t 30 Sep 16							
•			PD risk	grade mapp	ing						
External credit rating equivalent	Aa3 and above 0<0.03%	A1, A2, A3 0.03<0.1%		Ba1, Ba2 0.5<2.0%			Default 100%				
IRB approach	\$m	\$m	\$m	\$m	\$m	\$m	\$m				
Total exposure											
Corporate	-	61,838	100,898	71,552	19,406	5,391	3,013				
Sovereign	74,197	5,666	568	24	6	1	-				
Bank	-	52,772	8,714	108	53	3	-				
Total exposure (EaD)	74,197	120,276	110,180	71,684	19,465	5,395	3,013				
Undrawn commitments											
Corporate	-	14,270	26,028	11,537	2,219	463	122				
Sovereign	176	289	41	8	6	-	-				
Bank	-	1,170	165	10	-	-	-				
Total undrawn commitments (1)	176	15,729	26,234	11,555	2,225	463	122				
IRB approach Average EaD (\$m) (2)											
Corporate	-	1.61	0.63	0.30	0.18	0.15	0.33				
Sovereign	40.60	2.41	1.28	0.15	0.02	0.13	_				
Bank	_	3.14	0.68	0.59	0.60	0.21	-				
Exposure weighted average LGD											
(%)											
` '	-	29.6%	35.9%	29.1%	30.8%	34.9%	43.9%				
(%) Corporate Sovereign	- 3.5%	29.6% 30.2%	35.9% 41.4%	29.1% 44.9%	30.8% 45.0%	34.9% 38.3%	43.9% 45.0%				
Corporate Sovereign	- 3.5% -										
Corporate Sovereign Bank Exposure weighted average risk	3.5%	30.2%	41.4%	44.9%	45.0%	38.3%	45.0%				
Corporate Sovereign Bank	3.5%	30.2%	41.4%	44.9%	45.0%	38.3%	45.0%				
Corporate Sovereign Bank Exposure weighted average risk weight (%)	3.5%	30.2% 33.5%	41.4% 33.9%	44.9% 36.8%	45.0% 52.4%	38.3% 12.9%	45.0% 0.0%				

<sup>(1)</sup> Total undrawn commitments are included in the calculation of Total Exposures (EaD) shown above.

<sup>(2)</sup> Simple average of exposure by number of arrangements.

As at 31 Mar 16

				at 31 Mar 16						
			PD risk grade mapping							
External credit rating equivalent	Aa3 and above 0<0.03%	A1, A2, A3 0.03<0.1%	Baa1, Baa2, Baa3 0.1<0.5%	Ba1, Ba2 0.5<2.0%	Ba3, B1 2.0<5.0%	B2 and below 5.0<99.9%	Default 100%			
IRB approach	\$m	\$m	\$m	\$m	\$m	\$m	\$m			
Total exposure										
Corporate	-	59,821	100,447	71,887	21,019	5,706	2,651			
Sovereign	63,961	6,784	557	43	6	-	-			
Bank	-	64,911	8,904	1,828	31	16	-			
Total exposure (EaD)	63,961	131,516	109,908	73,758	21,056	5,722	2,651			
Undrawn commitments										
Corporate	-	13,423	24,964	12,056	2,595	700	126			
Sovereign	209	228	63	2	5	-	-			
Bank	-	864	507	10	_	-	-			
Total undrawn commitments	209	14,515	25,534	12,068	2,600	700	126			
IRB approach						-				
Average EaD (\$m)										
Corporate	_	1.43	0.65	0.3	0.19	0.17	0.28			
Sovereign	38.98	2.79	1.13	0.19	0.02	0.01	0.01			
Bank	-	3.24	0.69	8.88	0.33	0.69	-			
Exposure weighted average LGD(%)		-								
Corporate	-	30.4%	35.0%	29.6%	31.1%	36.9%	43.4%			
Sovereign	4.6%	25.9%	43.3%	54.7%	45.0%	45.0%	45.0%			
Bank	-	27.3%	32.9%	11.8%	47.0%	35.7%	-			
Exposure weighted average risk weight (%)										
Corporate	-	18.0%	42.7%	58.1%	79.3%	147.2%	236.9%			
Sovereign	0.9%	11.0%	58.3%	98.9%	107.0%	147.5%	596.3%			
Bank	-	11.5%	40.2%	15.5%	112.6%	164.7%	_			

# Table 5.3B: Retail Exposure by Risk Grade

This table provides a breakdown of gross retail credit exposures by PD risk grade, categorised into bands that broadly correspond to externally recognised risk grades, ranging from Super Senior Investment Grade to Defaulted exposures. Exposures exclude non-lending assets, securitisation and CVA.

			As at 30	Sep 16		
			PD risk grade	e mapping		
	0<0.1%	0.1<0.5%	0.5<2.0%	2.0<5.0%	5.0<99.9%	100%
IRB approach	\$m	\$m	\$m	\$m	\$m	\$m
Total exposure						
Residential mortgage	109,267	122,802	94,890	19,087	9,473	2,313
Qualifying revolving retail	4,459	3,022	2,012	1,133	1,000	25
Retail SME	1,295	4,830	6,168	2,703	967	322
Other retail	1,037	839	1,074	1,148	451	64
Total exposure (EaD)	116,058	131,493	104,144	24,071	11,891	2,724
Undrawn commitments						
Residential mortgage	28,244	13,564	6,299	903	141	38
Qualifying revolving retail	3,400	1,730	454	119	40	1
Retail SME	738	1,344	878	301	85	51
Other retail	697	261	216	77	16	-
Total undrawn commitments (1)	33,079	16,899	7,847	1,400	282	90
IRB approach						
Average EaD (\$m) (2)						
Residential mortgage	0.09	0.27	0.23	0.31	0.35	0.21
Qualifying revolving retail	0.01	0.01	0.01	0.01	0.01	0.01
Retail SME	0.02	0.03	0.03	0.02	0.02	0.01
Other retail	0.00	0.01	0.01	0.01	small	small
Exposure weighted average LGD (%)						
Residential mortgage	20.0%	20.0%	20.3%	20.0%	20.0%	20.3%
Qualifying revolving retail	83.4%	84.6%	86.7%	87.4%	87.5%	87.8%
Retail SME	23.7%	24.8%	28.2%	29.8%	30.4%	37.9%
Other retail	83.1%	81.2%	79.7%	79.6%	78.4%	79.4%
Exposure weighted average risk weight (%)						
Residential mortgage	5.4%	16.3%	35.6%	74.5%	118.7%	214.6%
Qualifying revolving retail	4.1%	11.9%	37.8%	82.5%	159.8%	337.8%
Retail SME	5.8%	14.4%	33.6%	55.6%	92.1%	293.2%
Other retail	14.1%	43.0%	90.3%	118.8%	147.8%	247.5%

<sup>(1)</sup> Total undrawn commitments are included in the calculation of Total Exposures (EaD) shown above.

<sup>(2)</sup> Simple average of exposure by number of arrangements.

Residential mortgage

Retail SME

Other retail

Qualifying revolving retail

			As at 31 I	/lar 16		
_			PD risk grade	mapping		
	0<0.1%	0.1<0.5%	0.5<2.0%	2.0<5.0%	5.0<99.9%	100%
RB approach	\$m	\$m	\$m	\$m	\$m	\$m
Total exposure						
Residential mortgage	108,992	121,146	89,524	17,002	8,587	2,242
Qualifying revolving retail	4,571	2,835	2,100	1,042	983	26
Retail SME	1,801	4,293	6,407	2,623	768	346
Other retail	1,006	808	1,092	1,089	458	69
Total exposure (EaD)	116,370	129,082	99,123	21,756	10,796	2,683
Undrawn commitments						
Residential mortgage	28,208	13,957	6,524	893	133	61
Qualifying revolving retail	3,401	1,591	453	97	35	1
Retail SME	1,043	1,102	886	273	63	60
Other retail	672	254	219	71	17	-
Total undrawn commitments	33,324	16,904	8,082	1,334	248	122
IRB approach						
Average EaD (\$m)						
Residential mortgage	0.09	0.26	0.22	0.30	0.33	0.20
Qualifying revolving retail	0.01	0.01	0.01	0.01	0.01	0.01
Retail SME	0.03	0.03	0.03	0.02	0.01	0.01
Other retail	0.00	0.01	0.01	0.01	small	smal
Exposure weighted average LGD (%)						
Residential mortgage	20.0%	20.0%	20.3%	20.0%	20.0%	20.4%
Qualifying revolving retail	83.5%	84.7%	86.8%	87.2%	87.4%	87.6%
Retail SME	23.2%	25.2%	28.6%	30.0%	31.9%	37.8%
Other retail	83.0%	81.0%	79.4%	79.3%	78.0%	78.6%

10.4%

12.0%

14.9%

43.2%

26.9%

38.0%

34.0%

89.7%

54.8%

83.9%

55.9%

118.3%

94.1%

163.7%

94.3%

149.1%

211.0% 323.0%

309.7%

275.0%

3.4%

4.1%

5.7%

14.2%



# 5.4 Credit Risk Mitigation

The NAB Group employs a range of techniques to reduce risk in its credit portfolio.

Credit risk mitigation commences with an objective credit evaluation of the counterparty. This includes an assessment of the counterparty's character, industry, business model and capacity to meet its commitments without distress. Other methods to mitigate credit risks include a prudent approach to facility structure, collateral, lending covenants, terms and conditions.

#### **Collateral Management**

Collateral provides a secondary source of repayment for funds being advanced, in the event that counterparty cannot meet its contractual repayment obligations.

Collateral commonly includes:

- · fixed and floating charges over business assets
- · residential, commercial and rural property
- · cash deposits
- · fixed income products
- · listed shares, bonds or securities
- · guarantees, letters of credit and pledges.

To ensure that collateral held is sufficiently liquid, legally valid, enforceable and regularly valued, credit risk policy provides a framework to:

- establish the amount and quality of collateral required to support an exposure
- determine acceptable valuation type and revaluation requirements for each collateral class
- record market value and 'bank value' (a conservative assessment of value in the event the collateral is realised).

Guarantees from financially sound parties are sometimes required to support funds advanced to a counterparty; which can reduce the risk of default on their obligations. Where allowed in credit risk policy, guarantors that are risk rated may enhance the counterparty customer rating.

# **Credit Hedging**

Credit hedging is utilised in the banking book to avoid counterparty concentrations against protection sellers and achieve portfolio diversification.

Credit risk to individual hedge counterparties is mitigated through careful selection of investment grade equivalent counterparties and use of collateral agreements to manage net exposures.

# **Credit Exposure Netting**

Credit Exposure Netting may be adopted to calculate counterparty credit exposures on a net basis. This recognises that the change in value for different products over time is not perfectly correlated; transactions with positive value when netted may offset those with negative value.

Credit Exposure Netting is subject to execution of supporting legal documentation. A credit exposure measurement and reporting system manages the netting pools in accordance with that documentation.

#### **Portfolio Management**

Group Credit Risk, together with Business Unit Risk functions, manage the overall risk of the corporate, sovereign and bank credit portfolios. Where credit risks are identified, a variety of techniques are used to mitigate the risk, including credit derivatives and, on occasion, the sale of loan assets (in consultation with the counterparties).

Internal reporting systems are utilised to record all:

- approved derivative, money market, credit line and/or credit trading facility limits
- credit exposure arising from securities sales and purchases, money market lines, commodities, trade, derivative and foreign exchange transactions
- country risk exposures for country economic capital limit purposes.

Limits may be established at a facility, product group or individual product level, based on the level of financial sophistication exhibited by the counterparty. A specialist administration unit operating independently from relationship managers, dealers and credit approvers record and maintain the limits.



# **Table 5.4A: Mitigation by Eligible Collateral**

This table discloses the total credit exposures subject to the standardised and supervisory slotting criteria approaches which are covered by eligible financial collateral. Exposures exclude non-lending assets, securitisation and CVA.

	As at 30	Sep 16
	Total exposure	of which is covered by eligible financial collateral
Exposure type	\$m	\$m
Specialised lending (SL)	67,011	612
Standardised approach		
Australian and foreign governments	-	-
Bank	-	-
Residential mortgage	4,768	57
Corporate	60,190	50,670
Other	1,182	98
Total standardised approach	66,140	50,825

<sup>(1)</sup> Eligible financial collateral, when used to reduce levels of exposure, refers to cash and cash equivalents as defined in APS 112. Exposures covered by eligible financial collateral are measured after the application of regulatory haircuts.

	As at 31	Mar 16
	Total exposure	of which is covered by eligible financial collateral
Exposure type	\$m	\$m
Specialised lending (SL)	67,701	349
Standardised approach		
Australian and foreign governments	-	-
Bank	-	-
Residential mortgage	4,954	54
Corporate	58,996	50,254
Other	1,173	75
Total standardised approach	65,123	50,383

# Table 5.4B: Mitigation by Guarantees and Credit Derivatives

This table discloses the total credit exposures which are covered by the guarantees and credit derivatives relating to each portfolio. Exposures exclude non-lending assets, securitisation and CVA.

		As at 30 Sep 16		
	Total exposure	of which is covered by guarantees	of which is covered by credit derivatives	
Exposure type	\$m	\$m	\$m	
IRB approach				
Corporate (including SME)	262,099	23,426	-	
Sovereign	80,462	-	-	
Bank	61,650	142	-	
Residential mortgage	357,831	-	-	
Qualifying revolving retail	11,651	-	-	
Retail SME	16,286	-	-	
Other retail	4,614	-	-	
Total IRB approach	794,593	23,568	-	
Specialised lending (SL)	67,011	•	-	
Standardised approach				
Australian and foreign governments	-	-	-	
Bank	-	-	-	
Residential mortgage	4,768	-	-	
Corporate	60,190	-	-	
Other	1,182	-	-	
Total standardised approach	66,140	-	-	

		As at 31 Mar 16		
	Total exposure	of which is covered by guarantees	of which is covered by credit derivatives	
Exposure type	\$m	\$m	\$m	
IRB approach				
Corporate (including SME)	261,531	24,648	-	
Sovereign	71,351	40	-	
Bank	75,690	150	2	
Residential mortgage	347,493	-	-	
Qualifying revolving retail	11,557	-	-	
Retail SME	16,238	-	-	
Other retail	4,522	-	-	
Total IRB approach	788,382	24,838	2	
Specialised lending (SL)	67,701	-	-	
Standardised approach				
Australian and foreign governments	-	-	-	
Bank	-	-	-	
Residential mortgage	4,954	-	-	
Corporate	58,996	-	-	
Other	1,173	-	-	
Total standardised approach	65,123	-	-	



# 5.5 Counterparty Credit Risk

This section describes the NAB Group's approach to managing credit risk concerning market-related instruments. Counterparty Credit Risk (CCR) is the risk that a counterparty to a transaction may default before the final settlement of the transaction's cash flows. An economic loss would occur if a transaction with a defaulting counterparty has a positive economic value to the NAB Group.

**Credit Limits** 

Credit limits for derivatives are approved and assigned by an appropriately authorised DCA based on the same principles (i.e. amount, tenor, probability of default, loss given default and product type), and internal credit policies used for approving bank loans.

Credit exposures for each transaction are measured as the current mark-to-market value and the Potential Credit Exposure (PCE) which is an estimate of the future replacement cost.

Credit risk economic capital is then allocated to individual counterparty exposures based on their relative risk contribution to Unexpected Loss (UL).

Limit excesses, whether they are active or passive, are subject to formal approval by a DCA.

#### Collateral

Counterparty credit exposures may be collateralised by an approved list of eligible collateral via market standard master agreements (ISDA and credit support annex). Eligible collateral may be subject to haircuts depending on asset type. Counterparties may also be subject to posting additional collateral before transacting.

Bank systems are in place to support daily marking-tomarket of net exposures and margin requirements, marking-to-market of collateral value and reconciliation of collateral receipt and holdings against collateral due.

# **Wrong Way Risk**

Wrong way risk occurs when exposure to counterparty is adversely correlated with the credit quality of that counterparty. Credit exposures and potential losses may increase under these circumstances as a result of market conditions. The NAB Group manages these risks through the effective implementation of a number of risk policies, including, but not limited to: single large exposure policy; credit concentration risk policies; aggregation policy; collateralisation policy; and various product restrictions.

#### **Downgrade Impact**

As at 30 September 2016, with respect to counterparty derivatives, the NAB Group would need to post an estimated amount of \$4.7 million of collateral in the event of a one notch downgrade to the NAB Group's credit rating, and \$65.9 million in the event of a two notch downgrade.

Group Treasury, on behalf of the NAB Group, plan for and manage the impact on transactions that would be affected by a downgrade clause.



# Table 5.5A (i): Net Derivatives Credit Exposure

This table discloses gross positive fair value of contracts, netting benefits, netted current credit exposure and collateral held. Net derivatives credit exposure represents net exposure at default, or exposure amount, under the current exposure method.

	A	s at
	30 Sep 16	31 Mar 16
	\$m	\$m
Gross positive fair value of derivative contracts	76,948	85,545
Netting benefits	(58,579)	(65,395)
Netted current credit exposure (NCCE)	18,369	20,150
Potential Future Credit Exposure	19,174	18,002
Collateral held		
Cash	(8,983)	(11,038)
Government Securities	-	-
Other	(174)	(227)
Total net derivatives credit exposure	28,386	26,887

# Table 5.5A (ii): Distribution of Current Credit Exposure

This table includes notional value of credit derivative hedges, and the distribution of current credit exposure by types of credit exposure.

	As at 30 Sep 16		As at 31 Mar 16		
	Notional principal	Exposure at default	Notional principal	Exposure at default	
Exposure type	\$m	\$m	\$m	\$m	
Interest rate contracts	789,222	10,553	1,257,343	9,202	
Foreign exchange and gold contracts	1,526,161	15,548	1,462,728	15,341	
Equity contracts	1,190	241	1,312	312	
Precious metal contracts (other than gold)	-	-	-	-	
Other commodity contracts (other than precious metals)	3,063	242	2,802	188	
Other market related contracts	10,887	172	20,390	190	
Central counterparty	3,531,125	1,630	2,746,842	1,654	
Total	5,861,648	28,386	5,491,417	26,887	

#### **Table 5.5B: Credit Derivative Transactions**

Credit derivative transactions that create exposures to CCR (notional value), segregated between use for the ADI's own credit portfolio, as well as in its intermediation activities, including the distribution of the credit derivatives products used, broken down further by protection bought and sold within each product group.

	As	at 30 Sep 16		As at 31 Mar 16			
	Protection bought Notional	Protection sold Notional	Total Notional	Protection bought Notional	Protection sold Notional	Total Notional	
	\$m	\$m	\$m	\$m	\$m	\$m	
Credit derivatives products used for own credit portfolio (1)							
Credit default swaps	98	-	98	578	-	578	
Credit derivatives products used for intermediation							
Credit default swaps	10,736	10,695	21,431	14,597	15,532	30,129	
Total return swaps	37	-	37	198	-	198	
Total credit derivative notional value	10,871	10,695	21,566	15,373	15,532	30,905	

<sup>(1)</sup> At March 2016, Credit derivative products used for own credit portfolio included \$370m of notional protection bought that has been reclassified as guarantees and excluded from this table at September 2016.



# Section 6

#### **Securitisation**

#### Introduction

Securitisation is a structure where the cash flow from a pool of assets is used to service obligations to at least two different tranches or classes of creditors (typically holders of debt securities), with each class or tranche reflecting a different degree of credit risk (i.e. one class of creditors is entitled to receive payments from the pool before another class of creditors). An exception to this is a warehouse SPV which is a securitisation even if it does not have at least two different tranches of creditors or securities. The Level 2 Group engages in securitisation activities for two primary purposes:

- securitisation activities for business purposes, including arranging and managing securitisations for third parties (clients). These activities are undertaken primarily through securitisation SPVs that provide funding for single or multiple transactions
- securitisation of its own assets for funding, liquidity (including contingent liquidity) purposes, primarily for risk and capital management reasons.

The Level 2 Group has discontinued all securities arbitrage activities (i.e. the funding of purchased assets via Asset Backed Paper Conduits).

The Level 2 Group's securitisation exposures are generally categorised according to the requirements of *APS 330*. Key definitions are provided below.

#### SPV

- SPV is an entity set up solely for the purpose of securitisation, usually a trust or a company
- the Level 2 Group does not sponsor any SPVs used to securitise third party exposures which are currently issuing securities.

# Origination

- originating ADI: the Level 2 Group is an "Originating ADI" if it originally sold the asset to the SPV (directly or indirectly), manages the SPV or provides a non-derivative facility to an Asset Backed Commercial Paper (ABCP) Program
- non-originating ADI facilities: any facility provided by the Level 2 Group in which the Level 2 Group is not an Originating ADI
- originated assets: these refer to assets that were originally written by the Level 2 Group and transferred to the SPV, or in the case of indirect origination, written directly by the SPV at the direction of the Level 2 Group
- traditional securitisations: securitisations in which the pool of assets is assigned to an SPV, usually by a sale
- synthetic securitisations: securitisations in which the risk of the pool of assets is transferred to an SPV through a derivative, usually a credit default swap.

The Level 2 Group's assessment and management of securitisation risk is governed by APS 120.



# 6.1 Third Party Securitisation

The Level 2 Group may undertake any of the following roles in its third party securitisation activities:

Role	Definition
Arranger	Structurer of securitisation transactions.
Liquidity Facility provider	Provider of liquidity facilities to an SPV for the primary purpose of funding any timing mismatches between receipts of funds on underlying exposures and payments on securities issued by the SPV.
Buyer of protection over assets (1)	Entering into derivative transactions that provide credit protection over assets on the Level 2 Group's balance sheet.
Dealer	Buyer and seller in the primary and secondary markets of securities.
Derivative provider	Counterparty to swaps and other derivative transactions, including interest rate and currency derivatives provided to securitisation SPVs and credit derivative transactions.
First loss provider(f)	Principally for securitisation of the Level 2 Group's own assets, the provider of credit enhancement that bears the first losses (if any) incurred by the securitised pool of assets.
Investor	Purchaser of securitisation debt securities for either trading or banking book purposes.
Letter of credit provider (1)	Provider of credit enhancement to securitisation transactions.
Manager	Operator of securitisation SPVs, including managing assets and liabilities and providing accounting and administrative services.
Redraw Facility provider(1)	Provider of liquidity to cover redraws of underlying loans for residential mortgage-backed securitisation transactions.
Securitisation funding facility provider	Lender to securitisation SPVs where the term of the funding extends beyond one year and may match the expected redemption date of the underlying security held by the SPV.
Sponsor (1)	The entity that establishes the securitisation SPVs including ABCP conduits and often provides other services.
Standby liquidity provider (1)	Provider of liquidity facilities to an SPV to cover the inability of the SPV to roll over ABCP.
Warehouse facility provider	Provider of lending (warehouse) facilities to an SPV for the financing of exposures in a pool.

<sup>(1)</sup> Immaterial level of involvement.

# **Structure and Organisation**

The Board approves risk appetite limits and periodically monitors and reviews the third party asset securitisation framework, management and reporting with guidance from the Product & Markets Risk Management Committee (Product & Markets RMC), the GRRMC and the BRC.

The Third Party Asset Securitisation Policy sets out how securitisation activity is governed and managed within the Level 2 Group.

The Product & Markets Risk function is responsible for ensuring that securitisation activity is conducted within the approved limits and maintaining ongoing reporting and compliance.

#### Management

The Level 2 Group's securitisation business is managed as part of the Product & Markets portfolio. Third party securitisation activities follow the Level 2 Group's credit decision-making and oversight process. The Business Bank Credit Risk function is responsible for independent credit decisions for securitisation transactions.

Expert knowledge specialists within the securitisation business work with customers, trustees and rating agencies to structure each transaction according to the requirements of Level 2 Group policies, *APS 120* and the rating agencies. Approvals are granted in accordance with the delegated commitment authority schedule.

Initial structuring and assessment includes an analysis of matters such as portfolio composition and quality, the level and type of credit enhancement, due diligence on the quality of the servicer of the assets, and specific structural enhancements such as trigger events.

#### Measurement

Securitisation exposures and RWAs are measured in accordance with regulatory requirements outlined in *APS 120*. Key metrics include any external rating (if available), internal risk grading, the seniority of the exposure and the composition of the pool of securitised assets. The Level 2 Group views securitisation exposures for facilities provided to securitisation transactions as 'hold to maturity' exposures.

Depending on the asset class, the Level 2 Group uses either the ratings-based approach (RBA), the internal assessment approach (IAA) or other *APS 120* methodologies, as approved by APRA, to calculate RWA for the portfolio.

The IAA methodology is applied to the following asset classes:

- · residential mortgages
- · equipment receivables
- · auto loan receivables

The IAA methodology has been developed by specialists within the Level 2 Group's securitisation function as part of the Third Party Asset Securitisation policy and was approved as set out under the heading 'Structure and Organisation' above.

The IAA methodology incorporates many of the elements of the external credit assessment institutions (ECAIs) used by the Level 2 Group including stress factors that are at least as conservative as the publicly available ECAI stress factors. The ECAIs used by the Level 2 Group are predominantly Standard & Poor's for rating securitisations for which the Level 2 Group is an originating ADI and Moody's and Fitch for some term transactions.

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In addition to providing the basis for assessing the regulatory capital under *APS 120* for the relevant asset classes, the IAA is used in the Level 2 Group's internal risk management process.

The IAA approval also includes an additional risk weighting approach for unrated securitisation facilities to "non-IAA" asset classes that applies the higher (most conservative) risk weight of: (i) APS 120 or APS 112 standardised risk weights, or (ii) APS 120 IAA risk weights based on the Level 2 Group's internal assessments. The outcome is that for a majority of the non-IAA asset classes the standardised risk weights apply.

The IAA model for each asset class is based on an asset class specific IAA methodology. The models used are locked-down to ensure a consistency of approach and minimise the risk of manual over-rides occurring. The methodology and model (where applicable) for each asset class are considered on a semi-annual basis to ensure they reflect the NAB Group's desired risk appetite and allow for changes in market conditions. Certain asset classes have a specific actuarial tool developed that allows for systematic assessment of credit risk across different pools of financial receivables.

IAA model outputs are used in the credit decision making process for a given exposure according to the NAB Group's DCA matrix. Under the NAB Group's Risk Management Accountability Model, the business has primary responsibility to manage risks originating in the business. This includes ensuring that the methodologies and models used remain appropriate and are updated as required. Secondary responsibility lies with Credit Risk who must ensure that the business uses the model consistently and that outcomes across different transactions are consistent. Internal auditors ensure that the approval process for the model and methodology are adequate.

#### **Monitoring and Reporting**

Finance functions perform regular measurement and reporting of securitisation and resecuritisation exposures, including revenue, capital, asset and facility limits and exceptions. Key elements of these reports are provided to the various risk committees.

Specialist securitisation areas monitor the quality of the pools of assets underlying securitisation or resecuritisation exposures and model the effect on the exposures. Material changes in credit quality of the assets or the exposures are reported to the risk function and, if required, to the relevant risk committees.

# **Accounting Treatment**

The payments on facilities provided to securitisation SPVs are contractually linked to the payments received on a pool of other instruments within the SPV. The facility provided is often pooled into tranches by the SPV based on a contractual cash waterfall repayment arrangement.

To measure the facility at amortised cost, the tranche which the facility is part of must give rise to cash flows that are 'solely payments of principal and interest'. The underlying pool of instruments in the SPV must also contain one or more instruments that have contractually cash flows that comprise 'solely payments of principal and interest'.

If the facility meets the criteria to be measured at amortised cost, interest income is recognised in the income statement using the effective interest method. Fees received which are directly attributable to the origination of the financial instrument are recognised as part of the effective interest method otherwise the fees are recognised on an accruals basis.

Most of these facilities fund NAB-sponsored securitisation SPVs which are consolidated by the Level 2 Group. On consolidation, the facilities are eliminated and the underlying liabilities and assets are brought onto the Level 2 Group's balance sheet.

Securitisation exposures held in trading book, where the facility provided to the SPV is not held to collect 'solely payments of principal and interest', but are traded, are recorded at fair value. Unrealised profit or losses in respect of the fair value adjustments are recognised immediately in to the profit and loss account.

Securitisation exposures held in banking book, where the facility provided to the SPV is to hold to collect 'solely payment of principal and interest' and sell the exposure where an opportunity arises, are recorded at fair value and unrealised profit or losses in respect of the fair value adjustments are recognised in other comprehensive income.

Securitisation warehouse facilities provided to third party SPVs are accounted for at amortised cost, net of any provision for impairment, provided they meet the contractually linked guidance above.

Derivatives such as interest rate swaps, basis swaps or cross-currency swaps with third party SPVs are recorded at fair value and unrealised profit or losses in respect of the fair value adjustments are recognised immediately in to the profit and loss account.

In general, there is no difference in accounting treatment between securitisation and resecuritisation exposures.

#### Securitisation Risks

Risks arising from securitisation activities include credit, liquidity, market and operational risks. Interest rate risk and securities price risk are managed as part of the market and non-traded market risk processes. In some cases risks are assumed by acquiring securities or entering into facilities. In other cases risks are transferred through the securitisation of Level 2 Group assets. The Level 2 Group engages in credit risk mitigation on a case-by-case basis.

The Level 2 Group has certain exposures which are classed as resecuritisation exposures. The Level 2 Group does not specifically target resecuritisation exposures for investment.



# **Table 6.1A: Total Securitisation Exposures**

Trading book securitisation exposures are not material at a Level 2 Group level. As such, these exposures are included in the tables below and are not separately disclosed within this document.

This section provides information about assets that the Level 2 Group manages as securitisations for third parties (clients) and for any retained exposure to assets securitised by the Level 2 Group.

The two tables below show the amount of securitisation exposures by facility and provides an indication of the relative extent to which the Level 2 Group has exposure to each type of asset within the securitisation SPV. This table does not provide information on Level 2 Group assets that have been sold to securitisations.

As at 30 Sep 16 Total outstanding exposures Non-Originating ADI originating Directly Indirectly ABCP Other ADI originated originated facilities (manager exposures assets assets provided services) **Underlying asset** \$m \$m \$m \$m \$m 15,764 4 620 307 Residential mortgage Credit cards and other personal loans 1,027 32 2.306 146 Auto and equipment finance CDOs/CLOs (1) 184 Commercial loans Commercial mortgages 2 31 Corporate bonds 630 Other 574 Total underlying asset 19,673 798 1,152

<sup>(1)</sup> As at 30 September 2016, all exposures are traditional securitisations, where the pool of assets is assigned to an SPV, usually by a sale.

		A	s at 31 Mar 16	<b>;</b>	
		osures			
	Non-		Originati	ng ADI	
	originating ADI exposures	Directly originated assets	Indirectly originated assets	ABCP facilities provided	Other (manager services)
Underlying asset	\$m	\$m	\$m	\$m	\$m
Residential mortgage	15,651	-	-	620	332
Credit cards and other personal loans	1,021	-	-	34	-
Auto and equipment finance	1,880	-	-	138	-
CDOs/CLOs (1)	-	-	-	-	302
Commercial loans	-	-	-	-	-
Commercial mortgages	2	-	-	-	34
Corporate bonds	-	-	-	-	610
Other	575	-	-	-	-
Total underlying asset	19,129	-	-	792	1,278

<sup>(1)</sup> As at 31 March 2016, all exposures are traditional securitisations, where the pool of assets is assigned to an SPV, usually by a sale.



# Table 6.1B: Type of Exposure

The following two tables provide information about assets that the Level 2 Group manages as securitisations (predominantly for third party clients) where the exposures are risk weighted under APS 120. These tables do not provide information on Level 2 Group assets that have been sold to securitisations whether or not the assets are risk weighted under APS 120. The table below breaks down the securitisation exposures by type of facility as defined in the Glossary.

	As	s at 30 Sep 16		As		
	On-balance sheet	Off-balance sheet	Total	On-balance sheet	Off-balance sheet	Total
Securitisation exposure type	\$m	\$m	\$m	\$m	\$m	\$m
Liquidity facilities	119	1,613	1,732	53	2,105	2,158
Warehouse facilities	9,680	1,720	11,400	9,273	1,318	10,591
Credit enhancements	2	17	19	2	16	18
Derivative transactions	221	-	221	160	-	160
Securities	8,264	-	8,264	8,351	-	8,351
Credit derivatives transactions	-	-	-	-	-	-
Other	-	-	-	-	-	-
Total securitisation exposures	18,286	3,350	21,636	17,839	3,439	21,278

# **Table 6.1C: Recent Third Party Securitisation Activity**

This table provides information about new securitisation facilities provided in the period described below.

	Notional amount of	facilities provided	
	6 months ended	6 months ended	
	30 Sep 16	31 Mar 16	
Securitisation exposure type	\$m	\$m	
Liquidity facilities	133	540	
Warehouse facilities	842	1,853	
Credit enhancements	-	-	
Derivative transactions	76	62	
Securities	959	752	
Credit derivatives transactions	-	-	
Other	-	-	
Total new facilities provided	2,010	3,207	



# Table 6.1D: Exposures by Risk Weight

These tables show the risk weights for securitisation and resecuritisation exposures as calculated under APS 120, split between the RBA, the IAA, and Other.

# **Securitisation Exposures by Risk Weight**

Securitisation exposures are on-balance and off-balance sheet risk positions held by the Level 2 Group arising from a securitisation, excluding exposures which have been classified as resecuritisations. Resecuritisation exposures are disclosed on the following page.

	As at	As at 30 Sep 16			
	Exposu	re RWA	Exposure	RWA	
Risk weight bands	\$	m \$m	\$m	\$m	
RBA					
≤ 10%	6,00	1 424	6,393	452	
> 10% ≤ 25%	40	1 50	410	50	
> 25% ≤ 35%			-	-	
> 35% ≤ 50%			-	-	
> 50% ≤ 75%			-	-	
> 75% ≤ 100%			-	-	
> 100% ≤ 650%			-	-	
> 650% ≤ 850%			-	-	
1250%			-	-	
Deductions			5	-	
RBA sub-total	6,40	2 474	6,808	502	
IAA					
≤ 10%	5,93	5 425	6,013	432	
> 10% ≤ 25%	6,35	806	5,382	686	
> 25% ≤ 35%	5	4 19	35	12	
> 35% ≤ 50%	7	6 38	36	18	
> 50% ≤ 75%	12	6 95	111	83	
> 75% ≤ 100%			14	14	
> 100% ≤ 650%		8 21	6	15	
> 650% ≤ 850%			-	-	
1250%			-	-	
Deductions	1	4 -	8	-	
IAA sub-total	12,56	3 1,404	11,605	1,260	
Other	_	.0 4	00	4	
≤ 10%		0 4	66	4	
> 10% ≤ 25%	40		386	64	
> 25% ≤ 35%	68		740	259	
> 35% ≤ 50%		5 17	53	27	
> 50% \le 75%	4.46		-	4 400	
> 75% \leq 100%	1,15		1,111	1,102	
> 100% ≤ 650%			-	-	
> 650% ≤ 850%			-	-	
1250%		- 2	-	2	
Deductions Other and Auto-				-	
Other sub-total	2,34		2,356	1,458	
Total	21,30	5 3,351	20,769	3,220	



# Resecuritisation Exposures by Risk Weight

Resecuritisation exposures are securitisation exposures in which the risk associated with an underlying pool of exposures is tranched and at least one of the underlying exposures is a securitisation exposure. In addition, an exposure to one or more resecuritisation exposures is a resecuritisation exposure.

	As at 30 9	As at 30 Sep 16		
	Exposure	RWA	Exposure	RWA
Risk weight bands	\$m	\$m	\$m	\$m
RBA				
≤ 10%	-	-	-	-
> 10% ≤ 25%	-	-	1	-
> 25% ≤ 35%	-	-	5	1
> 35% ≤ 50%	-	-	-	-
> 50% ≤ 75%	-	-	-	-
> 75% ≤ 100%	-	-	-	-
> 100% ≤ 650%	-	-	-	-
> 650% ≤ 850%	-	-	-	-
1250%	-	-	-	-
Deductions	-	-	16	-
RBA sub-total	-	-	22	1
IAA				
≤ 10%	-	-	-	-
> 10% ≤ 25%	-	-	-	-
> 25% ≤ 35%	-	-	-	-
> 35% ≤ 50%	-	-	-	-
> 50% ≤ 75%	-	-	-	-
> 75% ≤ 100%	-	-	-	-
> 100% ≤ 650%	-	-	-	-
> 650% ≤ 850%	-	-	-	-
1250%	-	-	-	-
Deductions	16	-	-	-
IAA sub-total	16	-	-	-
Other				
≤ 10%	108	7	94	6
> 10% ≤ 25%	6	1	5	1
> 25% ≤ 35%	7	2	6	2
> 35% ≤ 50%	183	74	302	121
> 50% ≤ 75%	-	_	-	_
> 75% ≤ 100%	-	_	_	_
> 100% ≤ 650%	-	_	_	-
> 650% ≤ 850%	-	_	-	-
1250%	-	_	_	_
Deductions	-	_	_	-
Other sub-total	304	84	407	130
Total	320	84	429	131



# **Total Exposures by Risk Weight**

This table is the sum of the tables 'Securitisation Exposures by Risk Weight' and 'Resecuritisation Exposures by Risk Weight' disclosed on the previous pages.

	As at 30 S	As at 31 Mar 16		
	Exposure	RWA	Exposure	RWA
Risk weight bands	\$m	\$m	\$m	\$m
RBA				
≤ 10%	6,001	424	6,393	452
> 10% ≤ 25%	401	50	411	50
> 25% ≤ 35%	-	-	5	1
> 35% ≤ 50%	-	-	-	-
> 50% ≤ 75%	-	-	-	-
> 75% ≤ 100%	-	-	-	-
> 100% ≤ 650%	-	-	-	-
> 650% ≤ 850%	-	-	-	-
1250%	-	-	-	-
Deductions	-	-	21	-
RBA sub-total	6,402	474	6,830	503
IAA				
≤ 10%	5,935	425	6,013	432
> 10% ≤ 25%	6,350	806	5,382	686
> 25% ≤ 35%	54	19	35	12
> 35% ≤ 50%	76	38	36	18
> 50% ≤ 75%	126	95	111	83
> 75% ≤ 100%	-	-	14	14
> 100% ≤ 650%	8	21	6	15
> 650% ≤ 850%	-	-	-	-
1250%	-	-	-	-
Deductions	30	-	8	-
IAA sub-total	12,579	1,404	11,605	1,260
Other				
≤ 10%	178	11	160	10
> 10% ≤ 25%	406	67	391	65
> 25% ≤ 35%	688	240	746	261
> 35% ≤ 50%	218	91	355	148
> 50% ≤ 75%	-	-	-	-
> 75% ≤ 100%	1,154	1,146	1,111	1,102
> 100% ≤ 650%	-	-	-	-
> 650% ≤ 850%	-	-	-	-
1250%	-	2	-	2
Deductions	-	-	-	-
Other sub-total	2,644	1,557	2,763	1,588
Total	21,625	3,435	21,198	3,351



# **Table 6.1E: Exposures Deducted from Capital**

The table below shows securitisation exposures that have been deducted from capital, divided into those that relate to securitisations of Level 2 Group assets and other securitisations.

As at 30 Sep 16

		1.0 at 00 cop 10						
	Deductions	relating to ADI-original	ted assets secu	ıritised	Deductions	Total		
	Residential mortgage	Credit cards and other personal loans	Commercial loans	Other	relating to other securitisation exposures			
	\$m	\$m	\$m	\$m	\$m	\$m		
Securitisation exposures deducted from capital								
Deductions from Common Equity Tier 1 capital (1)	-	-	-	-	30	30		
Total securitisation exposures deducted from capital	-	-	-	-	30	30		

<sup>(1)</sup> These are exposures to the subordinated tranche (i.e. exposure to the first 10% of credit losses of a securitisation and where the exposure is not to the most senior tranche).

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	AS at 01 mai 10							
	Deductions	relating to ADI-original	ted assets secu	ıritised	Deductions	Total		
	Residential mortgage	Credit cards and other personal loans	Commercial loans	Other	relating to other securitisation exposures			
	\$m	\$m	\$m	\$m	\$m	\$m		
Securitisation exposures deducted from capital								
Deductions from Common Equity Tier 1 capital	-	-	-	-	28	28		
Total securitisation exposures deducted from capital	-	-	-	-	28	28		



# 6.2 Level 2 Group Owned Securitised Assets

The Level 2 Group securitises its own assets for funding, liquidity risk and capital management purposes.

In doing this, the Level 2 Group acts as the originator, seller and servicer of assets from the Level 2 Group's balance sheet. This includes responsibility for collecting interest and principal on the securitised assets. The Level 2 Group may or may not retain an exposure to securitisation SPVs to which the Level 2 Group has sold assets. It may also manage or provide facilities for the securitisation (including credit enhancements, liquidity and funding facilities), roles which are outlined in Section 6.1 Third Party Securitisation.

This section includes information about the Level 2 Group's internal securitisation pools of residential mortgage-backed securities (RMBS). These securities have been developed as a source of contingent liquidity to support the Level 2 Group's liquid asset holdings outlined in *Section 9.1 Funding and Liquidity Risk*.

#### **Structure and Organisation**

GALCO and subsidiary ALCOs are responsible for the oversight of management's performance, and of the compliance and governance frameworks around balance sheet risks, including secured funding (which incorporates owned asset securitisation).

The GBSLR Policy and GBSLR Secured Funding Standard set out the principles and control framework for secured funding. Among other forms of secured funding, it applies to traditional securitisation, synthetic securitisation and a combination of the two.

The risk appetite for secured funding is reviewed annually and is set as part of the Level 2 Group Annual Funding Plan, approved by the Board.

#### Management

Securitisation exposures, risks and capital must comply with the requirements outlined in *APS 120*. Compliance with the requirements of *APS 120* is achieved through ensuring that the Level 2 Group:

- deals with the SPV and its investors on an arm's length basis and on market terms and conditions
- clearly discloses the nature and limitations of its involvement in a securitisation
- takes the necessary precautions to ensure that the Level 2 Group does not give the perception that it will support a securitisation that is in excess of its explicit contractual obligations (i.e. implicit support).

The Level 2 Group and subsidiary Treasuries have responsibility for the management of secured funding, including:

 secured funding strategy and plan development, incorporating the setting of funding indices and secured funding targets (forming part of the Annual Funding Plan)

- · execution of securitisation transactions
- · ongoing management of securitisation transactions.

At the Level 2 Group level, Group Treasury is also responsible for the oversight of secured funding plans and strategies, and for ensuring that activities across the Level 2 Group are coordinated and Level 2 Group objectives are achieved.

The GBSLR team are responsible for the independent oversight of secured funding execution and management conducted by the Level 2 Group and Subsidiary Treasuries, and monitoring secured funding activity to ensure it is conducted within the requirements of the Level 2 Group's secured funding framework and policies.

#### Measurement

The Level 2 Group's measurement framework for own asset securitisation is consistent with the framework outlined in *Section 6.1 Third Party Securitisation*. Business unit finance and risk functions perform regular measurement and reporting in relation to owned asset securitisation, including the impact on capital, provisioning, outstanding issuance and run-off. BNZ is also governed by local regulatory requirements and reports its owned asset securitisation to the RBNZ using its local regulatory methodology.

#### **Monitoring and Reporting**

Reporting is conducted periodically including:

- pool performance for each securitisation transaction
- · investor and regulatory reporting
- · rating agency and financial reporting
- · funding plan updates to GALCO and subsidiary ALCOs.

Any key issues arising are also presented to the GRRMC and BRC each month via the GCRO report.

#### **Accounting Treatment**

Through its securitisation program, the Level 2 Group engages in two main activities:

- it packages and sells loans (principally housing mortgage loans) and other finance receivables as securities to investors through a series of securitisation vehicles
- it develops securities as a source of contingent liquidity to support the Level 2 Group's liquid asset holdings.

The Level 2 Group is entitled to any residual income of the securitisation SPVs after all payments to investors and costs of the program have been met.

The Level 2 Group is considered to hold the majority of the residual risks and benefits within the securitisation SPVs and all relevant financial assets continue to be held on the Level 2 Group balance sheet. A liability is recognised for the proceeds of the funding transaction. The transactions are therefore considered financings rather than sales.



# Table 6.2A: Assets Securitised by the Level 2 Group

This table shows the classes of assets that have been securitised by the Level 2 Group. This table and table 6.2B may include assets which are sold to SPVs (1) which issue securities which meet the Reserve Bank of Australia's repurchase eligibility criteria; (2) which otherwise do not result in significant risk transfer and are considered on-balance sheet for regulatory purposes; or (3) in which significant risk transfer has taken place and which are considered off-balance sheet for regulatory purposes.

	As at 30 Sep 16							
	Total outstanding exposures securitised assets originated by ADI			Total past due assets from exposures	ADI recognised loss from exposures			
	Traditional	Synthetic	securitised	securitised	securitised			
Underlying asset (1)	\$m	\$m	\$m	\$m	\$m			
Residential mortgage (2)	83,458	-	296	351	-			
Credit cards	-	-	-	-	-			
Auto and equipment finance	-	-	-	-	-			
Commercial loans	-	-	-	-	-			
Other	-	-	-	-	-			
Total underlying asset	83,458	-	296	351	-			

The definition of impaired and past due assets is consistent with the definitions provided in the Glossary of this report.

<sup>(2)</sup> Includes internal securitisation pools of RMBS that have been developed as a source of contingent liquidity to support the Level 2 Group's liquid asset holdings. The amount of these securitised assets is \$69,493 million (March 2016: \$67,304 million).

		As at 31 Mar 16						
	Total outs exposures s assets orig AD	ecuritised inated by	Impaired assets relating to exposures securitised \$m	Total past due assets from exposures	recognised loss from exposures securitised			
Underlying asset	Traditional \$m	Synthetic \$m						
						Residential mortgage	78,702	-
Credit cards	-	-	-	-	-			
Auto and equipment finance	-	-	-	-	-			
Commercial loans	-	-	-	-	-			
Other	-	-	-	-	-			
Total underlying asset	78,702	-	248	357	-			



# **Table 6.2B: Recent Securitisation Activity**

This table shows the amount of assets sold by the Level 2 Group to securitisation SPVs and any gain or loss on sale.

	As at 30 Sep 16			A	s at 31 Mar 16	
	Amount securitised during period directly originated	Amount securitised during period indirectly originated	Recognised gain or loss on sale	Amount securitised during period directly originated	Amount securitised during period indirectly originated	Recognised gain or loss on sale
	\$m	\$m	\$m	\$m	\$m	\$m
Underlying asset (1)						
Residential mortgage	6,483	-	-	7,544	-	-
Credit cards	-	-	-	-	-	-
Auto and equipment finance	-	-	-	-	-	-
Commercial loans	-	-	-	-	-	-
Other	-	-	-	-	-	-
Total underlying asset	6,483	-	-	7,544	-	-

<sup>(1)</sup> The amount securitised during the period is securitisation undertaken for funding purposes, where no significant risk transfer has occurred.

#### Disclosure 6.2C: Securitisation Subject to Early Amortisation

Attachment G of *APS 120* provides for specific regulatory treatment for securitisations of certain types of assets. As at 30 September 2016 and 31 March 2016, none of these securitisations have been undertaken by the Level 2 Group.

# Disclosure 6.2D: Forthcoming Securitisation Activity by the Level 2 Group

The Level 2 Group has a securitisation strategy, and sets funding indices and securitisation targets as part of its Annual Funding Plan. The aim of the securitisation program is to ensure that the Level 2 Group is capital efficient and has diversity of funding and liquidity sources.

To support this strategy, the Level 2 Group has a business practice in which pools of assets originated by the Level 2 Group are available to be internally securitised (as a source of contingent liquidity) or externally securitised when market opportunities arise. The Level 2 Group continually assesses opportunities for securitisation of these assets.

This table provides information about forthcoming external securitisation deals entered into between 30 September 2016 and the disclosure date of this report.

20 0 40	
30 Sep 16	31 Mar 16
\$m	\$m
-	-
-	-
-	-
-	-
-	-
-	-
	-

# **Disclosure 6.2E: Credit Risk Mitigation and Guarantors**

APS 330 Table 12n requires disclosure of resecuritisation exposures retained or purchased, broken down according to the application of credit risk mitigation and exposures to guarantors. As at 30 September 2016, the Level 2 Group did not have any resecuritisation exposures to which credit risk mitigation is applied or exposures to guarantors.



# Section 7

#### **Market Risk**

#### Introduction

The Level 2 Group makes a distinction between traded and non-traded market risks for the purpose of managing market risk. This section relates to traded market risk. Non-traded market risk is discussed in Section 9 Balance Sheet and Liquidity Risk.

The Level 2 Group undertakes trading activities to support its clients and to profit in the short term from differences in markets, such as interest rates, foreign exchange rates, commodity prices, equity prices and credit spreads. Traded market risk is the potential for losses or gains to arise from trading activities undertaken by the Level 2 Group as a result of the movement of market prices.

The Level 2 Group's exposure to market risk arises out of its trading activities which are principally carried out by Product & Markets Fixed Income, Currencies & Commodities (FICC) and BNZ. This exposure is quantified for regulatory capital purposes using both the APRA-approved internal model approach and the standard method, details of which are provided below.

Other business units within the Level 2 Group do not conduct trading books.

#### **Management and Governance**

The Level 2 Group's risk appetite in relation to market risk is determined by the Board and is expressed in the NAB Group Risk Appetite Statement, and governed by the Traded Market Risk Policy and Standards.

The Market Risk Appetite Statement complements the NAB Group Risk Appetite Statement by providing further depth on the allocation of risk appetite to asset classes, regions and trading desks as well as detailing permitted products and markets.

The overall framework of Traded Market Risk Policy, Standards and the Risk Appetite Statement provide direction for the monitoring, oversight, escalation and governance of traded market risk including delegated authorities, risk measurement, and reporting and control standards. These policies are consistent with the prudential regulatory requirements.

The market risk profile of the NAB Group is overseen by the senior executive management of the NAB Group via the BRC, GRRMC, Group Credit & Market Risk Committee (GCMRC), and Product & Markets Risk Management Committee (P&M RMC).

The Product & Markets Market Risk Sub-committee (P&M MRSC) manages market risk with the following responsibilities:

- designing and implementing of policies and procedures to ensure market risk is managed within the appetite set by the Board
- reviewing market risks for consistency with approved market risk settings and the NAB Group's Risk Appetite

- overseeing the effectiveness and appropriateness of the risk management framework
- · reviewing and approving models
- escalating market risk issues to the higher committees as necessary.

Group Market Risk is an independent unit, separate from the trading activities units, with responsibility for the daily measurement and monitoring of market risk exposures. Group Market Risk has the following key controls in place for effective internal management as well as compliance with the prudential requirements:

- trading authorities and responsibilities are defined and monitored at all levels
- a comprehensive and controlled framework of risk reporting and limit breach management
- new product approval process and usage authority permitting desk to transact a particular product
- daily end of day and intra-day risk oversight as well as periodic desk review
- backtesting of VaR results under internal models for capital adequacy
- segregation of duties in the origination, processing, and valuation of transactions operated under clear and independent reporting lines
- regular and effective reporting of market risk to executive management and the Board
- periodic review and update of compliance with internal and regulatory policies
- independent and periodic internal audit review of compliance with policies, procedures, process and limite

Key methodologies for compliance with the prudential requirements for positions held in the trading book are:

- models that are used to determine risk and financial profit and loss for the NAB Group are independently validated with the review outcome documented and reported to P&M MRSC on a regular basis
- all trades are fairly valued daily using independently sourced and validated rates in accordance with Finance Rates and Revaluation Policy
- use of Model Reserve Framework and Fair Value Adjustments to support compliance with prudential validations.

#### Measurement

VaR estimates the likelihood that a given portfolio's losses will exceed a certain amount. The Level 2 Group uses VaR estimates for both regulatory capital calculations in accordance with *Prudential Standard APS 116 Capital Adequacy: Market Risk*, and for internal risk control purposes.

The Level 2 Group is accredited by APRA to use a historical simulation model to simulate the daily change in market factors. VaR is calculated for all trades on an individual basis using a full revaluation approach. For capital purposes, VaR for products modelled using the Internal Model is calculated in Australian dollars on a

globally diversified basis in accordance with the following parameters:

- · confidence level 99 per cent one tail
- holding period 10 days (1 day VaR scaled by square root of time)
- observation period 550 days (unweighted, updated daily).

VaR limits are assigned to individual trading desks and regions or product lines in accordance with the Market Risk Appetite Statement.

Group Market Risk monitors positions daily against the relevant limits and escalates any breaches in accordance with Market Risk standards and procedures. Additionally, Group Market Risk performs backtesting analysis to assess the validity of the VaR numbers when compared to the actual and hypothetical trading outcomes and to escalate any anomalies that may arise. Results of the backtesting are overseen by the P&M MRSC.

Stressed VaR is calculated using the same methodology as VaR but with an observation period based on a one-year period of significant market volatility.

Stress testing is carried out daily to test the profit and loss implications of extreme but plausible scenarios, and also to reveal hidden sensitivities in the portfolio that only become transparent when modelling extreme market moves.

'Stop loss limits' represent trigger points at which an overnight or accumulated loss incurred by a trading desk would lead to escalation in accordance with agreed procedures.

Sensitivity and other market risk limits are set by Group Market Risk to manage market risk at a more granular level, for example to manage concentration risk. These limits are monitored by Product & Markets FICC and independently by Group Market Risk.

Product & Markets FICC are responsible for managing risk, in order to deliver profits, while ensuring compliance with all limits and policies.

# **Capital Methodology**

As detailed in the following table, the Level 2 Group is accredited by APRA to use the Internal Model Approach (IMA) under APS116 for all trading asset classes except for specific interest rate risk, equities, carbon, and some foreign exchange risk from banking book portfolios. These asset classes are managed with regulatory capital calculated as an add-on to that from IMA. There are two types of market risk measures related to regulatory capital:

- general market risk which is related to changes in the overall market prices
- specific market risk which is related to changes for the specific issuer.

In accordance with APS 110, the RWA equivalent for traded market risk using the IMA is the capital requirement multiplied by 12.5.



# Market Risk

# Table 7.1A: Standard Method Risk-Weighted Assets

	As	at
	30 Sep 16	31 Mar 16
	\$m	\$m
Risk weighted assets		
Interest rate risk	543	586
Equity position risk	6	9
Foreign exchange risk	-	-
Commodity risk	-	-
Total risk weighted assets - standard method	549	595

# Table 7.1B: Total Risk-Weighted Assets

	As	at
	30 Sep 16	31 Mar 16
	\$m	\$m
Market risk		
Standard method	549	595
Internal model approach	6,750	6,655
Total market risk RWA	7,299	7,250

# Table 7.1C: Internal Model Approach VaR

The following table provides information on the maximum, mean and minimum VaR over the reporting period and at period end.

	6 months ended 30 Sep 16			As at		
	Mean value					30 Sep 16
	\$m	\$m	\$m	\$m		
VaR at a 99% confidence level (1)						
Foreign exchange risk	14	12	17	16		
Interest rate risk	9	6	11	8		
Volatility risk	3	2	4	3		
Commodities risk	1	-	1	1		
Credit risk	1	1	2	1		
Inflation risk	1	1	3	3		
Diversification benefit	(15)	n/a	n/a	(16)		
Total diversified VaR at a 99% confidence level	14	12	19	16		
Other market risks (2)	-	-	-	-		
Total VaR for physical and derivative positions (3)	14	12	19	16		

<sup>(1)</sup> The maxima / minima by risk types are likely to occur during different days in the period. As such, the sum of these figures will not equal the total maximum / minimum VaR which is the maximum/ minimum aggregate VaR position during the period.

<sup>(3)</sup> VaR is measured individually for foreign exchange risk, interest rate risk, volatility risk, commodities risk, credit risk, and inflation risk. Risk limits are applied in these categories separately, and against the total risk position.

	6 month	6 months ended 31 Mar 16		
	Mean value	Minimum value		31 Mar 16
	\$m	\$m	\$m	\$m
VaR at a 99% confidence level				
Foreign exchange risk	15	11	19	12
Interest rate risk	8	7	10	7
Volatility risk	3	2	4	3
Commodities risk	1	-	1	-
Credit risk	2	1	2	1
Inflation risk	-	-	1	1
Diversification benefit	(14)	n/a	n/a	(12)
Total diversified VaR at a 99% confidence level	15	11	20	12
Other market risks	-	-	-	-
Total VaR for physical and derivative positions	15	11	20	12

<sup>(2)</sup> Other market risks include exposures to various basis risks measured individually at a portfolio level.

# Table 7.1D: Internal Model Approach Stressed VaR

The following table provides information on the maximum, mean and minimum Stressed VaR over the reporting period and at period end.

	6 month	6 months ended 30 Sep 16				
	Mean value					30 Sep 16
	\$m	\$m	\$m	\$m		
Stressed VaR at risk at a 99% confidence level (1)						
Foreign exchange risk	22	16	29	24		
Interest rate risk	30	22	35	27		
Volatility risk	6	4	8	4		
Commodities risk	-	-	1	-		
Credit risk	9	5	11	9		
Inflation risk	2	1	7	7		
Diversification benefit	(31)	n/a	n/a	(34)		
Total diversified Stressed VaR at a 99% confidence level	38	31	46	37		
Other market risks (2)	-	-	1	-		
Total Stressed VaR for physical and derivative positions (3)	38	31	47	37		

<sup>(1)</sup> The maxima / minima by risk types are likely to occur during different days in the period. As such, the sum of these figures will not equal the total maximum / minimum Stressed VaR which is the maximum / minimum aggregate Stressed VaR position during the period.

<sup>(3)</sup> VaR is measured individually for foreign exchange risk, interest rate risk, volatility risk, commodities risk, credit risk, and inflation risk. Risk limits are applied in these categories separately, and against the total risk position.

	6 month	6 months ended 31 Mar 16		
	Mean value	Minimum value	Maximum value	31 Mar 16
	\$m	\$m	\$m	\$m
Stressed VaR at a 99% confidence level				
Foreign exchange risk	23	14	34	20
Interest rate risk	26	18	35	26
Volatility risk	6	4	7	5
Commodities risk	1	-	1	1
Credit risk	13	8	15	8
Inflation risk	1	1	1	1
Diversification benefit	(35)	n/a	n/a	(29)
Total diversified Stressed VaR at a 99% confidence level	35	27	50	32
Other market risks	-	-	1	1
Total Stressed VaR for physical and derivative positions	35	27	51	33

<sup>(2)</sup> Other market risks include exposures to various basis risks measured individually at a portfolio level.



# **Back-testing**

VaR estimates are back-tested regularly for reasonableness. Back-testing is a process that compares the Level 2 Group's daily VaR estimates against both actual and hypothetical daily profit and loss (P&L) to ensure that model integrity is maintained.

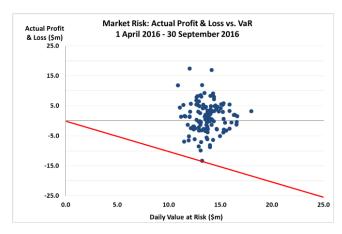
The results of back-testing are reported to senior management, risk committees, and the regulators. In addition to back-testing, the risk measurement model and all pricing models are subject to periodical reviews and independent validation at frequencies specified by the NAB Group Model Risk Policy.

#### Table 7.1E: Back-testing Results

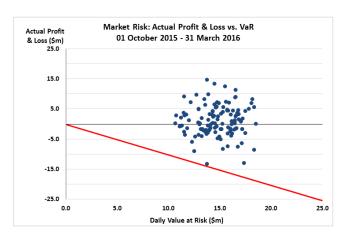
Comparison of VaR estimates to actual gains/losses	ended 30 Sep 16	ended 31 Mar 16
Number of "outliers" incurred for the trading portfolio	1	-

The following graph compares the Level 2 Group's daily VaR estimates against actual P&L.

# 6 months ended 30 Sep 16



#### 6 months ended 31 Mar 16



Back-testing, carried out by comparing the Level 2 Group's daily VaR estimate against actual P&L, identified one exception during the six month period to 30 September 2016 and no exceptions during the previous six month period to 31 March 2016. This remains within the model parameters and indicates acceptable operation of the VaR model within APRA's guidelines.

#### Section 8

# **Operational Risk**

#### Introduction

Operational risk is the risk of loss resulting from inadequate or failed internal processes, people and systems or external events. This includes legal risk, but excludes strategic risk and reputational risk.

The primary objective for the management of operational risk is to ensure that where operational risk exists, it is identified, assessed and managed to acceptable levels, and at the same time, allows for the achievement of business and strategic objectives and compliance with our obligations.

#### **Structure and Organisation**

The BRC, on the recommendation of the GRRMC, is responsible for approving and/or endorsing the:

- Group Operational Risk Management Framework (ORMF)
- · Group Operational Risk Appetite
- · Operational Risk Capital Calculation Model.

The NAB Group's Risk Governance structure provides the Board and BRC with assurance over the performance of the overall risk management framework. This is primarily achieved through Enterprise Operational Risk and Compliance (EOR&C) which provides the Board, BRC, GRRMC, Group Regulatory Compliance Operational Risk Committee (GRCORC) and the Risk Leadership Team (RLT) with the information required to manage these responsibilities.

This flow of information ultimately allows the Board to discharge its responsibilities for managing the NAB Group's operational risk exposures.

# Management

EOR&C provides the framework, policies, standards, processes and tools for the business to use in the identification, assessment, management, monitoring, measurement and reporting of operational risks.

Implementation of the ORMF leads to:

- all staff taking responsibility and ownership for managing the operational risk inherent in their day-today activities
- promoting and embedding a risk conscious culture and behaviour throughout the NAB Group
- consistency in the identification, assessment, management, monitoring, measurement and reporting of operational risk
- proactive identification and management of operational risks and events to contain: direct and indirect financial loss, disruption to business processes, and nonfinancial impacts including regulatory, reputation, customer and management remediation
- estimates of operational risk capital that reflect the operational risk profile of the NAB Group

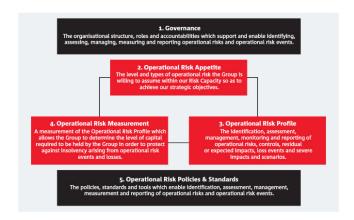
 risk decisions being made on an informed basis, considering risk appetite and the capital implications, thereby enhancing awareness and/or acceptance of operational risks.

The NAB Group creates a risk conscious environment through promoting an operational risk culture:

- of effective integration of operational risk management into day-to-day business decisions
- where risk-awareness and questioning are supported (including the exercise of appropriate judgement in the identification and management of risk)
- of compliance, not only within the strict parameters of the law, delegated authorities and other compliance requirements, but also extending to doing what is right.

The ORMF applies to all entities within the NAB Group, including any outsourced services undertaken on behalf of any business within the NAB Group.

# The NAB Group's Operational Risk Management Framework



The ORMF and supporting policies define the principles, minimum standards and processes for the management of operational risk throughout the NAB Group. The scope includes:

- · Business Continuity Management
- Data Quality
- Event Management
- Information Security
- Model Risk
- Operational Risk Profiling
- · Outsourcing and Offshoring
- · Physical Security
- · Travel Security
- Executive protection
- · Anti-Fraud.

Additional standards/processes are developed when there is a critical need to manage a specific risk area.



#### Measurement

The capital attributed to operational risk is calculated using the NAB Group's internal AMA operational risk models and supporting processes. From time to time additional overlays may be made to ensure the capital held is reflective of the NAB Group's operational risk profile at a point in time.

The NAB Group's model has been subjected to review by APRA and other external third parties and uses data captured from:

- historical internal loss data which is representative of the NAB Group's operational loss profile
- scenario analysis data received from business and risk management professionals which considers potential extreme events faced by the NAB Group
- relevant data from losses incurred by other financial institutions and factors reflecting the business environment and internal controls.

The Operational Risk Capital Calculation Model is illustrated below as an end-to-end capital allocation process.

#### **Calculation of Operational Risk Capital**

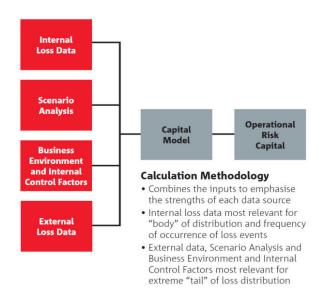


Table 8A: Total Risk-Weighted Assets

•	As	As at			
	30 Sep 16	31 Mar 16			
	\$m	\$m			
Operational risk					
Advanced measurement approach	37,500	40,000			
Total operational risk RWA	37,500	40,000			

#### **Monitoring and Reporting**

The success of the operational risk management processes is determined by the ability of management to articulate and consistently demonstrate behaviours that promote a strong risk awareness and culture throughout the NAB Group.

EOR&C provides the following reporting:

- monthly reporting on significant loss events, emerging issues, oversight, monitoring, and review activity. This information is available to the BRC and GRRMC as part of the NAB Group CRO reporting material.
- 6 monthly EOR&C reports to the BRC via GRRMC.

At times, the RLT and risk committees may also request EOR&C to report on topics of operational risk such as Business Continuity Management and physical security. EOR&C may also choose or be requested to undertake a deep dive review or provide analysis on a particular emerging issue or theme. Findings are reported to the requestor and, if material, escalated through the Risk Governance structure.

#### Risk Mitigation through Insurance

A key strategy to mitigate the financial impacts of operational risk exposures at the NAB Group level is the NAB Group's insurance program. This NAB Group function maintains and monitors the NAB Group's insurance program within a defined risk appetite and ensures that it aligns with the NAB Group's current and projected operational risk exposures. The quantitative modelling and measurement of the NAB Group's operational risk profile forms a significant input into the design of the NAB Group's insurance cover.

The regulatory capital measure for operational risk does not include any adjustment for insurance.

#### **Regulatory and Compliance Management**

The NAB Group is committed to complying with all relevant laws, prudential standards, codes and policies, and to preventing the activities it conducts from being used by those engaged in criminal activity, money laundering, terrorist financing, bribery, corruption, contravention of applicable sanctions laws or otherwise used in connection with criminal activity.

The NAB Group is also committed to identifying and monitoring changes in the regulatory environment and building constructive regulatory relationships

Accordingly, the NAB Group has in place dedicated policies, standard operating procedures, guidance notes and processes that are designed to ensure the effective management of regulatory and compliance obligations across the NAB Group.

#### Section 9

# **Balance Sheet and Liquidity Risk**

Balance Sheet and Liquidity Risk (BSLR) is primarily concerned with the management of various structural, non-traded market risks within the Level 2 Group's balance sheet. Non-traded market risk arises from the Level 2 Group's banking book activity and includes capital risk, non-traded equity risk, interest rate risk, funding risk (secured and unsecured), liquidity risk and foreign exchange risk.

#### **Structure and Organisation**

The Board approved risk appetite limits are outlined in the GBSLR Policy, ancillary Standards and Limits Schedule, which provide direction for the management, measurement, monitoring, oversight, reporting and governance of non-traded market risks. The BRC approves the GBSLR Policy.

The BRC and GRRMC receive regular reporting on balance sheet management activities, along with monthly reporting of non-traded market risk compliance and activity.

The GALCO and subsidiary ALCOs review risk management strategies, compliance with risk limits and controls and remedial action undertaken for limit breaches. They approve the GBSLR Standards and models relating to balance sheet and non-traded market risks.

With the exception of non-traded equity risk, the Level 2 Group and relevant subsidiary Treasuries are responsible for the management of non-traded market risks. For non-traded equity risk, individual business lines that have been allocated equity risk limits are responsible for managing their risk exposures.

GBSLR and subsidiary BSLR teams provide independent operational oversight over the non-traded market risk framework. GBSLR is the owner of the GBSLR Policy and ancillary Standards and oversees the operation of APRA approved models to meet regulatory requirements.

Further information on the management of GBSLR is included in the following sections of this report:

- · section 4.1 Capital Adequacy
- section 6.2 Level 2 Group Owned Securitised Assets
- · section 9.1 Funding and Liquidity Risk
- section 9.2 Interest Rate Risk in the Banking Book
- section 9.3 Equities Banking Book Position
- section 9.4 Foreign Exchange Risk in the Banking Book



# 9.1 Funding and Liquidity Risk

#### Introduction

Liquidity risk is the risk of the NAB Group being unable to meet its financial obligations as they fall due. These obligations primarily include the repayment of deposits and the repayment of borrowings and loan capital as they mature.

Funding risk is the risk which arises due to change in appetite and capacity of the market to provide adequate long-term and short-term funds to meet the NAB Group's strategic plans and objectives at an acceptable cost.

The objectives of the NAB Group in managing its funding and liquidity risks are:

- to ensure that the current and future payment obligations of the NAB Group are met as they become due
- to retain adequate liquidity buffers in the Group and subsidiary balance sheets so as to withstand severe market and institutional disruptions
- to meet planned business funding needs over a forward horizon
- to maintain access to global short-term and long-term debt capital markets and global secured funding markets consistent with the target credit ratings of the NAB Group and its subsidiaries
- to diversify funding sources in terms of maturity, currency, instrument, investor type, geographic region and by the issuing entity.

# **Liquidity and Funding Risk Management Framework**

The NAB Group's Liquidity Risk Management framework is approved by the Board on an annual basis. The framework comprises a risk appetite statement, funding and liquidity policies, an annual funding strategy, a contingent funding plan (CFP) and an internal liquidity adequacy assessment (ILAA).

The GALCO is responsible for oversighting the NAB Group's balance sheet structure, risk settings, compliance and governance frameworks around balance sheet risks including funding and liquidity risk.

Group Treasury develop and execute liquidity and funding strategies consistent with the NAB Group Funding strategy, mandates and limits in place. Group Risk set the risk appetite limits, provide oversight and are responsible for reporting of liquidity and funding compliance against limits. Liquidity risk management objectives are communicated more widely through the allocation of funding and liquidity costs to business units.

The risk appetite statement includes specific metrics relating to liquidity and funding risk. These metrics are determined with reference to outcomes of liquidity stress testing, management experience, ratings agency expectations and peer alignment. Liquidity stress testing includes systemic and idiosyncratic scenarios run over a mix of short and longer timeframes and include an offshore market closure scenario and a local market disruption scenario.

Liquid asset holdings and a strong funding base are the primary mitigants to liquidity risk. The size, diversity and tenor of the liquid asset portfolio and funding mix is set annually in the NAB Group funding strategy based on the risk appetite settings. The strategy is updated quarterly to reflect current market conditions and outlook.

The NAB Group's liquid asset portfolio is maintained by geography, currency and legal entity across NAB Ltd, BNZ, London, New York and Asian branches. The liquidity portfolio comprises a mix of:

- cash, Australian government and semi government securities:
- offshore central bank reserves and foreign sovereign securities; and
- a mix of negotiable certificates of deposit, bank bills, supranational bonds, covered bonds, RMBS and internal RMBS (all available as collateral for a Committed Liquidity Facility with the Reserve Bank of Australia (RBA)).

The NAB Group's funding is sourced from:

- customer deposits generated through transactional accounts, savings accounts and term deposits from individuals, small and medium enterprises (SME) and corporations; and
- wholesale funding debt programs in both domestic and international markets including Global Medium Term Notes, Covered Bond programs, RMBS, Commercial Paper and Certificates of Deposits.

The NAB Group CFP provides guidance on how the bank will respond in the event of a liquidity crisis including clear instructions on accountabilities, communication, escalation process, asset liquidation options and operational requirements. The NAB Group CFP is tested and updated annually. Early warning indicators provide insight into emerging periods of funding or liquidity stress and when to trigger the NAB Group CFP.

# **Measurement, Monitoring and Reporting**

Liquidity risk is measured, managed and monitored daily on a cash flow basis, using scenario analysis, gap analysis and stress testing, and addresses all regulatory requirements. Any non-compliance is escalated to the GALCO and Group CRO.

Monthly results are reported to Group and subsidiary ALCOs, GRRMC and BRC. The NAB Group has clearly defined escalation procedures whereby liquidity events, both systemic and name specific, are monitored and appropriate actions outlined against triggers.

#### **Regulatory Change**

The Liquidity Coverage Ratio (LCR) and Net Stable Funding Ratio (NSFR) are a key focus for the NAB Group, with compliance having been required from 1 January 2015 and from 1 January 2018 respectively.



# 9.2 Interest Rate Risk in the Banking Book

#### Introduction

Interest Rate Risk in the Banking Book (IRRBB) arises from changes in market interest rates that adversely impact the NAB Group's financial condition in terms of earnings (net interest income) or economic value of the balance sheet. This includes:

- Repricing Risk, arising from changes to the overall level of interest rates and inherent mismatches in the repricing term of banking book items
- Yield Curve Risk, arising from a change in the relative level of interest rates for different tenors and changes in the slope or shape of the yield curve
- Basis Risk, arising from differences between the actual and expected interest margins on banking book items over the implied cost of funds of those items
- Optionality Risk, arising from the existence of standalone or embedded options in banking book items, to the extent that the potential for those losses is not included in the above risk types.

The objective of the NAB Group's framework is to ensure that IRRBB is managed to optimise and stabilise the NAB Group's economic value and earnings over an investment horizon.

#### Management

The Board approves the risk appetite for IRRBB, and sets the overall limits for VaR and Earnings at Risk (EaR).

The key elements of the management framework for IRRBB include:

- the IRRBB Policy and Guidance Notes define the compliance and management framework to ensure that all interest rate risk positions in the banking book are identified, measured, managed and reported, and are aligned to the requirements of Prudential Standard APS 117: Capital Adequacy: Interest Rate Risk in the Banking book
- the NAB Group and subsidiary Treasuries are responsible for managing the interest rate risk profile of the balance sheet in line with the approved risk appetite. This includes development and execution of interest rate risk management strategies
- the Funds Transfer Pricing (FTP) Policy and Guidance Notes define the FTP mechanism in place to transfer interest rate risk out of originating business units and into the Group Treasury functions for the management of interest rate risk
- the NAB Group and subsidiary BSLR teams are responsible for IRRBB monitoring and oversight and are independent of Group Treasury. They maintain a risk framework for IRRBB and have responsibility for IRRBB measurement of exposures, compliance monitoring and reporting
- periodic reporting to management and governance committees of IRRBB exposures and compliance.

# Measurement

The NAB Group has been accredited by APRA to use its internal model for the measurement of IRRBB. Interest

rate risk is measured, managed and monitored using both the economic valuation approach and the earnings approach.

The principal metrics used to measure and monitor IRRBB are as follows:

Measurement	Definition
VaR	The potential loss in economic value implied by the static balance sheet that arises from changes to the current yield curve based upon historical observations for a given holding period and confidence level.
EaR	The potential loss in earnings implied by the static balance sheet over a 12-month forecast period, that arises from changes in the current yield curve based on historical observations for a given holding period and confidence level.
Market Value	The present value of all known future cash flows implied by the static balance sheet on both a spot and historically cumulative basis.
Embedded Value	The economic gain or loss implied by the static balance sheet which equates to the market value less the book value, less accrued interest.
Economic Value Sensitivity (EVS)	The potential impact of a parallel decrease in interest rates on the present value of all known future cash flows implied by the static balance sheet.
Net Interest Income Sensitivity (NIIS)	The potential impact of a parallel decrease in interest rates on the earnings over a 12-month forecast period implied by the static balance sheet.
Stress Testing	The potential loss in earnings and economic value from large parallel and non- parallel yield curve shocks.

VaR and EaR are measured with a three-month holding period and 99% confidence level for internal reporting purposes.

The NAB Group incorporates behavioural modelling where contractual-based modelling is inappropriate for measuring IRRBB, such as for prepayments, non-bearing interest accounts, rate locks and CET1 Capital. Any changes to the material assumptions require subsidiary ALCO or GALCO approval.

IRRBB regulatory capital includes a value for repricing and yield curve risk, basis risk, optionality risk and embedded value. The components of IRRBB regulatory capital are calculated using a historical VaR simulation using at least six years of historical data at a 99% confidence level, one-year investment term of capital, and a 12-month holding period.

#### **Monitoring and Reporting**

The IRRBB metrics are measured and monitored on a monthly basis as a minimum. Compliance with limits is reported to subsidiary ALCOs and GALCO on a monthly basis. IRRBB regulatory capital is also calculated monthly.



# Table 9.2A: Interest Rate Risk in the Banking Book

This table provides the increase or decrease in economic value for upward and downward rate shocks broken down by currency.

	As at 30 S	As at 30 Sep 16		As at 31 Mar 16	
	200 bp parallel increase	200 bp parallel decrease	200 bp parallel increase	200 bp parallel decrease	
	\$m	\$m	\$m	\$m	
Change in economic value (1)					
AUD	(170)	204	(187)	220	
CAD	-	-	1	(1)	
CHF	-	-	-	-	
EUR	(1)	1	1	(1)	
GBP	1	(1)	59	(59)	
HKD	3	(3)	2	(2)	
JPY	-	-	1	(1)	
NZD	(187)	193	(222)	231	
USD	87	(87)	39	(39)	
Other	4	(4)	2	(2)	
Total change in economic value	(263)	303	(304)	346	

<sup>(1)</sup> The Level 2 Group's major currencies are modelled on an individual basis. The remaining immaterial currencies are aggregated and modelled using a single yield curve. The 200 basis point interest rate shock results include earnings offset.

# Table 9.2B: Total Risk-Weighted Assets

	As at	
	30 Sep 16	31 Mar 16
	 \$m	\$m
IRRBB risk-weighted assets	12,136	10,725



# 9.3 Equities Banking Book Position

#### Introduction

Non-traded equity risk refers to the direct loss that may be incurred as a result of reduction in the fair value of an equity investment in the NAB Group's banking book. Fair value represents mark-to-market valuations derived from market prices or independent valuation and methodologies.

The objective of the NAB Group in managing non-traded equity risk is to protect the value of equity investments over the long term and to create value within an approved risk appetite. Key strategies include:

- · strategic investments
- capital gains
- distressed debt management (e.g. Debt for Equity swaps).

#### Management

Equity risk appetite limits are reflected in the NAB Group Risk Appetite Statement and the NAB Group Limits Schedule. The Equity Risk Standard defines the compliance and management framework in relation to undertaking, measurement, monitoring and reporting equity investments outside of the trading book. It applies to both direct equity investments and equity underwriting activities.

Business units with a non-traded equity risk limit are responsible for managing equity risk in line with the requirements of the non-traded equity risk framework. Business units and their risk committees are responsible for monitoring of, and compliance with, all material risks, and ensuring that all commercial and risk aspects of the transactions are addressed.

The GBSLR team is responsible for maintaining independent oversight of the non-traded equity risk framework, including independent review of proposed equity transactions for compliance under the equity risk delegated authority, oversight of the periodic valuation and impairment assessments of investments, and monitoring and reporting of equity investment against limits.

# Measurement

Investment in equity instruments that are neither held for trading nor contingent consideration recognised by the NAB Group in a business combination to which AASB 3 'Business Combination' applies, are measured at fair value through other comprehensive income, where an irrevocable election has been made by the management.

Amounts presented in other comprehensive income are not subsequently transferred to profit or loss. Dividends on such investments are recognised in profit or loss unless the dividend clearly represents a recovery of part of the cost of the investment.

#### **Monitoring and Reporting**

Monthly reports are provided to senior management and risk committees. The overall monitoring and reporting framework is shown below.

#### Monitoring and Reporting Framework

Motivation	Valuation Methodology	Risk Framework
Strategic	Observable	Regional
Investment	Market Prices	Finance
Capital Gains		Regional
	Independent Valuations	Delegated
Debt	valuations	Authority
For Equity		Regional
Swaps	Model Derived Estimates	Risk Function
	Estimates	Group
		Economic Capital
		GBSLR
Transact	Measure	Monitor

Financial Accounting & Records
Deal Execution, Business Strategy & Risk Management
Operational Risk  Methodologies for ECap
Measurement Measurement & Compliance



#### **Table 9.3A: Equities Banking Book Position**

This table provides the value of investments disclosed in the balance sheet, as well as the fair value of those investments.

	As at 30 Sep 16		As at 31 Mar 16	
	Carrying Fair value <sup>(2)</sup>		Carrying value <sup>⊕</sup>	Fair value <sup>(2)</sup>
	\$m	\$m	\$m	\$m
Total listed equities (publicly traded)	23	23	26	26
Total unlisted equities	385	386	626	628

<sup>(1)</sup> Carrying value as recorded in the Balance Sheet, in accordance with accounting standards.

#### Table 9.3B: Gains and Losses on Equity Investments

This table provides the realised (actual) gains/losses arising from sales and liquidations in the six months to 30 September 2016. Unrealised (expected) gains/losses which were previously included in Tier 1 and Tier 2 capital represent gains/losses recognised in the balance sheet.

	6 month	ns ended	
	30 Sep 16	31 Mar 16	
	\$m	\$m	
Gains (losses) on equity investments			
Cumulative realised gains (losses) in reporting period	101	-	
Total unrealised gains (losses)	85	168	
Total unrealised gains (losses) included in Common Equity Tier 1, Tier 1 and Tier 2 capital	85	168	

#### Disclosure 9.3C: Equity Investments Subject to Grandfathering Provision

The Level 2 Group does not have any equity investments that are subject to grandfathering provisions

<sup>(2)</sup> For the purposes of determining the fair value of investments in the table above, the NAB Group uses the quoted prices from an active market to the extent that one is available. If the market for a financial instrument is not active, fair value is established by using a valuation technique.

#### 9.4 Foreign Exchange Risk in the Banking Book

The NAB Group's banking book has exposure to risk arising from currency movements as a result of participation in the global financial markets and international operations. Foreign Exchange Risk in the Banking Book (FXRBB) arises from both operating business activities and structural foreign exchange exposures from foreign investments and capital management activities. Currency movements can impact profit and loss, cash flows and the balance sheet.

The NAB Group's objective in relation to foreign exchange risk is to protect the NAB Group's capital ratio from the impact of currency movements, and to manage non-structural foreign exchange risk within risk appetite. The NAB Group's main structural foreign exchange exposures are due to its investment in BNZ.

The Board approves the risk appetite for FXRBB, setting the overall VaR limit. In addition, with guidance from the BRC, it monitors and reviews the adequacy of the NAB Group's foreign exchange risk compliance and management framework developed by management.

The key elements of the management framework for FXRBB include:

- the GBSLR Policy and FXRBB Standard define the compliance and management framework to ensure all foreign exchange positions (both structural and nonstructural) in the banking book are identified, measured, managed and reported
- the NAB Group and subsidiary Treasuries are responsible for the development and execution of foreign exchange risk management strategies
- GBSLR and subsidiary BSLR teams provide independent oversight. They are responsible for monitoring and oversight to ensure FXRBB is managed in compliance with the Policy and requirements of the Standard
- periodic reporting to management and governance committees of FXRBB exposures and compliance.



## **Leverage Ratio Disclosures**

The leverage ratio table below has been prepared in accordance with APRA's prudential standard *APS110: Capital Adequacy* (*Attachment D*). The Leverage Ratio is a non-risk based measure that uses exposures to supplement the risk-weighted assets based capital requirements. In summary, the leverage ratio is intended to:

- restrict the build-up of leverage in the banking sector to avoid destabilising deleveraging processes that can damage the broader financial system and the economy; and
- reinforce the risk-based requirements with a simple, transparent, non-risk based supplementary measure.

As at 30 September 2016 the leverage ratio for the Level 2 Group was 5.72%.

## 10.1 Leverage Ratio Disclosure Template

		As at	As at
		30 Sep 16	31 Mar 16
		\$m	\$m
On-balar	nce sheet exposures		
1	On-balance sheet items (excluding derivatives and securities financing transactions (SFTs), but including collateral)	689,924	669,032
2	(Asset amounts deducted in determining Tier 1 capital)	(10,940)	(13,242)
3	Total on-balance sheet exposures (excluding derivatives and SFTs) (sum of rows 1 and 2)	678,984	655,790
Derivativ	ve exposures		
4	Replacement cost associated with all derivatives transactions (i.e. net of eligible cash variation margin)	9,245	8,885
5	Add-on amounts for potential future credit exposure (PFCE) associated with all derivatives transactions	18,405	17,262
6	Gross-up for derivatives collateral provided where deducted from the balance sheet assets pursuant to the Australian Accounting Standards	-	-
7	(Deductions of receivables assets for cash variation margin provided in derivatives transactions)	(1,542)	(283)
8	(Exempted central counterparty (CCP) leg of client-cleared trade exposures)	-	-
9	Adjusted effective notional amount of written credit derivatives	10,695	15,623
10	(Adjusted effective notional offsets and add-on deductions for written credit derivatives)	(10,669)	(14,389)
11	Total derivative exposures (sum of rows 4 to 10)	26,134	27,098
Securition	es financing transaction exposures	·	
12	Gross SFT assets (with no recognition of netting), after adjusting for sales accounting transactions	58,927	65,251
13	(Netted amounts of cash payables and cash receivables of gross SFT assets)	(21,530)	(23,543)
14	CCR exposure for SFT assets	1,881	1,333
15	Agent transaction exposures	-	-
16	Total Securities financing transaction exposures (sum of rows 12 to 15)	39,278	43,041
Other Of	f-balance sheet exposures		
17	Off-balance sheet exposure at gross notional amount	153,905	155,033
18	(Adjustments for conversion to credit equivalent amounts)	(70,657)	(70,457)
19	Other off-balance sheet exposures (sum of rows 17 and 18)	83,248	84,576
Capital a	and total exposures		
20	Tier 1 Capital	47,336	42,535
21	Total exposures (sum of rows 3, 11, 16 and 19)	827,644	810,505
Leverage	e ratio		
22	Leverage ratio	5.72%	5.25%



## 10.2 Summary Comparison of Accounting Assets vs Leverage Ratio Exposure Measure

		As at	As at 31 Mar 16	
		30 Sep 16		
		\$m	\$m	
Items				
1	Total consolidated assets as per published financial statements	777,622	868,730	
2	Adjustment for investments in banking, financial, insurance or commercial entities that are consolidated for accounting purposes but outside the scope of regulatory consolidation	1,122	(90,630)	
3	Adjustment for assets held on the balance sheet in a fiduciary capacity pursuant to the Australian Accounting Standards but excluded from the Leverage Ratio exposure measure	-	-	
4	Adjustments for derivative financial instruments	(25,289)	(40,262)	
5	Adjustment for SFTs (i.e. repos and similar secured lending)	1,881	1,333	
6	Adjustment for off-balance sheet exposures (i.e. conversion to credit equivalent amounts of off-balance sheet exposures)	83,248	84,576	
7	Other adjustments	(10,940)	(13,242)	
8	Leverage ratio exposure	827,644	810,505	

At 30 September 2016 the Leverage Ratio for the NAB Level 2 Group of 5.72% remains above the BCBS minimum requirement of 3.0% for banks that have not been identified as a G-SIB. Furthermore, the ratio exceeds the appropriate range of between 3–5 per cent as recommended by the Financial System Inquiry calculated in accordance with the Basel framework.

The minimum Leverage Ratio is yet to be determined by APRA, with Pillar 1 compliance not expected to be required until 1 January 2018.

Over the half year to 30 September 2016, the Leverage Ratio increased by 47 basis points to 5.72%. This uplift was predominately due to the increase in Tier 1 Capital of \$4.8 billion (+59 basis points), which includes cash earnings less the payment of the 2016 interim dividend net of Dividend Reinvestment Plan (DRP) participation, the 80% sale of NAB's Wealth life insurance business, the issuance proceeds from NAB Capital Notes 2 and the sale of CYBG AT1 instruments.

On-balance sheet items (excluding derivatives and securities financing transactions (SFTs), but including collateral) for the NAB Level 2 Group have increased by \$23 billion (-16 basis points) to \$679 billion, while net movements to other leverage ratio exposure categories contributed a net 4 basis point increase to the ratio.



#### **Liquidity Coverage Ratio**

The Liquidity Coverage Ratio (LCR) is a metric that measures the adequacy of High Quality Liquid Assets (HQLA) available to meet net cash outflows (NCO) over a 30-day period during a severe liquidity stress scenario. The APRA minimum coverage level is 100% for both the Level 2 NAB Group and NAB Ltd from 1 January 2015.

The NAB Group LCR for the quarters ended 30 September 2016, 30 June 2016 and 31 March 2016 is presented in the Table 11.1 LCR Disclosure Template which reflects the Basel standard disclosure template and is based on a simple average of daily LCR outcomes excluding weekends.

#### **Liquidity Coverage Ratio Commentary**

The NAB Group maintains well diversified and high quality liquid asset portfolios to support regulatory and internal requirements in the various countries in which it operates.

Average liquid assets for the quarter were \$147 billion of which HQLA comprised \$91 billion. The HQLA consists primarily of Level 1 assets which include cash, deposits with Central Banks, Australian Semi Government and Commonwealth Government securities and securities issued by foreign sovereigns.

Alternative Liquid Assets (ALA) relate to the Committed Liquidity Facility (CLF) provided by the Reserve Bank of Australia (RBA). HQLA held in Bank of New Zealand which is excess to meeting an LCR of 115% is excluded reflecting liquidity portability considerations. The amount excluded was on average \$2.4 billion during the quarter to 30 September 2016.

The CLF value used in the LCR calculation is the lesser of the undrawn portion of the facility granted to the NAB Group and the value of the collateral the NAB Group chooses to hold at any given time to support the facility and its liquidity requirements. This collateral is a combination of internal Residential Mortgage Backed Securities (RMBS) and other RBA repo eligible securities including bank bills and third party RMBS. The drawn portion of the CLF relates to accounts held with the RBA for the settlement of payment obligations. The NAB Group has an available CLF of \$55.4 billion during the period 1 January 2016 to 31 December 2016.

LCR NCO represents the net cash flows that could potentially occur from on and off balance sheet activities within a 30 day severe liquidity stress scenario. The cash flows are calculated by applying APRA prescribed run-off factors to maturing debt and deposits and inflow factors to assets. High run-off factors are applied to sophisticated investors and depositors including long term and short term debt holders, financial institution and corporate depositors. Lower run off factors are applied to deposits less likely to be withdrawn in a period of severe stress. These include deposits from people and from small medium enterprises. Deposits from corporate and financial institutions which are considered to be operational in nature also attract a lower run off, for example deposits from the NAB custody business. NAB conducts an annual review of its interpretation of the LCR definitions. During 2015/2016 NAB revised the methodology for determining operational deposit excess amounts and cash inflows from fully performing exposures.

Cash outflows arising from business activities that create contingent funding and collateral requirements such as repo funding and derivatives and the extension of credit and liquidity facilities to customers are also captured within the LCR calculation along with an allowance for debt buyback requests.

The NAB Group manages its LCR position daily within a target range that reflects management risk appetite across the legal entity structure, major currencies and jurisdictions in which business activities are undertaken.

#### Q3 2016 vs Q2 2016

Average holdings of liquid assets and NCO both decreased reflecting the Clydesdale Bank exit which occurred midway through the March 2016 quarter.

#### Q4 2016 V Q3 2016

No movement in the liquid asset portfolio. NCO increase driven by a combination of higher derivative cash outflows reflecting material funding maturities during the period and by lower cash inflows from methodology change.

## 11.1 Liquidity Coverage Ratio Template

		30 Sep	30 Sep 16		16	31 Mar 16	
		66 data p		65 data p		62 data p	
		Total unweighted value (average)	Total weighted value (average)	Total unweighted value (average)	Total weighted value (average)	Total unweighted value (average)	Total weighted value (average)
		<b>\$m</b> <sup>(1)</sup>	\$m	\$m <sup>(1)</sup>	\$m	\$m <sub>(2)</sub>	\$m <sup>(2)</sup>
Liquid as	sets, of which:		146,682		146,475		148,348
1	High-quality liquid assets (HQLA) <sup>(2) (3)</sup>	n/a	90,938	n/a	90,267	n/a	92,380
2	Alternative liquid assets (ALA)	n/a	51,400	n/a	51,400	n/a	51,400
3	Reserve Bank of New Zealand (RBNZ) securities <sup>(2) (3)</sup>	n/a	4,344	n/a	4,808	n/a	4,568
Cash out	flows						
4	Retail deposits and deposits from small business customers, of which:	169,085	18,114	167,339	17,975	177,551	18,825
5	stable deposits	48,288	2,415	47,498	2,375	51,899	2,595
6	less stable deposits	120,797	15,699	119,841	15,600	125,652	16,230
7	Unsecured wholesale funding, of which:	141,604	76,155	139,586	76,284	145,282	77,623
8	operational deposits (all counterparties) and deposits in networks for cooperative banks	54,449	13,612	50,022	12,506	49,612	12,403
9	non-operational deposits (all counterparties)	72,084	47,472	74,463	48,677	76,082	45,632
10	unsecured debt	15,071	15,071	15,101	15,101	19,588	19,588
11	Secured wholesale funding	n/a	4,156	n/a	5,252	n/a	5,830
12	Additional requirements, of which	140,473	32,762	137,366	30,719	144,024	30,733
13	outflows related to derivatives exposures and other collateral requirements	20,953	20,953	18,970	18,970	18,398	18,398
14	outflows related to loss of funding on debt products	-	-	-	-	-	-
15	credit and liquidity facilities	119,520	11,809	118,396	11,749	125,626	12,335
16	Other contractual funding obligations	3,522	3,296	4,269	3,512	2,526	2,513
17	Other contingent funding obligations	114,403	7,464	116,821	7,631	115,261	7,498
18	Total cash outflows	n/a	141,947	n/a	141,373	n/a	143,022
Cash infl	ows						
19	Secured lending (e.g. reverse repos)	52,395	3,267	51,841	3,563	48,554	3,692
20	Inflows from fully performing exposures	23,959	13,520	29,182	15,825	28,968	15,242
21	Other cash inflows	4,111	4,111	5,106	5,106	5,502	5,500
22	Total cash inflows	80,465	20,898	86,129	24,494	83,024	24,434
		Total a	djusted value	Total a	djusted value	Total a	djusted value
23	Total liquid assets		146,682		146,475		148,348
24	Total net cash outflows		121,049		116,879		118,588
25	Liquidity Coverage Ratio (%)		121%		125%		125%

<sup>&</sup>lt;sup>(1)</sup> Unweighted inflow and outflow values are outstanding balances maturing or callable within 30 days.

<sup>&</sup>lt;sup>(2)</sup> Values relating to Clydesdale bank have been included up to the date of exit 8 February 2016.

<sup>(3)</sup> Weighted values are calculated after applying caps to the amount of liquid assets included from subsidiaries.



#### **Detailed Capital Disclosures**

## 12.1 Common Disclosure Template - Regulatory Capital

This table provides the post 1 January 2018 Basel III common disclosure requirements for APS 330 (Attachment A). Regulatory adjustments under Basel III are disclosed in full as implemented by APRA. The capital conservation buffer and any countercyclical buffer requirements referred to in rows 64 to 67 apply from 1 January 2016. Furthermore, an additional CET1 capital buffer of 1% become effective from 1 January 2016 as an extension to the capital conservation buffer as the NAB Group is categorised as a Domestic Systemically Important Bank.

The information contained within the table below should be read in conjunction with section 12.2 Regulatory Balance Sheet and section 12.3 Reconciliation between the Common Disclosure Template and the Level 2 Regulatory Balance Sheet.

	AS	aı
30	Sep	16

		30 Sep 16
		\$m
Comr	non Equity Tier 1 Capital: instruments and reserves	
1	Directly issued qualifying ordinary shares (and equivalent for mutually-owned entities) capital	31,204
2	Retained earnings	17,076
3	Accumulated other comprehensive income (and other reserves)	529
4	Directly issued capital subject to phase out from CET1 (only applicable to mutually-owned companies)	-
5	Ordinary share capital issued by subsidiaries and held by third parties (amount allowed in group CET1)	-
6	Common Equity Tier 1 Capital before regulatory adjustments non Equity Tier 1 Capital: regulatory adjustments	48,809
7		2
8	Prudential valuation adjustments Goodwill (net of related tax liability)	2.817
9	Other intangibles other than mortgage-servicing rights (net of related tax liability)	2,390
10	Deferred tax assets that rely on future profitability excluding those arising from temporary differences (net of related tax liability)	2,390
11		143
12	Cash-flow hedge reserve Shortfall of provisions to expected losses	69
13	Securitisation gain on sale (as set out in paragraph 562 of Basel II framework)	03
14	Gains and losses due to changes in own credit risk on fair valued liabilities	(214
15	Defined benefit superannuation fund net assets	18
16	Investments in own shares (if not already netted off paid-in capital on reported balance sheet)	-
17	Reciprocal cross-holdings in common equity	_
18	Investments in the capital of banking, financial and insurance entities that are outside the scope of regulatory consolidation, net of eligible short positions, where the ADI does not own more than 10% of the issued share capital (amount above 10% threshold)	-
19	Significant investments in the ordinary shares of banking, financial and insurance entities that are outside the scope of regulatory consolidation, net of eligible short positions (amount above 10% threshold)	-
20	Mortgage service rights (amount above 10% threshold)	-
21	Deferred tax assets arising from temporary differences (amount above 10% threshold, net of related tax liability)	-
22	Amount exceeding the 15% threshold	-
23	of which: significant investments in the ordinary shares of financial entities	-
24	of which: mortgage servicing rights	-
25	of which: deferred tax assets arising from temporary differences	-
APRA	a specific regulatory adjustments	
26	National specific regulatory adjustments (sum of rows 26a, 26b, 26c, 26d, 26e, 26f, 26g, 26h, 26i and 26j)	5,637
26a	of which: treasury shares	(6
26b	of which: offset to dividends declared under a dividend reinvestment plan (DRP), to the extent that the dividends are used to purchase new ordinary shares issued by the ADI	-
26c	of which: deferred fee income	-
26d	of which: equity investments in financial institutions not reported in rows 18, 19 and 23	1,946
26e	of which: deferred tax assets not reported in rows 10, 21 and 25	1,466
26f	of which: capitalised expenses	474
26g	of which: investments in commercial (non-financial) entities that are deducted under APRA prudential requirements	13
26h	of which: covered bonds in excess of asset cover in pools	-
26i	of which: undercapitalisation of a non-consolidated subsidiary	-
26j	of which: other national specific regulatory adjustments not reported in rows 26a to 26i	1,744
27	Regulatory adjustments applied to Common Equity Tier 1 due to insufficient Additional Tier 1 and Tier 2 to cover deductions	-
28	Total regulatory adjustments to Common Equity Tier 1	10,862
29	Common Equity Tier 1 Capital (CET1)	37,947



## As at 30 Sep 16

A .1.1141	and Time & Continue in the second	\$m
	onal Tier 1 Capital: instruments	0.070
30 31	Directly issued qualifying Additional Tier 1 instruments	6,073
32	of which: classified as equity under applicable accounting standards of which: classified as liabilities under applicable accounting standards	6.073
33	Directly issued capital instruments subject to phase out from Additional Tier 1	3,317
33	Additional Tier 1 instruments (and CET1 instruments not included in row 5) issued by subsidiaries and held by third parties (amount	3,317
34	allowed in group AT1)	-
35	of which: instruments issued by subsidiaries subject to phase out	
36	Additional Tier 1 Capital before regulatory adjustments	9,390
	onal Tier 1 Capital: regulatory adjustments	
37	Investments in own Additional Tier 1 instruments	-
38	Reciprocal cross-holdings in Additional Tier 1 instruments	-
39	Investments in the capital of banking, financial and insurance entities that are outside the scope of regulatory consolidation, net of eligible short positions, where the ADI does not own more than 10% of the issued share capital (amount above 10% threshold)	1
40	Significant investments in the capital of banking, financial and insurance entities that are outside the scope of regulatory consolidation (net of eligible short positions)	-
41	National specific regulatory adjustments (sum of rows 41a, 41b and 41c)	-
41a	of which: holdings of capital instruments in group members by other group members on behalf of third parties	-
41b	of which: investments in the capital of financial institutions that are outside the scope of regulatory consolidations not reported in rows 39 and 40	-
41c	of which: other national specific regulatory adjustments not reported in rows 41a and 41b	-
42	Regulatory adjustments applied to Additional Tier 1 due to insufficient Tier 2 to cover deductions	-
43	Total regulatory adjustments to Additional Tier 1 Capital	1
44	Additional Tier 1 Capital (AT1)	9,389
45	Tier 1 Capital (T1 = CET1 + AT1)	47,336
Tier 2	Capital: instruments and provisions	
46	Directly issued qualifying Tier 2 instruments	3,755
47	Directly issued capital instruments subject to phase out from Tier 2	3,373
48	Tier 2 instruments (and CET1 and AT1 instruments not included in rows 5 or 34) issued by subsidiaries and held by third parties (amount allowed in group T2)	501
49	of which: instruments issued by subsidiaries subject to phase out	-
50	Provisions	63
51	Tier 2 Capital before regulatory adjustments	7,692
Tier 2	Capital: regulatory adjustments	
52	Investments in own Tier 2 instruments	75
53	Reciprocal cross-holdings in Tier 2 instruments	-
54	Investments in the capital of banking, financial and insurance entities that are outside the scope of regulatory consolidation, net of eligible short positions, where the ADI does not own more than 10% of the issued share capital (amount above 10% threshold)	8
55	Significant investments in the capital banking, financial and insurance entities that are outside the scope of regulatory consolidation (net of eligible short positions)	-
56	National specific regulatory adjustments (sum of rows 56a, 56b and 56c)	-
56a	of which: holdings of capital instruments in group members by other group members on behalf of third parties	-
56b	of which: investments in the capital of financial institutions that are outside the scope of regulatory consolidation not reported in rows 54 and 55	-
56c	of which: other national specific regulatory adjustments not reported in rows 56a and 56b	_
57	Total regulatory adjustments to Tier 2 Capital	83
58	Tier 2 Capital (T2)	7,609
59	Total Capital (TC = T1 + T2)	54,945
60	Total risk weighted assets based on APRA standards	388,445

As at 30 Sep 16

		\$m
Capita	al ratios and buffers	
61	Common Equity Tier 1 (as a percentage of risk weighted assets)	9.77%
62	Tier 1 (as a percentage of risk weighted assets)	12.19%
63	Total capital (as a percentage of risk weighted assets)	14.14%
64	Buffer requirement (minimum CET1 requirement of 4.5% plus capital conservation buffer of 2.5% plus any countercyclical buffer requirements expressed as a percentage of risk-weighted assets) <sup>(1)</sup>	7.00%
65	of which: capital conservation buffer requirement	2.50%
66	of which: ADI-specific countercyclical buffer requirements	0.00%
67	of which: G-SIB buffer requirement	n/a
68	Common Equity Tier 1 available to meet buffers (as a percentage of risk weighted assets)	5.27%
Natio	nal minima (if different from Basel III)	
69	National Common Equity Tier 1 minimum ratio (if different from Basel III minimum)	n/a
70	National Tier 1 minimum ratio (if different from Basel III minimum)	n/a
71	National total capital minimum ratio (if different from Basel III minimum)	n/a
Amou	nts below the thresholds for deduction (not risk-weighted)	
72	Non-significant investments in the capital of other financial entities	395
73	Significant investments in the ordinary shares of financial entities	1,551
74	Mortgage servicing rights (net of related tax liability)	-
75	Deferred tax assets arising from temporary differences (net of related tax liability)	1,466
Applic	able caps on the inclusion of provisions in Tier 2	
76	Provisions eligible for inclusion in Tier 2 in respect of exposures subject to standardised approach (prior to application of cap)	63
77	Cap on inclusion of provisions in Tier 2 under standardised approach	278
78	Provisions eligible for inclusion in Tier 2 in respect of exposures subject to internal ratings-based approach (prior to application of cap)	-
79	Cap for inclusion of provisions in Tier 2 under internal ratings-based approach	1,856
Capita	al instruments subject to phase-out arrangements (only applicable between 1 Jan 2018 and 1 Jan 2022)	
80	Current cap on CET1 instruments subject to phase out arrangements	-
81	Amount excluded from CET1 due to cap (excess over cap after redemptions and maturities)	-
82	Current cap on AT1 instruments subject to phase out arrangements	3,634
83	Amount excluded from AT1 due to cap (excess over cap after redemptions and maturities)	-
84	Current cap on T2 instruments subject to phase out arrangements	3,373
85	Amount excluded from T2 due to cap (excess over cap after redemptions and maturities)	1,149

<sup>(1)</sup> Consistent with APS330, the 1% domestic systemically important bank capital buffer applicable to NAB from 1 January 2016 is not disclosed in this table.



## 12.2 Level 2 Regulatory Balance Sheet

The table shows the NAB Group's Balance Sheet and the Level 2 Regulatory Balance Sheet.

			Level 2	
	NAB Group		Regulatory	
	Balance		Balance	
	Sheet		Sheet	Template
	As at		As at	Reference /
	30 Sep 16	Adjustments	30 Sep 16	Reconciliation
	\$m	\$m	\$m	Table
Assets				
Cash and liquid assets	30,630	(777)	29,853	
Due from other banks	45,236	-	45,236	
Trading derivatives	43,131	1,884	45,015	
Trading securities	45,971	(42)	45,929	
Debt instruments at fair value through other comprehensive income	40,689	-	40,689	
Investments relating to life insurance business	86	(86)	-	
Other financial assets at fair value	21,496	(15)	21,481	
Hedging derivatives	6,407	-	6,407	
Loans and advances	510,045	(49)	509,996	
Due from customers on acceptances	12,205	-	12,205	
Property, plant and equipment	1,423	(6)	1,417	
Goodwill and other intangible assets	5,302	(2,470)	2,832	Table A
Deferred tax assets	1,925	(595)	1,330	
Other assets	13,076	(2,475)	10,601	
Investment in non-consolidated entities	-	3,927	3,927	Table A
Due from controlled entities	-	1,826	1,826	
Total assets	777,622	1,122	778,744	
Liabilities				
Due to other banks	43,903	-	43,903	
Trading derivatives	41,654	3	41,657	
Other financial liabilities at fair value	33,224	-	33,224	
of which:				
Change in own credit worthiness	214	-	214	Row 14
Hedging derivatives	3,245	-	3,245	
Deposits and other borrowings	459,714	5	459,719	
Life policy liabilities	-	-	-	
Current tax liabilities	297	(13)	284	
Provisions	1,432	(150)	1,282	
Bonds, notes and subordinated debt	127,942	(3,561)	124,381	
Other debt issues	6,248	-	6,248	
Other liabilities	8,648	3,784	12,432	
Deferred tax liabilities	-	(20)	(20)	
Due to controlled entities	-	188	188	
Total liabilities	726,307	236	726,543	
Net assets	51,315	886	52,201	

# Pillar 3 report **2016**

	NAB Group Balance Sheet As at	Balance Sheet As at		Level 2 Regulatory Balance Sheet As at	Template Reference																		
	30 Sep 16 \$m	Adjustments \$m	30 Sep 16 \$m	Reconciliation Table																			
Equity	****	****	7																				
Issues and paid-up ordinary share capital	30,968	236	31,204	Row 1																			
Other contributed equity	3,317	-	3,317																				
Contributed equity	34,285	236	34,521																				
General reserve for credit losses	75	-	75																				
Asset revaluation reserve	83	-	83																				
Foreign currency translation reserve	(71)	(25)	(96)																				
Cash flow hedge reserve	143	-	143	Row 11																			
Equity-based compensation reserve	234	-	234																				
Debt instruments at fair value through other comprehensive income reserve	80	-	80																				
Equity instruments at fair value through other comprehensive income reserve	85	-	85																				
Other reserves	554	(25)	529	Row 3																			
Reserves	629	(25)	604																				
Retained profits	16,378	698	17,076	Row 2																			
Total equity (parent entity interest)	51,292	909	52,201																				
Non-controlling interest in controlled entities	23	(23)	-																				
Total equity	51,315	886	52,201																				



## 12.3 Reconciliation between the Common Disclosure Template and Level 2 Regulatory Balance Sheet

	As at 30 Sep 16	Template
Table A	\$m	Reference
Goodwill and other intangible assets	2,832	
Investment in non-consolidated entities	3,927	
Total	6,759	
Less		
DTL for other intangible assets	1	
Goodwill (net of related tax liability)	2,817	Row 8
Other intangibles other than mortgage-servicing rights (net of related tax liability)	2,390	Row 9
Net tangible assets of investment in non-consolidated entities	1,551	
Add		
Insignificant equity investment in financial institutions	395	
Total equity investment in financial institutions	1,946	Row 26d

## 12.4 Material Entities Excluded from Level 2 Regulatory Balance Sheet

## **Table 12.4A: Insurance and Fund Management Entities**

	As at 30 Sep 16		
	Total Assets	<b>Total Liabilities</b>	
	\$m	\$m	
Superannuation and Funds Management Entities			
National Wealth Management Holdings Limited	2,148	1,225	
National Australia Financial Management Limited	984	9	
MLC Holdings Limited	678	-	
MLC Investments Limited	156	47	

#### **Table 12.4B: Securitisation Entities**

	As at 30	) Sep 16
	Total Assets	<b>Total Liabilities</b>
	\$m	\$m
Titan NZ Funding Trust	242	242
Titan NZ (MRP Bonds) Trust	239	239



## 12.5 Countercyclical Capital Buffer

#### Table 12.5A: Countercyclical Capital Buffer - Private Sector Credit Exposures

The Basel III countercyclical capital buffer is calculated as the weighted average of the buffers in effect in the jurisdictions to which ADIs have private sector credit exposures and is calculated in accordance with APRA's prudential standard APS110: Capital Adequacy (Attachment C). Its primary objective is to use a buffer of capital to achieve the broader macroprudential goal of protecting the banking sector from periods of excess aggregate credit growth that have often been associated with the build-up of systemwide risk.

Private sector credit exposures are exposures (including non-banking financial sector exposures) that attract a credit risk capital charge or the risk-weighted equivalent trading book capital charge for specific risk, incremental risk and securitisation.

APRA may require an ADI to hold additional CET1 Capital of between zero and 2.5 per cent of total RWA, as a countercyclical capital buffer.

The table below provides the geographic breakdown, at country level, of the private sector credit exposures and the associated RWA values that are used to calculate the Level 2 Group's countercyclical capital buffer ratio.

As at 30 Sep 16 Countercyclical **ADI-specific** RWA **EAD** Buffer Capital Buffer % \$m \$m % Country Hong Kong 0.625 2,857 1,330 0.003 0.000 Norway 1.5 49 53 Sweden 1.5 311 150 0.001 Other (1) 803,891 306,691 0.000 Total 807,108 308,224 0.004

<sup>(1)</sup> Other' encompasses all other countries in jurisdictions to which the Level 2 Group has private sector credit exposures where the countercyclical capital buffer is zero or unannounced.

	As at 31 Mar 16			
	Countercyclical Capital Buffer	EAD	RWA	ADI-specific Buffer
	%	\$m	\$m	%
Country				
Hong Kong	0.625	3,210	1,434	0.003
Norway	1	55	53	0.000
Sweden	1	318	151	0.001
Other <sup>(1)</sup>	-	791,686	281,299	0.000
Total	-	795,269	282,937	0.004

<sup>(9)</sup> Other encompasses all other countries in jurisdictions to which the Level 2 Group has private sector credit exposures where the countercyclical capital buffer is zero or unannounced.



#### Remuneration

The NAB Group provides detailed information specific to senior executive remuneration in the *Remuneration Report* section of NAB's 2016 Annual Financial Report available online at www.nab.com.au.

This disclosure relates to senior managers and material risk takers of the Level 2 Group, for the financial year ended 30 September 2016 (referred to as 2016 throughout this section).

Individuals within this disclosure have been identified consistent with the definitions provided in paragraph 21 of *APS 330* and paragraph 59(a) and (c) of *Prudential Standard CPS 510 Governance* (CPS 510).

	Number of individuals (1)	Definition
Senior Managers	27	Members of the NAB Group Executive Leadership Team (ELT), senior managers who are members of the NAB GRRMC and business line Chief Risk Officers.
Material Risk Takers	31	Executives of the NAB Group who can substantially impact the financial performance and capital position of the Level 2 Group.

<sup>(1)</sup> There were 24 senior managers and 27 material risk takers identified for the 2015 disclosure.

#### 13.1 Remuneration Governance

The Remuneration Committee (the Committee) has been established by the Board. Its Charter (which is approved by the Board) sets out the membership, responsibilities, authority and activities of the Committee. The full Charter is available online at www.nab.com.au.

As at the date of this report, the Committee was comprised of four independent non-executive directors (including the Chairman of the Committee). The Committee met 13 times during 2016.

The Committee Chairman receives an annual fee of \$55,000 and other members of the Committee receive an annual fee of \$27,500 for membership of the Committee. The member fee increased from \$25,000 effective 1 January 2016.

#### **Use of External Advisers**

Where appropriate, the Committee seeks and considers advice directly from external advisers, who are independent of management.

The Committee retained 3 degrees consulting to review and provide recommendations and advice on remuneration and governance matters.

#### **Scope of Remuneration Policy**

The NAB Group operates a global remuneration policy (the Policy) that applies to NAB and all its controlled entities.

The Policy covers all employees, including senior managers and material risk takers. The NAB Group's overall philosophy is to adopt, where possible, a methodology, which links remuneration directly to the performance and behaviour of an employee, the NAB Group's results and shareholder outcomes.

#### **13.2 Remuneration Processes**

#### **Remuneration Policy**

The NAB Group's Policy uses a range of components to focus employees on achieving the NAB Group's strategy and business objectives. The Policy is designed to:

- · attract, recognise, motivate and retain employees
- · drive employee performance
- align the interests of employees and shareholders through ownership of NAB securities
- comply with jurisdictional remuneration regulations and the NAB Group's diversity, inclusion and pay equity commitments.

Remuneration consists of both fixed and variable components:

- fixed remuneration provided as cash and benefits (including employer superannuation)
- short-term performance-based variable remuneration reflecting both individual and business performance for the current year, supporting the longer-term strategy of the NAB Group
- long-term performance based variable remuneration reflecting the longer-term business performance of the NAB Group.

The mix of fixed and variable remuneration is balanced to ensure that fixed remuneration provides a sufficient level of remuneration so that the variable remuneration components can be fully flexible, including the possibility of paying no variable remuneration.

The remuneration mix at target is based on market information and practices. In any year, the actual mix may vary from target, given the overlay of business performance and individual performance.

Individual target remuneration must be approved by the Board for the ELT and any other senior executives of the NAB Group (as determined by the Board).

In addition, the Board will approve and monitor the remuneration framework for senior managers and material risk takers. Individual target remuneration for other senior managers and material risk takers is approved by the appropriate senior manager in line with the Policy.

More details on variable remuneration arrangements are provided in Section 13.4 Linking Performance and Remuneration and Section 13.5 Adjusting Remuneration for Longer-Term Performance.



#### Other features of the Policy

#### Malus

The Board has absolute discretion, subject to compliance with the law, to adjust any performance-based components of remuneration downwards, or to zero, to protect the financial soundness of the NAB Group. In addition, the Board may vary vesting of deferred incentives and long-term incentives if the NAB Group's financial performance or risk management have significantly deteriorated over the vesting period. A qualitative overlay may be applied that reflects the NAB Group's management of business risks, shareholder expectations and the quality of the financial results.

This discretion can be applied at any time and may impact unvested equity awards and performance-based remuneration yet to be awarded, whether in cash or equity. In exercising its discretion, the Board will consider whether the remuneration is appropriate given later individual or business performance. Malus may apply to any employees across the NAB Group, by division, by role and/or employee, depending on circumstances.

#### Clawback

In the UK, variable remuneration for some UK Material Risk Takers, including retention awards, is subject to clawback for up to 7 years from the award date.

The UK employees will be required to repay, up to the full amount, any performance-based remuneration, where the Board (in its absolute discretion) determines that one or more of the following circumstances have arisen before the seventh anniversary of the relevant award date:

- the employee has participated in, or was responsible for, conduct which resulted in significant losses to the NAB Group or relevant business
- the employee has failed to meet appropriate standards of fitness and propriety
- the NAB Group has reasonable evidence of employee misbehaviour or material error
- the NAB Group or the relevant business suffered a material failure of risk management, taking into account the employee's level of responsibility.

#### Minimum shareholding policy

Members of the ELT are required to accumulate and retain NAB equity over a five year period from commencement in an ELT role, to the value of two times fixed remuneration for the Group CEO and one times fixed remuneration for other senior executives.

Details of senior executive shareholdings in NAB are set out in NAB's 2016 Annual Financial Report available online at www.nab.com.au.

#### Commencement, retention and guaranteed incentives

Commencement awards enable buy-out of unvested equity from previous employment. The amount, timing and performance hurdles relevant to any such awards are based on satisfactory evidence. The awards are primarily provided in the form of shares or performance rights, subject to performance hurdles, restrictions and certain forfeiture conditions, including forfeiture on resignation,

unique to each offer. Guaranteed incentives or bonuses do not support the NAB Group's performance-based culture and are not provided as part of the Policy.

The NAB Group provides retention awards for key employees in roles where retention is critical over a medium-term timeframe (generally two to three years). These are normally provided in the form of shares or performance rights, subject to a restriction period, achievement of individual performance standards and forfeiture conditions, including forfeiture on resignation.

#### **Remuneration Policy Review**

The Committee reviewed the Policy during 2016 to ensure:

- that the Executive LTI performance hurdles support delivery of the One NAB Plan (see Section 13.4 Linking Performance and Remuneration - Executive Long-Term Incentive Plan for further information)
- the minimum amount of STI deferred is comparable to external peers.

#### **Risk and Financial Control Employees**

Risk and financial control employees (as defined in paragraph 59(b) of *CPS 510*) are critical to effective management of risk across the NAB Group.

Independence from the business for these employees is assured through:

- setting the remuneration mix so that variable remuneration is not significant enough to encourage inappropriate behaviours while remaining competitive with the external market
- the Risk or Finance function determining remuneration decisions, and not the business the employees support
- performance measures and targets set align with the NAB Group and/or are specific to the Risk or Finance function
- NAB Group performance and / or function performance being a key component for calculating employee variable remuneration.

The Committee reviews remuneration structures for these employees and oversees the overall remuneration outcomes for employees in these roles at least annually.



#### 13.3 Remuneration and Risk

Risk exists in every aspect of the business and throughout the NAB Group's operating environment. The NAB Group identifies and manages its risks as part of a Group-wide risk management framework. The risk management framework supports the successful implementation of the NAB Group's strategies and allows the NAB Group to run a sustainable, resilient business that is responsive to its changing environment. The NAB Group's remuneration strategy, performance and remuneration frameworks, policies and practices are designed to support the risk management framework and ensure employees are taking the right risk, with the right controls for the right return.

The NAB Group regularly assesses risks and controls, and undertakes stress testing and scenario analysis.

Assessing the risk profile aims to identify and understand the drivers of change, so that appropriate action can be taken to manage risk positions, within the Board approved risk appetite.

#### **Risk Measures**

A number of risk measures exist across each of the NAB Group's key categories of risk, including but not limited to:

Risk Category (1)	Definition	Key Measures
Credit	The potential that a customer will fail to meet their obligations to the NAB Group in accordance with agreed terms	- Economic capital limits - Credit concentration limits e.g. single large exposures, industries, and countries - Portfolio limits, settings and indicators in respect to credit quality having regard to probability of default, loss given default exposure at default, risk-weighted assets, and a range of more granular measures applicable to the nature of the credit risk (e.g. loan to valuation ratios, days past due, impairments and write-offs)
Operational	The risk of inadequate or failed internal processes and controls, people and systems or external events	- Economic capital limits - Operational risk limits in respect to risk event types (e.g. actual financial losses) - Additional risk limits, settings and indicators applicable to the nature of operational risk (eg. technology incidents, customer complaints, control effectiveness) - Operational Risk and Control Self-Assessment rating
Conduct	Intentionally or unintentionally treating the NAB Group's customers unfairly and delivering negative outcomes for customers, clients, counterparties, investors, shareholders and the markets in which the NAB Group operate resulting from inappropriate, unlawful or unethical judgementsmade during the execution of the NAB Group's business activities.	<ul> <li>Measured through specific operational risk, compliance risk and regulatory risk measures</li> </ul>
Balance Sheet and Liquidity	Risk relating to the NAB Group's banking book activities e.g. funding, liquidity, capital, interest rate risk in the banking book, equity and foreign exchange risk in the banking book	- Economic capital limits - VaR and EaR limits - Additional limits linked to a range of activities and risks (e.g. liquidity coverage ratio, customer and stable funding indexes, CET1 Capital)
Market	Adverse changes in fair value of positions arising from the NAB Group's trading book activities as a result of movement in 'risk factors' such as FX and interest rates, volatilities and credit spreads	Economic capital limits     Trading desk limits and settings (e.g. stop loss limits)     Globally diversified VaR and inner stress limits
Regulatory	Includes: - damaging the NAB Group's relationships with its regulators - failing to identify, monitor and implement changes in the legislative and regulatory environment, and of failing to take opportunities to shape the development of emerging legislative frameworks and/or to effectively implement the required changes	<ul> <li>- A range of risk limits reflecting prudential regulator ratings, significant conduct investigations, formal regulatory requirements and effective management of regulatory change (e.g. significant conduct investigations underway, failure to identify new regulatory changes)</li> </ul>
Strategic	Includes: -strategic positioning risk – the strategic choices made by the NAB Group and their ongoing attractiveness in response to, or in anticipation of, changes in the environment - strategic execution risk – failing to execute the chosen strategy	- Economic capital limits

Post the Nippon Partnership in October 2016, Life Insurance Risk is no longer considered a key category of material risk to the NAB Group. In addition, as a result of the demerger of NAB and CYBG Group in February 2016, Defined Benefit Pension Risk is no longer considered to be a key category of material risk to the NAB Group, as material pension schemes were only operated by the CYBG Group.

#### **Aligning Risk and Remuneration**

Variable remuneration outcomes reflect risk at a number of levels:

Individual scorecards – Employees have specific risk related measures relevant to their role and aligned with the NAB Group's Risk Appetite Statement and Divisional Risk Setting Statements where appropriate. The employee's performance against these risk measures is captured, in part, through the employee's variable remuneration. Employees who do not meet minimum performance requirements will not be eligible for variable remuneration.

Conduct Gate – Supports the NAB Group's risk culture. Employees have a responsibility to ensure they comply with Group policies, including the Group Securities Trading Policy and the Code of Conduct. In particular, the Group Securities Trading Policy specifically prohibits directors and employees from protecting the value of unvested securities (including unvested deferred variable remuneration) with derivative instruments. Directors and employees can protect the value of vested securities in limited circumstances. Employees who do not pass the conduct expectations of their role will have their variable remuneration reduced in part, or in full, depending on the severity of the breach and may not participate in the LTI



Plan and/or may have deferred STI and/or LTI forfeited/lapsed. They may also be subject to other disciplinary action.

**STI pool measures** – The financial measures used to determine the STI pool capture a number of material risks (see *Section 13.4 Linking Performance and Remuneration* for further discussion on how the financial measures take account of risk).

Risk adjustment of business outcomes – The Committee may recommend to the Board adjustment of the financial outcomes upon which variable remuneration is determined based on a qualitative overlay that reflects the NAB Group's management of business risks, shareholder expectations and the quality of the financial results.

During 2016, NAB Group's material risk categories were updated:

- Defined Benefit Pension risk was removed as no longer considered material on full divestment of CYBG PLC through a demerger and Initial Public Offering in February 2016
- Life Insurance was removed as no longer considered a material risk with the sale of 80% of NAB Wealth's life insurance business to Nippon Life Insurance Company with effect from September 2016
- Conduct risk has been identified as a distinct material risk category as it directs the Group's focus to customer outcomes.

#### 13.4 Linking Performance and Remuneration

Performance is linked to remuneration through both fixed and variable remuneration components.

Fixed remuneration is set based on a combination of the individual's capability and experience, market position (assessed against the relevant NAB fixed remuneration range), internal relativities, work performance and pay equity considerations.

#### **Short-Term Incentives**

STI is determined based on a combination of business and individual performance.

Business performance is measured by a mix of growth in cash earnings, cash Return on Equity (ROE), and Return on Total Allocated Equity (ROTAE). These measures reasonably capture the effects of a number of material risks and minimise actions that promote short-term results at the expense of longer-term business growth and success. The STI pool is calculated for the NAB Group using the following key performance measures:

Performance Measures	Weighting
- Group cash earnings	40%
- ROE	30%
- Group ROTAE	30%

An employee's individual performance is assessed against what they have delivered and how they have achieved the outcomes. An employee's scorecard defines performance measures and targets relevant to the employee's role that support delivery of the NAB Group's longer-term strategy.

A behavioural assessment and conduct requirements also form part of the employee's overall performance outcome.

Examples of performance measures used across the NAB Group in 2016 were:

	Example Performance Measures
Customer	- Customer Adocacy (Net Promoter Score) (1)
	- ROE
Shareholder	- Cash earnings
value	- Revenue
	- Expenses
	- Risk Appetite Statement and Divisional RSS
Risk	- Management of events/losses/breaches as incurred including material controllable events
	- Satisfies Prudential and Conduct requirements
	- 1st line risk accountabilities
	- Delivery of specific projects
Kay daliyarahlas	- Process/technology change
Key deliverables	- Employee engagement
	- Diversity and Inclusion

<sup>(1)</sup> Net Promoter Score® and NPS® are registered trademarks of Bain & Company, Satmetrix Systems and Fred Reichheld.

A portion of the STI is provided as deferred equity or deferred cash. This allows time to confirm that the initial business and individual performance outcomes are realised and if not, for the STI to be adjusted downwards.

STI plans link to the NAB Group and business performance by delivering smaller STI pools when performance is less than target and larger STI pools when performance is above target.

#### **Executive Long-Term Incentive Plan**

The Executive LTI Plan helps to drive management decisions concerning the long-term prosperity of the NAB Group. The Executive LTI Plan has four to five year performance periods.

The performance measures for the Executive LTI awarded in respect of 2016 are:

- NAB Group's cash ROE growth compared to the other three major Australian Banks (Australia and New Zealand Banking Group Limited, Commonwealth Bank of Australia and Westpac Group).
- NAB's TSR performance relative to the TSR performance of a selection of financial services companies in the S&P/ASX 200.

A list of the companies used for the LTI TSR performance measure can be found online at www.nab.com.au. NAB Group's cash ROE growth ranking and NAB's TSR ranking compared to the peer groups will determine the proportion of performance rights that will vest.

#### **Customer Advocacy Incentive Award**

Supporting NAB's focus on the customer, some executives received a share award during 2016, aimed to reward executives for NAB's customer advocacy outcomes. The award is restricted for approximately 2 years and the level of vesting is subject to achievement of NPS objectives set at the beginning of the performance period and service conditions.



#### **Adjustment of Remuneration**

Poor performance during a performance period will be reflected in the STI awarded or amount of LTI that vests at the end of the vesting period. If performance is significantly weak, this may result in no STI being awarded and/or no LTI vesting.

The Committee, in consultation with the BRC, reviews financial and risk outcomes at the end of the performance year and recommends to the Board, the size of the STI pool, taking into account a qualitative overlay that reflects the NAB Group's management of business risks (see *Section 13.3 Remuneration and Risk*), shareholder expectations and the quality of the financial results.

## 13.5 Adjusting Remuneration for Longer-Term Performance

Longer-term performance is reflected in the design of NAB Group's variable remuneration arrangements.

STI plans contain annual performance metrics that are set to achieve the NAB Group's longer-term strategy. Deferral of a portion of the STI reward allows for the reward to be adjusted after the initial performance assessment to reflect longer-term performance outcomes.

The NAB Group's LTI plan has a minimum four year performance period to align management decisions with the achievement of sustained positive performance by NAB Group.

#### **Deferral Arrangements**

STI rewards are subject to deferral for all senior managers and material risk takers depending on the STI plan and jurisdictional requirements:

Role Grouping	Deferral Arrangement (1)
ELT	50% of STI is deferred equally over 2 years LTI is deferred for no less than 4 years.
Senior Managers and Material Risk Takers (not in categories below)	25% of STI is deferred for 1 year
UK Senior Managers and Material Risk Takers earning more than £500,000 variable remuneration	60% of STI is deferred over 3 years
Other UK Senior Managers and Material Risk Takers on Group STI not meeting de minimis conditions (2)	40% of STI is deferred for 3 years
UK Senior Managers and Material Risk Takers on Financial Markets Specialist Incentive Plan who are EGMs or GMs and earning less than £500,000 variable remuneration	50% of STI deferred equally over 3 years
Other UK Senior Managers and Material Risk Takers on Financial Markets Specialist Incentive Plan	50% of STI deferred equally over 2 years

<sup>(1)</sup> Other deferral arrangements apply to employees not identified as senior managers or material risk takers.

Deferred STI amounts are generally provided in either shares or performance rights.

For UK Material Risk Takers, half of any 'up-front' cash STI payment is provided as equity subject to a six month retention period and a further six month retention period

applies to deferred STI and LTI after performance conditions have been satisfied. The retained amounts are restricted from being sold, transferred or exercised by the employee during the retention period. No further performance conditions apply to retention equity.

Deferred STI and unvested LTI may be further adjusted as described in Section 13.2 Remuneration Processes – Malus and Clawback.

Once an award has vested or the performance restrictions have ceased, no further adjustment or 'Malus' applies. Clawback may be applied to vested awards in the UK.

#### 13.6 Forms of Variable Remuneration

The NAB Group provides variable remuneration in the following forms:

Form	Use
	All or a portion of the STI award that relates to the current performance year
Cash	<ul> <li>Occasionally for deferred STI where an employee is entitled to receive deferred STI but has ceased employment with the NAB Group prior to allocation of any shares or performance rights</li> </ul>
	- Retention and recognition awards
	- Commencement awards.
	- Deferred STI (except as noted otherwise)
Shares	- General employee share offers
Silaies	- Retention and recognition awards
	- Commencement awards.
	Deferred STI for executives receiving an LTI award or for jurisdictional reasons
Performance rights	- LTI awards
	- Retention and recognition awards
	- Commencement awards.

Generally, the NAB Group aims to provide deferred STI and LTI awards as equity to align the interests of employees and shareholders. Performance rights are provided where NAB Group does not consider it appropriate to pay dividends during deferral or restriction periods.

The mix of different forms of variable remuneration is dependent on the employee's role and external market relativities.

All employees are eligible to participate in an STI plan. STI awards will generally be provided in a combination of cash and equity as described above in Deferral Arrangements (see Section 13.5 Adjusting Remuneration for Longer-Term Performance).

LTI awards are provided to senior executives of the NAB Group. Not all senior managers or material risk takers will participate in the LTI program. Senior managers and material risk takers who do not participate in the LTI program will generally receive deferred STI shares.

Retention, recognition and commencement awards are provided to an employee depending on circumstances. The quantum and form will vary depending on the specific circumstances at the time of the award.

<sup>(2)</sup> De minimis conditions are variable remuneration is no more than 33% of total remuneration and total remuneration is no more than £500,000.



#### 13.7 Quantitative Remuneration Disclosures

#### Table 13.7A: Total Value of Remuneration Awards

As at 30 Sep 16

As at 30 Sep 15

	Senior Managers Ma		Material Ris	k Takers	Senior Mai	Senior Managers		Material Risk Takers	
	Unrestricted	Deferred	Unrestricted	Deferred	Unrestricted	Deferred	Unrestricted	Deferred	
	\$000	\$000	\$000	\$000	\$000	\$000	\$000	\$000	
Fixed remuneration									
Cash-based (1)	17,784	-	15,666	-	18,503	-	14,662	-	
Other (2)	850	-	947	-	807	-	888	-	
Variable remuneration (3)									
Cash-based (4)	10,233	-	13,554	-	9,391	-	11,425	-	
Equity (5)	-	15,414	-	10,273	-	12,188	-	8,105	

<sup>(1)</sup> Includes cash salary, cash allowances, short-term compensated absences (such as annual leave entitlements accrued but not taken during the year), motor vehicle benefits, parking, relocation costs and other benefits (including any related fringe benefits tax).

Table 13.7B: Deferred Remuneration

	As at 30	Sep 16	As at 30	As at 30 Sep 15	
	Senior Managers			Material Risk Takers	
	\$000	\$000	\$000	\$000	
Total outstanding deferred remuneration (1)	48,608	19,802	48,738	21,963	
Cash-based	867	-	-	-	
Equity	47,742	19,802	48,738	21,963	
Paid out during the year (2)	7,577	7,602	8,116	12,121	
Reductions due to explicit adjustments (3)	(20,692)	(1,833)	(5,266)	(3,044)	
Reductions due to implicit adjustments	(1,083)	(1,494)	(269)	(325)	

<sup>(1)</sup> The value of deferred cash awards is the grant value and for deferred equity awards is the grant fair value. Outstanding deferred remuneration provided as shares and share-linked instruments is fully exposed to ex post explicit and/or implicit adjustments.

#### **Table 13.7C: Other Remuneration**

As at 30 Sep 16

As at 30 Sep 15

	Senior Managers		Material Risk Takers		Senior Managers		Material Risk Takers	
	No. of individuals	Total amount \$000	No. of individuals	Total amount \$000	No. of individuals	Total amount \$000	No. of individuals	Total amount \$000
Commencement awards (1)	2	3,676	1	2,035	1	1,002	2	551
Termination payments (2)	3	3,062	2	1,033	1	174	1	127

<sup>(1)</sup> The full value of these awards and payments is shown with no expensing adjustments made.

<sup>(2)</sup> Other fixed remuneration includes employer contributions to superannuation (in Australia and New Zealand) and National Insurance Contributions (in the UK) and long service leave entitlements accrued but not taken during the year. The long service leave entitlements are recognised as accruing on an annual basis subject to an actuarial calculation.

<sup>(3) 26 (2015: 24)</sup> senior managers and 30 (2015: 27) material risk takers received variable remuneration in respect of the relevant year. In 2016, some senior managers and material risk takers did not receive variable remuneration as they ceased employment with the NAB Group during the relevant year.

<sup>(4)</sup> The cash component of the STI received in respect of the relevant year.

<sup>(9)</sup> Equity includes all shares and share-linked instruments. Amounts are determined based on the grant date fair value amortised on a straight line basis over the expected vesting period. The amount shown is the portion relating to the relevant year accounting expense accrual and includes amounts relating to the relevant year and prior year awards.

<sup>[2]</sup> Includes the value of vested awards using the closing share price of NAB shares on the vesting date for all senior managers and material risk takers during the relevant year.

<sup>(3)</sup> Includes any reductions to awards as a result of forfeitures and lapses due to failure to meet performance hurdles, resignations, or malus adjustments for all senior managers and material risk takers during the relevant year. The value was calculated using the closing share price of NAB shares on the forfeiture or lapsing date.

<sup>(2)</sup> Termination payments are made in accordance with the relevant NAB Enterprise Agreement and/or the employee's employment agreement. Employees may also retain shares and performance rights in accordance with the relevant terms and conditions of each grant, which remain subject to the relevant performance hurdles and restriction periods. These arrangements are in line with the NAB Group's policy and practice in such circumstances.



#### 13.8 London Branch Remuneration Disclosures

The following quantitative disclosures are applicable to NAB's London Branch operations only. They have been prepared in accordance with Article 450 of the European Union Capital Requirements Regulation for the year ended 30 September 2016. All monetary amounts are in GBP.

Individuals included in this section of the disclosure meet the following definitions:

<b>UK Material Risk Takers</b>	Roles
Senior Management	Includes senior management of NAB's London Branch operations and NAB Group senior management who have significant management accountability for NAB's London Branch operations.
Other Material Risk Takers	Includes employees performing Significant Influence Functions, employees who have responsibility and accountability for activities that could have a material impact on London Branch's risk profile, and employees in independent risk management, compliance or internal audit function roles.

#### Table 13.8A: Aggregate Remuneration of Material Risk Takers by Operating Segment

	London Branch	Control Function(1)	Total
Number of Material Risk Takers	36	17	53
Total remuneration (£000)	11,883	5,971	17,854

<sup>(1)</sup> Includes Risk, Internal Audit and Compliance employees.

#### **Table 13.8B: Total Value of Remuneration Awards**

	Senior Management	Other Material Risk Takers	Total
Number of Material Risk Takers	28	25	53
	Senior Management	Other Material Risk Takers	Total
	0003	£000	£000
Fixed remuneration	8,546	4,596	13,142
Variable remuneration (cash)	1,386	980	2,366
Variable remuneration (retained shares)	422	201	623
Deferred remuneration (equity) (1)	1,009	714	1,723
Deferred remuneration (cash) (f)	-	-	-
Total variable remuneration	2,817	1,895	4,712
Total remuneration	11,363	6,491	17,854

<sup>&</sup>lt;sup>(1)</sup> The NAB Group provides all deferred remuneration in Company equity or cash.

#### **Table 13.8C: Deferred Remuneration**

	Senior Management	Other Material Risk Takers	Total
	£000	£000	000£
Outstanding - vested	94	70	164
Outstanding - unvested	3,498	1,904	5,402
Awarded during the year	1,767	773	2,541
Vested during the year	1,900	647	2,548
Reductions during the year through performance adjustments	(26)	-	(26)

#### **Table 13.8D: Other Remuneration**

	Senior Management <sup>⑴</sup>	Other Material Risk Takers <sup>(1)</sup>
Termination payments (£000)	470	248
Number of beneficiaries	2	2
Highest award to a single beneficiary (£000)	275	134

<sup>(1)</sup> No sign-on bonuses, commencement or retention awards were provided to senior managers or material risk takers during 2016.



## Table 13.8E: Remuneration by Band

Remuneration band (£000) (1)	Number of Material Risk Takers
851 - 1,277	2
Less than 851	51
Total	53

<sup>(1)</sup> Total remuneration has been calculated including fixed remuneration, allowances, variable remuneration in relation to the performance year, and fees for non- executive directors.

Variable remuneration includes the annual short-term incentive and the long-term incentive award in respect of the 2016 financial year. Bands have been converted using a rate of 1

Euro = £0.8517, consistent with the European Commissions' currency converter for September 2016.



## **Glossary**

Term	Description
ABCP	Asset-Backed Commercial Paper being a form of commercial paper that is collateralised by other financial assets. It is a short-term debt instrument created by an issuing party (typically a bank or other financial institution).
Additional regulatory provisions	That portion of collective provisions covering facilities where any assessment of probability of default or loss would give rise to a reasonable expectation that the facilities in question will need in the short term to be subject to a write-down or write-off, or assessment for impairment on an individual facility basis.
ADI	Authorised Deposit-taking Institution.
Additional Tier 1 Capital	Additional Tier 1 Capital comprises high quality components of capital that satisfy the following essential characteristics: (a) provide a permanent and unrestricted commitment of funds; (b) are freely available to absorb losses; (c) rank behind the claims of depositors and other more senior creditors in the event of winding up of the issuer; and (d) provide for fully discretionary capital distributions
Advanced IRB approach (IRB)	The Advanced Internal Ratings Based (IRB) approach refers to the processes employed by the NAB Group to estimate credit risk.  This is achieved through the use of internally developed models to assess potential credit losses using the outputs from the PD, LGD and EaD models.
AMA	Advanced Measurement Approach (AMA) is the risk estimation process used for the NAB Group's operational risk. It combines internally developed risk estimation processes with an integrated risk management process, embedded within the business with loss event management.
ANZSIC	Australian and New Zealand Standard Industrial Classification.
APRA	Australian Prudential Regulation Authority.
APS	Prudential Standards issued by APRA applicable to ADIs.
Alternative Liquid Assets (ALA)	Alternative liquid assets are made available in jurisdictions where there is insufficient supply of HQLA in the domestic currency to meet the aggregate demand of banks with significant exposures in the domestic currency in the Liquidity Coverage Ratio (LCR) framework. The Committed Liquidity Facility (CLF) provided by the Reserve Bank of Australia to Australian banks is treated as an ALA in the LCR.
Alternative Standardised Approach (ASA)	Alternative Standardised Approach is the risk estimation process used for the NAB Group's operational risk.
	Back-testing refers to the process undertaken to monitor performance of the NAB Group's risk models. Historical data is used to compare the actual outcomes to the expected outcomes.
Back-testing	Theoretical (or hypothetical) back-testing refers to the process whereby the trading positions at the end of the preceding day are revalued using the end-of-day rates for that day and then again at the succeeding day's closing rates. The difference between the two mark-to-market values of the portfolio which represents the profit and loss that would have occurred had there been no transactions on the day, is compared with the VaR. VaR is also compared with the actual daily traded profit and loss as a cross-check of the reasonableness of the theoretical portfolio movement.
Basel Accord	The Basel regulatory framework (which includes Basel II, Basel 2.5 and Basel III) is the global benchmark for assessing banks' capital adequacy. The guidelines are aimed at promoting a more resilient banking system through the development of capital adequacy standards that are more accurately aligned with the individual risk profile of institutions, by offering greater flexibility for supervisors to recognise and encourage the use of more sophisticated risk management techniques.
Board	Board of Directors of NAB.
BRC	Board Risk Committee.
Capital adequacy	Capital adequacy is the outcome of identifying and quantifying the major risks the NAB Group is exposed to, and the capital that the NAB Group determines as an appropriate level to hold for these risks, as well as its strategic and operational objectives, including its target credit rating.
Cash earnings	Cash earnings is defined as net profit attributable to owners of NAB from continuing operations, adjusted for the items NAB considers appropriate to better reflect the underlying performance of the NAB Group. Cash earnings for the September 2016 full year has been adjusted for the following:  - Distributions  - Treasury shares  - Fair value and hedge ineffectiveness  - Life insurance economic assumption variation  - Amortisation of acquired intangible assets  - Sale and demerger transaction costs.
Cash Return on Equity (ROE)	Cash ROE is calculated as cash earnings divided by average shareholders' equity, excluding non-controlling interests and other equity instruments and adjusted for treasury shares.
CDO	Collateralised Debt Obligation.
Central Counterparty (CCP)	A clearing house which interposes itself, directly or indirectly, between counterparties to contracts traded in one or more financial markets, becoming the buyer to every seller and the seller to every buyer.
CLO	Collateralised Loan Obligation.
Committed Liquidity Facility (CLF)	The Reserve Bank of Australia will establish a committed liquidity facility (CLF) as part of Australia's implementation of the Basel III liquidity reform, which will provide high-quality liquidity to commercial banks to assist them in meeting the Basel III liquidity requirements.
Common Equity Tier 1 (CET1) Capital	Common Equity Tier 1 (CET1) Capital is recognised as the highest quality component of capital. It is subordinated to all other elements of funding, absorbs losses as and when they occur, has full flexibility of dividend payments and has no maturity date. It is predominately comprised of common shares; retained earnings; undistributed current year earnings; as well as other elements as defined under APS111 - Capital Adequacy: Measurement of Capital.
Conduct Gate	All employees must satisfy threshold measures for compliance which reflect a range of internal and external regulatory requirements.
Corporate (including SME)	Corporate (including SME) consists of corporations, partnerships or proprietorships not elsewhere classified and includes non-banking entities held by banks.

Term	Description
Credit derivatives	Credit derivatives include single-name credit default and certain total rate of return swaps, cash funded credit linked notes and first-to-default and second-to-default credit derivative basket products. ADIs may also recognise many more complex credit derivatives that do not fall into the list above, that have been approved by APRA.
Credit derivative transactions	In relation to securitisation exposures, credit derivative transactions are those in which the credit risk of a pool of assets is transferred to the NAB Group, usually through the use of credit default swaps.
Credit enhancements	Credit enhancements are arrangements in which the NAB Group holds a securitisation exposure that is able to absorb losses in the pool, providing credit protection to investors or other parties to the securitisation. A first loss credit enhancement is available to absorb losses in the first instance. A second loss credit enhancement is available to absorb losses after first loss credit enhancements have been exhausted.
Credit Value Adjustment (CVA)	A capital charge to reflect potential mark-to-market losses due to counterparty migration risk on bilateral OTC derivative contracts.
The Credit Risk function	All areas reporting directly to EGM Enterprise Risk & Chief Credit Officer including Operational Risk & Compliance, Risk Appetite & Analytics, Credit Risk, Risk Governance and Strategic Business Services.
Default Fund	Clearing members' funded or unfunded contributions towards, or underwriting of, a CCP's mutualised loss sharing arrangements.
Derivative transactions	In relation to securitisation exposures, derivative transactions include interest rate and currency derivatives provided to securitisation SPVs, but do not include credit derivative transactions.
EaD	Exposure at Default (EaD) is an estimate of the total committed credit exposure expected to be drawn at the time of default for a customer or facility that the NAB Group would incur in the event of a default. It is used in the calculation of RWA.
Earnings at Risk (EaR)	Earnings at Risk (EaR) is a mathematical technique that uses statistical analysis of historical data to estimate the likelihood that a given portfolio's net interest margin losses will exceed a certain amount over a 12 month period.
Economic capital	Economic capital represents the NAB Group's internal assessment of the amount of capital required to protect against potential unexpected future losses arising from its business activities, in line with its target credit rating.
Economic profit	Economic profit represents cash earnings less capital costs whereby capital costs is allocated equity multiplied by the cost of equity.
ELE	The Extended Licensed Entity (ELE) comprises the ADI itself and any APRA approved subsidiary entities assessed as effectively part of a single 'stand-alone' entity, as defined in <i>Prudential Standard APS 222 Associations with Related Entities</i> .
Eligible financial collateral	Eligible financial collateral, under the standardised approach, will be the amount of cash collateral, netting and eligible bonds and equities. Eligible financial collateral, under the IRB approach, for corporate, sovereign and bank portfolios, is limited to the collateral items detailed in <i>paragraphs 4</i> and 23 of <i>Attachment G</i> of <i>APS 112</i> . Recognition of eligible financial collateral is subject to the minimum conditions detailed in that same Attachment, paragraph 6.
ESG Risk	Environmental, Social and Governance Risk.
Fair value	The price that would be received to sell an asset or paid to transfer a liability in an orderly transaction between market participants at measurement date.
Foundation IRB (FIRB)	Foundation Internal Ratings Based (FIRB) approach refers to an alternative approach to advanced IRB defined under the Basel Accord where a Group develops its own PD models and seeks approval from its regulator to use these in the calculation of regulator capital, and the regulator provides a supervisory estimate for LGD and EaD.
General Reserve for Credit Losses (GRCL)	The general reserve for credit losses (GRCL) is an estimate of the reasonable and prudent expected credit losses over the remaining life of the portfolio and on non-defaulted assets. The reserve is a compliance requirement under APS 220 - Credit Quality. The GRCL is calculated as a collective provision for doubtful debts, excluding securitisation and provision on default no-loss assets. The difference between the GRCL and accounting collective provision is covered with an additional top-up, created through a transfer from retained earnings to a reserve, to reflect losses expected as a result of future events that are not recognised in the NAB Group's collective provision for accounting purposes.
GRCL calculation methodology	The GRCL is calculated as a collective provision for doubtful debts, excluding securitisation and provision on default no-loss assets. The difference between the GRCL and accounting collective provision is covered with an additional top-up, created through a transfer from retained earnings to reflect losses expected as a result of future events that are not recognised in the NAB Group's collective provision for accounting purposes. All collective provisions on defaulted or otherwise non-performing assets, regardless of expected loss, are reported as additional regulatory specific provisions.
GRRMC	Group Risk Return Management Committee.
Guarantees	Guarantors under the standardised approach are recognised according to APS 112 Attachment F paragraph 3. The secured portion of an exposure is weighted according to the risk weight appropriate to the guarantor and the unsecured portion is weighted according to the risk weight applicable to the original counterparty (Refer to Attachment A for the appropriate risk weights). Under the IRB approach, for corporate, sovereign and bank portfolios, the ADI may recognise credit risk mitigation in the form of guarantees and credit derivatives according to the FIRB substitution approach where an ADI uses supervisory estimates of LGD (refer to APS 113 Attachment B paragraph 49), an AIRB substitution approach where the ADI has approval from APRA to use its own estimates of LGD (refer to APS 113 Attachment B paragraph 60) and, for certain exposures, a double default approach (refer to APS 113 Attachment B paragraph 67). An ADI may decide, separately for each eligible exposure, to apply either the relevant substitution approach or the double default approach. For retail portfolios there are two approaches for the recognition of credit risk mitigation in the form of guarantees and credit derivatives under the retail IRB approach, a substitution approach (refer to APS 113 Attachment C paragraph 19) and, for certain exposures, a double default approach (refer to APS 113 Attachment C paragraph 28). An ADI may decide separately for each eligible exposure to apply either the substitution approach or the double default approach.
High Quality Liquid Assets (HQLA)	HQLA refers to high quality liquid assets determined in accordance with APS 210 Liquidity (APS210). These assets include notes and coins, central bank reserves and highly rated marketable securities issued or guaranteed by central banks or governments.
IAA	Internal Assessment Approach.
ICAAP	Internal Capital Adequacy Assessment Process (ICAAP) is the mechanism developed and used by the NAB Group to determine capital requirements as outlined under Basel III. It results in the NAB Group identifying and assessing all risks to which it is exposed and allocating an appropriate level of capital to each.
IFRS	International Financial Reporting Standards.
IMA	Internal Model Approach (IMA) describes the approach used in the assessment of traded market risk. The NAB Group uses, under approval from APRA, the IMA to calculate general market risk for all transactions in the trading book other than those covered by the Standard Method.

Term	Description
	Impaired facilities consist of: - Retail loans (excluding unsecured portfolio managed facilities) which are contractually past due 90 days with security insufficient to
	cover principal and arrears of interest revenue
Impaired facilities	- Non-retail loans which are contractually past due and there is sufficient doubt about the ultimate collectability of principal and
	interest; and - Impaired off-balance sheet credit exposures where current circumstances indicate that losses may be incurred.
	- Unsecured portfolio managed facilities are also classified as impaired assets when they become 180 days past due (if not written off).
	Investment earnings (net of tax) on shareholders' retained profits and capital from life businesses, net of capital funding costs, IoRE is comprised of three items:
	- Investment earnings on surplus assets which are held in the Statutory Funds to meet capital adequacy requirements under the Life
Investment earnings on Retained Earnings (IoRE)	Insurance Act 1995 (Cth);
. totalilou Lairiiligo (loi tL)	<ul> <li>Interest on deferred acquisition costs (net of reinsurance) included in insurance policy liabilities resulting from the unwind of discounting; and</li> </ul>
	Less the borrowing costs of any capital funding initiatives.
IoRE discount rate variation	The profit impact of a change in value of deferred acquisition costs (net of reinsurance) included in insurance policy liabilities
	resulting from a movement in the inflation adjusted risk-free discount rate.  The internal ratings based (IRB) approach refers to the processes employed by the NAB Group to estimate credit risk. This is
IRB approach	achieved through the use of internally developed models to assess the potential credit losses using the outputs from the probability of
	default, loss given default and exposure at default models.
IRRBB	Interest rate risk in the banking book.
Level 2 Group	The Level 2 Group, being NAB and the entities it controls subject to certain exceptions set out in Section 2 Scope of Application of this report.
Level 3 conglomerate Group	Contains APRA-regulated entities with material operations across more than one APRA-regulated industry and/or unregulated entities.
	The Leverage Ratio is a simple, transparent; non-risk based supplementary measure that use exposures to supplement the risk-
Leverage Ratio	weighted assets based capital requirements and is prepared in accordance with APRA's <i>Prudential Standard APS110: Capital Adequacy.</i>
LGD	Loss Given Default (LGD) is an estimate of the expected severity of loss for a credit exposure following a default event. Regulatory LGDs reflect a stressed economic condition at the time of default. It is used in the calculation of RWA.
	LCR is a new measure announced as part of the Basel III liquidity reforms that came into force on 1 January 2015. The ratio
Liquidity Coverage Ratio (LCR)	measures the amount of high quality liquid assets held that can be converted to cash easily and immediately in private markets, to total net cash flows required to meet the NAB Group's liquidity needs for a 30 day calendar liquidity stress scenario.
1 to 1 die 1 fee die 1	Liquidity facilities are provided by the NAB Group to an SPV for the primary purpose of funding any timing mismatches between
Liquidity facilities	receipts of funds on underlying exposures and payments on securities issued by the SPV (asset liquidity facilities), or to cover the inability of the SPV to roll over ABCP (standby liquidity facilities).
Loan to value ratio	Loan to Value Ratio (LVR) is the ratio between the loan and value of the security provided.
Masterscale	Masterscale is a consistent series of grades applied to credit exposures that allows the NAB Group to place every credit exposure into a specific grade or range that represents the likelihood of a credit default. This allows comparison of customers and portfolios.
NAB	National Australia Bank Limited ABN 12 004 044 937.
NAB Group	NAB and its controlled entities.
	NPS is a customer advocacy measure used in many industries, including financial services. NPS measures how likely a customer
	would be to recommend NAB to a friend or colleague. It is based on one key question: 'On a scale of 0 - 10, how likely would you be to recommend NAB to your friend or colleague?' The overall score is calculated by subtracting the percentage of customers that
	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous
Net Promoter Score (NPS)	
Net Promoter Score (NPS)	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.
Net Promoter Score (NPS)	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous
Net Promoter Score (NPS)	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for
	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for Business customers.  NSFR is a measure announced as part of the Basel III liquidity reforms that will apply from January 2018. The ratio establishes a minimum acceptable amount of stable funding (the portion of those types and amounts of equity and liability financing expected to be
Net Promoter Score (NPS)  Net Stable Funding Ratio (NSFR)	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for Business customers.  NSFR is a measure announced as part of the Basel III liquidity reforms that will apply from January 2018. The ratio establishes a minimum acceptable amount of stable funding (the portion of those types and amounts of equity and liability financing expected to be reliable sources of funds over a one-year time horizon under conditions of extended stress) based on the liquidity characteristics of
Net Stable Funding Ratio	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for Business customers.  NSFR is a measure announced as part of the Basel III liquidity reforms that will apply from January 2018. The ratio establishes a minimum acceptable amount of stable funding (the portion of those types and amounts of equity and liability financing expected to be
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Net Stable Funding Ratio (NSFR)	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for Business customers.  NSFR is a measure announced as part of the Basel III liquidity reforms that will apply from January 2018. The ratio establishes a minimum acceptable amount of stable funding (the portion of those types and amounts of equity and liability financing expected to be reliable sources of funds over a one-year time horizon under conditions of extended stress) based on the liquidity characteristics of an ADI's assets and activities over a one-year horizon. Finalised requirements are still to be outlined by the Basel Committee and APRA.
Net Stable Funding Ratio (NSFR)  Net write-offs	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for Business customers.  NSFR is a measure announced as part of the Basel III liquidity reforms that will apply from January 2018. The ratio establishes a minimum acceptable amount of stable funding (the portion of those types and amounts of equity and liability financing expected to be reliable sources of funds over a one-year time horizon under conditions of extended stress) based on the liquidity characteristics of an ADI's assets and activities over a one-year horizon. Finalised requirements are still to be outlined by the Basel Committee and APRA.  Write-offs on loans at amortised cost and Fair Value loans net of recoveries.
Net Stable Funding Ratio (NSFR) Net write-offs Non-retail credit	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for Business customers.  NSFR is a measure announced as part of the Basel III liquidity reforms that will apply from January 2018. The ratio establishes a minimum acceptable amount of stable funding (the portion of those types and amounts of equity and liability financing expected to be reliable sources of funds over a one-year time horizon under conditions of extended stress) based on the liquidity characteristics of an ADI's assets and activities over a one-year horizon. Finalised requirements are still to be outlined by the Basel Committee and APRA.  Write-offs on loans at amortised cost and Fair Value loans net of recoveries.  Non-retail credit broadly refers to credit exposure to business customers. It excludes retail credit defined below.
Net Stable Funding Ratio (NSFR)  Net write-offs Non-retail credit Non-traded book	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for Business customers.  NSFR is a measure announced as part of the Basel III liquidity reforms that will apply from January 2018. The ratio establishes a minimum acceptable amount of stable funding (the portion of those types and amounts of equity and liability financing expected to be reliable sources of funds over a one-year time horizon under conditions of extended stress) based on the liquidity characteristics of an ADI's assets and activities over a one-year horizon. Finalised requirements are still to be outlined by the Basel Committee and APRA.  Write-offs on loans at amortised cost and Fair Value loans net of recoveries.  Non-retail credit broadly refers to credit exposure to business customers. It excludes retail credit defined below.  Non-traded book refers to the investment in securities held by the NAB Group through to maturity.
Net Stable Funding Ratio (NSFR)  Net write-offs Non-retail credit Non-traded book The Operational Risk function	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for Business customers.  NSFR is a measure announced as part of the Basel III liquidity reforms that will apply from January 2018. The ratio establishes a minimum acceptable amount of stable funding (the portion of those types and amounts of equity and liability financing expected to be reliable sources of funds over a one-year time horizon under conditions of extended stress) based on the liquidity characteristics of an ADI's assets and activities over a one-year horizon. Finalised requirements are still to be outlined by the Basel Committee and APRA.  Write-offs on loans at amortised cost and Fair Value loans net of recoveries.  Non-retail credit broadly refers to credit exposure to business customers. It excludes retail credit defined below.  Non-traded book refers to the investment in securities held by the NAB Group through to maturity.  All areas reporting directly to the General Manager, Operational Risk and Compliance.  Past due facilities ≥ 90 days consist of well-secured assets that are more than 90 days past due and portfolio-managed facilities that are not well secured and between 90 and 180 days past due.  A performance right is a right to acquire one NAB ordinary share, once the performance right has vested based on achievement of
Net Stable Funding Ratio (NSFR)  Net write-offs Non-retail credit Non-traded book The Operational Risk function	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for Business customers.  NSFR is a measure announced as part of the Basel III liquidity reforms that will apply from January 2018. The ratio establishes a minimum acceptable amount of stable funding (the portion of those types and amounts of equity and liability financing expected to be reliable sources of funds over a one-year time horizon under conditions of extended stress) based on the liquidity characteristics of an ADI's assets and activities over a one-year horizon. Finalised requirements are still to be outlined by the Basel Committee and APRA.  Write-offs on loans at amortised cost and Fair Value loans net of recoveries.  Non-retail credit broadly refers to credit exposure to business customers. It excludes retail credit defined below.  Non-traded book refers to the investment in securities held by the NAB Group through to maturity.  All areas reporting directly to the General Manager, Operational Risk and Compliance.  Past due facilities ≥ 90 days consist of well-secured assets that are more than 90 days past due and portfolio-managed facilities that are not well secured and between 90 and 180 days past due.  A performance right is a right to acquire one NAB ordinary share, once the performance right has vested based on achievement of the related performance hurdle or at the Board's discretion. Each performance right entitles the holder to be provided with one NAB
Net Stable Funding Ratio (NSFR)  Net write-offs Non-retail credit Non-traded book The Operational Risk function	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for Business customers.  NSFR is a measure announced as part of the Basel III liquidity reforms that will apply from January 2018. The ratio establishes a minimum acceptable amount of stable funding (the portion of those types and amounts of equity and liability financing expected to be reliable sources of funds over a one-year time horizon under conditions of extended stress) based on the liquidity characteristics of an ADI's assets and activities over a one-year horizon. Finalised requirements are still to be outlined by the Basel Committee and APRA.  Write-offs on loans at amortised cost and Fair Value loans net of recoveries.  Non-retail credit broadly refers to credit exposure to business customers. It excludes retail credit defined below.  Non-traded book refers to the investment in securities held by the NAB Group through to maturity.  All areas reporting directly to the General Manager, Operational Risk and Compliance.  Past due facilities ≥ 90 days consist of well-secured assets that are more than 90 days past due and portfolio-managed facilities that are not well secured and between 90 and 180 days past due.  A performance right is a right to acquire one NAB ordinary share, once the performance right has vested based on achievement of
Net Stable Funding Ratio (NSFR)  Net write-offs Non-retail credit Non-traded book The Operational Risk function	answer 6 or below ('defractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for Business customers.  NSFR is a measure announced as part of the Basel III liquidity reforms that will apply from January 2018. The ratio establishes a minimum acceptable amount of stable funding (the portion of those types and amounts of equity and liability financing expected to be reliable sources of funds over a one-year time horizon under conditions of extended stress) based on the liquidity characteristics of an ADI's assets and activities over a one-year horizon. Finalised requirements are still to be outlined by the Basel Committee and APRA.  Write-offs on loans at amortised cost and Fair Value loans net of recoveries.  Non-retail credit broadly refers to credit exposure to business customers. It excludes retail credit defined below.  Non-traded book refers to the investment in securities held by the NAB Group through to maturity.  All areas reporting directly to the General Manager, Operational Risk and Compliance.  Past due facilities ≥ 90 days consist of well-secured assets that are more than 90 days past due and portfolio-managed facilities that are not well secured and between 90 and 180 days past due.  A performance right is a right to acquire one NAB ordinary share, once the performance right has vested based on achievement of the related performance hurdle or at the Board's discretion. Each performance right entitles the holder to be provided with one NAB ordinary share subject to adjustment for capital actions. A performance right entitles the holder to be provided with one NAB ordinary share subject to adjustment
Net Stable Funding Ratio (NSFR)  Net write-offs Non-retail credit Non-traded book The Operational Risk function Past due facilities ≥ 90 days	answer 6 or below ('detractors') from the percentage of customers that answer 9 or 10 ('promoters'). NPS allows for continuous customer feedback providing a greater understanding of what matters to customers to improve the customer experience.  While the segments referenced are NAB defined customer segments, the score is derived using industry provided survey data from Roy Morgan Research for Consumer customers and the Business Financial Services Monitor provided by DBM Consulting for Business customers.  NSFR is a measure announced as part of the Basel III liquidity reforms that will apply from January 2018. The ratio establishes a minimum acceptable amount of stable funding (the portion of those types and amounts of equity and liability financing expected to be reliable sources of funds over a one-year time horizon under conditions of extended stress) based on the liquidity characteristics of an ADI's assets and activities over a one-year horizon. Finalised requirements are still to be outlined by the Basel Committee and APRA.  Write-offs on loans at amortised cost and Fair Value loans net of recoveries.  Non-retail credit broadly refers to credit exposure to business customers. It excludes retail credit defined below.  Non-traded book refers to the investment in securities held by the NAB Group through to maturity.  All areas reporting directly to the General Manager, Operational Risk and Compliance.  Past due facilities ≥ 90 days consist of well-secured assets that are more than 90 days past due and portfolio-managed facilities that are not well secured and between 90 and 180 days past due.  A performance right is a right to acquire one NAB ordinary share, once the performance right has vested based on achievement of the related performance hurdle or at the Board's discretion. Each performance right entitles the holder to be provided with one NAB ordinary share subject to adjustment for capital actions. A performance right is issued at no charge to the employee employee and there is no exercise price to be
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Term	Description
PD	Probability of Default (PD) is an estimate of the likelihood of a customer defaulting or not repaying their borrowings and other obligations to the NAB Group in the next 12 months.
Point in Time	Point in Time (PiT) within this document refers to risk models that estimate the likelihood of default and resulting loss over a 12-month period having regard to the current economic conditions.
Qualifying revolving retail exposures	For the purposes of regulatory reporting, credit cards are referred to as qualifying revolving retail.
RBA	Reserve Bank of Australia.
Regulatory capital	Regulatory capital is the total capital held by the NAB Group as a buffer against potential losses arising from the business the NAB Group operates in. Unlike economic capital, it is calculated based on guidance and standards provided by the NAB Group's regulators, including APRA. It is designed to support stability in the banking system and protect depositors.
Regulatory expected loss	Regulatory Expected Loss (EL) is a calculation of the estimated loss that may be experienced by the NAB Group over the next 12 months. Regulatory EL calculations are based on the PD, LGD and EaD values of the portfolio at the time of the estimate which includes stressed LGDs for economic conditions. As such, regulatory EL is not an estimate of long-run average expected loss.
Resecuritisation	Resecuritisation exposures are securitisation exposures in which the risk associated with an underlying pool of exposures is transhed and at least one of the underlying exposures is a securitisation exposure. In addition, an exposure to one or more resecuritisation exposures is a resecuritisation exposure.
Retail credit	For the purposes of managing credit, two broad categories are used: retail credit and non-retail credit. This reflects the different approaches to the sales and ongoing management of credit and is consistent with the approach required under the Basel Accord. Retail credit refers to the credit provided to retail or personal customers. For the purposes of regulatory capital, retail credit is categorised into four groups: residential mortgages, credit cards (or qualifying revolving credit), retail SME and other.
Return on Total Allocated Equity (ROTAE)	ROTAE is a function of cash earnings, combined divisional RWA (and by capital adequacy for Wealth Management) and target regulatory capital ratios.
Risk appetite	Risk appetite defines the level of risk the NAB Group is prepared to accept as part of its business. The resulting level of risk is a direct input into the NAB Group's capital requirements.
Risk Management Framework (RMF)	NAB identifies and manages risk using the RMF.
Risk-Weighted Assets (RWA)	A quantitative measure of the NAB Group's risk, required by the APRA risk-based capital adequacy framework, covering credit risk for on- and off-balance sheet exposures, market risk, operational risk and interest rate risk in the banking book.
RMC	Risk Management Committee.
Securities	Securities include the purchase of securitisation debt securities for either trading or banking book purposes.
Securitisation	Structured finance technique which involves pooling, packaging cash-flows and converting financial assets into securities that can be sold to investors.
Senior executives	Persons who are (or were) members of the Executive Leadership Team, including executive directors.
Senior managers	Consistent with paragraph 21 of APS 330 and paragraph 59(a) of Prudential Standard CPS 510 Governance (CPS 510), senior managers are Responsible Persons under the NAB Group's Fit and Proper Policy, including members of the NAB Group Executive Leadership Team, senior managers who are members of the NAB GRRMC and business line Chief Risk Officers. Non-executive directors of the NAB Group and NAB's appointed auditor are excluded.
	London Branch senior managers are defined in Section 13.8.
SME	Small and medium sized enterprises.
SGA	Specialised Group Assets.
Specific provisions	Specific provisions for prudential purposes include all provisions for impairment assessed on an individual basis in accordance with IFRS excluding securitisation.
Sponsor	The entity that establishes the securitisation SPVs including ABCP conduits and often provides other services.
Standardised approach	Standardised refers to an alternative approach to the assessment of risk (notably credit and operational) whereby the institution uses external rating agencies to assist in assessing credit risk and/or the application of specific values provided by regulators to determine RWA.
Statutory Fund	A Statutory Fund is a fund that is established in the records of a life company; and relates solely to the life insurance business of NAB or a particular part of that business.
Stress testing	Stress testing refers to a technique whereby the NAB Group's capital position is assessed against a number of different scenarios used to determine the movement on expected losses and subsequent impact on capital.
Through the cycle	Through the Cycle (TtC) within this document refers to risk models that estimate the likelihood of default and resulting loss over a 12-month period having regard to the impact of an economic downturn.
Tier 1 Capital	Tier 1 Capital comprises Common Equity Tier 1 (CET1) Capital and instruments issued by the NAB Group that meet the criteria for inclusion as Addition Tier 1 capital set out in APS111 - Capital Adequacy: Measurement of Capital
Tier 1 Capital ratio	Tier 1 Capital as defined by APRA divided by RWA.
Tier 2 Capital	Tier 2 Capital includes other components of capital that, to varying degrees, fall short of the quality of Tier 1 Capital but nonetheless contribute to the overall strength of an ADI and its capacity to absorb losses.
Tier 2 Capital ratio	Tier 2 Capital as defined by APRA divided by RWA.
Total Capital	Total capital is the sum of Tier 1 capital and Tier 2 capital, as defined by APRA.
Total Capital ratio	Total capital ratio is the sum of Tier 1 capital and Tier 2 capital, as defined by APRA, divided by risk-weighted assets.
Total Shareholder Return (TSR)	Total Shareholder Return (TSR) is a concept used to compare the performance of different companies' securities over time. It combines share price appreciation and dividends paid to show the total return to the shareholder. The absolute size of the TSR will vary with stock markets, but the relative position reflects the market perception of overall performance relative to a reference group.
Traded book	Traded book refers to the NAB Group's investment portfolio that is traded or exchanged in the market from time to time that reflects market opportunities.
Value at Risk (VaR)	Value at Risk (VaR) is a mathematical technique that uses statistical analysis of historical data to estimate the likelihood that a given portfolio's losses will exceed a certain amount.
Warehouse facilities	Warehouse facilities are lending facilities provided by the NAB Group to an SPV for the financing of exposures in a pool. These may be on a temporary basis pending the issue of securities or on an on-going basis.
Write-offs	Write-offs represent credit losses in accordance with accounting rules.
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