BANK NEGARA MALAYSIA
CENTRAL BANK OF MALAYSIA

Financial Stability Review

First Half

2021

BANK NEGARA MALAYSIA
CENTRAL BANK OF MALAYSIA

Preface

This Financial Stability Review – First Half 2021 provides Bank Negara Malaysia's assessment on current and potential risks to financial stability and the resilience of the Malaysian financial system to sustain its financial intermediation role in the economy. It also reports on any actions that have been taken to manage risks to financial stability and contains box article(s) on topics of special interest.

This publication is intended to promote greater awareness on issues and developments affecting financial stability.

This document uses data available up to 30 June 2021, unless otherwise stated.

The Financial Stability Review - First Half 2021 is available in Portable Document Format (PDF) at www.bnm.gov.my

Contents

Key Highlights on
Financial Stability Review – First Half 2021

Domestic financial stability continues to be firmly supported by a resilient financial sector

Healthy capital and liquidity buffers enable banks to ensure continued support for economic recovery

18.4%
Total capital ratio
(Dec '20: 18.9%)

149%
Liquidity Coverage Ratio
(Dec '20: 148%)

RM127b
Excess capital buffers
(Dec '20: RM133 billion)

Insurers and takaful operators remain well-capitalised, with sustained underwriting performance

221%
Capital adequacy ratio
(Dec '20: 220%)

RM37b
Excess capital buffers
(Dec '20: RM36 billion)

Banks further increased buffers to absorb potential credit losses, in line with prudent provisioning practices

54%
Higher provisions relative to pre-pandemic level

1.8%
Total provisions-to-total loans
(Dec '20: 1.7%)

129%
Loan loss coverage ratio (including regulatory reserves)
(Dec '20: 129%)

- Early triggers used to indicate a significant increase in credit risks
- More conservative provisioning model parameters
- Increased application of management overlays

Stress tests affirm resilience of the banking system to withstand adverse economic and financial shocks

Most household borrowers continue to have sufficient financial buffers, although some borrowers are facing greater financial stress

Financial buffers of overall households remained intact

2.2 times
Financial assets-to-debt[1]
(Dec '20: 2.2 times)

1.5 times
Liquid financial assets-to-debt[1]
(Dec '20: 1.5 times)

Repayment assistance continues to support distressed borrowers

Simulations suggest **11-15%** of household borrowers may need to **draw down on financial buffers to service debt**

Of which, only 1.9% are at risk of depleting their cash or deposit buffers

12.8% of household loan accounts were under repayment assistance

Note: Estimation on simulated income and employment shocks excludes the impact of policy measures to ease borrowers' cashflows

Sound underwriting standards have maintained prudent debt service ratios among households

Median Debt Service Ratios

Newly-approved loans **41%**
(Dec '20: 43%)

Outstanding loans **35%**
(Dec '20: 35%)

[1] Prudent threshold is one time

Source: Bank Negara Malaysia

Businesses have partly recovered, but continue to face headwinds amid the uneven economic recovery

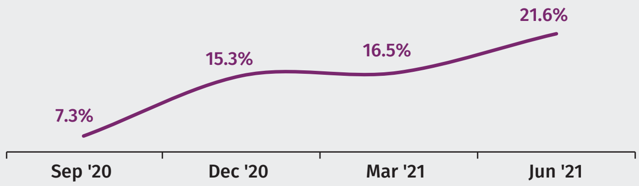
Larger businesses continued to strengthen buffers amid a recovery in earnings

Business Sector Indicators[2]

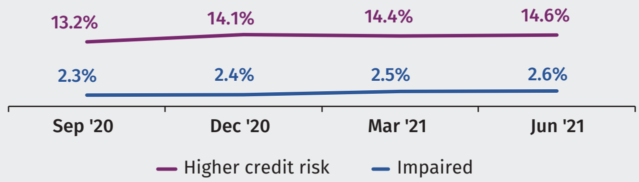
Operating margin	6.3%	*(4Q '20: 5.2%)*
Cash-to-short-term debt ratio	1.4 times	*(4Q '20: 1.4 times)*
Debt-to-equity ratio	21.9%	*(4Q '20: 22.5%)*
Interest coverage ratio	5.4 times	*(4Q '20: 4.9 times)*

SMEs have been more affected but recent increase in credit risk remains modest amid sustained policy support

Share of SME Loan Exposures under Repayment Assistance



Share of SME Loan Exposures Classified as Higher Credit Risk[3] **and Impaired**



Bank lending continued to support financing needs of SMEs, with additional capacity from various financing support measures

6% *(Dec '20: 9.6%)*	Overall SME loan growth	*1H '21:* **RM154b** *(2H '20: RM137b)*	SME loan disbursements exceeded pre-COVID levels *(2017-19 avg.: RM150b)*
RM309b *(Dec '20: RM305b)*	Total outstanding SME financing by banks	**77.3%** *(Dec '20: 73.3%)*	Approval rate for SME loans

Financing support and credit guarantees via Danajamin PRIHATIN Guarantee Scheme, Credit Guarantee Corporation Malaysia Berhad, Syarikat Jaminan Pembiayaan Perniagaan Berhad

BNM's Fund for SMEs e.g. Targeted Relief and Recovery Facility, PENJANA Tourism Financing

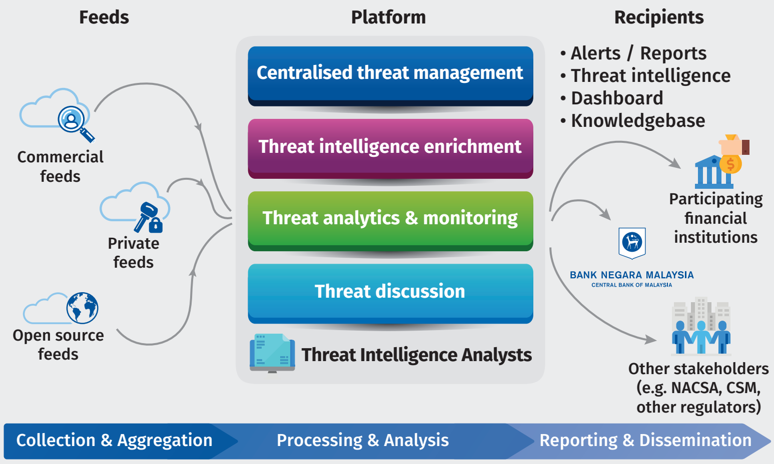
Note: Figures are as at June 2021, unless otherwise specified

Managing risks from information technology disruptions and cyber-attacks continues to be a high priority for the financial sector

Measures taken by financial institutions to strengthen operational and cyber resilience

- Ongoing enhancements to business continuity and disaster recovery plans
- Strengthened collaborative arrangements to detect and respond to cyber threats
- Strengthened internal policies and oversight arrangements for third party service providers
- Continuous review of the adequacy of controls to protect confidential data under extended remote working arrangements

Deployment of Financial Sector Cyber Threat Intelligence Platform (FinTIP) will further support the financial sector's cyber response capabilities



[2] Data as at 1Q 2021; Prudent thresholds for cash-to-short-term debt ratio and interest coverage ratio are one time and two times, respectively
[3] As measured by loans classified by banks under Stage 2 based on MFRS 9

Source: Bank Negara Malaysia and S&P Capital IQ

Overview

Overview

Risks to financial stability have remained contained even as a resurgence of COVID-19 infections and lagging vaccine rollouts, especially in many emerging markets, weighed on the recovery of the global economy in the first half of 2021. Policymakers around the world continue to finely balance the need to maintain exceptional policy support for the economy given the outlook that remains clouded by the pandemic, and avoid a build-up of future vulnerabilities from stretched asset valuations, increased risk-taking and higher private sector leverage amid an extended period of low interest rates. Expectations of normalisation of monetary policy in advanced economies could increase risks for financial systems where the recovery has yet to gain a firm footing and vulnerabilities are more pronounced.

In Malaysia, domestic financial stability continues to be firmly supported by a resilient financial sector. The ramp up of provisions in 2020 has provided banks with some headroom this year to moderate the amount of additional provisions set aside for credit losses, and supported a recovery in profitability. This enabled banks to further extend debt repayment assistance to households and businesses that were affected by the most recent movement restrictions, while sustaining lending activities. Similarly, insurers and takaful operators generally remain profitable and well-placed to assist individuals and businesses by providing flexibilities for premium and contribution payments that would preserve their protection coverage. In the domestic financial markets, conditions have remained orderly. This is further supporting overall funding conditions for banks and corporates. Domestic bond yields could see continued upward pressure from the higher incoming government bond supply and a further rise in US Treasury yields reflecting improvements in US economic prospects. However, the impact on the profitability and capital positions of banks and insurers and takaful operators is expected to be manageable, even under scenarios of larger-than-expected yield movements.

Business sector performance began to recover heading into the second quarter of 2021 amid the easing of movement restrictions. The share of firms-at-risk has declined from earlier peaks seen in 2020, although it remains higher than the average pre-pandemic levels due to continued challenges faced by firms in sectors that have been harder hit by movement restrictions. Overall business leverage has also improved in line with higher debt repayments by firms. The re-imposition of stricter nationwide containment measures towards the end of the second quarter of 2021 could, however, see some of these financial improvements set back, particularly among smaller firms in the construction and services sectors, while prolonging difficulties that were already challenging firms in the tourism-related industries. This could lead to a renewed pressure on the debt-servicing capacity of more affected firms. Repayment assistance programmes, as well as support measures from the Government and the Bank have so far contained any material increase of loan defaults. In particular, the cashflow relief from deferred loan repayments is helping SMEs cope better under renewed movement control restrictions, along with positive impacts from cost-cutting measures and increased digital adoption. Consistent with this, the share of SME loans assessed by banks to be of higher credit risk remained relatively modest despite an increase in SMEs that applied for repayment assistance in recent months. Banks also continued to lend to viable SMEs with various financing guarantee schemes remaining available to complement direct bank lending to these segments.

Most household borrowers remain reasonably resilient, with existing financial buffers and policy assistance measures providing a cushion against potential shocks. Repayment assistance extended by banks continued to provide support to distressed household borrowers, staving off further damage to their finances and, in turn, the economy and financial system at large. While this is helping to temporarily support borrowers' debt-servicing capacity, a more entrenched economic recovery remains key to restoring the longer-term financial health of borrowers. The share of household borrowers who have applied for repayment assistance has risen sharply in line with the further expansion of repayment assistance by banks in June and July, but as observed prior to June, this is expected to decline again as the economy gradually reopens and households see less need to build up precautionary buffers. Importantly, new bank lending to the household sector continues to be underpinned by sound underwriting standards. The exposure of banks to higher-risk household borrowers with thinner buffers also remains low.

Activity in the housing market reversed earlier improvements observed in the second half of 2020 as the effects from the positive response to various home ownership incentives introduced by the Government subsided. However, house prices continued to be supported by sustained demand among first-time house buyers for affordable properties. This is expected to mitigate risks associated with a significant house price correction that could undermine household balance sheets and increase potential losses to banks. Limited exposures of banks to loans for the purchase of property by household investors further contained such risks. Despite interest rates being at record lows, existing macroprudential measures have also continued to reinforce prudent lending behaviour among banks, thereby containing a build-up of future risks from a credit-induced residential property price boom such as that experienced in some other jurisdictions.

Banks continue to take a forward-looking approach to credit risk management despite considerable challenges faced in updating assessments of borrowers' creditworthiness. This is partly due to the absence of more current repayment data, especially for borrowers enrolled under the various repayment assistance programmes. Throughout the first half of 2021, banks have continued to increase provisions for credit losses in anticipation of a deterioration in asset quality as repayment assistance programmes are gradually unwound. The loan loss coverage ratio has remained around historically high levels, reflecting the higher degree of stringency in the provisioning practices of banks. Provisions by banks with significant retail exposures have also notably increased in recent months in response to the successive expansion of repayment assistance programmes. This continues to provide assurance that banks are reasonably well-positioned to withstand higher-than-expected credit losses in the event of more adverse credit developments.

While recovery prospects for the domestic economy remain subject to some degree of uncertainty surrounding the pandemic trajectory, the domestic financial system is expected to remain resilient against potential economic and financial shocks. Banks, insurers and takaful operators continue to have sufficient financial buffers to absorb potential losses under severe macroeconomic and financial conditions, while sustaining support for economic recovery. With the need to keep remote and flexible working arrangements in place for longer than expected as well as greater digitalisation of financial services that also rely on third party service providers, managing risks from information technology disruptions and cyber-attacks continues to be a high priority for the Bank and financial institutions. Ongoing, significant investments by financial institutions to strengthen business continuity plans and cyber risk resilience remain critical to reduce operational risks, both at the institution and system-wide levels. The operationalisation of the Financial Sector Cyber Threat Intelligence Platform in September, which is overseen by the Bank, will further support these efforts by enhancing the financial sector's ability to swiftly detect and respond to cyber threats.

Coping with an Uneven Recovery: Key Developments in the First Half of 2021

Coping with an Uneven Recovery: Key Developments in the First Half of 2021

MARKET RISK

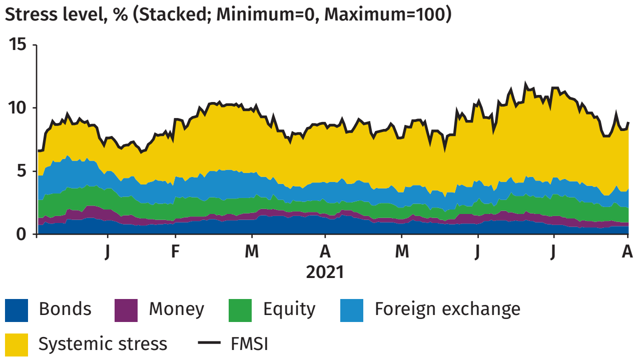
Domestic financial market conditions remained orderly

In the first half of 2021, global financial markets were lifted by the stronger-than-expected economic recovery, particularly in advanced economies where an acceleration in vaccine deployment has led to the easing of pandemic restrictions. Nevertheless, the global economic rebound remained uneven as a resurgence of COVID-19 infections and lagging vaccine rollouts weighed on the recovery in many emerging markets. On the domestic front, market stress increased in mid-June and July (Chart 1.1) amid rising global bond yields, more restrictive containment measures in response to an escalation in COVID-19 cases as well as domestic political developments, before easing slightly in August. Stress levels, nevertheless, remained well below those observed at the onset of the COVID-19 pandemic between March and April 2020.

The domestic equity market saw non-resident outflows amounting to RM4.5 billion for the eight months up to end-August 2021 amid subdued investor sentiment (Chart 1.2). While lingering uncertainties surrounding the re-opening of the economy could trigger further outflows by non-residents in the period ahead, the continued presence of large domestic institutional and retail investors is expected to provide some support to equity prices. Notably, retail investors continued to purchase the bulk of the sell-offs in the equity market, accounting for 34% of the total value traded in August 2021 (2020: 34%; 3-year average: 19%).

Importantly, such investments have not been associated with higher leverage which could increase risks to households under more volatile market conditions. Household loans to purchase quoted shares remained small at 0.5% of total banking system loans, consistent with the 5-year historical average, while loans to stockbroking and fund management firms also remained stable at less than 1% of total banking system loans. Retail investor activity[1] is expected to be sustained in the near term, as households, particularly those with higher

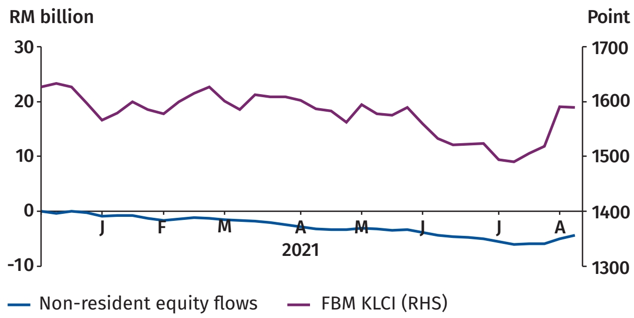
Chart 1.1: Financial Market – Financial Market Stress Index (FMSI)



Note: The FMSI reached a peak of 28.2% at the onset of the COVID-19 pandemic in March 2020

Source: Bloomberg, Reuters and Bank Negara Malaysia estimates

Chart 1.2: Financial Market – Cumulative Non-resident Equity Flows and Performance of the Domestic Equity Market



Source: Bloomberg

[1] Based on the CGS-CIMB 2021 Retail Investors' Sentiment Survey, the majority of retail investors in Malaysia were observed to be those earning monthly incomes of above RM5,000 with investments that are primarily funded by savings and income.

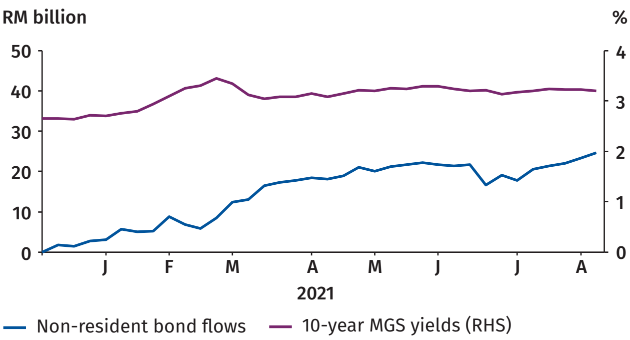
incomes, continue to seek higher returns amid the low interest rate environment. Although there has been evidence of some households using monies from deferred loan repayments to invest in the equity market, this is not prevalent and more likely to occur among higher-income households with greater financial flexibilities given the potential costs associated with deferring loan repayments. Market insights also suggest that these retail investors tend to be those with some experience in equity investments, seeking to increase longer-term returns on their savings. Collectively, these factors continue to limit any risks to financial stability from higher levels of retail investor activity seen in the more recent period. A prolonged period of low interest rates, however, could increase risks going forward by intensifying the search for yield among households that may be less capable of managing investment risks.

The domestic bond market remains attractive to non-resident investors

The domestic government bond market recorded larger net non-resident inflows in the first eight months of 2021 (RM23.9 billion) compared to the whole of 2020 (RM17.2 billion) (Chart 1.3). This followed the affirmation of Malaysia's sovereign rating of "A-" and "A3" by S&P Global Ratings and Moody's Investors Service, respectively, and Malaysia's retention in FTSE Russell's World Government Bond Index (WGBI). The share of non-resident holdings in the government bond market consequently increased to 25.2% as at August 2021 (December 2020: 24.2%; 5-year average: 25.9%). Demand for Malaysian Government Securities (MGS) is expected to remain supported by the attractive yield pick-up over US Treasuries (UST). On average, the 10-year MGS-UST yield differential stood at 169 basis points (bps) during the first eight months of 2021 (2020 average: 195 bps; 2019 average: 151 bps) (Chart 1.4). Longer-term bonds (10 years and longer) continued to command a healthy average bid-to-cover ratio of 2.6 times in the first eight months of 2021 (2020 average: 2.1 times). Meanwhile, domestic institutional investors continued to play an important role in supporting orderly conditions in the domestic bond market, with banks' holdings of government bonds increasing markedly during the period amid subdued loan growth. Domestic funding conditions also remained favourable for corporates. Gross corporate bond[2] issuances increased during the first seven months of 2021 (RM63.8 billion; January to July 2020: RM45.6 billion), with the credit spread for 10-year AAA-rated papers hovering around 63 bps on average between January and August 2021 (2020 average: 59 bps). More than half of these issuances were from the finance, insurance, real estate and business services sectors.

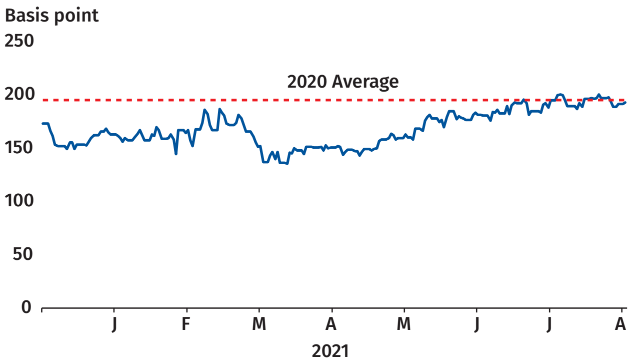
Looking ahead, domestic bond yields could see continued upward pressure from the higher incoming government bond supply and a further rise in UST yields from improvements in US economic prospects. This increases risks from mark-to-market losses and higher borrowing costs for financial institutions, businesses and the Government. Active risk management and hedging strategies of financial institutions are expected to contain any significant impact from heightened market volatility on the resilience of individual institutions. For banks, while the elevated domestic bond yields during the first half of 2021 led to revaluation losses from bond

Chart 1.3: Financial Market – Cumulative Non-resident Bond Flows and Performance of the Domestic Bond Market



Source: Bank Negara Malaysia and Bloomberg

Chart 1.4: Financial Market – 10-year MGS-UST Yield Differential



Source: Bloomberg

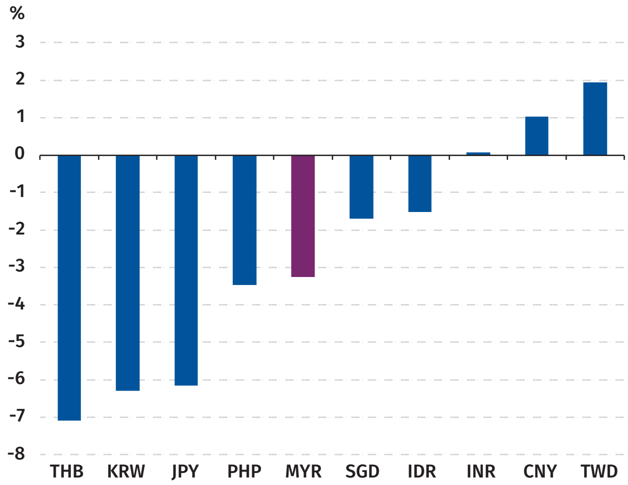
[2] Include banks and non-financial corporates, but exclude short-term papers in conventional and Islamic principles and issuances by Cagamas.

holdings in the banking book, the impact has been manageable at less than 1% of total risk-weighted assets. In addition, banks' costs of funds are not expected to be significantly affected by higher yields, given their low reliance on the bond market as a funding source.[3] Based on a sensitivity analysis of banks' balance sheets to bond yield movements, an increase in bond yields of up to 89 bps[4] and higher resultant funding costs[5] could reduce banks' aggregate profits before tax and total capital ratio by up to 11% and 1 percentage point (ppt), respectively.

For insurers and takaful operators (ITOs), a similar shock could have a more significant impact with the profitability[6] of life and family funds, and general funds declining by up to 85% and 29%, respectively. From a solvency standpoint, an increase in bond yields is expected to be positive for the life and family sector given correspondingly lower valuations of liabilities relative to assets,[7] while the aggregate capital adequacy ratio of the general sector could decline by up to 11 ppts. Overall, the impact of rising bond yields on banks and ITOs' solvency positions is expected to remain limited with aggregate capital levels remaining comfortably above the regulatory minima.

Conditions in the Malaysian foreign exchange market were influenced by both external and domestic factors in the first eight months of 2021. In the first quarter of the year, the rise in long-term UST yields saw the rebalancing of portfolio investments towards US financial assets, which in turn led to a broad-based strengthening of the US dollar against most emerging market currencies. Investors were also more cautious in the second quarter as COVID-19 cases surged across several Asian economies, including Malaysia. Domestic risk factors also weighed on the ringgit. From January to end-August 2021, the ringgit exchange rate depreciated by 3.3% to close at RM4.1552 against the US dollar in line with movements of regional currencies (Chart 1.5). Exchange rate adjustments continued to be orderly, with the 1-month RM/USD implied volatility averaging at 4.4% (3-year average: 4.5%).

Chart 1.5: Financial Market – Movement of Ringgit and Regional Currencies against the US Dollar



Note: 1. THB - Thai baht, KRW - Korean won, JPY - Japanese yen, PHP - Philippine peso, SGD - Singapore dollar, IDR - Indonesian rupiah, INR - Indian rupee, CNY - Chinese renminbi, TWD - New Taiwan dollar
2. Refers to year-to-date movement as at end-August 2021

Source: Bloomberg

The degree of financial market volatility will remain highly dependent on global and domestic economic recovery prospects, uncertainty surrounding potential shifts in the monetary policy stance in advanced economies and concerns over the effects of COVID-19 variants. The flexible domestic exchange rate regime will continue to serve its critical role as a shock absorber by facilitating appropriate adjustments in the external sector and cushioning the domestic economy from adverse global shocks. Malaysia's deep and liquid bond market and diverse investor base will also support the intermediation of portfolio flows, thus preserving orderly market conditions.

[3] Funding via equity and interbank financing, and bond issuances account for 17% and 2.6% of total banking system funding, respectively.
[4] Based on the steepest increase in bond yields observed in the first quarter of 2021.
[5] Higher funding costs due to potential tightening in domestic funding conditions accompanying the steepening yield curve.
[6] Refers to excess income over outgo for life and family funds, and operating profit for general funds.
[7] Due to the longer duration of liabilities compared to assets as highlighted in the BNM Financial Stability Review for Second Half 2019.

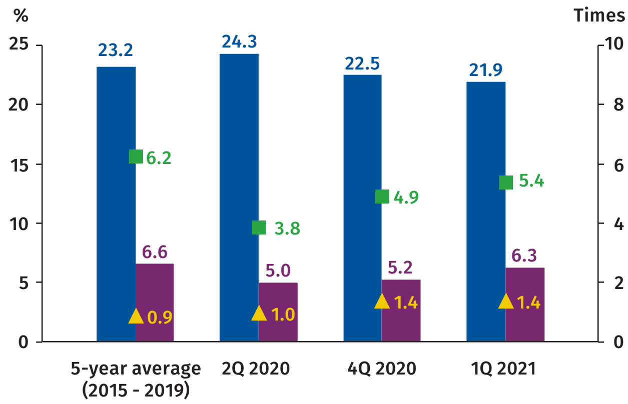
CREDIT RISK

Businesses recovered slightly, but the outlook remains challenging amid a resurgence of COVID-19 cases

The financial performance[8] of all business sectors, except for tourism-related businesses, improved in the first quarter of 2021 with the easing of movement restrictions, although they have yet to recover to pre-pandemic levels (Chart 1.6). These improvements were especially pronounced among smaller- and mid-sized listed firms, which had been more affected by the movement restrictions in 2020. The improvements also reflected greater success of firms in lifting revenue through digitalisation. Income from e-commerce sales rose by about 27% in the first half of 2021 compared to the same period last year.[9] Correspondingly, online retail payment transactions[10] increased at a faster rate of 71% in the first half of 2021 (2H 2020: 69%). Many of these changes are likely to contribute to longer-term efficiency gains which will better support business performance and resilience going forward. The share of firms-at-risk[11] declined from earlier peaks seen in 2020 (Chart 1.7). However, it remained higher than pre-pandemic levels, mainly reflecting continued challenges faced by firms in the hotels and restaurants, air transport, construction, and real estate sectors.

Smaller- and mid-sized firms continued to maintain higher precautionary liquid buffers to better cope with continued uncertainty in the operating environment. Overall business deposits grew by 3.5% while the median cash-to-short-term debt ratio[12] (CASTD) remained above the 2015-2019 average across most sectors. Firms also remained cautious in taking on additional debt given uncertain economic prospects. Business loan[13] applications continued to contract at a similar pace to that seen in 2020 (1H 2021: -11.2%; 2020: -11.1%), while loan repayments surpassed pre-pandemic levels, growing strongly by 22% (2020: -4.1%). Net non-financial corporate (NFC) bond[14] issuances also moderated (January-July 2021: RM12.5 billion; January-July 2020: RM16.9 billion) amid higher redemptions, particularly among firms in the services sector. This led to a further decline in overall business leverage during the period. Nevertheless, larger NFCs with strong financials have continued to take advantage of favourable funding conditions to tap the corporate bond market, with sustained NFC bond issuances (January-July 2021: RM55.1 billion; January-July 2020: RM56.8 billion).

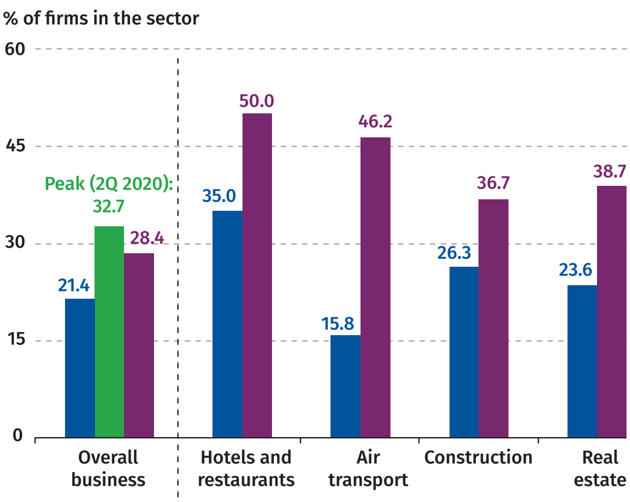
Chart 1.6: Business Sector – Key Financial Performance Indicators



Note: Prudent thresholds for ICR and CASTD are two times and one time, respectively

Source: S&P Capital IQ and Bank Negara Malaysia estimates

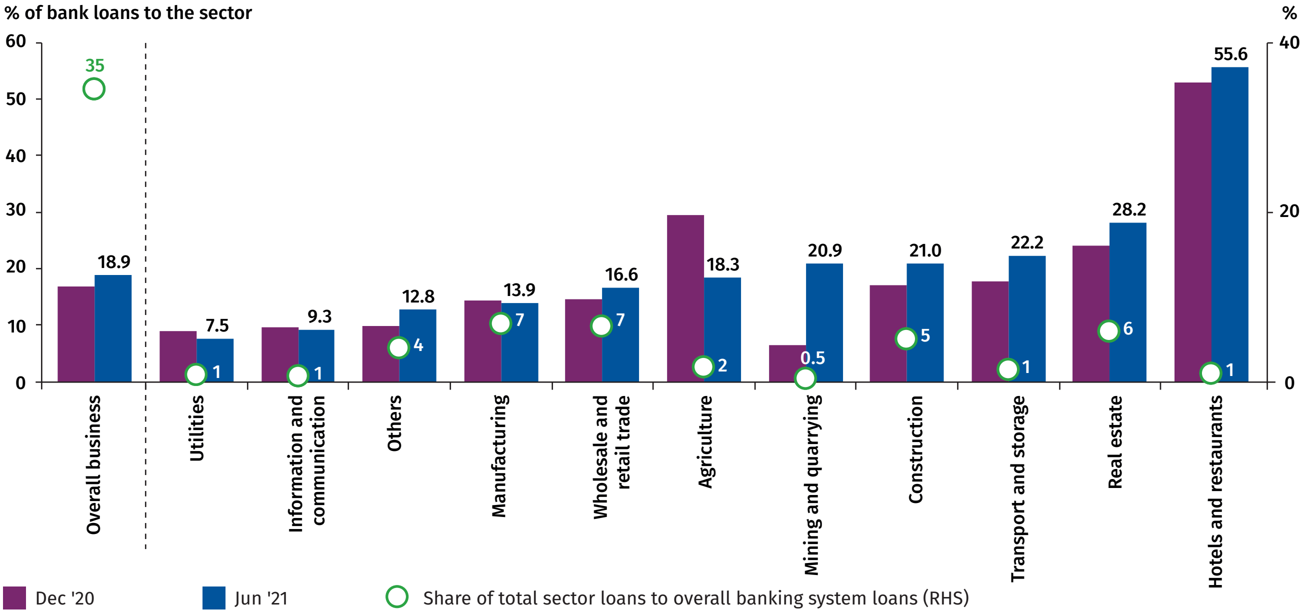
Chart 1.7: Business Sector – Firms-at-risk for Selected Sectors



Source: S&P Capital IQ and Bank Negara Malaysia estimates

[8] Data as of first quarter of 2021. Data on the financial performance for the second quarter of 2021 was not available in time for this Review due to an automatic one-month extension granted by Bursa Malaysia for listed firms to issue financial statements (normally due on 31 July 2021 and 31 August 2021) following the re-imposition of movement restrictions.
[9] Source: Department of Statistics, Malaysia.
[10] Include payments through DuitNow & DuitNow Quick Response (QR), Financial Process Exchange (FPX), Interbank GIRO (IBG), National Electronic Bill Payment Scheme (JomPAY), Direct Debit, MyDebit and Interbank Fund Transfer (IBFT).
[11] Firms-at-risk are defined as listed non-financial corporates with interest coverage ratio (ICR) below the prudent threshold of two times.
[12] Prudent threshold for CASTD is one time.
[13] Refers to both loans and financing, unless otherwise stated.
[14] Refers to both bonds and sukuk, including short-term papers, unless otherwise stated. Excludes issuances by Cagamas, financial institutions and non-residents.

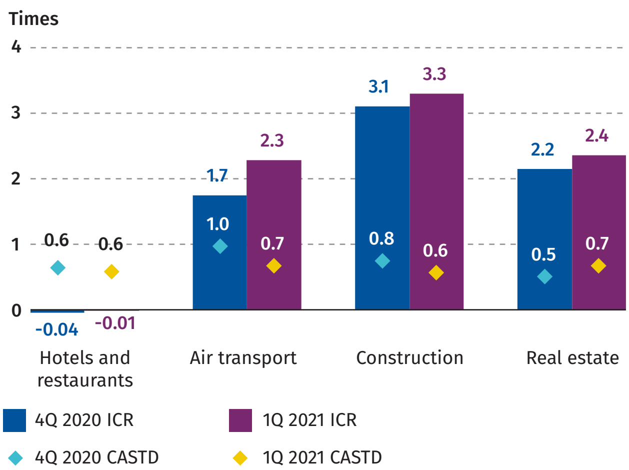
Chart 1.8: Business Sector – Share of R&R Loans by Sector



Source: Bank Negara Malaysia

The re-imposition of stricter nationwide containment measures under the Full Movement Control Order (FMCO) towards the end of the second quarter of 2021 may set back earlier financial improvements, particularly among smaller firms in the construction and services sectors, while prolonging difficulties that were already challenging firms in the tourism-related industries. This was evident from the higher share of loans under repayment assistance as at end-June 2021 across most business sectors compared to December 2020 (Chart 1.8). Industry engagements suggest that firms in sectors more significantly impacted by movement restrictions continued to face significant cashflow stress and could face renewed pressure on their debt-servicing capacity despite some improvement observed in the first quarter (Chart 1.9).

Chart 1.9: Business Sector – Liquidity and Debt-servicing Capacity Indicators for Selected Sectors



Note: Prudent thresholds for ICR and CASTD are two times and one time, respectively

Source: S&P Capital IQ and Bank Negara Malaysia estimates

Large corporates were better placed to manage effects of latest containment measures with SMEs more affected due to low liquidity buffers

Generally, larger corporates were better placed to manage challenges associated with the containment measures given their stronger buffers. Market indicators of default risk[15] for overall listed firms have sustained an improving trend throughout the FMCO, although they remain above pre-pandemic levels, indicating that there is still some way to recovery for most firms. Consistent with this, the number of domestic bond issuers that were downgraded during the period has also remained limited and were due to firm-specific weaknesses. The share of non-SME loans under repayment assistance and assessed by banks to be of significantly higher credit risk[16] declined slightly to 17.2% and 16.8% of total non-SME loans, respectively (December 2020: 17.7% and 17.2%, respectively).

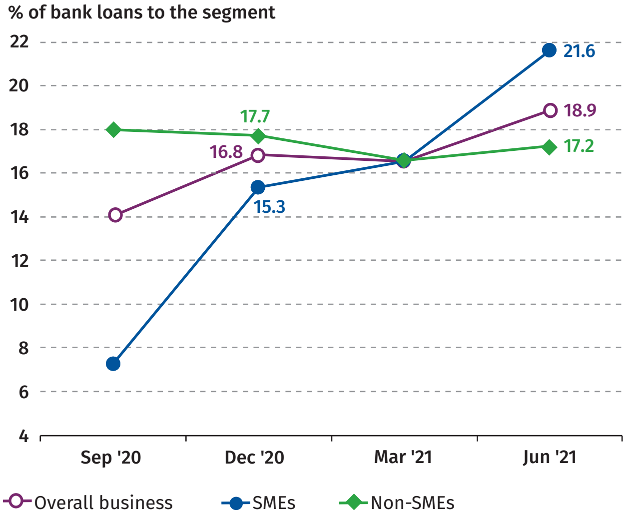
[15] As tracked by the Bloomberg Default Risk (DRSK) indicator which measures the probability of default over a one-year horizon for the sample of Bursa-listed firms. The indicator is based on the Merton distance-to-default measure, along with additional economically and statistically relevant factors.

[16] As measured by loans classified by banks under Stage 2 based on Malaysian Financial Reporting Standard 9 (MFRS 9).

Banks have maintained a high degree of vigilance over large exposures, with heightened monitoring of, and engagements with, borrowers observed among banks to proactively manage credit risks. The Bank's supervisory reviews indicate that the level of provisions held by banks against such exposures has been prudent. This should reduce the need for banks to further increase provisions in this borrower segment by a significant amount, assuming gradually improving economic conditions.

In contrast, the containment measures have disproportionately affected SMEs, with a significant share of SMEs entering the FMCO with relatively low liquidity buffers.[17] The overall proportion of SME loans under repayment assistance spiked to 21.6% (May 2021: 16.9%; December 2020: 15.3%) of total SME loans (Chart 1.10),[18] particularly driven by SMEs in the wholesale and retail, real estate, construction, and manufacturing sectors. The sharp increase in SME loans under repayment assistance has corresponded to periods when banks eased processes (including documentation requirements) for SME borrowers to obtain repayment assistance – notably in December 2020 and June 2021. From industry engagements, SMEs indicated that the cashflow relief from deferred loan repayments is helping them cope better under renewed movement control restrictions, even for those that may be able to continue servicing their debt without repayment assistance. Survey data further suggest that the impact of the movement restrictions on cash buffers of SMEs was less severe in the first half of 2021 compared to that observed at the onset of the pandemic. This reflects some improvement in business conditions, with further support from cost-cutting measures and increased digital adoption. The share of SME loans assessed by banks to be of higher credit risk increased in line with more loans falling under repayment assistance, but remains relatively modest at 14.6% of total SME loans (December 2020: 14.1%). The real estate, wholesale and retail, construction and manufacturing sectors continued to make up the bulk (almost 70%) of these loans. Notwithstanding this, the interrupted re-opening of the economy has led to persisting uncertainty for many SMEs, likely increasing their reliance on policy support measures in the near term.

Chart 1.10: Business Sector – Share of R&R Loans by Segment



Source: Bank Negara Malaysia

In the commercial real estate sector, occupancy and rental rates of shopping complexes and office space continued to face downward pressure (Chart 1.11 and Chart 1.12). Despite lower incoming supply following some cancellations and deferments of projects, vacancy rates increased across all key states with the completion of several commercial property developments amid persistent weak demand. Landlords continued to give rent-free periods, rental concessions, and short-term rental assistance packages to attract new tenants and retain existing ones. Average rental rates for office and retail space in the Klang Valley have now declined for four consecutive quarters since the third quarter of 2020. Despite various extensions of rental relief, up to half of mall operators reported significant difficulties collecting rent from their tenants.[19] This will continue to adversely impact the cashflows of mall owners, particularly for malls in non-prime locations with relatively higher vacancy rates. Looking ahead, vacancy rates could continue to rise and place further pressure on rents as a result of structural changes brought about by the pandemic, including flexible working arrangements and a shift in consumer spending patterns towards e-commerce. The expiry of protections under the COVID-19 Act 2020 that prohibit non-paying commercial property tenants from being evicted from occupied premises could further weigh on occupancy rates. Although this is not expected to

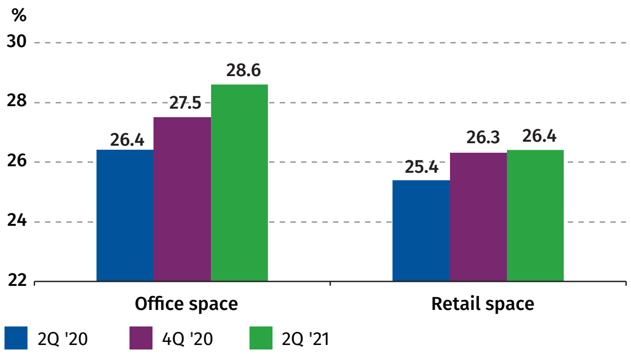
[17] The BNM Survey on Financial and Non-financial Needs of SMEs (May 2021), as well as surveys conducted by the World Bank (January-February 2021) and the Small and Medium Enterprises Association (SAMENTA) (June 2021) indicate that about 60% of SMEs hold less than three months of cash reserves.

[18] SMEs continued to make up the bulk of the firms benefitting from repayment assistance, accounting for 92% of total business loan accounts approved for rescheduling and restructuring (R&R).

[19] Based on a survey conducted by the Malaysia Shopping Malls Association (PPK Malaysia) in August 2021.

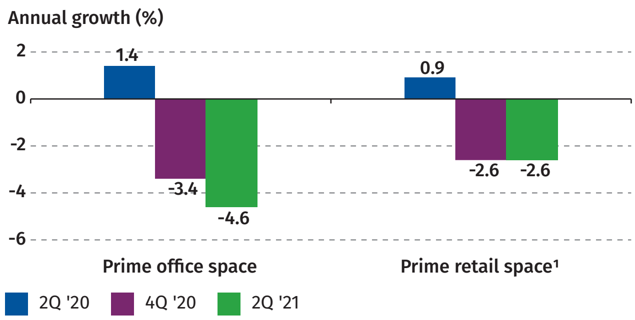
significantly increase risks to financial stability given the limited direct bank lending exposures to office and retail commercial properties (3.1% of banking system loans) and conservative bank lending practices, broader spillovers to the economy could heighten risks for banks.

Chart 1.11: Business Sector – Vacancy Rates for Office and Retail Space in Klang Valley



Source: Jones Lang Wootton

Chart 1.12: Business Sector – Rentals for Prime Office and Retail Space in Kuala Lumpur

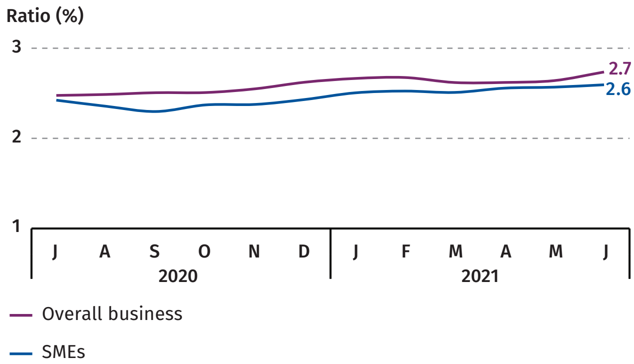


[1] Average rents of the most prominent shops in major shopping complexes

Source: Knight Frank Malaysia and Savills Malaysia

Repayment assistance programmes, and support measures by the Government and the Bank, have thus far contained any notable increase in defaults, with the overall business loan impairment ratio remaining broadly stable at 2.7% (Chart 1.13). Banks are nevertheless preparing for higher defaults and have continued to build up provisions against the materialisation of potential credit losses when support measures are eventually unwound (refer to the Information Box on 'Banking Institutions' Provisioning Practices to Mitigate Elevated Credit Risk from the Pandemic'). Additionally, under a simulated scenario of an extended drag on the economy and the absence of policy interventions, banks are expected to remain resilient even if business impairments were to reach up to three times the current level by end-2022.[20]

Chart 1.13: Business Sector – Gross Impaired Loans



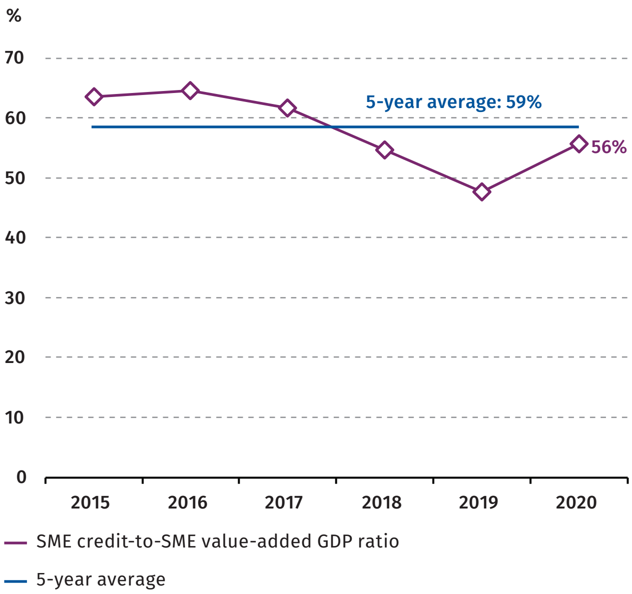
Source: Bank Negara Malaysia

The resilience of banks is continuing to support financing to viable SMEs. During the first half of this year, more than a quarter of approved SME loans were to first-time borrowers, while approved loans to young SMEs[21] accounted for almost 20% of the total volume of SME loans approved. This is helping to sustain business activity, particularly as businesses seek to pivot their operations or pursue new business opportunities in response to the immediate and foreseeable longer-term impacts of the pandemic. Overall outstanding SME loans grew by 6% (December 2020: 9.6%), with approval rates for SME loans improving to 77.3% (December 2020: 73.3%; 5-year average: 82.8%). Financing for investment-related activities,[22] which will expand the productive capacity of SMEs, continued to grow albeit at a more moderate pace (June 2021: 2.4%; December 2020: 7.6%). Meanwhile, financing for working capital increased by 9.2% (December 2020: 12.3%), driven primarily by the consumer-facing sectors such as wholesale and retail, hotels and restaurants, and transportation sectors which continued to face headwinds in the challenging environment.

[20] Refer to the section on 'Assessing the Resilience of Financial Institutions' in the BNM Financial Stability Review for Second Half 2020 for further details.
[21] Defined as SMEs established for not more than three years.
[22] Investment-related activities include loans for purchase of securities, transport vehicles, non-residential properties, and fixed assets, as well as for construction and other purposes.

BNM's Fund for SMEs is also helping to further support lending to SMEs. The Fund, which allows banks to offer financing at concessionary rates by reducing banks' cost of funds and enhancing borrowers' credit profiles through pre-packaged guarantees, currently represents about 5% of outstanding financing to SMEs, compared to the pre-pandemic average (2015-2019) of 2%. In addition, banks also leveraged other credit guarantee schemes provided by Credit Guarantee Corporation Malaysia Berhad (CGC) and Syarikat Jaminan Pembiayaan Perniagaan Berhad (SJPP). About 7% of outstanding financing to SMEs is backed by credit guarantees under these schemes. This remains markedly higher than the pre-pandemic level (2015-2019 average: 4%), reflecting greater caution by banks until there is better visibility on the performance of SME loans that are currently under repayment assistance. As noted earlier, SME borrowers have also been more hesitant to take on additional debt unless necessary. These factors are serving to contain risks from increased leverage among SMEs despite higher borrowings for working capital induced by the pandemic (Chart 1.14).[23] However, the more cautious risk appetite of banks could also hurt recovery if a pullback in bank lending becomes more pervasive due to heightened concerns over asset quality. The average value of new working capital loans extended by banks since the onset of the pandemic has been significantly smaller (by about half) compared to pre-pandemic loan values.

Chart 1.14: Business Sector – SME Credit-to-SME Value-added GDP Ratio



Note: Decline observed during 2018 and 2019 partly reflects the reclassification exercise of SMEs to non-SMEs by financial institutions, where a net amount of RM60.4 billion of outstanding SME loans was reclassified as outstanding non-SME loans

Source: Bank Negara Malaysia and Department of Statistics, Malaysia

Banks remain well-provisioned to withstand potential credit losses from businesses

In this environment, policy measures that complement bank lending to SMEs while shoring up confidence among banks to take risks onto their own balance sheets will continue to play an important role in supporting the economic recovery. To this end, financing support in the form of the Danajamin PRIHATIN Guarantee Scheme (DPGS), and credit guarantees by CGC and SJPP remain available for businesses. The Bank has also increased allocations for the various facilities under the Bank's funds for SMEs, and provided more flexibility under the Targeted Relief and Recovery Facility (TRRF) and PENJANA Tourism Financing (PTF) to enable SMEs to refinance existing debt at lower costs while tapping fresh funds.[24] Additional relief measures introduced in the PEMERKASA+ and PEMULIH assistance packages, including extended wage subsidies, tax incentives, and government grants are also expected to provide further support to businesses. For businesses that continue to face difficulties in servicing their debt obligations, banks remain well-positioned to extend continued repayment assistance tailored to the specific circumstances of borrowers. This continues to be complemented by various platforms available to facilitate timely and effective debt workouts with creditors.[25] As the economic recovery gains traction, the ability of more businesses to resume servicing their debt will also further improve the risk appetite for new bank lending, especially to SMEs.

[23] SMEs have typically relied more on personal funds and retained earnings to support their businesses prior to the pandemic. Findings from the BNM SME Finance Survey 2018 showed that most firms tapped into own cash and retained earnings (62% of respondents), while about a third has debt with financial institutions (including microfinance institutions).

[24] The flexibility took effect on 5 July 2021, with the following features: i) Refinancing allowed for up to 50% of the total financing approved for the PTF and up to 30% for the TRRF; and ii) Not for refinancing existing business financing under the BNM's Fund for SMEs.

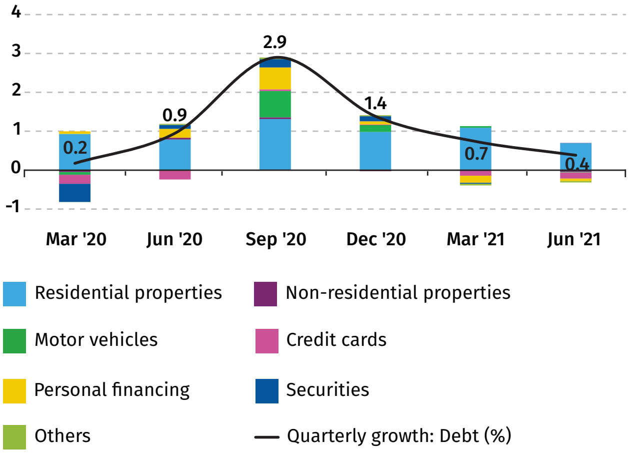
[25] Refer to the Information Box on 'Debt Resolution Mechanisms for Viable Businesses Facing Temporary Financial Distress' in the BNM Financial Stability Review for Second Half 2020 for further details.

Most household borrowers remain reasonably resilient, with policy support measures providing additional buffers for households facing higher levels of financial stress

Household debt[26] growth was broadly sustained as at end-June 2021, expanding by 5.5% (December 2020: 5.5%) over the same period last year even as more borrowers resumed payments on their loans after exiting from loan moratoria. Quarter-on-quarter trends, however, revealed that household debt growth moderated during this period as the strong response to various home ownership and car purchase incentives rolled out in the second half of 2020 tapered off (Chart 1.15). Personal financing and credit card loans also declined as movement restrictions weighed on consumer spending. At the aggregate level, there is little sign of a sharp deleveraging by households, suggesting that many households continue to have the financial capacity to take on new debt.

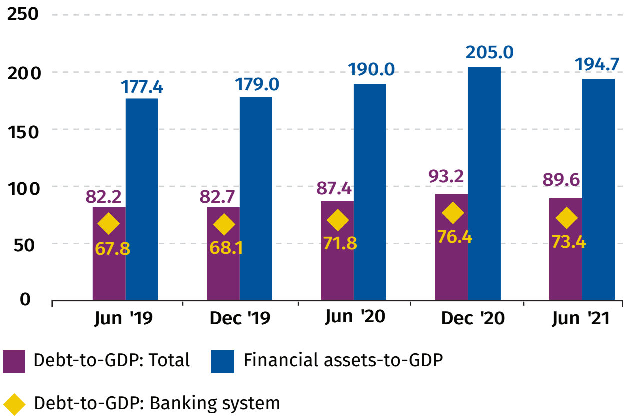
Bank lending to households also held steady (5.2% year-on-year growth; December 2020: 5%), particularly for secured loans, amid a more cautious outlook on credit risk. Around 70% of new banking system disbursements[27] in the first half of 2021 continued to be channelled to middle- and high-income borrowers who have greater capacity to take on new debt, with 40% and 20% of total new disbursements going towards the purchase of residential properties and cars, respectively. Importantly, lending continued to be underpinned by sound underwriting standards, with the debt service ratios of newly-approved and outstanding household loans maintained at a prudent level of 41% and 35% (December 2020: 43% and 35%), respectively. Similarly, the share of borrowers with a debt service ratio above 60% has remained at around a quarter of total household borrowers (24%; December 2020: 25%). A significant proportion (66%) of the debt held by these borrowers are associated with the middle- and high-income groups who are more likely to be able to withstand financial shocks. Overall household debt-to-GDP ratio improved to 89.6% but remained elevated amid the sluggish recovery in nominal GDP (Chart 1.16).

Chart 1.15: Household Sector – Quarterly Growth of Debt



Source: Bank Negara Malaysia

Chart 1.16: Household Sector – Key Ratios



Source: Bank Negara Malaysia, Bursa Malaysia, Department of Statistics, Malaysia, Employees Provident Fund and Securities Commission Malaysia

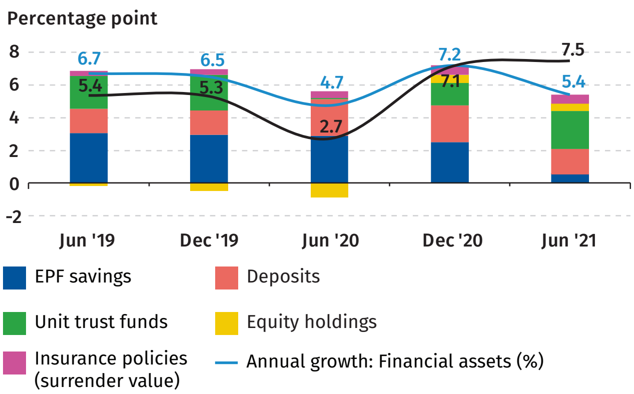
[26] Extended by both banks and non-bank financial institutions.

[27] Excludes credit cards.

Risks in the household sector are confined to a small but deeply stressed segment

Household financial assets registered an annual growth of 5.4% in June 2021 (December 2020: 7.2%) (Chart 1.17). However, in level terms, aggregate financial assets declined between December 2020 and June 2021 by RM3 billion, mainly driven by overall retirement savings which were significantly lower due to the i-Sinar and i-Lestari programmes.[28] Over the longer term, the drawdown of such savings could compound future difficulties for some households that are already likely to have insufficient savings for retirement.[29] In the short term, however, the flexibility provided for households to withdraw their retirement savings early has provided an additional source of funds to help them tide over current financial strains. Conservative simulations[30] by the Bank suggest that the share of borrowers that would have to draw on pre-existing savings to meet their debt obligations and living expenses over the next 18 months in the event of assumed income and unemployment shocks is likely to be relatively modest, at between 11% and 15% of borrowers.[31] Of these borrowers, those who are more likely to deplete their cash or deposit buffers, and are thus most at risk, is estimated to form a much smaller share (1.9%) of household borrowers. About two thirds (65%) of such at-risk borrowers comprise those earning less than RM5,000 monthly who were also more highly leveraged compared to other income groups pre-COVID-19. Exposures of banks to these most vulnerable borrowers are estimated to account for only 1.3% of banking system loans. Most household borrowers therefore appear to have sufficient financial buffers and remain reasonably resilient, with policy assistance measures providing additional reserves against potential shocks. This is also a reflection of more robust affordability assessments conducted by banks over the years following the implementation of responsible lending standards by the Bank in 2012.

Chart 1.17: Household Sector – Annual Growth of Financial Assets



Source: Bank Negara Malaysia, Bursa Malaysia, Employees Provident Fund and Securities Commission Malaysia

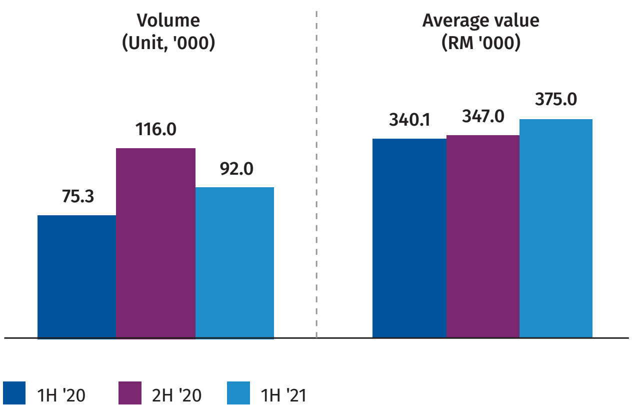
[28] Under the i-Sinar and i-Lestari programmes by the Employees Provident Fund (EPF), individuals may withdraw a portion of their retirement savings.
[29] Based on a study conducted by EPF, two out of three active EPF contributors are projected to have insufficient retirement savings to meet a minimum pension of RM1,000 per month. Refer to EPF's 'Social Protection Insight' Volume 3 (2018) for further details.
[30] Refer to the Information Box on 'Forecasting Households' Time to Default' in the BNM Financial Stability Review for First Half 2020 for further details on the methodology.
[31] This estimation excludes the impact of any policy measures to ease borrowers' cashflows, such as repayment assistance programmes after the first quarter of 2021, cash transfers from the Government, or the withdrawal of retirement funds. The drawdown of buffers is simulated starting from the second quarter of 2020.

Developments in the Residential Property Market

In the first half of 2021, housing transactions were slower compared to the second half of 2020 as the effects from the positive response to various home ownership incentives introduced by the Government subsided (Chart 1.18). Tighter movement restrictions and operational frictions following a resurgence of COVID-19 cases also weighed on market activity in the second quarter. Despite the moderation in activity, average transaction values grew at a stronger pace. This was supported by transactions for properties priced below RM500,000 which accounted for more than 80% of housing transactions. Housing transactions during the period also continued to be lifted by home purchases ahead of an earlier anticipated expiry of the Home Ownership Campaign in end-May 2021.[32] Demand for financing has recovered to above pre-pandemic levels, with housing loan applications increasing across most price segments compared to the second half of 2020 (Chart 1.19). Approval rates have also broadly recovered closer to levels recorded before the pandemic (overall approval rate in 1H 2021: 73.2%; 2020: 71.5%; 2013-2019 average: 75.5%), except for properties priced above RM1 million where approval rates have continued to reflect the more cautious risk appetite of banks.

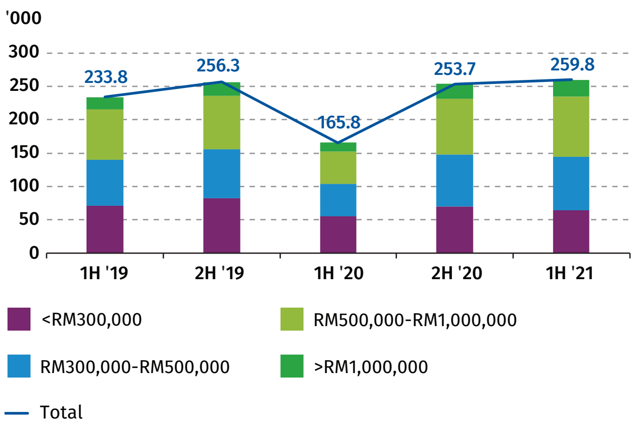
In line with the slower market activity, the number of unsold houses rose to 181,460 units as at the second quarter of 2021 (4Q 2020: 167,104 units), largely driven by houses priced above RM300,000 and serviced apartments that are under construction. Several new housing launches in previous quarters which would have experienced slower sales during this period also contributed to the increase in unsold units. Market observers are expecting activity to pick up with the gradual easing of movement restrictions and recovery in economic activities, as observed in the second half of 2020. Incoming supply of newly-launched residential properties would likely shift towards the mass market price segments, as seen in the higher share of properties priced at RM500,000 and below (1H 2021: 71.6%; 2015-2019 average: 65.9% share). Such adjustments will continue to reduce demand-supply mismatches and improve overall housing affordability. Along with sustained demand among first-time house buyers, this is expected to mitigate risks of a significant house price correction. Based on the latest release of the National Property Information Centre (NAPIC) report for the first half-year of 2021, house price growth is likely to have remained broadly flat in the first six months of 2021 (preliminary estimates of Malaysian House Price Index (MHPI) growth: -0.3%),[33] with market expectations of a recovery heading into 2022.

Chart 1.18: Property Market – Housing Transactions



Source: National Property Information Centre (NAPIC)

Chart 1.19: Property Market – Volume of Housing Loan Applications by Price Segment

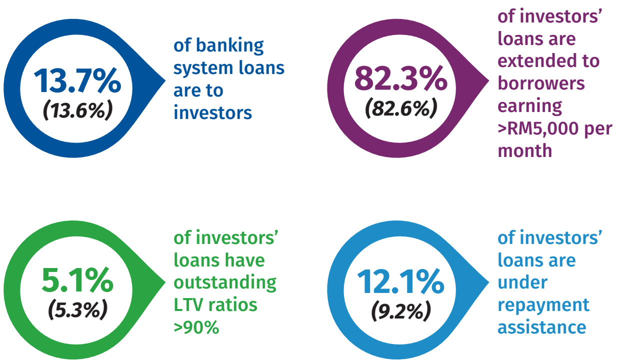


Source: Bank Negara Malaysia

[32] The Home Ownership Campaign has since been extended to 31 December 2021 under the Government's PEMERKASA+ assistance package.
[33] Estimated from the average MHPI growth for 1Q and 2Q 2021. It is worth noting, however, that based on historical trends, the final MHPI estimates may likely be revised upwards to reflect additional data submissions for the quarter.

Risks to household balance sheets as well as potential losses to banks from housing loan exposures remained manageable. In particular, risks from household investors[34] in the housing market remained contained amid prevailing low interest rates. Such borrowers have higher incentives to default if house prices were to decline and fall into negative equity or they face a loss of rental income. Banks' exposures to household investors have risen slightly from pre-pandemic levels to 13.7% of overall banking system loans (December 2020: 13.6%; December 2019: 13.3%) (Diagram 1.1). However, the annual growth rate of banks' housing loan exposures to owner-occupiers continued to outpace that of exposures to household investors (8.4% and 5.2%, respectively; December 2020: 8.7% and 5%). So far, household investors are predominantly higher-income earners who are typically more resilient to income shocks. The average loan-to-value (LTV) ratio of outstanding housing loans by household investors also remained relatively low and stable (54.8%; December 2020: 54.9%), thus preserving ample buffers against a potential decline in house prices.

Diagram 1.1: Household Sector – Key Statistics on Household Housing Investors



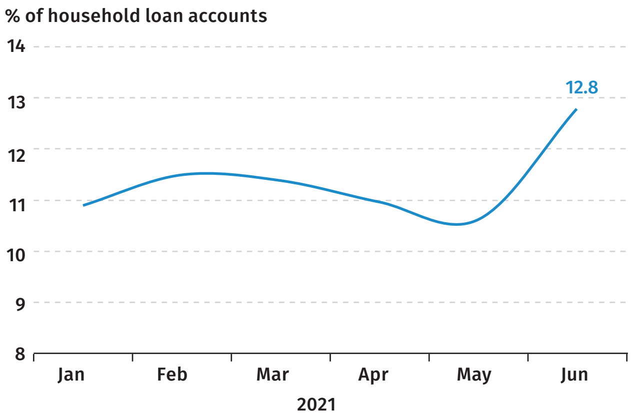
Note: (...) refers to position as at end-December 2020

Source: Bank Negara Malaysia

Some pockets of household investors may be experiencing challenges in servicing their debt based on repayment assistance data, but risks to banks stemming from these borrowers are judged to be low, given the small share of investors in negative equity at less than 1% of total housing loans. Despite low interest rates, existing macroprudential measures are believed to have reinforced prudent lending behaviour among banks and mitigated a credit-fuelled increase in residential property prices such as that experienced in some other jurisdictions. Any recalibration of macroprudential measures will take into account the Bank's overall assessment of risks to household resilience and implications for financial stability.

Repayment assistance extended by banks continued to provide support to distressed household borrowers, staving off further damage to their finances and, in turn, the economy and financial system at large. As at end-June 2021, 12.8% of household loan accounts, or 16% of outstanding household loan exposures, were under a repayment assistance plan[35] (December 2020: 8.9% and 11.1%, respectively). Borrowers earning less than RM5,000 monthly formed two-thirds of these loan accounts. While access to repayment assistance is helping to temporarily support borrowers' debt-servicing capacity, a more entrenched economic recovery remains key to restoring the longer-term financial health of borrowers. Some early positive signs of this were observed, as the total share of household accounts under repayment assistance began to fall between February (11.5%) and May (10.6%), just before the FMCO was imposed (Chart 1.20).

Chart 1.20: Household Sector – Accounts under Repayment Assistance



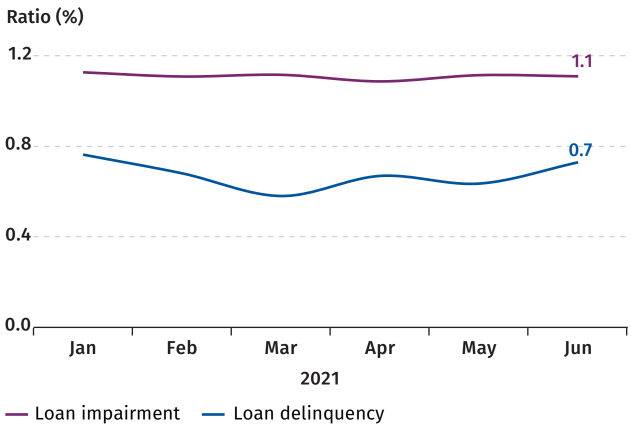
Source: Bank Negara Malaysia

[34] A household investor, in this context, is defined as an individual borrower with more than one housing loan.

[35] Either in the form of a loan repayment moratorium or reduced instalment terms. Figures are based on repayment assistance applications that were approved by banks and subsequently accepted by customers.

Additionally, there was a marked shift towards reduced instalment plans, as some borrowers who previously opted for a loan moratorium regained capacity to partially service their debts. The share of household loans classified by banks in Stage 2[36] was correspondingly lower at 6.9% (December 2020: 7.3%). While the transition to more targeted repayment assistance during this period has not been accompanied by a significant deterioration in household asset quality (Chart 1.21), renewed lockdown measures followed by a further expansion of repayment assistance by banks in June and July[37] to maintain support for borrowers continue to mask the true extent of potential impairments going forward.

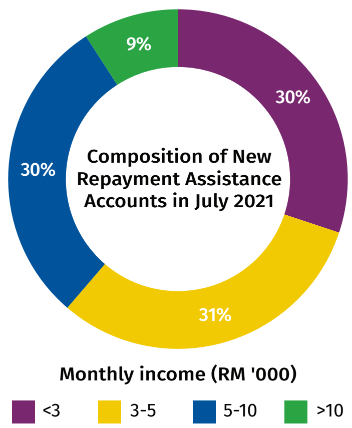
Chart 1.21: Household Sector – Loan Impairment and Delinquency Ratios in the Banking System



Source: Bank Negara Malaysia

As at end-July 2021, the share of household loan accounts and exposures under repayment assistance rose sharply to 25.4% and 30% of total household accounts and loan exposures, respectively. Applications for the latest moratorium peaked in the first half of July, with weekly applications declining steeply thereafter. Borrowers who opted for the latest assistance packages were spread across all income groups (Chart 1.22). This, coupled with the more flexible eligibility criteria[38] for assistance, suggests that the recent rise in accounts under repayment assistance is not solely driven by borrowers in distress. Recent surveys by the Bank[39] and anecdotal evidence indicate that about a third of borrowers that applied for repayment assistance are partly using it to build up precautionary buffers, and to a lesser extent, for investments in the equity market. These borrowers are expected to have less difficulty in resuming their repayments when the current repayment assistance ends. The share of accounts associated with temporarily distressed borrowers under a repayment assistance plan is also expected to shrink over time as economic conditions improve, as observed between February and May this year. Potential credit losses that may materialise are assessed to be adequately covered by bank's loan loss provisions (refer to the Chapter on 'Financial Institution Soundness and Resilience').

Chart 1.22: Household Sector – New Repayment Assistance Accounts by Monthly Income Group



Source: Bank Negara Malaysia

[36] Refers to loans that exhibit a significant increase in credit risk under MFRS 9.

[37] With the imposition of the FMCO towards the end of the second quarter, banks began to offer individual borrowers the option to opt for a 6-month loan moratorium as part of the PEMULIH assistance package.

[38] Under the earlier repayment assistance packages offered by banks, automatic approval for assistance was only granted to lower-income group borrowers or those facing economic hardship.

[39] BNM's Consumer Sentiment Surveys from December 2020 to May 2021.

OPERATIONAL RISK

Financial institutions remained operationally resilient and continue to strengthen their cyber security risk posture

Financial institutions adapted relatively quickly to the stricter movement restrictions in the first half of 2021, leveraging earlier experience in managing operational challenges since the onset of the pandemic. No major operational disruptions were recorded at the system-wide level, with operational risk losses declining by 18.7% to RM118.1 million compared to the first half of 2020. Financial institutions, however, remained highly vigilant of potential risks from information technology (IT) disruptions and cyber-attacks. Stronger detective and recovery capabilities developed by financial institutions have prevented any system-wide disruptions caused by IT and cyber incidents encountered during the period. Financial institutions have also further strengthened controls around IT enhancement projects to minimise IT failures caused by processing errors. Critically, ongoing initiatives to improve and maintain good cyber hygiene practices continue to be a high priority. Ongoing enhancements to financial institutions' business continuity plans (BCPs) and disaster recovery plans (DRPs) to reflect remote working arrangements have also led to further improvements in financial institutions' crisis preparedness.

The various collaborative arrangements in place at the industry, national and regional levels continue to support the financial sector's ability to swiftly detect and respond to cyber threats, thus ensuring the uninterrupted provision of essential financial services (Diagram 1.2). These arrangements were further enhanced with the operationalisation of the Financial Sector Cyber Threat Intelligence Platform (FinTIP)[40] in September 2021. Membership of the Cyber Working Group (CWG) established by the Bank has also expanded to include two additional financial institutions in 2021, resulting in a total of 11 members. The CWG continues to play an active role in facilitating swift communications between members on emerging cyber threats and engagements on initiatives to maintain a strong cyber defence posture. At the regional level, the Bank continues to leverage the Cybersecurity Resilience and Information Sharing Platform (CRISP) to exchange information among ASEAN central banks.

Diagram 1.2: Industry Arrangements to Support Detection and Responses to Cyber Threats

Deployment of Financial Sector Cyber Threat Intelligence Platform (FinTIP)

01 FinTIP is an industry platform that collects, aggregates and analyses cyber threat data in real time from various sources. FinTIP facilitates the sharing of information to the Bank and participating financial institutions to ensure rapid identification and detection of emerging cyber threats and critical IT vulnerabilities.

02 FinTIP will also foster industry collaboration and cooperation, serving as a platform for community-driven discussions on cyber threats.

Implementation of Cyber Incident Scoring System (CISS)

01 Financial institutions are required to immediately report any cyber incidents to the Bank using the CISS template, which comprises six key pieces of information. The Bank should also be promptly updated as new information becomes available.

02 The Bank will assess the severity and determine the potential systemic impact of the incident.

03 Actionable cyber threat intelligence will be disseminated to the industry in a timely manner so that appropriate prevention, detection and response measures can be implemented.

Regular engagements with various stakeholders

01 The Bank has established the Cyber Working Group which comprises selected financial institutions that meet quarterly to discuss emerging cyber risks in the industry.

02 The Bank also regularly engages agencies such as National Cyber Security Agency (NACSA), CyberSecurity Malaysia, Securities Commission Malaysia and Malaysia Communication & Multimedia Commission (MCMC) to share cyber information and coordinate responses to cyber threats.

Establishment of Cybersecurity Resilience and Information Sharing Platform (CRISP)

01 CRISP is a regional platform for ASEAN central banks to share each country's cyber threat landscape and intelligence, facilitate discussions on emerging cyber risks, and support capacity building of cyber risk specialists and supervisors.

Source: Bank Negara Malaysia

[40] Refer to the Information Box on 'Establishment of the Financial Sector Cyber Threat Intelligence Platform (FinTIP)' for further details on FinTIP.

Ransomware attacks and vulnerabilities within third party service providers (TPSPs) have been a key focus of strengthened internal policies of financial institutions, and are also sources of risk that the Bank is focused on. In recent months, sporadic ransomware attacks caused some disruptions to the business operations of two financial institutions, but they were effectively contained. Risks associated with the use of TPSPs have also increased substantially for some financial institutions that have relied more heavily on third party services as a result of operational adjustments made in response to the pandemic. These risks include TPSPs that may be unable to meet service level agreements due to operational restrictions imposed under extended movement control orders; IT infrastructure of TPSPs that are inadequately protected against IT failures and cyber threats; and weak BCP and DRP of TPSPs that may hamper their ability to effectively support financial institutions during a crisis.

The Bank is closely monitoring measures by financial institutions to manage these risks. Financial institutions have intensified periodic reviews of the risk controls and financial sustainability of TPSPs to ensure the continuity of services rendered. This includes specific reviews of the BCPs of TPSPs. Some financial institutions have also enhanced the fee structures that are tied to service level agreements to better align risk controls and the quality of services delivered by TPSPs. Financial institutions are also strengthening their response strategies to manage potential disruptions to TPSP services by including the sudden unavailability of TPSPs as part of financial institutions' own BCP tests and contingency plans.

The concentration of financial institutions to specific TPSPs, and contagion risks associated with interlinkages between TPSPs and the financial system, could pose systemic risks. With more services moving onto digital platforms supported by third parties, there is a need to improve visibility over such risks at both the institution and system levels. This will require financial institutions to comprehensively map their interlinkages with service providers across the value chain (both physically and virtually) in order to identify and monitor concentration and contagion risks. This in turn can be developed into a cyber contagion map at the system-wide level to provide an aggregate view of the relevant interdependencies and interconnections between underlying IT components, TPSPs that support the financial system, and the financial network. Results from these assessments are expected to better inform crisis simulation exercises, risk mitigations and BCPs for the financial sector going forward.

As remote and flexible working arrangements become the norm, the Bank has also increased its focus on the adequacy of controls by financial institutions to protect confidential data given that the use of unsecured platforms and devices to perform day-to-day tasks poses significant IT security risks. In general, conditions for remote access to confidential data and critical applications continue to be one of the key security considerations, and for many financial institutions, such access is limited to narrowly defined circumstances with enhanced cyber security safeguards. For example, almost all financial institutions have deployed data loss prevention tools, established clearly defined response and recovery strategies to limit the impact of any data breach, and enforced restricted user access to confidential data. Financial institutions are expected to continuously re-evaluate the adequacy of these controls in line with prospects of keeping remote and flexible working arrangements in place for longer than expected, or adopting permanent changes in their business operations as a result of the pandemic.

Payment and settlement systems continued to be operationally resilient

Both the Real-time Electronic Transfer of Funds and Securities System (RENTAS)[41] and retail payment systems (RPS) continued to maintain high system availability, with no major incidents or service disruptions. Robust BCP measures such as split operations, high level of redundancy, and reserve teams supported the smooth operations of the payment systems. The Bank also conducted an assessment on RPS which led to actions by payment system operators to further strengthen control measures that will increase the cyber resilience of RPS. These include measures to increase dedicated resources to manage cyber security operations, strengthen monitoring and control systems, and enhance security testing techniques and

[41] RENTAS is a real-time gross settlement system for interbank fund transfers, debt securities settlement and depository services for scripless debt securities.

methodologies. With the launch in June 2021 of a QR payment linkage with PromptPay[42] that enables instant cross-border QR code payments in Malaysia and Thailand, robust risk management measures were also jointly coordinated between the Bank and Bank of Thailand (BOT) to ensure a strong and secure cross-border payment network.

As real-time payment transactions continued to grow at an accelerated pace, the associated credit and settlement risks in several RPS that are settled on a deferred net settlement (DNS) basis have increased. To safeguard financial institutions against settlement risks, the Payments Network Malaysia Sdn Bhd (PayNet) is working to put in place collateralisation arrangements for DNS on the Real-time Retail Payments Platform (RPP), Financial Process Exchange (FPX), MyDebit and Shared ATM Network (SAN) by end-2021. Under the arrangements, participants in these systems will be required to set aside cash and/or securities as collateral to meet their settlement obligations.

On 1 July 2021, the Bank assumed operations of RENTAS from PayNet as part of plans to further strengthen the end-to-end risk management of RENTAS. The transfer was completed smoothly with no operational disruptions. This transfer will reduce integration and coordination risks between the Bank and PayNet as the Bank will now own, operate and provide the technology and infrastructure support to the system. In line with international best practices, clear and transparent governance arrangements have been preserved following the transfer. Notably, the Bank's responsibilities for the regulatory and supervisory oversight of key financial market infrastructures, including RENTAS, and its role as the operator of RENTAS, will continue to be clearly segregated within the Bank. A dedicated management committee has also been established to oversee the operations, development, and risk management of RENTAS. The committee includes four external representatives with relevant experience and expertise in IT as well as the financial technology (FinTech) and payments ecosystem.

[42] PromptPay is a real-time retail payment system in Thailand that facilitates payments and fund transfers via electronic channels (e.g. internet banking, mobile banking and ATMs).

Establishment of the Financial Sector Cyber Threat Intelligence Platform (FinTIP)

Cyber-attacks can pose considerable risks to financial stability with the financial industry expected to face threats that are growing in frequency, sophistication and scope. This development is not unique to Malaysia. Globally, there has been an increasing number of cyber-attacks that have brought down key business operations. Of note, some of these were orchestrated by threat actors using highly sophisticated tactics which exploit the higher number of entry points into the network and systems of financial institutions as a result of the rapid adoption of Internet-facing systems and greater digitalisation of financial services. These threat actors operate in an active underground ecosystem where they share information, coordinate attacks, recruit hackers, sell compromised data and provide cybercrime services.

The increased intensity of such attacks and their well-coordinated nature call for a coordinated financial sector response. While financial institutions have continued to invest extensively in IT hardening and cyber resilience in their respective institutions, an industry-wide, multi-stakeholder strategy to defend the financial system against common cyber threats is needed to reinforce the efforts of individual financial institutions. To this end, the Bank has been working to establish a cyber threat intelligence and collaboration platform for the financial industry. The Financial Sector Cyber Threat Intelligence Platform, or FinTIP, commenced operations in September 2021.

FinTIP to strengthen industry collaboration and foster information sharing

The FinTIP is intended to achieve three key goals:
- Perform rapid assessment and dissemination of information on emerging cyber threats and critical IT vulnerabilities;
- Foster information sharing and collaboration across the industry via a secured and trusted platform; and
- Increase cyber situational awareness to aid strategic decision-making.

The operation of FinTIP by the Bank helps to build trust, thereby reducing a key barrier to widespread information sharing and collaboration between financial institutions and other key stakeholders. Stakeholders in public and private sectors can participate and contribute to FinTIP by confidentially sharing information on cyber threats, incidents and IT vulnerabilities in near real-time. At the national level, FinTIP serves as a bridge to connect and facilitate cross-sector information exchange between the financial sector and other economic sectors via entities such as the National Cyber Security Agency (NACSA), CyberSecurity Malaysia (CSM), Malaysian Communication and Multimedia Commission (MCMC) and Securities Commission Malaysia (SC).

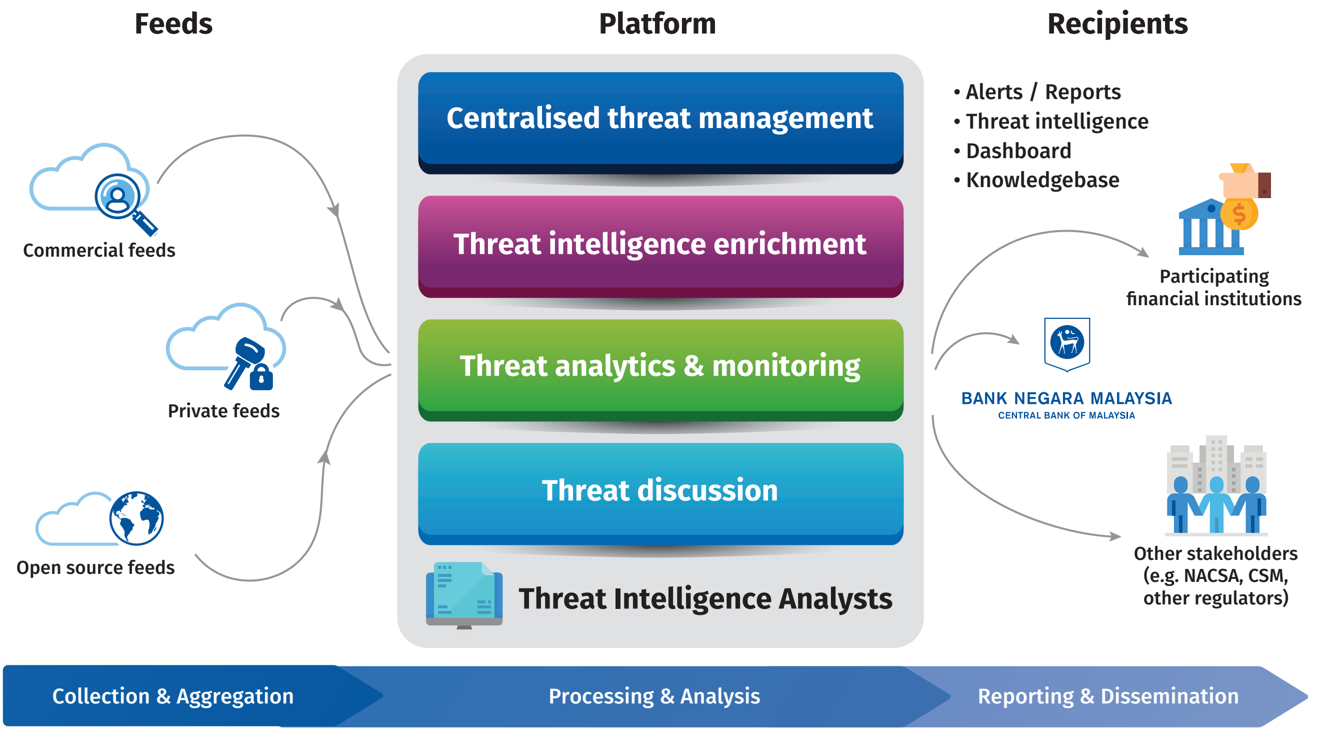
Rapid information assessment and dissemination

FinTIP, which operates on a 24x7x365 basis, will collect, aggregate and analyse cyber threat intelligence and IT vulnerabilities from various sources, and distribute relevant information to stakeholders in a timely manner (Diagram 1.3). This analytical platform leverages a combination of machine algorithms and human experts to correlate, normalise, enrich, and sanitise collected data to produce real-time actionable intelligence. Financial institutions can use the information provided by FinTIP for their own incident response, security operations, threat hunting, vulnerability management and risk analysis. They can also access professional services for assistance on cyber incident remediation and analysis of threats. Diagram 1.4 describes the key features of FinTIP.

Improving industry collaboration

FinTIP also provides a secure platform for financial institutions and other stakeholders across the industry to exchange information on defensive measures taken and lessons learnt from cyber incidents. For example, financial institutions can participate in community-driven discussions to collaborate and learn from each other's experiences in dealing with common threats. Financial institutions can also obtain an objective understanding of their cyber risk performance or exposure level, benchmarked against industry peers.

Diagram 1.3: FinTIP Deployment Model



Source: Bank Negara Malaysia

Diagram 1.4: FinTIP Features

Continuous threat landscape monitoring

Real-time dashboard – personalised dashboard consisting of representation of different data types, sightings and charts.

Exposure level – correlate submitted asset inventory against known vulnerabilities in real-time.

Peer benchmarking – measure performance or exposure level against the aggregated industry level.

Threat landscape reports – easily export periodic threat landscape report directly from FinTIP portal.

Industry broadcast & communication

Timely dissemination – of alerts and advisories to the relevant parties.

Trusted discussion channel – to facilitate information exchange and collaboration within the organisation and within the industry.

Advanced analysis by threat analysts

Malware and shellcode analysis – request in-depth analysis to understand the behaviour of potentially malicious code by submitting artefacts to FinTIP.

Sandboxing – execute untrusted programs or files via FinTIP's sandbox (safe environment).

Localised threat intelligence sharing

Secure local intelligence sharing – private intelligence feed submitted into FinTIP will be collected, sanitised and even anonymised before being shared to the wider audience.

Source: Bank Negara Malaysia

Enhancing cyber situational awareness

FinTIP increases overall industry cyber situational awareness by providing a more holistic view of threat actors targeting the local industry and helps financial institutions better understand the threat actors' tactics, techniques, and procedures. Data collected on threats and IT vulnerabilities are mapped to the IT assets used within the industry to provide an accurate localised cyber exposure level. This information will enable the Bank to pinpoint specific vulnerabilities and assess the potential system-wide impact of a cyber threat.

The reports produced by FinTIP are tactical, operational and strategic in nature to cater for a diverse audience. At the tactical level, technical reports provide granular data on cyber threat indicators which financial institutions can integrate into their cyber security tools to identify and mitigate cyber threats. At the operational level, financial institutions will be able to track attack campaigns and undertake actor profiling to gain a better understanding of the threat actors that target the financial institution. This will enable financial institutions to prioritise and perform more targeted cyber security operations. Finally, at the strategic level, financial institutions can use FinTIP data to inform business decisions by better understanding how global and local events, and the evolving threat landscape affect a financial institution's cyber security posture.

FinTIP complements existing multi-layered defence strategies

FinTIP reflects a shared responsibility for cyber security by facilitating a whole-of-industry approach towards enhancing cyber resilience. It is important to note that FinTIP serves to complement and augment, rather than replace, an individual institution's own existing cyber threat intelligence services. The Bank expects FinTIP to support deeper and faster information sharing and collaboration which in turn, will strengthen the financial industry's response capabilities to the evolving cyber threats affecting the financial system.

Financial Institution Soundness and Resilience

Financial Institution Soundness and Resilience

THE BANKING SECTOR

Liquidity and funding conditions in the banking system remained supportive of credit intermediation activities

Funding conditions in the banking system remained stable. The aggregate Net Stable Funding Ratio (NSFR) stood at 116.4% (December 2020: 116%), with all banks meeting the minimum NSFR requirement of 100% ahead of the 30 September 2021 full compliance deadline. Banking system deposits continued to grow, supported by precautionary savings by households and businesses (Chart 2.1).[1] Meanwhile, deposits from non-bank financial institutions (NBFIs) moderated slightly, reflecting withdrawals by these institutions, partly to facilitate the implementation of Government relief measures.

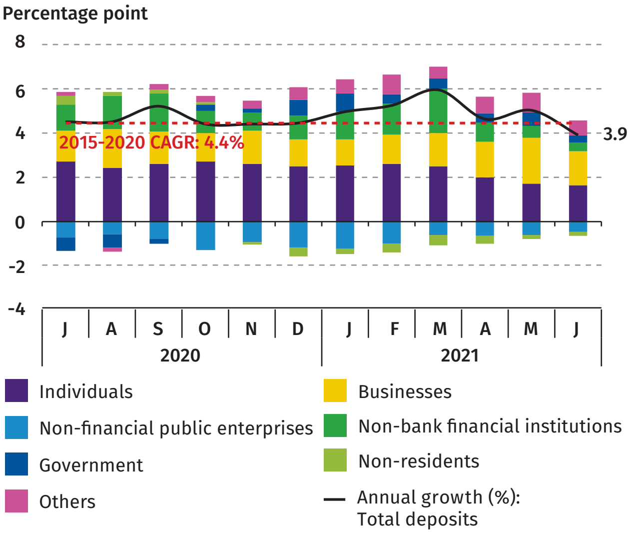
Given the uncertain operating environment, households, businesses, and fund managers have continued to maintain a preference for more liquid deposits (Chart 2.2). This has led to lower funding costs and consequently improved net interest income for banks (Chart 2.3). At the institution level, the shift towards shorter-term funding has led to larger movements in the Liquidity Coverage Ratio (LCR) positions[2] for some banks. However, this is unlikely to have a material impact on liquidity risks given ample liquidity buffers maintained by banks (Chart 2.4). Banks have also continued to more efficiently manage excess liquidity buffers above internal LCR targets in an effort to lift earnings amid slower expected loan growth. All banks continue to record LCR above 100%, with increased holdings of high-quality liquid assets (HQLA).

[1] The moderation in household and business deposit growth since April 2021 was predominantly due to base effects, as the blanket automatic loan moratorium led to a surge in deposit growth from precautionary cash holdings in the second quarter of 2020.

[2] The notable LCR decline in May 2021 was driven mainly by maturing deposits from fund managers due to the expected expiry of an existing income tax exemption for corporate investors on interest or profit earned from money market funds. The tax exemption has been extended to January 2022, which resulted in a rollover of the bulk of the deposits and the corresponding LCR improvement in June 2021.

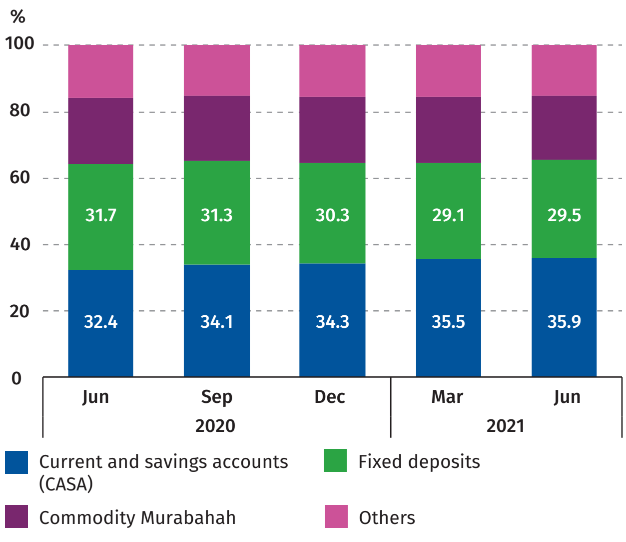
Notably, banks' holdings of government bonds rose by RM22 billion from December 2020 (2H 2020: -RM1 billion), helping to support interest income amid the subdued loan growth.

Chart 2.1: Banking System – Contribution to Growth in Deposits Accepted



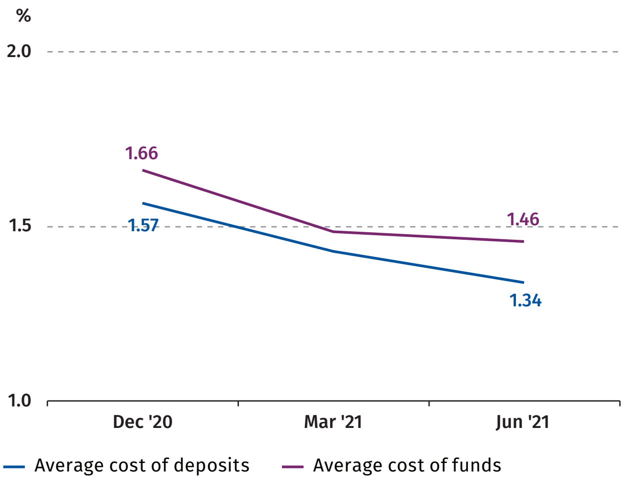
Source: Bank Negara Malaysia

Chart 2.2: Banking System – Composition of Deposits by Type



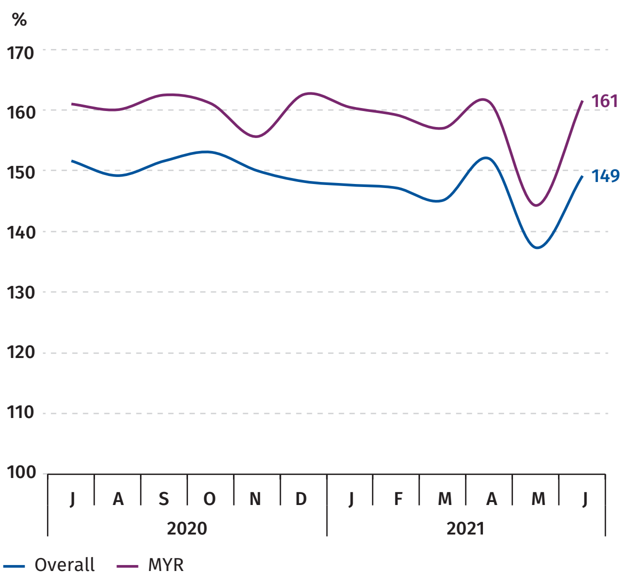
Source: Bank Negara Malaysia

Chart 2.3: Banking System – Average Cost of Deposits and Average Cost of Funds



Source: Bank Negara Malaysia

Chart 2.4: Banking System – Liquidity Coverage Ratio



Source: Bank Negara Malaysia

Moving forward, overall funding conditions are expected to remain supportive of intermediation activity. Some banks could face higher deposit withdrawals by individuals and firms that have been more severely affected by the implementation of the FMCO. The sharply higher take-up of repayment assistance under the PEMULIH package, along with withdrawals by non-bank public enterprises to support additional relief measures could also increase liquidity pressures for certain banks. Heavy outflows by non-residents could further exacerbate these risks. However, as noted earlier, banks' liquidity positions are expected to remain resilient to these pressures. Based on a conservative simulation exercise conducted by the Bank which incorporates the simultaneous materialisation of these downside risks, coupled with the drawdown of unutilised credit lines by businesses, banks' liquidity positions remained resilient. Banks also continue to observe sound liquidity risk management practices, and have additional flexibility to draw on their liquidity buffers, if needed, to preserve support for lending activities. The availability of the Statutory Reserve Requirement (SRR) flexibility until end-2022 will further support banks' ability to respond to potential liquidity stress.

Risks posed by banks' external debt exposures remain manageable

Banking system external debt increased marginally in the first half of the year (RM341.4 billion; December 2020: RM337.2 billion) (Chart 2.5). The weaker ringgit against selected major and regional foreign currencies (FCY) during this period partly contributed to the higher external debt. The level of external debt was notably higher in the first quarter of 2021, driven mainly by higher intragroup transactions by banks in the Labuan International Business and Financial Centre (LIBFC). The bulk of these borrowings are channelled to support financing transactions with non-resident clients, consistent with their active role in facilitating FCY transactions arranged and managed by the head office. Risks associated with these exposures are assessed to be low, with intragroup funding observed to closely match the financing extended in terms of amount, currency, and tenure. Higher interbank borrowings by a few domestic banking groups (DBGs) as part of their centralised liquidity management operations also contributed to the increase in the aggregate external debt of banks. These trends reversed in the second quarter of 2021 with total external debt of banks as a share of total funding remaining low and in line with historical averages of 7.7%.

Overall risks from the external debt exposures of banks continue to be mitigated by a number of factors that remain consistent. Almost 60% of total banking system external debt can be attributed to stable intragroup exposures and long-term debt securities, which are less susceptible to sudden withdrawal shocks and rollover risks (Chart 2.6). Around 20% of the external debt are ringgit-denominated, which are unaffected by valuation changes from currency movements. Additionally, banks continued to maintain sizeable FCY liquid assets of RM170.5 billion, sufficient to cover up to 3.1 times the current level of FCY external debt-at-risk (Chart 2.7).[3] Banks' foreign exchange net open position (FX NOP) has also trended lower to 4.7% (December 2020: 5.2%) of banks' total capital (Chart 2.8). This reflects banks' reduced risk appetite amid renewed uncertainties surrounding the economic and market outlook during the period.

Chart 2.5: Banks' External Debt – by Instrument

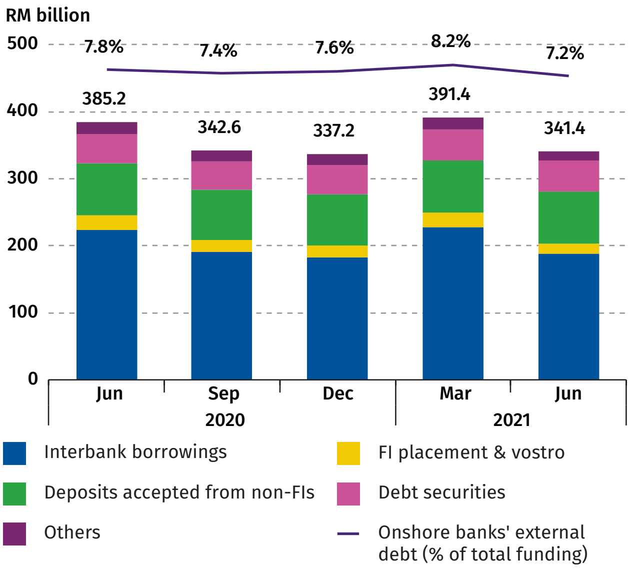


Chart 2.6: Banks' External Debt – by Type of Exposure and Instrument

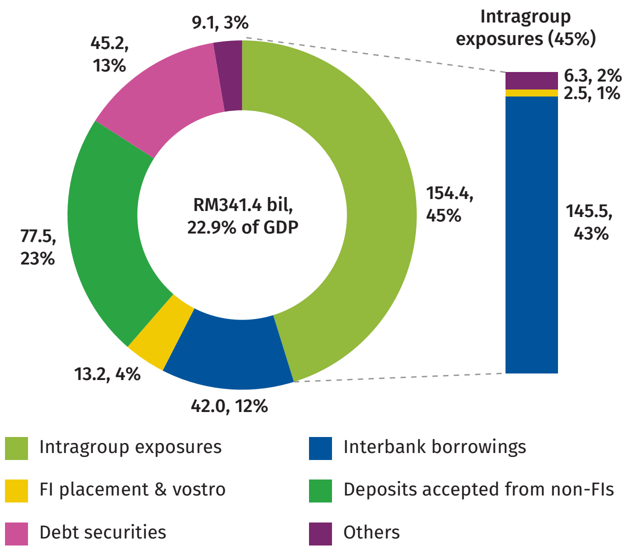


Chart 2.7: Banking System – FCY External 'Debt-at-Risk' and Liquid Assets

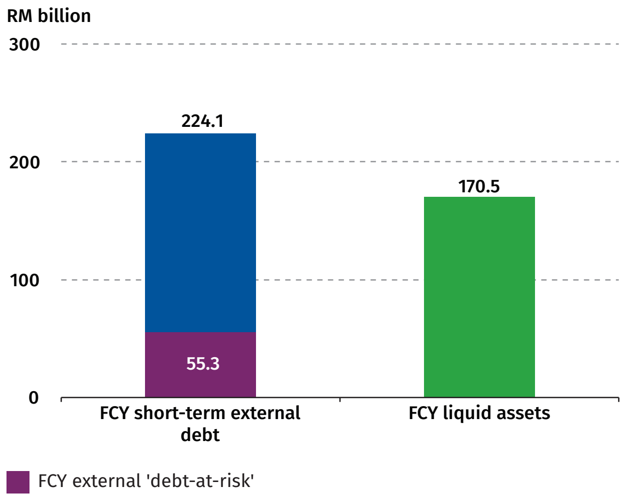
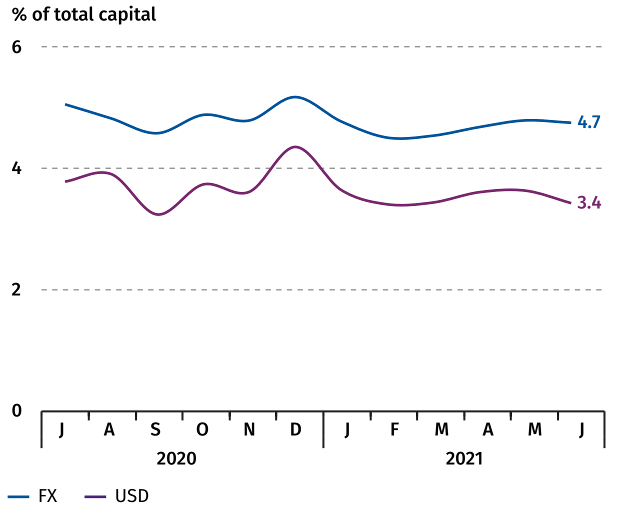


Chart 2.8: Banking System – FX and USD Net Open Positions



Note: 1. Banks' external debt in this context refers to external debt of DBGs, locally-incorporated foreign banks (LIFBs) and LIBFC banks
2. Banking system or onshore banks refer to only DBGs and LIFBs
3. Liquid assets comprise cash and cash equivalents, unencumbered debt securities held and interbank placements

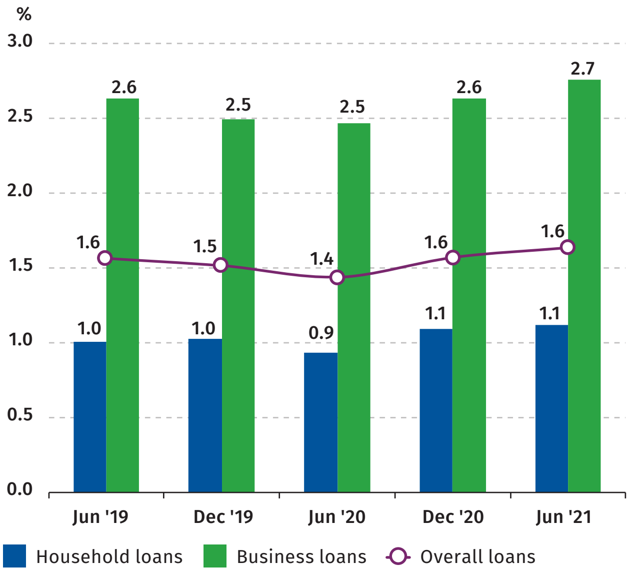
Source: Bank Negara Malaysia

[3] Banks' external 'debt-at-risk' comprises financial institutions' deposits, interbank borrowings, and short-term loans from unrelated non-resident counterparties, which are considered more susceptible to sudden withdrawal shocks.

Banks continued to be resilient despite the challenging credit risk outlook

The expansion of repayment assistance – in November 2020 and again in June and July 2021 – has kept banking system impairments at low levels, with gross and net impaired loan ratios remaining stable at 1.6% and 1% of total loans, respectively (Chart 2.9). Notwithstanding this, banks have continued to increase provisions for credit losses throughout the first half of 2021 in anticipation of a deterioration in asset quality as repayment assistance programmes are gradually unwound. Total provisions are now about 54% higher than the pre-pandemic level at the end of 2019, and have risen further to 1.8% as a share of total loans as at end-June 2021 (2020: 1.7%; 5-year average: 1.3%). The loan loss coverage ratio (including regulatory reserves) has remained around historically high levels at 129.2%. Banks continue to be prudent in setting aside buffers for credit losses from loans assessed to be of higher risk, as observed from the sustained increase in provisions for Stage 2 loans despite impairments remaining low. Provisions for Stage 2 loans represented 40% of total provisions (2020: 36.8%; 2019: 29.2%), in line with the elevated share of loans under Stage 2 which stood at 9.7% of total loans as at end-June (December 2020: 9.9%; 2019 average: 7.5%)[4] (refer to the Information Box on 'Banking Institutions' Provisioning Practices to Mitigate Elevated Credit Risk from the Pandemic' for further details on banks' provisioning practices).

Chart 2.9: Banking System – Gross Impaired Loans Ratio



Source: Bank Negara Malaysia

[4] Refer to the section on Credit Risk for further assessment on credit risk.

Banking Institutions' Provisioning Practices to Mitigate Elevated Credit Risk from the Pandemic

Banks faced considerable challenges in updating their assessments of credit risks and determining the appropriate level of provisions against expected credit losses (ECL) during the COVID-19 pandemic. Elevated levels of uncertainty have required banks to continuously reassess the reasonableness of forward-looking economic indicators embedded in ECL models. This has been further compounded by difficulties faced to ascertain the actual deterioration in borrowers' repayment capabilities, particularly among borrowers enrolled under the various repayment assistance programmes, due to the absence of more current repayment data.

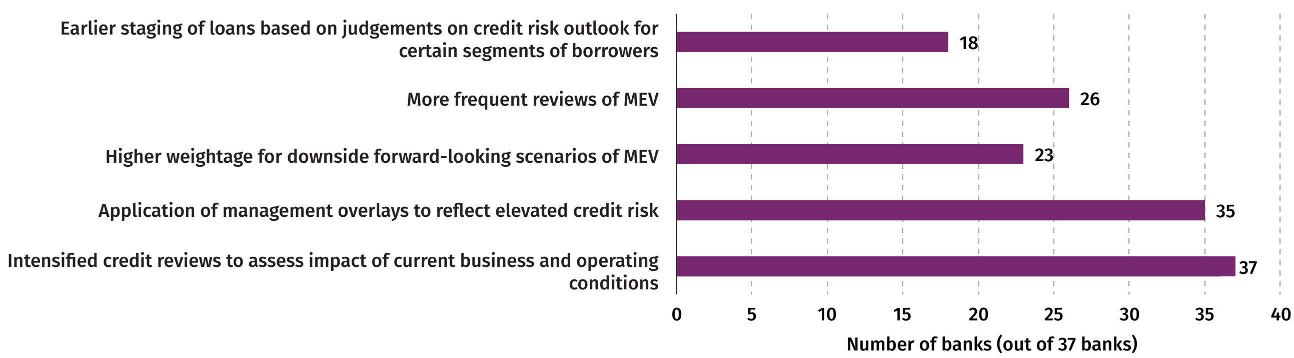
Reflecting these challenges, the Bank formally communicated its expectations of banks to exercise appropriate discretion in the application of accounting and regulatory capital standards in relation to ECL and the definition of default respectively. This took into account the exceptional nature of the COVID-19 shock, and the mitigating effects of substantial policy support measures, including repayment assistance, aimed at helping borrowers bridge temporary repayment difficulties and thus, preserve their debt-servicing capacity over the life of the financing. Consistent with this, the Bank clarified that in the absence of other factors indicating a significant increase in credit risk, the extension of repayment assistance to borrowers affected by the pandemic should not result in an automatic transfer of their financing to Stage 2 or Stage 3 that would, in turn, require banks to make provisions for lifetime losses under MFRS 9. Similarly, the assessment of 'unlikeliness to repay' under the definition of default for regulatory capital purposes should not be based solely on borrowers taking up repayment assistance but should instead be based on a more holistic assessment of relevant indicators and information available on the borrowers.

Against this backdrop, this box elaborates how banks have adapted to the challenges faced in the assessment of credit risks, while ensuring the adequacy of provisions against elevated credit risks due to the pandemic. It draws insights from a thematic review conducted by the Bank in the second quarter of 2021 involving 37 banking institutions.

Banks have adjusted their provisioning and credit monitoring practices to account for the potential increase in credit risk amid lower borrower visibility

All banks have incorporated a higher degree of stringency in their provisioning practices (Chart 2.10). This has taken various forms, including the earlier staging of loans based on judgements about the credit risk outlook for certain borrower segments; subjecting management judgements to stronger oversight; more frequent reviews of macroeconomic variables (MEV) with higher weightages assigned to downside forward-looking scenarios; and adopting greater conservatism in the determination of management overlays to reflect the continued economic uncertainty. Credit monitoring processes were also enhanced by harnessing alternative data, such as data on payment transactions to compensate for the inability or delays in obtaining updated financial information on borrowers. All banks also intensified credit reviews of vulnerable corporate borrowers through frequent virtual engagements, focusing on changes in business and operating conditions to obtain a better understanding of the pandemic's impact on borrowers' profiles.

Chart 2.10: Banks' Provisioning and Credit Monitoring Practices to Account for Potential Increase in Credit Risk

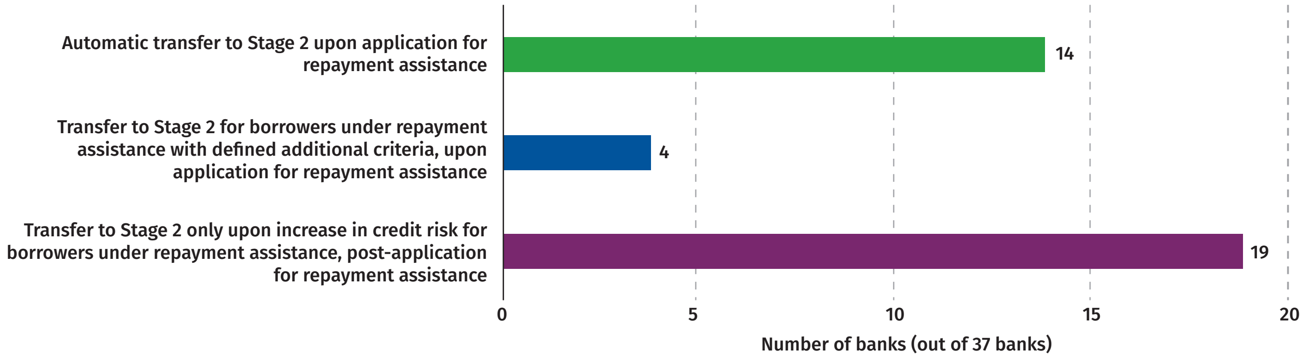


Source: BNM Survey to Banks

Staging classifications

For the retail portfolio, triggers used by banks to indicate a significant increase in credit risk remained reasonably prudent (Chart 2.11). Despite flexibilities provided for banks to make informed judgements on the relative importance attached to criteria normally used to indicate changes in credit risk, almost half (18) of banks covered under the review continue to consider repayment assistance as a key trigger for assessments of a significant increase in credit risk. For most of these banks, the approval of an application for repayment assistance automatically results in the transfer of the financing to Stage 2. In four banks reviewed, an application for repayment assistance would trigger a stage transfer for financing if it also met other indicators of heightened credit risks, such as pre-pandemic records of payment arrears, lower income levels and higher debt service ratios. In the remaining 19 banks, the assessment of a significant increase in credit risk for financing under repayment assistance is based on evidence of repayment behaviour during the repayment assistance period. However, in these cases, banks also consider the extent of a borrower's reliance on repayment assistance programmes to support debt servicing, for example, where requests are made by borrowers to further extend repayment assistance.

Chart 2.11: Banks' Staging Practices for Retail Borrowers under Repayment Assistance



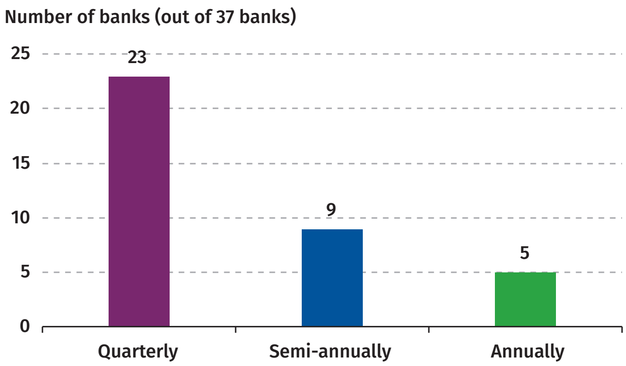
Source: BNM Survey to Banks

For the non-retail portfolio, staging classification practices remain largely unchanged from the pre-pandemic period. Borrowers continue to be assessed at the account level and are moved to Stage 2 or Stage 3 only upon observed evidence of a significant increase in credit risk. Banks with pre-existing policies that require the automatic transfer of rescheduled and restructured loans to Stage 2 have maintained practices consistent with these policies. Several banks were also more pre-emptive in classifying loans under Stage 3, resulting in higher provisions made for selected vulnerable corporates in economic sectors that were most impacted by the pandemic. Most banks have continued to observe the minimum period of sustained debt servicing by borrowers of no less than six months before allowing staging upgrades from Stage 2 to Stage 1 to take place. In all cases, staging upgrades are further subjected to additional reviews at the account-level to affirm that the borrower's debt-servicing capacity is likely to be sustained.

ECL models

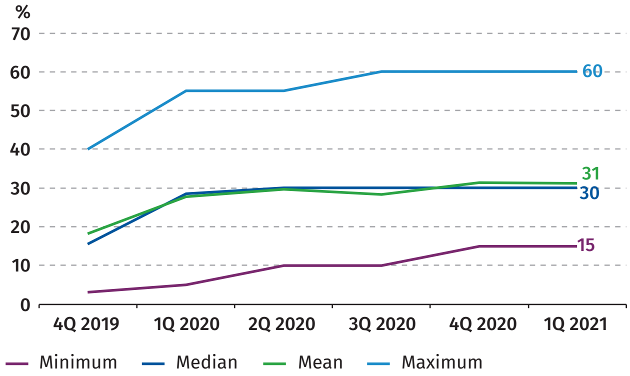
The majority of banks increased the frequency of revisions to MEV used in their ECL models, specifically GDP growth and unemployment forecasts, given the high and persisting degree of economic uncertainty experienced throughout the pandemic (Chart 2.12). Most banks also incorporated a higher degree of conservatism in their MEV forecasts relative to the pre-pandemic period, with a higher weightage (ranging between 15% and 60% across banks) applied to downside forward-looking scenarios (Chart 2.13). 14 banks further excluded probability of default data points in 2020 to mitigate data distortions caused by repayment assistance programmes. During this period, several banks have suspended any write-back of provisions based on ECL model outputs in order to preserve provisioning buffers against higher future expected losses.

Chart 2.12: Frequency of Revisions to MEV



Source: BNM Survey to Banks

Chart 2.13: Weightage for Downside Forward-looking Scenarios



Source: BNM Survey to Banks

Management overlays

The majority of banks have pre-emptively applied management overlays[5] to bolster provisions for borrower segments judged to be of higher credit risk. This includes borrowers under repayment assistance and in economic sectors that have been more affected by the pandemic. The increased application of management overlays by banks reflects the higher uncertainties surrounding the determination of ECL estimates, as well as to provide additional buffers for borrowers under repayment assistance that could see a deterioration in credit risk going forward (including borrowers that remain in Stage 1). Cumulative management overlays set aside by banks currently represent about 40% of total provisions – the highest level since the implementation of MFRS 9. In the second quarter of 2021, management overlays provided by banks with significant retail exposures notably increased by an average of 34% in response to the successive expansion of repayment assistance programmes. In determining the quantum of management overlays, most banks apply higher probabilities of default and/or Stage 2-equivalent default probability assumptions for identified segments of borrowers under repayment assistance.

The pre-existing prudent provisioning practices of banks and adjustments made during the pandemic to account for the heightened level of uncertainty are expected to support the resilience of banks against potential risks of a significant deterioration in asset quality. Loan loss provisions are currently assessed to be adequate to buffer against conservative estimates of projected losses, including losses from exposures to sectors that have been more affected by the pandemic and more vulnerable borrowers that may continue to face difficulties servicing their debt when repayment support measures are gradually unwound. Banks are expecting to further increase provisions in the second half of the year following updated assessments of the impact of the FMCO and the extended duration of repayment assistance programmes. However, current buffers as well as projected earnings should enable banks to absorb such additional provisions. The conservative provisioning practices observed across banks provide further assurance that banks are reasonably well-positioned to withstand higher-than-expected credit losses in the event of more adverse credit developments.

[5] Management overlays are additional provisions set aside on top of provisions derived from ECL models. It reflects adjustments to account for data deficiencies or uncertainties not adequately captured by the ECL models.

The ramp up of provisions in 2020 has provided banks with some headroom this year to moderate the amount of additional provisions set aside for credit losses (Chart 2.14). The resulting decline in annualised credit costs (Chart 2.15), coupled with lower modification losses from the transition to more targeted repayment assistance programmes, supported improvements in banks' profitability in the first half of 2021. Net interest margins also improved (2.1%; December 2020: 1.9%) due to lower funding costs and higher loan growth particularly in the household segment. This partially offset a marked decline in net trading income amid rising bond yields, after significant gains recorded in 2020. Overall, pre-tax profits[6] of the domestic banking system improved slightly (Chart 2.16), translating into higher returns on asset and equity of 1.1% and 9.7% (December 2020: 1.0% and 8.4%), respectively. However, market valuations of listed banks remained volatile and continue to reflect cautious investor sentiment amid prospects of weaker future earnings due to the delayed economic recovery (Chart 2.17).

Chart 2.14: Banking System – Provisions

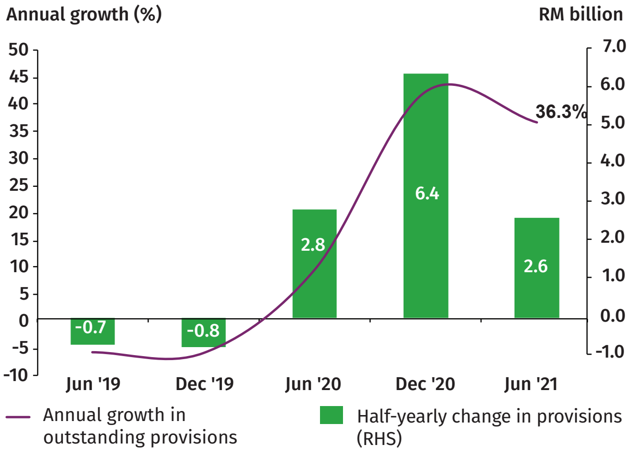


Chart 2.15: Banking System – Annualised Credit Cost Ratio

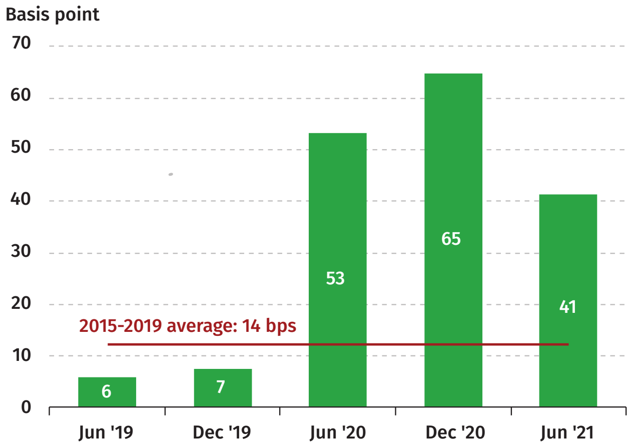


Chart 2.16: Banking System – Income, Cost and Profit before Tax

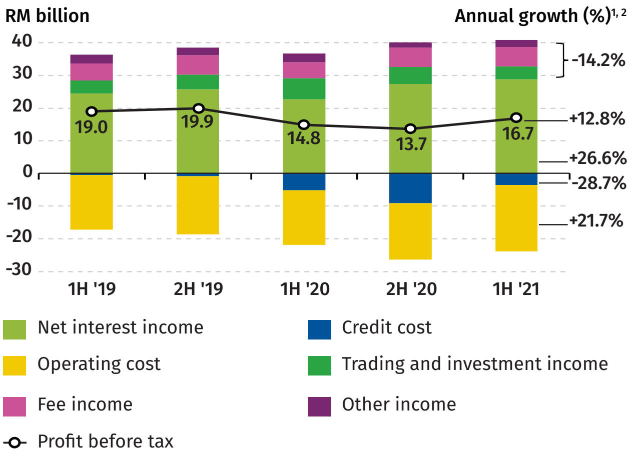
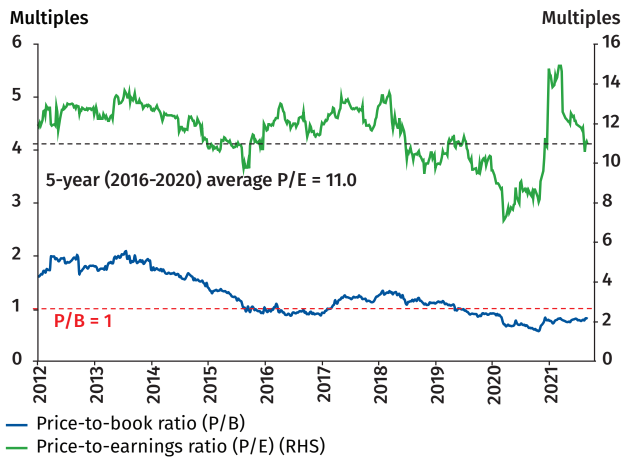


Chart 2.17: Banking System – Price-to-Book and Price-to-Earnings Ratios[3] of Publicly Listed Banks in Malaysia



Note: 1. Annual growth computed based on figures for 1H 2020 and 1H 2021
2. Figures may not add up due to rounding
3. Refers to median ratio of all publicly listed banks in Malaysia

Source: Bank Negara Malaysia and Bloomberg

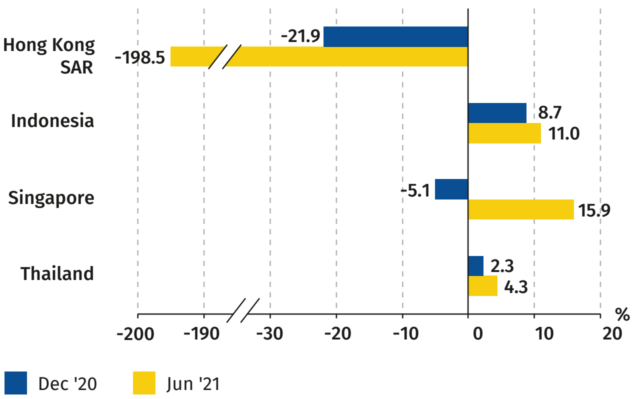
[6] Banking system profits are aggregated at the entity level. The aggregated results are subsequently adjusted for dividend income received from domestic banking subsidiaries (previously added at both the parent and subsidiary levels). Differences in comparative pre-tax figures reported in previous Financial Stability Reviews are estimated to range between 5.5% and 10.7%.

Banks expect to continue bolstering provisions in the second half of 2021 given renewed stress faced by some borrowers. However, this is likely to taper off with the return to more targeted repayment assistance along with greater ability of banks to differentiate borrowers' repayment capacity as broad-based repayment assistance measures are gradually retired. Loan growth is also expected to improve as containment measures are eased in tandem with the progress of the domestic vaccination programme. This will provide further support to earnings.

DBGs' overseas operations continue to remain resilient, with a recovery in profitability in most jurisdictions

Most of the DBGs' overseas operations[7] recorded an improvement in profitability, mainly due to lower provisions made this year compared to 2020 (Chart 2.18). In particular, operations in Singapore, which are the most significant (Chart 2.19), registered a strong turnaround in tandem with the recovery in economic activities as COVID-19 infections were effectively contained. Earnings from operations in Indonesia and Thailand were also lifted by a lower increase in impairment allowances. The overall performance of overseas operations was, however, weighed down by operations in Hong Kong SAR mainly due to higher provisions from additional management overlays allocated for borrowers with elevated credit risk.

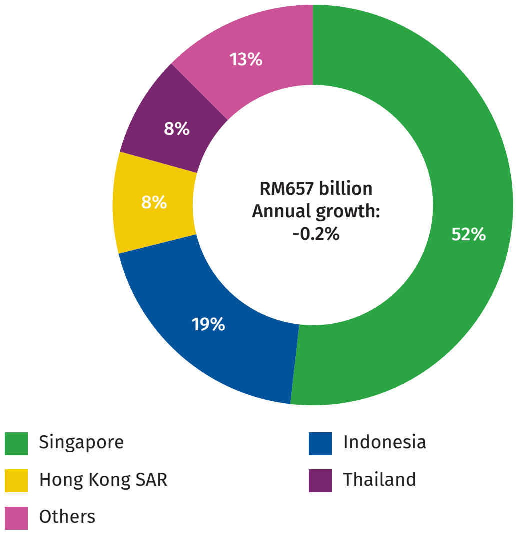
Chart 2.18: Banking System - Return on Equity of Overseas Operations by Jurisdiction



Note: Average ROE is weighted by the asset size of each domestic banking groups' overseas operations in respective jurisdictions

Source: Bank Negara Malaysia

Chart 2.19: Banking System - Asset Profile of Major Overseas Operations



Source: Bank Negara Malaysia

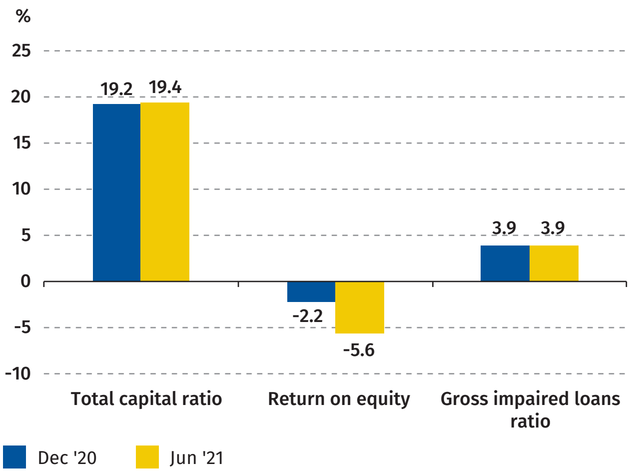
Relief measures implemented throughout the first half of 2021 have continued to support the asset quality of DBGs' overseas operations which remained broadly stable (Chart 2.20).[8] Overseas exposures to sectors directly and indirectly affected by the pandemic are also relatively small, ranging between 0.02% and 7.2% of gross loans of individual DBGs. Further, liquidity and funding risk in key jurisdictions continue to be manageable as activities are largely funded by customer deposits (Chart 2.21).

During this period, most overseas operations of DBGs have observed an increase in short-term deposits arising from relief measures implemented in the respective jurisdictions. Capital buffers held against overseas operations remain strong and are expected to reduce the need for any recourse to parental support. While the resurgence in COVID-19 cases in some jurisdictions continues to cloud the credit risk outlook, stress tests conducted by the Bank on overseas operations affirm that all major foreign subsidiaries of DBGs are expected to have sufficient capital buffers to withstand potential shocks under extreme stress scenarios, without additional support from their respective parent DBGs.

[7] Refers to DBGs' overseas offices (branches and subsidiaries) operating outside of Malaysia and LIBFC. DBGs have presence in 14 overseas jurisdictions, with major operations in Singapore, Indonesia, Thailand and Hong Kong SAR.

[8] Impairment ratio is weighted by the asset size of operations of each DBG in respective jurisdictions.

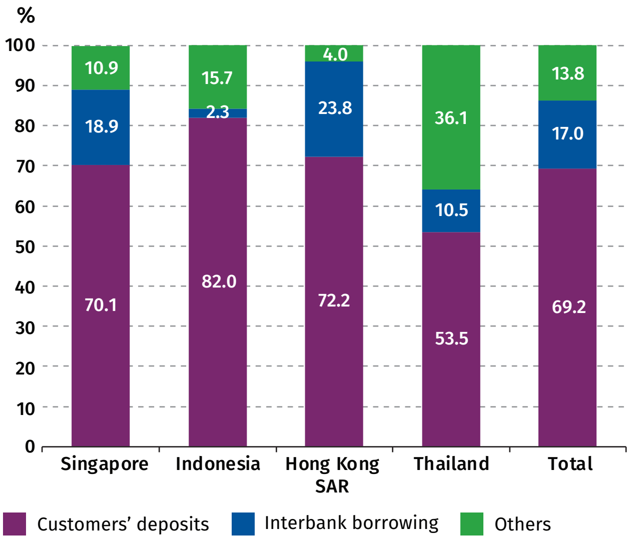
Chart 2.20: Banking System – Key Financial Indicators of Overseas Operations



Note: The average key financial indicators are weighted by the asset size of selected overseas operations

Source: Bank Negara Malaysia

Chart 2.21: Banking System – Funding Profile of Major Overseas Operations

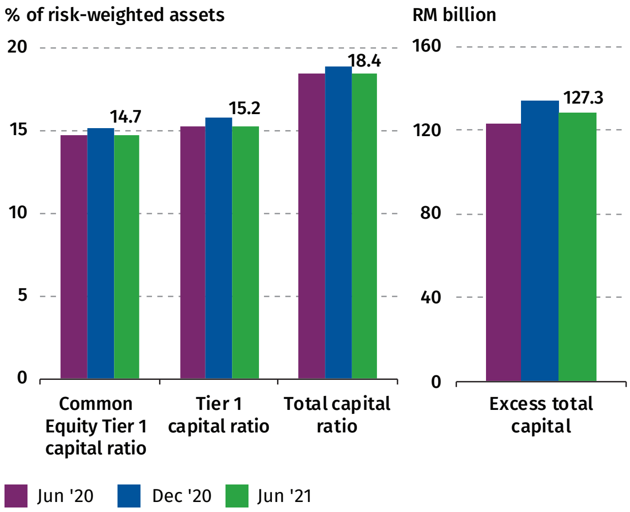


Note: Figures may not add up due to rounding

Source: Bank Negara Malaysia

The improvement in earnings from both their domestic and overseas operations has enabled banks to preserve healthy capital buffers. This allowed some banks to cautiously resume dividend payments that were previously halted or reduced to conserve capital, although a number of banks have kept in place dividend reinvestment programmes to protect their capital buffers given lingering uncertainties over the outlook of the economy. Banks continued to maintain strong capital positions, with excess capital buffers[9] above the regulatory minimum that remain high (Chart 2.22). This remains critical to promote supportive conditions for bank lending amid higher expected levels of credit losses.

Chart 2.22: Banking System – Capital Ratios



Note: Excess total capital refers to total capital above the regulatory minimum, which includes the capital conservation buffer requirement of 2.5% and bank-specific higher minimum requirements

Source: Bank Negara Malaysia

All domestic systemically important banks (D-SIB) continued to maintain CET1 capital comfortably above the regulatory minima, including the higher loss absorbency (HLA) requirements which came into effect on 31 January 2021, and internal capital targets. Based on the Bank's latest assessment using end-2020 data submissions,[10] the list of banks subjected to the higher capital buffer requirements to reflect their systemic importance remains unchanged (Table 2.1).

Table 2.1: D-SIBs HLA Requirement

D-SIBs	HLA Requirement (% of risk-weighted assets)
Malayan Banking Berhad	1.0
CIMB Group Holdings Berhad	
Public Bank Berhad	0.5

Source: Bank Negara Malaysia

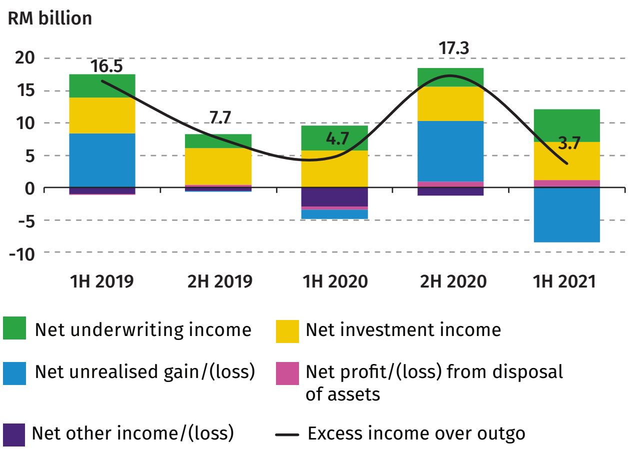
[9] Refers to capital held in excess of regulatory minimum, which includes the capital conservation buffer (2.5%) and bank-specific requirements.
[10] The D-SIBs assessment is bounded for banks with total consolidated assets equal to or more than RM30 billion. Please refer to https://www.bnm.gov.my/-/domestic-systemically-important-banks-d-sib-framework.

THE INSURANCE AND TAKAFUL SECTOR

The insurance and takaful sector recorded lower profitability, driven by weaker investment performance

The overall profitability of insurance and takaful funds was lower in the first half of 2021 compared to the same period in 2020. For the life insurance and family takaful funds, excess income over outgo declined to RM3.7 billion (1H 2020: RM4.7 billion) (Chart 2.23). This was driven by net unrealised losses from bond investments in line with the weaker bond market performance and, to a lesser extent, mark-to-market equity investment losses. Income from underwriting activities provided some support to profitability. Growth of new business premiums[11] recovered strongly at 30.2% (1H 2020: -7.1%), primarily driven by the investment-linked, Mortgage Reducing Term Assurance/Takaful (MRTA/MRTT), and medical and health business segments (Chart 2.24). This reflected the resumption of face-to-face product sales and property market activity as a result of less restrictive containment measures up until end-May. As noted in the previous publication of the Financial Stability Review, ITOs have also observed an increasing awareness among Malaysians on the important role that insurance and takaful can have in providing a financial safety net in times of uncertainty. This is expected to provide some lift to demand for insurance and takaful despite near term pressures on household incomes.

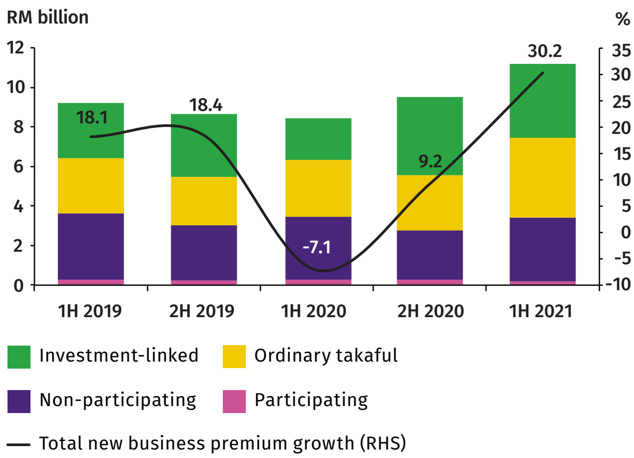
Chart 2.23: Life Insurance and Family Takaful Fund – Composition of Income and Outgo



Note: Net underwriting income refers to excess of net premium after deducting benefit payouts, agency remuneration and management expenses

Source: Bank Negara Malaysia

Chart 2.24: Life Insurance and Family Takaful Sector – New Business Premium Growth and Product Composition



Source: Bank Negara Malaysia

[11] Refers to both insurance premiums and takaful contributions, unless stated otherwise.

The impact on life and family ITOs from the temporary relief measures granted to policyholders[12] remained limited. Affected policyholders have been afforded the option to defer premiums due under life insurance policies and family takaful certificates for three months, without interruption in their coverage. This option, previously slated to expire by June 2021, has been extended until December 2021. Policyholders that have availed of the premium deferment option have continued to increase, although the amount of premiums deferred and covered by premium holidays[13] remained relatively small at 8.3% of premiums in force (June 2021: 7.7%; March 2021: 6.5%).[14] To account for heightened risks arising from the pandemic, some life and family ITOs have introduced additional underwriting measures, including questionnaires to assess the COVID-19 medical history and risk exposure of prospective policyholders. In selected cases, affected policyholders could be subjected to additional underwriting conditions such as longer waiting periods. Higher premium loadings could also be imposed on policyholders with indications of higher risk to develop serious health conditions, although this would be largely dependent on further medical assessments undertaken on a case-by-case basis. Overall, such practices have so far not been widely observed to suggest a broader tightening of underwriting conditions across ITOs due to COVID-19.

The impact on ITOs' earnings from the premium deferrals as well as COVID-19 claims is expected to remain manageable, with ITOs assessed to be resilient against stressed scenarios assuming higher claims[15] than observed thus far. Consistent with this, ITOs have not to date been dependent on the regulatory flexibilities accorded to them throughout the course of the pandemic.

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[12] Refers to both insurance policyholders and takaful participants, unless stated otherwise.

[13] A premium holiday refers to continued insurance/takaful coverage despite an absence of premium payments and applies to products with the premium holiday feature already in place such as investment-linked products. This flexibility is available to policyholders as long as the investment value in the unit fund remains sufficient to meet the necessary insurance cost during the premium holiday period.

[14] Based on a cumulative amount from 27 March 2020 until 3 September 2021.

[15] Assumptions under the stressed scenarios include: (i) COVID-19-related ex-gratia payments to policyholders and higher claims for policies without a pandemic clause; and (ii) a conservative increase in the general insurance claims ratio by up to 17%. Refer to the section on 'Assessing the Resilience of Financial Institutions' in the BNM Financial Stability Review for Second Half 2020 for further details.

Evaluating the Impact of Medical Re-pricing Deferrals on Life Insurers and Family Takaful Operators

Medical reimbursement insurance/takaful cover in Malaysia is typically designed to cover or reimburse, either fully or partially, the expenses arising from inpatient and certain outpatient medical treatments. In 2020, close to 7 million individual medical reimbursement policies/certificates were written by life insurers and family takaful operators. This represents a significant portion of life insurance and family takaful business, accounting for 68% of total protection insurance and takaful claims[16] in 2020. This box examines trends in the claims experience of medical reimbursement insurance/takaful products, the effect of the pandemic, and the consequential impact on the re-pricing cycles of these products.

How are medical reimbursement insurance/takaful covers managed?

Medical reimbursement covers are typically designed with annually reviewable premium rates to reflect changes in the cost of treatment and propensity to utilise healthcare services. As these factors are difficult to predict in the long term, regular re-pricing is a standard feature of these products to ensure the sustainability of the medical insurance/takaful portfolios. Medical insurance/takaful portfolios become unsustainable when the premiums collected are insufficient to cover the expected claims cost, expenses, and profit margin of the ITOs. Key assumptions used to estimate the expected claims cost are the rate of medical claims inflation and the average cost per treatment or claim event. Similar to other countries, the cost of medical services in Malaysia has been increasing at a much faster pace than general price inflation (Table 2.2). The claims cost is also affected by changes in utilisation of healthcare services by policyholders, which may arise from demographic shifts and changes in lifestyle and behaviours. All these assumptions are combined to derive the expected claims cost which determines the required level of premiums.

Table 2.2: Comparison of Net Medical Trend Rates

	Net Medical Trend Rate* (%)		
	2019	2020	2021 (Projected)
Malaysia	10.0	10.7	9.8
Singapore	7.1	7.8	7.7
Global	5.1	4.6	6.2
United States	6.1	6.6	5.1
United Kingdom	3.9	5.2	5.0
Australia	4.9	4.6	4.2

*Medical trend rate net of general inflation

Source: 2021 Global Medical Trends Survey Report, Willis Towers Watson

16 Total protection claims are claims which arise from medical, death, and disability coverages, excluding surrender and maturity claims. This proportion includes medical claims from group and employer-based schemes.

The claims experience of medical reimbursement covers varies across ITOs, and even across the various products of the same ITO, on account of:

(1) The risk profiles of individuals covered, such as age groups, which in turn affect the type of medical services utilised. For example, products covering individuals with older age profiles will likely exhibit higher medical claims inflation since the likelihood of requiring medical services and encountering surgical complications increases with age; and

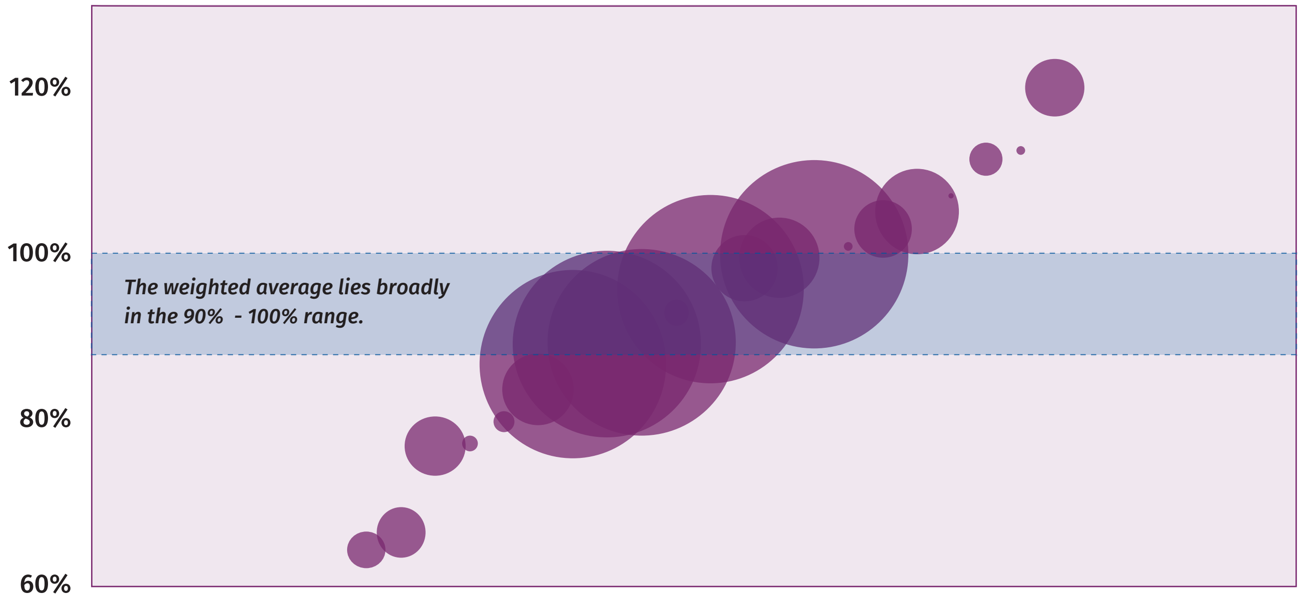
(2) Product features, which affect policyholders' tendency (and ability) to make a claim. For example, products with cost-sharing features often have lower claims payout compared to those without. In some countries, cost-sharing via deductibles or co-payments is mandated in their healthcare systems to contain the cost of medical services.

To maintain fair outcomes across policyholders, premiums are typically differentiated to take into account differences in claims experience between risks that are pooled together. For example, the premium levels for risk groups with higher tendency to claim and/or require more expensive treatments are generally set higher than those with lower risk profiles.

How has COVID-19 impacted the claims trend and what can be expected post-pandemic?

Over the period from 2015 to 2019, the combined ratio of life insurance and family takaful industry's individual medical portfolio lay broadly in the range between 90% and 100% (Diagram 2.1). It is observed that the combined ratio, which is the ratio of total claims paid and expenses to total premiums collected,[17] displays a cyclical pattern of peaks and troughs that coincides with a three- to five-year re-pricing cycle commonly practised by ITOs.

Diagram 2.1: Distribution of Life Insurers and Family Takaful Operators' Total Medical Combined Ratios for the Period 2015 - 2019



Note: The size of the bubbles generally denotes the size of medical business by claims, averaged for the top 5 writers

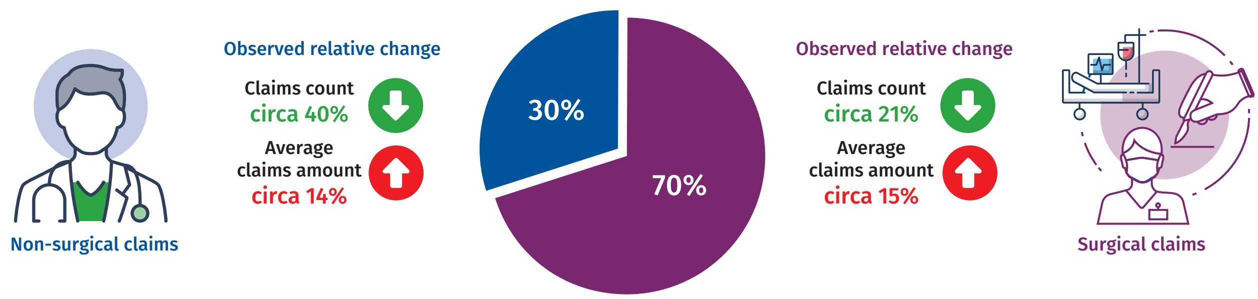
Source: Bank Negara Malaysia estimates

[17] A combined ratio of 100% indicates that the premiums collected are fully depleted by claims and expenses, with no profit left for the ITO as a return for underwriting the portfolio.

In 2020, the combined ratios of the medical portfolios of ITOs decreased. It was observed that the lower claims were driven primarily by temporary factors, such as movement restrictions, reduced social contact due to the implementation of remote working and learning, and hesitation to seek non-critical medical treatment at hospitals during the pandemic. The number of claims in 2020 decreased compared with 2019, with most claims coming from critical treatments that could not be deferred. However, the reduction in the number of claims during the pandemic period was partially offset by the increase in the average cost per treatment of 14% for non-surgical treatments and 15% for surgical treatments (Diagram 2.2), which exceeded the respective long-term trends of 8% and 9% per annum.[18] This was partly attributable to the more severe and urgent nature of illnesses being treated and claimed for, as well as additional costs arising from pandemic-related protocols such as lab tests for COVID-19 and higher utilisation of disposable medical supplies (including personal protective equipment).

Diagram 2.2: Claims Experience Over the Pandemic Period by Claims Type

Lower medical claims incidence but average medical claims inflation continued to rise during the pandemic period



Note: The annualised relative change in claims count and average claims amount is based on a comparison between 2019 experience to that over the pandemic period (2020 up to 1H 2021). The annualised relative change experienced by each individual life insurer and family takaful operator may differ from the above aggregate statistics

Source: Bank Negara Malaysia estimates using data from life insurers and family takaful operators with significant medical business

The number of claims is expected to normalise once the pandemic abates and movement restrictions are gradually lifted. Incidences of hospitalisation from common non-surgical treatments such as stomach flu and dengue fever are expected to return to past trends. Although the extent of the rebound in medical claims post-pandemic is uncertain, observations from other markets suggest the possibility of a temporary increase in utilisation of healthcare services. This can be contributed by a sharp increase in the number of claims compared to the pandemic period due to delayed non-critical treatments, and diagnoses from postponed medical visits by individuals who had earlier avoided going to hospitals due to COVID-19 concerns (Gardner and Fraser, 2021; Berlin et. al, 2020).

In the short term, the average treatment cost could also increase due to poorer health conditions worsened by delays in seeking treatment (Mathews and Cherney, 2020). Demand-supply dynamics may also push costs higher, particularly for hospital supplies and services that may increase due to higher demand. Based on 2018 claims data, hospital supplies and services accounted for 60% and 70% of claimable surgical and non-surgical treatment costs respectively in Malaysia.[19] Further, higher charges from pandemic-related protocols are likely to persist in the foreseeable future.

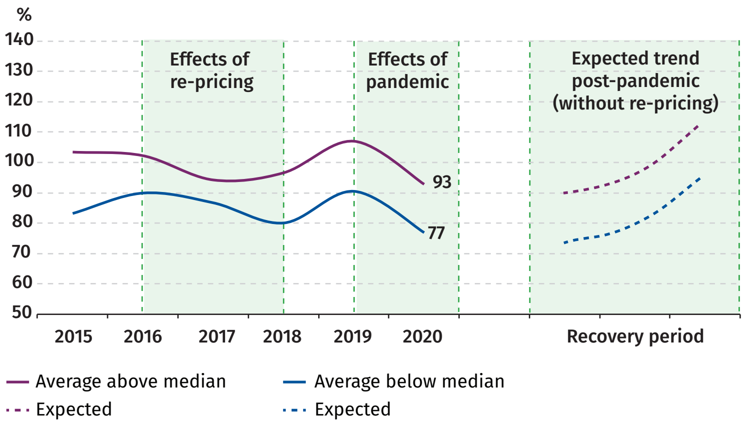
Over the longer term, it is uncertain how the pandemic will affect underlying medical trends. The accelerated adoption of telehealth services by international insurers during the pandemic has been a notable development that could improve the efficiency of providing healthcare and reduce cost. However, balanced against this is the yet unknown effects of long COVID[20] in the insured population which could increase the utilisation of healthcare services (Aon, 2021; Willis Towers Watson, 2020).

[18] The compounded annual growth rate from 2013 – 2018 of average billed amount based on an independent study commissioned by the industry through the Medical Cost Containment Task Force.
[19] Based on the independent study commissioned by the industry through the Medical Cost Containment Task Force.
[20] Longer-term health conditions that may affect some patients after contracting COVID-19.

What is the impact of delaying the re-pricing cycle?

Notwithstanding these expected trends (Chart 2.25), most ITOs agreed to defer any earlier planned re-pricing exercises in 2020 to preserve the affordability of medical covers. ITOs will be carefully evaluating the risks of continuing to delay the re-pricing cycle, especially for portfolios with the highest combined ratios prior to the pandemic (Chart 2.26). For such portfolios, there is considerable risk that a sharp rebound in claims once the pandemic fears subside could lead to steeper or more frequent price increases in the near term. This could have a disproportionate impact on some individual policyholders given the larger adjustments made over a shorter period of time. In the takaful business, which is based on risk sharing between takaful participants, there could be additional concerns relating to fairness and equity if the medical tabarru' charges are not increased in line with risk expectations, as other takaful participants will be subsidising the losses attributed to medical claims to a greater extent than originally represented to participants.

Chart 2.25: Medical Combined Ratios from 2015 to 2020 and the Expected Impact of Delaying Re-pricing



Medical Re-pricing Mechanism

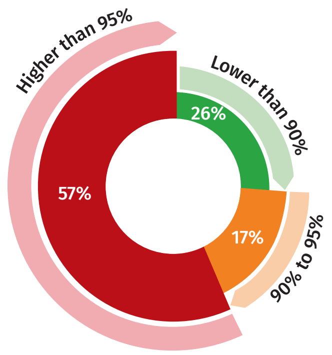
Re-pricing is typically triggered when the actual combined ratio of a medical product portfolio exceeds a pre-determined threshold and the current price of the product is considered to be no longer sustainable. Under a re-pricing exercise, a new price will be set based on expected future claims experience with some allowance for inflation to ensure the portfolio remains sustainable until the next review.

Once begun, a re-pricing exercise for a particular product takes place over a duration of one year, as the new prices will take effect at the policy/certificate anniversary of each individual in the portfolio. Immediately following a re-pricing exercise, the combined ratio decreases for a short while before rising again over a few years to trigger the next re-pricing cycle.

Note: Data represents yearly renewable individual medical insurance policies. The average combined ratio is aggregated for all life insurers that are higher or lower than the median life insurer for each calendar year. Data has been adjusted to address any data issues

Source: Bank Negara Malaysia estimates using data from life insurers

Chart 2.26: Distribution of Life Insurers and Family Takaful Operators by Pre-pandemic Medical Combined Ratios



Note: Data represents 2019 medical claims experience

Source: Bank Negara Malaysia estimates

What can be done to better manage the re-pricing of medical insurance/takaful business?

While re-pricing enables ITOs to manage the sustainability of their business, the Bank requires ITOs to implement re-pricing exercises in an objective and fair manner, based on actual past claims experience and expectations of future claims experience that are reasonable and supportable. Prior to the pandemic, the Bank was also concerned when ITOs delayed re-pricing exercises for too long as a competitive strategy. Lengthy delays are likely to result in sharp and unexpected premium adjustments subsequently to catch up with claims inflation. This may leave policyholders who are unable to afford the higher premiums with limited options to obtain replacement coverage due to advancement in age or changes in their health status. To promote fairer outcomes for policyholders, ITOs are required to establish an internal policy to govern the medical re-pricing exercise, which includes setting out objective indicators and thresholds used by ITOs to trigger re-pricing, as well as the methodology used to determine the new price. The implementation of these policies must be monitored and reviewed to ensure that it is applied consistently and with due regard to the fair treatment of policyholders. The Bank is also reviewing existing regulations to allow more flexibility for ITOs to moderate the extent of re-pricing required for smaller product portfolios that may be more likely to experience greater volatility in claims experience.

Following earlier signs of improvements in the economy in 2021, some ITOs have resumed re-pricing recently. However, these ITOs have also put in place measures to support medical policyholders who may have difficulties maintaining higher premium payments given the current exceptional circumstances. The measures aim to ease cashflows of policyholders without forgoing protection, allowing them time to financially recover. Options made available to policyholders include enabling them to maintain premiums at the original amount before re-pricing, by temporarily switching to a cheaper plan or product. Policyholders exercising this option would be able to revert to their original coverage within a specified period without new or additional underwriting. This is in addition to the existing option for affected policyholders to temporarily defer premium payments.

Over the longer term, containing medical claims inflation, which is a major driver of re-pricing, remains a key priority to preserve sustainable access to medical reimbursement coverage from private ITOs. This requires a concerted effort from multiple stakeholders – including healthcare providers, regulators, ITOs, support service providers, and end consumers – to deliver longer-term reforms in the delivery and consumption of private healthcare services. Such reforms are further discussed in the article on 'Managing Medical Claims Inflation' published in the Bank's Annual Report 2019.

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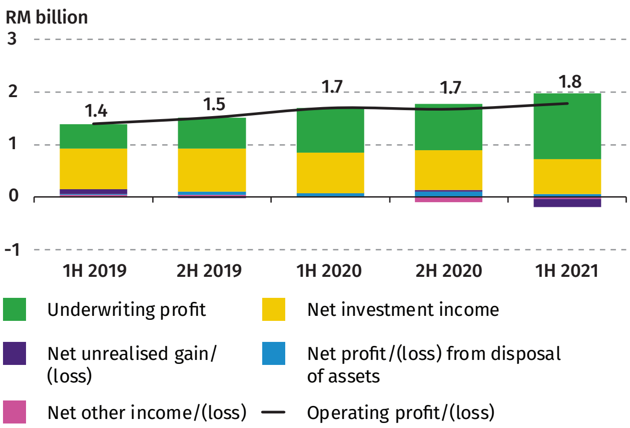
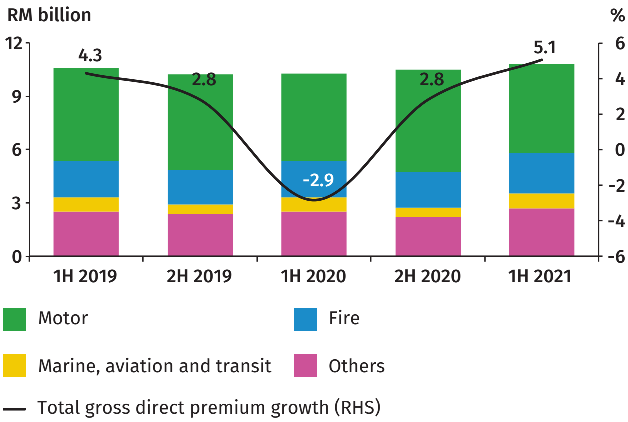
General insurance and takaful funds recorded a slight increase in operating profits to RM1.8 billion (1H 2020: RM1.7 billion), driven by better underwriting performance (Chart 2.27). Gross direct premiums were bolstered by revised premium rates in the fire, and contractors' all risks and engineering segments (1H 2021: +14%; 1H 2020: +4%) following higher claims from several large fire and explosion incidents in the last two years (Chart 2.28). Higher premiums were also supported, to a lesser extent, by a recovery in the motor segment amid a rebound in car sales following the extension of the vehicle sales tax exemption, which is in place until December 2021, and the easing of containment measures prior to the FMCO. A modest increase in general reinsurance rates was observed amid a hardening of the global reinsurance market, mainly affecting the commercial and specialised lines of business. Reinsurance support for the coverage of business interruption losses arising from infectious and contagious diseases – already limited in terms of global capacity and take-up – may also be further reduced in the wake of the pandemic. However, this had little impact on the overall profitability of ITOs. Some smaller ITOs continued to experience considerable earnings volatility due to a higher reliance on investment income to support overall profitability. Risks of heightened volatility in the financial markets therefore remain significant for these ITOs.

Chart 2.27: General Insurance and Takaful Fund – Composition of Operating Profits



Source: Bank Negara Malaysia

Chart 2.28: General Insurance and Takaful Sector – Gross Direct Premium Growth and Product Composition



Note: Others include contractors' all risks and engineering

Source: Bank Negara Malaysia

Despite the lower interest rate environment, the long-term asset allocation and investment strategies of life and family ITOs have remained largely stable. The life insurance industry is also expected to remain resilient in an environment of prolonged low interest rates.[21] In comparison, general ITOs have been observed to shift more of their cash holdings into Collective Investment Schemes (CIS)[22] over the past few years to generate higher returns, while still maintaining sufficient liquidity to meet short-term obligations. General ITOs' cash and deposit holdings declined further to 15.1% of total assets (December 2020: 18.4%), while their bond holdings have also increased in tandem over the recent period to 28.9% of total assets (December 2020: 27.6%). Additionally, general ITOs were also observed to have increased their investments in equities during this period, taking advantage of attractive equity prices. ITOs' investment risk management practices remain generally sound. Investment strategies continue to be largely driven by ITOs' board-approved strategic asset allocation and tactical asset allocation plans that have not changed significantly in response to market developments in recent periods. This continues to be supported by satisfactory monitoring and governance arrangements that serve to contain risk exposures in asset classes that have experienced greater volatility.

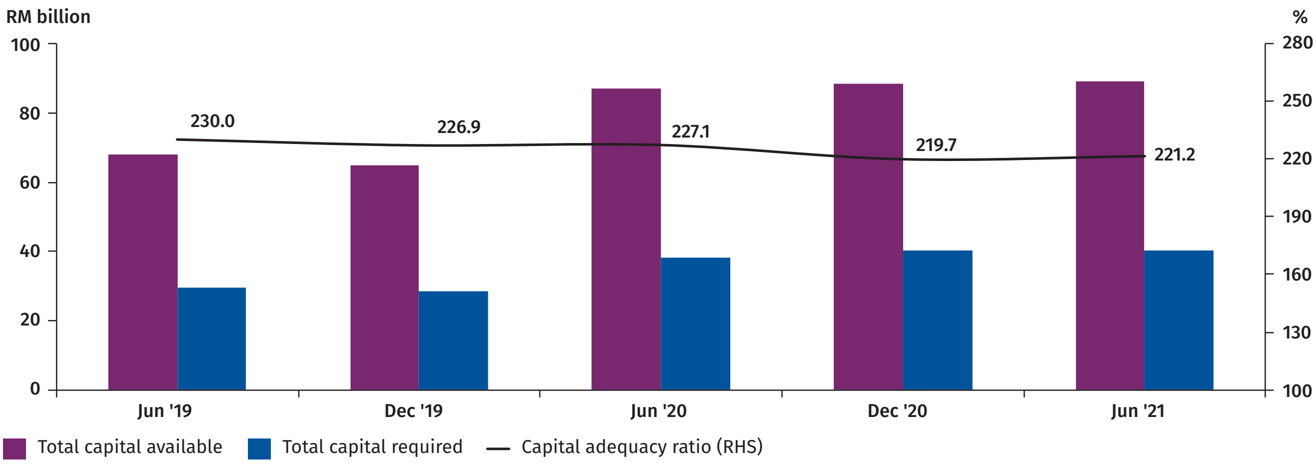
[21] Refer to the Information Box on 'Assessing the Impact of Declining Interest Rates on Life Insurers' Solvency Positions' in the BNM Financial Stability Review for Second Half 2019.

[22] Largely comprise investments in unit trust funds with fixed income investments as the underlying assets.

Going forward, financial market volatility and prospects of rising bond yields will continue to weigh on earnings of ITOs given their sizeable financial investments. Nonetheless, the insurance and takaful sector is expected to remain resilient. A sensitivity analysis conducted[23] on the balance sheet of ITOs shows limited impact to their solvency positions in the event of a sharp rise in bond yields. This is underpinned by the strong capitalisation of ITOs.

The aggregate industry capital adequacy ratio (CAR) of 221.2% remains well above the regulatory minimum of 130% (Chart 2.29). All ITOs also continue to maintain capital ratios above their internal capital target levels that range between 150% and 250%. As at end-June 2021, aggregate excess capital buffers above the regulatory minimum stood at RM36.8 billion. Stress tests conducted on insurers[24] also affirmed their ability to withstand severe potential shocks.

Chart 2.29: Insurance and Takaful Sector – Capital Adequacy Ratio



Source: Bank Negara Malaysia

[23] Refer to the section on Market Risk in the chapter 'Coping with an Uneven Recovery: Key Developments in the First Half of 2021' for details of a sensitivity analysis conducted on the balance sheet of ITOs to bond yield movements.

[24] Refer to the section on 'Assessing the Resilience of Financial Institutions' in the BNM Financial Stability Review for Second Half 2020 for further details.

ASSESSING THE RESILIENCE OF FINANCIAL INSTITUTIONS

Stress testing is an integral component of the Bank's financial stability framework. In the previous publication,[25] the Bank presented the results of its most recent multi-year, top-down solvency stress test. In that exercise, two hypothetical adverse scenarios were designed to augment our assessment of the resilience of individual financial institutions and the broader financial system against an economic recovery path that was significantly weaker than anticipated. Results of the exercise affirmed that financial institutions are adequately buffered against potential losses that may arise should these adverse scenarios materialise.

Taking into account developments since the publication of those results, including the implementation of the FMCO, the top-down stress test performed earlier this year continues to capture the range of possible severe economic and financial shocks that sufficiently tests the resilience of financial institutions. This, in part, reflects the significant degree of conservatism around repayment assumptions that has been built into the stress test when translating the applied shocks into potential losses of financial institutions (Table 2.3).

Therefore, an update of the multi-year, top-down stress test will be published in the Financial Stability Review for the Second Half of 2021, in line with past annual stress test cycles. Notwithstanding this, as part of the Bank's ongoing supervisory assessments, individual banks were required to submit their stress test results based on a hypothetical stressed scenario of a weaker-than-expected economic recovery path, extending to the end of 2022. The scenario assumes that recovery in the domestic economy will be gradual and only expected towards the second half of 2022. Given prolonged movement restrictions, economic scarring is assumed to be deep and widespread with elevated unemployment levels, depressed asset prices, high business closures, and weak consumer and business sentiments. In addition, no further extension of support measures and introduction of new relief measures are assumed. Banks were also asked to consider the impact of potential sovereign rating downgrades. As with the top-down, macro-solvency stress test, the economic scenario used in this bottom-up exercise does not represent the Bank's actual expectations for the trajectory of the economy. The scenario is constructed solely for the benefit of testing the resilience of banks against severe and prolonged economic shocks, and serves to complement the Bank's assessments under its top-down stress test.

Table 2.3: Repayment Assumptions in the Top-down Stress Test

	Assumption
Repayment assistance	• No R&R of business loans after the second quarter of 2021 • Repayment assistance for household borrowers to end after the first quarter of 2021
Cures	• No reversion in loan staging of households and businesses, even if subsequent improvements are observed
Policy support measures	• Effects from policy initiatives such as flexibilities to withdraw from retirement savings, wage subsidy programmes, or cash transfers from the Government are not considered
Maturing bullet repayment loans	• Up to 50% of maturing bullet repayment loans of non-listed firms in the vulnerable sectors were assumed to turn impaired, which is markedly higher compared to the actual impairments[1] observed thus far

Note:
[1] As of June 2021, only 17% of the total original maturing bullet repayments were assessed by banks (and reviewed by auditors) to exhibit signs of a significant increase in credit risk, while a very small portion (0.4%) of maturing bullet loans have turned impaired

Source: Bank Negara Malaysia

[25] Refer to the section on 'Assessing the Resilience of Financial Institutions' in the BNM Financial Stability Review for Second Half 2020 for further details.

In this exercise, individual banks independently modelled the expected macroeconomic and financial shocks to be applied and the corresponding potential losses they may incur. The degree of shocks and corresponding assumptions applied were observed to be generally conservative across all banks. For instance, some banks applied additional stress factors to selected segments of their portfolios, including significantly higher probabilities of default. DBGs also included the impact of shocks to the operations of their overseas branches in the stress test. In addition, most banks assumed a rise in bond yields,[26] reflecting expectations of higher non-resident outflows amid renewed policy uncertainty and a resurgence in COVID-19 cases domestically. This was despite their expectations of further overnight policy rate (OPR) cuts. Banks were further observed to assume that loans under repayment assistance would continue to spike in 2021 before tapering by end-2022 in line with the assumed economic recovery path.

The results of the bottom-up stress test performed by individual banks affirm the aggregate resilience of the banking system against severe economic and financial shocks. Credit risk remains the key driver of potential losses faced by banks, with both the top-down and bottom-up stress tests showing a larger share of losses coming from the business sector. Credit costs under the bottom-up exercise are close to four times the credit costs observed in 2020, higher than that derived under the top-down stress test of about two times. This was skewed by significantly more conservative economic parameters employed by a few banks. These banks account for about a fifth of total banking system assets and are supported by strong starting capital positions at the entity and group levels.

Overall, under the bottom-up exercise, the median decline in the total capital ratio by end-2022 is 4.4 percentage points (ppts), with an inter-quartile range[27] of 5.9 ppts (first quartile: 2.1 ppts, third quartile: 8 ppts). These results, while showing a larger aggregate impact on the banking system due to large variations in assumptions across banks, do not change the overall assessment of the resilience of the banking system under the Bank's top-down stress test.

Importantly, the continued resilience of banks remains a key mitigant against excessive risk aversion which often typifies banks' behaviour following an economic downturn. The stress test results affirm that banks remain in a sound position to support lending to viable businesses and households, thus promoting conditions for the economy to stage a stronger recovery.

[26] Refer to the section on Market Risk in the chapter 'Coping with an Uneven Recovery: Key Developments in the First Half of 2021' for details of a complementary sensitivity analysis conducted on the balance sheet of financial institutions to bond yield movements.

[27] The inter-quartile range indicates the difference between the total capital ratio decline reported by the 75th percentile bank and the 25th percentile bank. Given the approach taken in the bottom-up stress test which may result in exceptional variations in economic parameters used by some banks, the inter-quartile range offers a more representative measure of the dispersion between the results of individual banks.

Annex

Table A.1

Key Financial Soundness Indicators

	As at end				
	1H 2019	2H 2019	1H 2020	2H 2020	1H 2021*p*
	% (or otherwise stated)				
Banking System					
Total Capital Ratio	18.0	18.6	18.4	18.9	18.4
Tier 1 Capital Ratio	14.7	15.1	15.2	15.7	15.2
Common Equity Tier 1 Capital Ratio	14.0	14.6	14.6	15.2	14.7
Return on Assets[1]	1.4	1.4	1.0	1.0	1.1
Return on Equity[1]	12.1	12.2	8.9	8.4	9.7
Liquidity Coverage Ratio	153.0	149.1	149.2	148.2	149.1
Net Impaired Loans Ratio	1.0	1.0	0.9	1.0	1.0
Capital Charge on Interest Rate Risk in the Trading Book to Capital Base	1.1	1.2	1.2	1.1	1.1
FX Net Open Position to Capital Base	4.8	4.2	4.8	5.2	4.7
Equity Holdings to Capital Base	0.7	1.6	1.3	1.5	1.3
Insurance and Takaful Sector					
Capital Adequacy Ratio	230.0	226.9	227.1	219.7	221.2
Life Insurance and Family Takaful					
Excess Income over Outgo (RM billion)	16.5	7.7	4.7	17.3	3.7
New Business Premium / Contribution (RM billion)	9.7	9.0	9.0	9.9	11.8
Capital Adequacy Ratio	213.2	206.2	210.6	203.5	207.9
General Insurance and General Takaful					
Underwriting Profit (RM billion)	0.5	0.6	0.9	0.9	1.3
Operating Profit (RM billion)	1.4	1.5	1.7	1.7	1.8
Gross Direct Premium / Contribution (RM billion)	10.6	10.2	10.3	10.5	10.8
Claims Ratio	59.3	59.1	55.9	54.2	52.7
Capital Adequacy Ratio	273.2	279.8	287.1	282.6	270.9
Household (HH) Sector					
HH Debt (RM billion)	1,217.7	1,251.8	1,265.9	1,320.6	1,335.4
HH Financial Assets (RM billion)	2,627.6	2,708.8	2,751.9	2,903.5	2,900.5
HH Debt-to-GDP Ratio	82.2	82.7	87.4	93.2	89.6
HH Financial Assets-to-Total HH Debt Ratio	215.8	216.4	217.4	219.9	217.2
HH Liquid Financial Assets-to-Total HH Debt Ratio	145.6	143.2	143.8	145.3	146.5
Impaired Loans Ratio of HH Sector[2]	1.2	1.2	1.0	1.1	1.0
Business Sector[3]					
Return on Assets	1.5	1.6	0.8	1.0	1.6
Return on Equity	2.8	3.2	1.6	2.1	3.0
Debt-to-Equity Ratio	25.1	25.8	24.3	22.5	21.9
Interest Coverage Ratio (times)	4.7	4.8	3.8	4.9	5.4
Operating Margin	5.7	5.7	5.0	5.2	6.3
Impaired Loans Ratio of Business Sector	2.6	2.5	2.5	2.6	2.7
Development Financial Institutions[4]					
Lending to Targeted Sectors (% change)	0.4	-0.3	3.9	7.7	6.2
Deposits Mobilised (% change)	1.8	2.5	2.0	6.6	7.5
Impaired Loans Ratio	6.7	6.4	5.9	5.1	5.5
Return on Assets	1.5	1.5	1.1	1.1	1.3

[1] Banking system profits are aggregated at the entity level. The aggregated results are subsequently adjusted for dividend income received from domestic banking subsidiaries (previously added at both the parent and subsidiary levels). Differences in comparative pre-tax figures reported in previous Financial Stability Reviews are estimated to range between 5.5% and 10.7%
[2] Refers to both banks and non-bank financial institutions
[3] The financial performance metrics of publicly listed corporates are as at the first quarter of 2021
[4] Refers to development financial institutions under the Development Financial Institutions Act 2002
p Preliminary
Note: Figures may not necessarily add up due to rounding

Source: Bank Negara Malaysia, Bursa Malaysia, Department of Statistics, Malaysia, Employees Provident Fund, Securities Commission Malaysia, S&P Capital IQ and Bank Negara Malaysia estimates

Table A.2

Key Financial Indicators: Islamic Banking and Takaful Sectors

	As at end				
	1H 2019	2H 2019	1H 2020	2H 2020	1H 2021*p*
Islamic Banking System	RM million (or otherwise stated)				
Total Assets[1]	979,393.3	1,020,371.0	1,041,629.6	1,089,539.9	1,138,648.9
% of total assets of entire banking system[1]	32.8	33.5	33.3	34.2	35.0
Total Financing[1]	720,748.1	753,609.9	780,376.6	817,398.2	840,971.6
% of total loans / financing of entire banking system[1]	38.4	39.2	39.9	41.0	41.4
Total Deposits and Investment Accounts[1]	804,959.9	826,167.2	859,946.8	889,951.4	933,214.3
Total Deposits[1]	724,326.0	739,130.3	761,993.4	790,905.4	820,390.9
Total Investment Accounts[1]	80,633.9	87,036.9	97,953.4	99,046.0	112,823.4
% of total deposits and investment accounts of entire banking system[1]	37.4	37.7	38.1	38.9	39.7
	%				
Total Capital Ratio	17.6	18.5	18.3	18.6	17.6
Tier 1 Capital Ratio	14.3	14.6	14.6	15.0	14.1
Common Equity Tier 1 Capital Ratio	13.8	14.1	14.0	14.5	13.6
Return on Assets	1.1	1.2	0.6	0.7	1.2
Net Impaired Financing Ratio	1.0	1.0	0.9	0.9	0.9
Takaful Sector	RM million (or otherwise stated)				
Takaful Fund Assets	34,522.0	36,517.6	39,040.1	41,871.2	43,222.6
Family	30,601.4	32,283.8	34,538.5	37,025.5	38,272.0
General	3,920.6	4,233.9	4,501.6	4,845.7	4,950.6
% of insurance and takaful industry	10.9	11.2	11.8	11.9	12.3
Net Contribution Income	5,788.3	5,542.4	5,642.8	5,985.5	7,189.0
Family	4,456.0	4,150.9	4,336.5	4,527.5	5,776.3
General	1,332.3	1,391.4	1,306.3	1,457.9	1,412.8
% of insurance and takaful industry	18.9	17.7	18.6	18.2	21.9
Family Takaful					
New Business Contribution	3,253.9	2,904.0	3,191.8	3,401.9	4,682.1
General Takaful					
Gross Direct Contribution	1,631.3	1,677.2	1,641.2	1,817.1	1,861.7
Claims Ratio (%)	56.6	59.5	53.3	58.0	51.8

[1] Including development financial institutions under the Development Financial Institutions Act 2002
p Preliminary

Note: Figures may not necessarily add up due to rounding

Source: Bank Negara Malaysia

Glossary, Acronyms and Abbreviations

Annualised credit cost ratio
Annualised year-to-date loan loss impairment charged to the income statement as a share of total outstanding loans

Artefacts
A piece of evidence associated with the footprints of the attackers found on the network, systems or devices such as text, malicious codes and files

Bid-to-cover ratio
A measure of the strength of demand for securities during an auction. It is the ratio of amount of bids received in an auction over the amount sold

Business continuity plan (BCP)
A comprehensive documented action plan that outlines the procedures, processes and systems necessary to resume or restore the business operation of an insitution in the event of a disruption

Capital adequacy ratio (CAR)
A measure of a financial institution's solvency position, expressed as the ratio of total capital available to total capital required

Cash-to-short-term debt ratio (CASTD)
Ratio of a corporation's cash to short-term debt, which measures liquidity

Collective Investment Schemes (CIS)
Investment schemes where investors pool their funds to be managed by a fund manager according to the investment mandate agreed with the investors

Combined ratio
Sum of incurred claims and expenses as a percentage of premium/takaful contribution

Commercial feeds
Threat data collected from commercial entities and security vendors, who sell the information to various organisations in a structured manner

Common Equity Tier 1 (CET1) capital
A component of a bank's regulatory capital comprising ordinary shares issued by a banking institution, retained earnings and other reserves

Cost-sharing
A feature in medical reimbursement insurance/takaful products where policy owners/takaful participants pay part of the cost of covered healthcare services out of pocket

Cross-border payment
A payment in which the payer and the payee are located in different jurisdictions

Cyber resilience
The ability of an organisation to continue to carry out its mission by anticipating and adapting to cyber threats and other relevant changes in the environment, as well as by withstanding, containing and rapidly recovering from cyber incidents

Cyber threat intelligence
Threat information that has been aggregated, transformed, analysed, interpreted or enriched to provide the necessary context for decision-making processes

Debt service ratio
Ratio of total monthly bank and non-bank debt obligations to monthly disposable income (net of statutory deductions)

Deferred net settlement (DNS)
A net settlement mechanism which settles on a net basis at the end of a predefined settlement cycle

Disaster Recovery Plan (DRP)
A comprehensive written plan of action that sets out the procedures and establishes the processes for IT systems and requirements that are necessary to support and restore the business operation of an institution in the event of a disruption

Dividend reinvestment programme
A programme offered by banks that allows shareholders to reinvest cash dividends into additional shares of the banks

Domestic banking group (DBG)
Domestically-owned financial group comprising a licensed commercial bank, licensed investment bank and licensed Islamic bank

Domestic systemically important bank (D-SIB)
Bank whose failure has the potential to cause considerable disruption to the domestic financial system and the wider economy

Excess income over outgo
Sum of net underwriting income, net investment income and other income, for all direct life insurers/family takaful operators and life reinsurers

Expected credit loss (ECL)
The weighted average of credit losses with the respective risks of a default occurring as the weights

Financial Market Stress Index (FMSI)
A risk monitoring tool to gauge the stress level in the domestic financial markets and drivers of market stress

Gross direct premiums/contributions
Premiums/contributions receivable before deduction of commissions, brokerage or other expenses, for all direct general insurers/takaful operators

Higher loss absorbency (HLA)
Capital buffer requirement imposed on a D-SIB above the minimum regulatory requirement to increase its going-concern capital buffers, which aims to reduce its probability of failure

High-income borrowers
Borrowers earning more than RM10,000 per month

High-quality liquid assets (HQLA)
Assets that can be easily and immediately converted into cash at little or no loss of value

Household financial assets
Assets that are held by households including deposits, investments in unit trust funds and equities, insurance/takaful policies and Employees Provident Fund (EPF) savings

Household liquid financial assets
Household financial assets excluding EPF savings

Interest coverage ratio (ICR)
Ratio of a corporation's earnings before interest, taxes, depreciation and amortisation to interest expense, which measures debt-servicing capacity

Investment-linked products
Life insurance or family takaful where the policy/certificate value at any time is partly determined by the value of the investment assets at the time

Liquidity Coverage Ratio (LCR)
The ratio of a bank's high-quality liquid assets (HQLA) to the expected net cash outflows over the next 30 calendar days

Locally-incorporated foreign bank (LIFB)
Foreign-owned licensed bank or licensed Islamic bank that is incorporated in Malaysia

Macroeconomic variables (MEV)
Indicators that signal the current trends in the economy such as GDP growth and unemployment forecasts

Management overlays
Additional provisions set aside on top of provisions derived from ECL models. Management overlays provide model risk adjustments due to data deficiencies or uncertainties not adequately captured by the ECL models

Medical re-pricing
Revision to rates of premium/takaful contribution or cost of insurance/tabarru' for medical reimbursement insurance/takaful cover

Middle-income borrowers
Borrowers earning RM5,000-RM10,000 per month

Net impaired loans
The ratio of impaired loans net of specific provisions to total loans net of specific provisions

Net interest margin (NIM)
The difference between interest rates at which banks extend financing and interest rates banks pay for funding, including deposits

Net Stable Funding Ratio (NSFR)
The ratio of a bank's available stable funding (ASF) to the required stable funding (RSF), where ASF refers to funding sources weighted according to their stability, and RSF refers to assets and other off-balance sheet exposures weighted according to their liquidity

Net underwriting income
Insurance premium income after deducting benefit payouts, agency remuneration, and other expenses, for all direct life insurers/family takaful operators and life reinsurers

New business premiums/contributions
Premiums/contributions acquired from new policies/certificates for a particular year, for all direct life insurers/family takaful operators and life reinsurers

Nominal GDP
Gross domestic product at current prices

Non-financial corporate (NFC)
A corporation whose principal activity is the production of goods and/or the provision of non-financial services

Open source feeds
Threat data collected from publicly available sources

Operating profit/loss
Sum of underwriting profit/loss, net investment and other income for all direct general insurers/takaful operators and general reinsurers

Premium/contribution deferment
The option for COVID-19-affected consumers to defer premiums or contributions due under life insurance policies and family takaful certificates for three months without affecting the coverage

Price-to-book ratio (P/B)
The ratio of stock price to book value of the share

Price-to-earnings ratio (P/E)
The ratio of stock price to bank's earnings per share for the last 12 months

Private feeds
Threat data collected from private entities which could not be found elsewhere

Probability of default
Likelihood of a counterparty defaulting on its contractual obligations to a financial institution over a given time horizon

Real-time gross settlement
The real-time settlement of payments, transfer instructions or other obligations individually on a transaction-by-transaction basis (i.e. gross basis)

Retail payment system (RPS)
A funds transfer system that typically handles a large volume of relatively low value payments in such forms as cheques, credit transfers, direct debits and card payment transactions

Sandboxing
A restricted and controlled environment that enables potentially malicious software to be executed securely without affecting the real production resources, programs or environment

Settlement risk
The risk that settlement of funds for fund or securities transfer will not take place as expected. This may comprise both credit and liquidity risks

Shellcode
A piece of code that includes malicious content used to exploit a software vulnerability

Stage 2 loans
Loans that have exhibited deterioration in credit risk, for which banks are required to set aside provisions based on lifetime expected credit losses, based on the Malaysian Financial Reporting Standard 9

Stage 3 loans
Loans that have objective evidence of impairment (i.e. credit impaired) based on the Malaysian Financial Reporting Standard 9

Tabarru'
A donation, gift or contribution. From takaful perspective, tabarru' refers to contribution from certificate holders for the purpose of takaful

Third party service provider (TPSP)
Entities, including affiliate companies that provide ancillary services to a financial institution under an outsourcing arrangement

Threat actor
An individual, a group or an organisation believed to be operating with malicious intent

Threat hunting
Practice of proactively searching through networks, devices and datasets to hunt for malicious or suspicious activities that have avoided detection by existing security tools

Total capital
A bank's total regulatory capital comprising the sum of CET1, Additional Tier 1 and Tier 2 capital

Underwriting profit/loss
Earned insurance/takaful premium/contribution income less net claims incurred, commissions and management expenses, for all direct general insurers, general takaful operators and general reinsurers

Unsold houses
Comprises residential units (including SOHO and serviced apartments) that remained unsold for more than nine months from the date of launch or after 1 January 1997. These units comprise (i) units completed with Certificate of Completion and Compliance or Temporary Certificate of Fitness for Occupation in the review period; or (ii) units with building plan approval that are under construction

ASEAN
Association of Southeast Asian Nations

ATM
Automated Teller Machine

BCP
business continuity plan

CAGR
compounded annual growth rate

CAR
capital adequacy ratio

CASA
current and savings accounts

CASTD
cash-to-short-term debt ratio

CET1
Common Equity Tier 1

CISS
Cyber Incident Scoring System

CRISP
Cybersecurity Resilience and Information Sharing Platform

CSM
CyberSecurity Malaysia

CWG
Cyber Working Group

DBG
domestic banking group

DNS
deferred net settlement

DRP
disaster recovery plan

D-SIB
domestic systemically important bank

ECL
expected credit loss

EPF
Employees Provident Fund

FCY
foreign currency

FI
financial institution

FinTIP
Financial Sector Cyber Threat Intelligence Platform

FMCO
Full Movement Control Order

FMSI
Financial Market Stress Index

FX
foreign exchange

GDP
Gross Domestic Product

HLA
higher loss absorbency

HQLA
high-quality liquid assets

ICR
interest coverage ratio

IL
investment-linked

IT
information technology

ITCL
Individual target capital level

ITO
insurers and takaful operators

LCR
Liquidity Coverage Ratio

LIBFC
Labuan International Business and Financial Centre

LIFB
locally-incorporated foreign bank

LTV
loan-to-value

MCMC
Malaysia Communication & Multimedia Commission

MEV
macroeconomic variables

MFRS
Malaysian Financial Reporting Standard

MGS
Malaysian Government Securities

MHPI
Malaysian House Price Index

MYR
Malaysian Ringgit

NACSA
National Cyber Security Agency

NBFI
non-bank financial institution

NFC
non-financial corporate

NIM
net interest margin

NOP
net open position

NSFR
Net Stable Funding Ratio

P/B
price-to-book

P/E
price-to-earnings

PayNet
Payments Network Malaysia Sdn Bhd

PEMERKASA+
Additional Strategic Programme to Empower the People and Economy

PEMULIH
National People's Well-Being and Economic Recovery Package

PTF
PENJANA Tourism Financing

QR
Quick Response

R&R
rescheduling and restructuring

RENTAS
Real-time Electronic Transfer of Funds and Securities System

ROA
return on assets

ROE
return on equity

RPP
Real-time Retail Payments Platform

RPS
retail payment system

SME
small and medium enterprise

SOP
standard operating procedure

SRR
Statutory Reserve Requirement

TPSP
third party service provider

TRRF
Targeted Relief and Recovery Facility

UST
United States Treasury

WGBI
FTSE Russell's World Government Bond Index