

A new macro-prudential policy framework for New Zealand – final policy position

1.0 Background

1. During March and April, the Reserve Bank undertook a public consultation on its proposed framework for macro-prudential policy. The [consultation document](#) solicited views on the proposed objectives, instruments and decision-making framework and the potential costs of using macro-prudential policy instruments.
2. The consultation provided useful feedback which is reflected in the new base framework for macro-prudential policy, and which will inform the detailed technical design of the macro-prudential instruments over the coming months.
3. A [Memorandum of Understanding](#) has recently been signed between the Governor of the Reserve Bank and the Minister of Finance, which formalises the objectives, instruments and governance of the macro-prudential policy framework.
4. This paper provides details of the agreed framework. The Reserve Bank has identified a number of further issues arising from the consultation, which are outlined in Section, and in the [response to submissions](#) (PDF 207KB). These will be reviewed once the base framework is in place.

2.0 The objective of macro-prudential policy

5. The objective of the Reserve Bank's macro-prudential policy is to increase the resilience of the domestic financial system and counter instability in the domestic financial system arising from credit, asset price or liquidity shocks. The instruments of macro-prudential policy are designed to provide additional buffers to the financial system (e.g. through changes in capital, lending and liquidity requirements) that vary with the macro-credit cycle. They may also help dampen extremes in the credit cycle and capital market flows. As such, these instruments can play a useful secondary role in stabilising the macro-economy. As a result, the Reserve Bank will consider any interaction with monetary policy settings when implementing macro-prudential policy and will explain the implications, if any, for monetary policy.
6. Sections 1A(1)(b) and 68 of the Reserve Bank of New Zealand Act 1989 (the 'Act') establish the purpose for the implementation of macro-prudential regulations on registered banks in New Zealand, which is to promote the maintenance of a sound and efficient financial system. The powers to implement or adjust countercyclical capital buffers, the minimum core funding ratio, sectoral capital requirements and restrictions on loan-to-value ratios for residential lending are referred to under section 78 of the Act.
7. The implementation of any of the instruments listed above would be undertaken under section 74 of the Act, under which the Reserve Bank is able to impose conditions of registration on registered banks.

3.0 The instruments of macro-prudential policy

8. The following prudential instruments can be deployed in the pursuit of macro-prudential policy objectives in New Zealand:

- The countercyclical capital buffer
- Adjustments to the core funding ratio
- Adjustments to sectoral capital requirements
- Quantitative restrictions on the share of high loan-to-value ratio loans to the residential property sector.

3.1 The countercyclical capital buffer

9. The countercyclical capital buffer (CCB) framework is an additional capital requirement that may be applied in times when excess private sector credit growth is judged to be leading to a build-up of system-wide risk. The CCB framework applies to all locally incorporated banks i.e. banks which have their own balance sheet in New Zealand. The foreign parent of a bank branch that is operating in New Zealand, or an offshore bank lending directly to New Zealand borrowers, may choose to hold the CCB against its New Zealand exposures if it follows the reciprocity provisions envisaged under Basel III.¹

10. The CCB framework aims, during the credit cycle upswing, to provide the banking system with an additional cushion against subsequent losses or sharp increases in risk-weighted assets that may be associated with an economic downturn or significant financial system distress. Release of the CCB in these circumstances will help banks to meet regulatory capital requirements without having to cut back on lending to creditworthy borrowers.

11. When risks to the New Zealand financial system are judged to be low, the CCB will be set to zero. However, in times of excessive private sector credit growth, banks may be required to hold the CCB, which will provide the banking system with an extra layer of high quality capital (common equity). The CCB rate is typically expected to range up to 2.5 percent of risk-weighted assets; however, the Reserve Bank may impose a higher CCB if circumstances warrant.

12. There are three main ways in which banks can meet the CCB requirement:

- i. they can reduce their voluntary capital buffers, leaving overall capital ratios unchanged;
- ii. they can raise capital, through equity issues or higher retained earnings;
- iii. they can reduce risk-weighted assets, by reducing exposures (including lending) or rebalancing away from higher risk-weighted assets.

13. It is expected that the primary role of the CCB will be to meet the objective of increasing financial system resilience, although it may have some influence on dampening extremes in the credit cycle through its effect on overall funding costs. While feedback from banks suggests some may choose to meet a CCB by reducing their voluntary buffers others noted that their internal policies would require them to raise extra capital, which would result in an aggregate increase in financial system buffers.

¹ The Basel III reciprocity arrangements are designed to help maintain a level playing field between banks that are regulated locally (including the subsidiaries of the Australian parent banks) and foreign banks that are not regulated by the local supervisor (such as the branches of foreign banks operating in New Zealand). Under reciprocity, the CCB that would apply to each bank at a consolidated level would reflect the geographic composition of its portfolio, i.e. a weighted average of buffers across the group's global operations.

3.2 Adjustments to the core funding ratio

14. The baseline minimum core funding ratio (CFR) requires banks to source at least 75 percent of their funding from retail deposits, long-term wholesale funding or capital. Adjustments to the CFR would vary the proportion of stable funding required to fund a given amount of lending over the cycle. The CFR applies to all locally incorporated banks.

15. CFR adjustments are intended to reduce the vulnerability of the banking sector to disruptions in funding markets, by increasing the 'stickiness' of funding during times of market pressure and reducing rollover risk on the stock of wholesale funding.

16. A CFR tightening (an upward adjustment of the CFR) would increase system resilience by increasing the use of stable funding, and could also help lean against the credit cycle. Conversely, when there is a significant deterioration in external funding market conditions, a CFR easing (a downward adjustment of the CFR) might be appropriate. Such adjustments to the CFR would provide a safety valve for the system, so that in times of prolonged funding market stress, the CFR requirement does not unduly constrain the flow of credit in the economy or force excessive adjustment to market conditions via bank deleveraging. In some circumstances, it may be appropriate for the minimum CFR to temporarily fall below the baseline minimum.

3.3 Sectoral capital requirements

17. Adjustments to sectoral capital requirements (SCR) would require banks to hold extra capital against a specific sector or segment in which excessive private sector credit growth is judged to be leading to a build-up of system-wide risk. They are similar to a targeted version of the CCB. SCR would apply to all locally incorporated banks.²

18. As with the CCB, SCRs work by providing a temporary additional cushion against potential loan losses but to a particular sector. In addition, they could alter the relative attractiveness of lending to the targeted sector. Banks might decide to reduce their exposures to the sector if faced with a higher cost of funding. Alternatively, should banks pass on any increased funding cost, a rise in borrowing costs would help reduce demand for credit in the targeted sector.

19. Requiring banks to hold extra capital against exposures to a particular sector also sends a strong message to banks and market participants about the riskiness of lending to that sector. It is expected that banks would review their credit practices and pricing policies in that sector, which could see some tightening in credit conditions. Expectations of slower credit growth may flow through to asset price expectations, helping mitigate speculative demand.

20. SCRs would typically be applied through a sectoral capital overlay (SCO) that is calibrated as a proportion of banks' risk-weighted exposures to the sector, say for housing lending or agricultural lending. In some cases however, such as targeting of a particular lending segment such as high-LVR housing lending, they might be applied through overlays to sectoral risk weights (SRW). When sectoral risks are judged to be acceptable, there will be no macro-prudential SCR in effect.

² Reciprocity arrangements for foreign bank branches that are operating in New Zealand, or an offshore bank lending directly to New Zealand borrowers, will be determined in due course in discussion with the home supervisors.

21. SCRs applied via risk-weights would be part of the minimum regulatory capital requirement, whereas a capital add-on would be treated in the same way as the CCB.

3.4 Quantitative restrictions on the share of high loan-to-value ratio loans to the residential property sector

22. Quantitative restrictions would typically take the form of 'speed limits' which restrict the share of new high loan-to-value ratio (LVR) lending that banks may undertake. They could also take the form of outright limits on the proportion of the value of the residential property that can be borrowed. LVR restrictions would apply to all banks registered in New Zealand.

23. A 'speed limit' would limit the share of new high-LVR lending to the residential property sector that can be undertaken above a given LVR threshold. For example, only 10 percent of new residential property lending might be permitted with an LVR above 90 percent.

24. An outright limit would mean that banks would not be able to undertake any high-LVR residential property lending above a given threshold. For example, zero new residential property lending permitted with an LVR above 90 percent. This can also be thought of as a speed limit of zero.

25. Tiered limits might also be used. For example, only 10 percent of new residential property lending might be permitted with an LVR above 85 percent, only 5 percent of new residential property lending might be permitted with an LVR above 90 percent, and zero new residential property lending permitted with an LVR above 100 percent.

26. Unlike the other macro-prudential instruments, the primary impact of LVR restrictions is likely to be on the credit cycle. Financial system resilience might also be enhanced indirectly, by increasing the average amount of collateral held against housing loans (i.e. reducing borrower leverage). In addition, restrictions on high-LVR lending would require banks to substantially modify their lending practices, potentially resulting in a significant tightening of lending standards.

27. LVR restrictions are a blunt instrument, in that they would affect all high-LVR borrowing against residential property. While reasonably broad application is necessary to maximise effectiveness, the Reserve Bank has identified two potential ways of mitigating the potential efficiency costs. The first is through the use of speed limits rather than outright limits. The second is through the limited use of exemptions.

28. Speed limits would allow banks to continue to provide some high-LVR loans to creditworthy borrowers (e.g. individuals with low net worth but strong current or future debt servicing capacity), and have been broadly preferred in banks' submissions. Speed limits would also reduce the incentives for disintermediation and avoidance, since banks would still be able to undertake some high LVR lending.

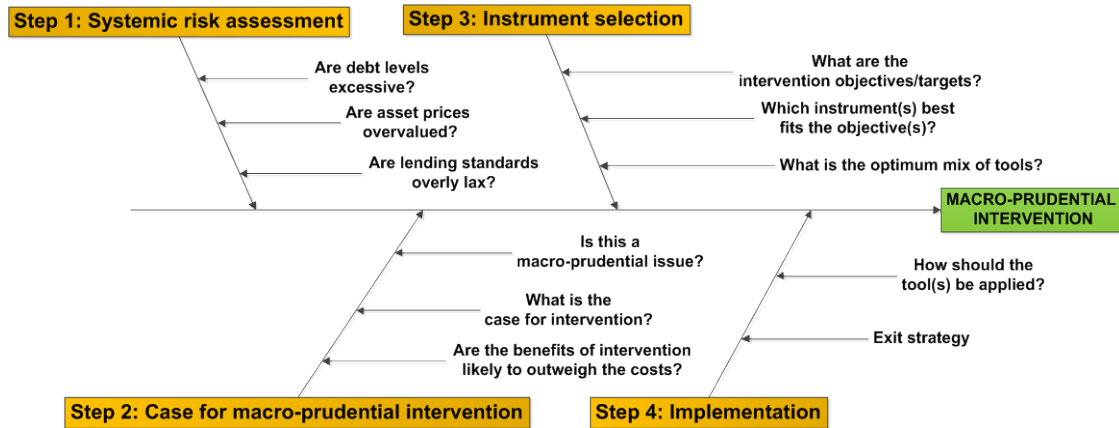
29. Exemptions will be permitted for high-LVR lending under Housing New Zealand's Mortgage Insurance Scheme (MIS), including the Welcome Home Loan scheme and Kainga Whenua program. MIS loans are intended to meet government housing policy objectives and present minimal risks to financial stability, as any bank losses are either underwritten or guaranteed by Housing New Zealand.

4.0 The decision-making process

30. There are four key steps to the macro-prudential policy process (Figure 1).

Figure 1

The macro-prudential decision framework



4.1 Systemic risk assessment

31. The risk assessment process focuses on whether debt levels and asset price imbalances are, or are likely to become, excessive and whether lending standards may be deteriorating. A critical judgement will be whether these indicators are deteriorating or improving. In reaching judgements on these matters a range of quantitative (statistical) and qualitative information will be consulted (refer Table 1).

Table 1

Examples of macro-prudential indicators

Type of indicator	Macro-prudential indicator	Financial condition
Macroeconomic	Credit	Leverage and credit market conditions
	Household credit	Leverage and credit market conditions
	Business Credit	Leverage and credit market conditions
	Agricultural credit	Leverage and credit market conditions
	Government debt	Leverage
Banking sector	Capital adequacy (actual)	Balance sheet strength
	Non-performing loans	Asset quality
	Sectoral watchlist loans*	Asset quality
	High-LVR lending	Leverage and risk appetite
Market-based	House prices	Asset market conditions
	Commercial property prices	Asset market conditions
	Farm prices	Asset market conditions
	Market funding spreads	Funding and credit market conditions
Qualitative	Bank lending standards	Risk appetite

* Household, business and agriculture sectors

32. The indicator set is likely to vary over time, with the risk assessment being supplemented by market and supervisory intelligence, and stress tests of banking sector resilience. The Reserve Bank will publish guidance on the indicators and judgements that

underlie its macro-prudential policy decisions in its regular *Financial Stability Reports*. Given the broad range of factors shaping financial system risk, the Reserve Bank does not believe it will be able to publish simple thresholds or trigger points for decisions. The Reserve Bank's capacity to pre-specify these matters is also constrained by the dynamic and innovative nature of the financial system, and the limited state of knowledge on macro-prudential policy, which is a new policy area internationally. This means there is a strong role for policymaker judgement in the process, unlike monetary policy where measurable outcomes and two decades of experience have underpinned the evolution of a more rules oriented framework.

4.2 Case for macro-prudential intervention

33. In assessing the case for macro-prudential intervention, the first step will be an assessment of whether other policy responses might be appropriate. The existence of imbalances might not warrant a macro-prudential response if the imbalances could be better addressed through other policies.

34. In normal circumstances, the baseline prudential regime should be sufficient to manage risks associated with the normal ups and down of the economic and financial cycles. Capital and funding requirements in particular aim to ensure that banks have sufficient buffers to cope with through-the-cycle funding and asset quality shocks. However, a macro-prudential adjustment might still be required to address risks arising from procyclicality in the financial system and the tendency for credit and asset price cycles to become mutually reinforcing. Such an approach may also be required to manage serious disjunctures between the New Zealand financial cycle and the international cycle, when for example, there are major changes in international funding market conditions.

35. The other major policy function of the Reserve Bank is monetary policy. Monetary policy takes account of developments in credit and asset prices, as these can be expected to have a bearing on inflation pressures in the economy. In general, a macro-prudential policy tightening and a monetary policy tightening are likely to be mutually reinforcing in terms of their impact on the credit cycle and on the inflation outlook. The Reserve Bank will take into account the interactions between monetary policy and macro-prudential policy adjustments when reaching its policy decisions. However, circumstances resulting in a macro-prudential policy adjustment will not necessarily be accompanied by an adjustment to monetary policy as the objectives of each function are different. For example, while rapid credit and asset price growth may necessitate macro-prudential policy measures for financial stability reasons, they might not lead to monetary policy adjustments if CPI inflation pressures remain in check.

36. Prior to macro-prudential policy adjustments, it is expected that the Reserve Bank will clearly communicate its concerns around the emerging risks to financial stability. Explaining and discussing these risks to banks and the public will be important, as in some cases this may help to change behaviour without recourse to additional prudential measures.

37. The final step would be a broad assessment of the potential costs of macro-prudential intervention relative to the expected benefits. The main benefit of a more stable financial system is reduced risk of financial crisis and associated output losses. The Global Financial Crisis has demonstrated that failures in the financial system can result in significant economic disruption, placing households and business under severe stress, as well as placing considerable pressure on governments' fiscal resources. As outlined in Section 3, macro-prudential instruments, through creating additional capital and liquidity buffers, and mitigating extremes in the financial cycle, can contribute to the overall stability of the financial system, and reduce the likelihood of crisis.

38. These potential system-wide benefits will be weighed carefully against the potential issues associated with a macro-prudential tightening. Examples of costs and implementation issues might include:

- a. Risks of avoidance and the administrative costs associated with implementing and enforcing the instruments. The use of some macro-prudential instruments, such as restrictions on high-LVR lending, will require the compilation and collection of additional data on lending patterns (although these would be desirable for risk assessment reasons anyway). In addition these instruments will need to be vigorously enforced and monitored in order to reduce avoidance;
- b. Efficiency costs and other unintended consequences associated with regulation or restrictions. Instruments such as LVR restrictions could impede some viable borrowers' access to home ownership, including small businesses, and may have broader distributional and equity effects;
- c. Possible financial sector disintermediation whereby lending shifts to lenders not subject to the instrument. The Reserve Bank believes that the risks of disintermediation will be mitigated partly by its intention to use the instruments in a temporary and occasional fashion; also that disintermediation does not matter for the objective of increasing financial system resilience provided the lenders are not part of the core New Zealand financial system (e.g. if they are offshore).
- d. External market conditions – instruments such as the CFR or CCB may be less effective in leaning against credit growth if global funding spreads become compressed and bank funding is plentiful;
- e. The possibility that banks might choose to reduce voluntary buffers (funding or capital) to meet the macro-prudential tightening, and on the downswing, that banks might be reluctant to eat into released buffers for fear of stigma. The latter risk is expected to be partly mitigated by the fact that the release would be system-wide, and driven by systemic rather than idiosyncratic (bank-specific) events.

4.3 Instrument selection

39. When selecting an appropriate macro-prudential instrument, an important consideration will be the effectiveness of the instrument in meeting the policy objectives given the particular risks facing the financial system at that time. As noted above, the objectives of macro-prudential policy are increasing the resilience of the domestic financial system and countering instability in the domestic financial system arising from credit, asset price or liquidity shocks. It is possible that the weight accorded to each of these objectives may vary across time.

40. In some cases, the optimum response might involve using more than one instrument. For example, during a credit boom it might be appropriate to not only constrain the build-up of leverage in the banking system with the CCB but also to target high risk borrowing more directly (e.g. through the use of LVR restrictions).

41. The potential benefits of the instrument will need to be weighed against the specific costs of intervention, including any distortions to the financial system or potential leakages. The general considerations outlined in Section 4.2 of this paper will be weighed in the context of the specific instrument. This process would also draw on feedback received during the consultation process on potential risks and costs associated with the various

instruments.³ Should a decision to intervene be made, the Reserve Bank would publish the case for intervention, including its assessment of the expected costs and benefits. Macro-prudential policy is a new field and we would expect international techniques and perspectives on costs and benefits to develop over time as countries gain more experience in the use of such instruments. We expect to assimilate and learn from this in terms of our own framework.

4.4 Implementation

42. The Reserve Bank favours a discretionary and relatively simple approach to implementation. Macro-prudential instruments will not be applied in a formulaic manner; they will be applied in a forward looking manner; and they will not be applied in manner that frustrates existing loan agreements that apply to concrete purchase and sale contracts.

43. In times of financial crisis, a priority will be to ensure that the flow of credit is not unduly constrained, subject to the banking system remaining adequately capitalised. For example, a CCB would be 'released' when there were clear signs that the credit cycle had peaked in order to allow institutions to draw on the extra capital during the subsequent downturn.

44. Macro-prudential instruments will be operationalised via changes to the *Banking Supervision Handbook* (BSH) and banks' Conditions of Registration (COR), with the normal consultation processes applying. The BSH changes will set out the base framework for each tool, including the necessary information for banks to be able to pre-position their procedures, policies and processes for tool deployment, and to train their staff. The lead time for such changes will in part reflect the time required for pre-positioning.

45. Table 2 contains the indicative notice periods for imposition of a macro-prudential requirement via banks' conditions of registration. Whereas the BSH will describe the base framework, the COR will specify the calibrations. This could be the size of a CFR increase or capital requirement, or high-LVR thresholds and quantitative limits. The notice periods balance the need to act in a timely fashion so as to reduce the potential for pre-emptive avoidance, and the need to provide a reasonable time for banks to meet the requirement. It should be noted that the Reserve Bank will have the discretion to lengthen the notice period for LVR restrictions beyond two weeks should this appears necessary due to bank system constraints or other reasons.

Table 2

Indicative notice periods for macro-prudential instruments

Instrument	Notice period
Countercyclical capital buffers	Up to twelve months
Sectoral capital requirements	Up to three months
Adjustments to core funding ratio	Up to six months
Restrictions on high-LVR housing lending	At least two weeks

³ Refer to the [response to submissions](#) (PDF 207KB) for further discussion of the costs, benefits and risks associated with the various macro-prudential tools.

5.0 Governance and accountability

46. As outlined in the [Memorandum of Understanding](#) between the Governor of the Reserve Bank and the Minister of Finance, the Reserve Bank would consult with the Minister of Finance ahead of making macro-prudential policy decisions and keep the Minister regularly informed of any conditions that might warrant a future macro-prudential policy response. However, final policy decisions would rest with the Governor of the Reserve Bank. The Bank would account publicly for its assessments and decisions, primarily in its regular six-monthly *Financial Stability Reports*.

6.0 Potential refinements to the macro-prudential framework

47. The summary of submissions identifies a number of areas that may warrant further work.

48. Two areas are being explored to determine feasibility for inclusion in the base framework:

- tightening the definitions of key residential lending concepts such as “residential mortgage”, “origination event”, “valuation”, so as to reduce the potential for gaming of LVR restrictions,
- whether it is possible to operate LVRs so that refinancing of pre-existing high LVR loans is exempt, on the condition that the loan amount and LVR are not increased, and whether it might also be possible to allow borrowers to ‘transfer’ their LVR when selling and buying a home, again on the condition that the loan amount and LVR do not increase.

49. The following areas are not in scope for the implementation of the base framework, but may form part of the Reserve Bank’s future work program:

- extending the macro-prudential regulatory framework to the non-bank sector, particularly with regard to LVR restrictions,
- strengthening the existing framework for monitoring the non-bank lending sector (aka shadow banking sector),
- reviewing the economic case for and against exempting some borrowers, such as first-home buyers,
- reviewing the economic case for and against the application of LVR restrictions on a regional basis,
- the case for incorporating debt-servicing capacity into the macro-prudential framework.⁴

⁴ Refer [response to submissions](#) (PDF 207KB) for further details.