S&P Global Ratings

Credit Conditions Asia-Pacific:

China First To Recover

June 30, 2020

Key Takeaways

- Overall. The road to recovery for Asia-Pacific GDP trends and earnings will stretch to 2023.
 Geographically, China leads, followed by developed economies, with emerging markets last.
 Sectorwise, essential retail and telecoms are the first to rebound; oil and gas, and autos, will be the last; real estate, capital goods and other corporate sectors in between.
- Risks. During this recovery, the top risks include a build-up of leverage, economic disruption from COVID-19 measures, economic spillover from the U.S.-China strategic confrontation, and uneven access to U.S. dollar funding.
- Credit. COVID-19 and an oil price decline have triggered negative rating actions on a third of our regional pool. Indeed, the net negative rating outlook bias comprises one-sixth of issuer ratings. Consequently, while there are "green shoots" signalling a regional recovery, the likelihood of rating downgrades and defaults persists.

(Editor's Note: S&P Global Ratings' Credit Conditions Committees meet quarterly to review macroeconomic conditions in each of four regions (Asia-Pacific, Latin America, North America, and Europe, the Middle East, and Africa). Discussions center on identifying credit risks and their potential ratings impact in various asset classes, as well as borrowing and lending trends for businesses and consumers. This commentary reflects views discussed in the Asia-Pacific committee on June 23, 2020.)

Credit conditions in the second half of 2020 will remain very difficult. While signs of an economic recovery in China and some developed countries in Asia-Pacific have appeared, some emerging markets (e.g. India) are still struggling with a large and rising number of COVID-19 cases. Thanks mainly to government and regulatory actions, financing conditions have eased compared with that in late Q1 to early Q2. However, highly leveraged borrowers may still face challenges. S&P Global Ratings considers the effect of the COVID-19-induced slump in demand on corporates, households, and governments to be a top risk. Revenue cash inflow is down and debt is rising. It will be a case of survival of the fittest.

Asia-Pacific is a patchwork of jurisdictions and industries at various stages on the post-COVID-19 road to recovery. Early exiters from COVID-19 include China and South Korea, and middle exiters include Japan, noting that restrictions and changing consumer behaviors continue to hamper these economies as they emerge from lockdowns. Meanwhile, the credit effects in late-exiter jurisdictions (mainly emerging markets such as India and Indonesia) are still uncertain and could be profound.

Our baseline scenario is that economic conditions may not rebound until the second half of 2021 (see "Economic Research: Asia-Pacific Losses Near \$3 Trillion As Balance Sheet Recession Looms", published June 25, 2020). The economic malaise is problematic as many weaker corporates scramble for cash, while stronger corporates refinance obligations or, alternately, shore up reserves. Meanwhile, households' repayment capacity is weaker as unemployment spikes.

While government monetary, fiscal, and prudential actions are providing some buffer in the short term, the debt overhang over the medium- to long-term has jumped. This surge in leverage, amid a slow and uncertain return to revenues, is one of our top regional risks.

While the slew of negative rating actions has slowed in June, compared with April and May, our outlook across many industries remains negative (see "COVID-19 And Oil Price-Related Public Rating Actions On Corporations, Sovereigns, And Project Finance To Date", June 24, 2020).

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Credit Conditions Asia-Pacific: China First To Recover

Table 1 lists our top Asia-Pacific risks.

Table 1

Top Asia-Pacific Risks

Larger surge in leverage, slower return of revenue

Risk level* Very low Moderate Elevated High Very high Risk trend** Improving Unchanged Worsenin

Our baseline assumptions incorporate the expectation of higher leverage for corporations, households, and governments, and a recovery to trendline economic activity over 2021–2023 (varying by geography and sector). However, if debt growth is faster and income recovery is slower than we expect, the resultant surge in leverage would be harder to manage, increasing the pressure on issuer credit quality. This is particular so for lower-rated entities and emerging markets.

Economic disruption from COVID-19 measures and post-COVID policies

Risk level* Very low Moderate Elevated High Very high Risk trend** Improving Unchanged Worsening

While China appears to be an "early exiter" from COVID-19, and some high-income countries (such as Korea, Australia, and New Zealand) seem to be stabilizing the virus spread, other countries (such as India) are still seeing a rising number of cases. For "late exiters", harder or longer COVID-19 containment measures may further undermine economic activity. For "early-to-middle exiters", over- or undershooting in government and regulatory policy choices on phasing-out monetary and fiscal stimulus packages may threaten the trajectory of economic recovery.

Economic spillovers from U.S.-China strategic confrontation

Risk level* Very low Moderate Elevated High Very high Risk trend** Improving Unchanged Worsening

U.S.-China relations remain strained on three economic and financial fronts: trade, access to U.S. financial markets, and technology. Broader geopolitical issues, including Hong Kong and Taiwan, also remain a source of tension. The main short-term effects of a deteriorating economic relationship would be felt on manufacturing investment (in China and elsewhere) and currencies. Given the key role of the U.S. dollar and Chinese renminbi across Asia-Pacific, abrupt moves could affect financial conditions across the region. The more important effects are long term and are centered on supply chains, which have been a driver of productivity and long-term growth across Asia.

Uneven access To U.S. dollar funding

Risk level* Very low Moderate Elevated High Very high Risk trend** Improving Unchanged Worsening

This risk exacerbates the refinancing challenges faced by highly leveraged borrowers in the region, more so for lower grade issuers in certain geographies or sectors with slower recovery prospects. Access to U.S. dollar funding in the Asia-Pacific region had tightened following the outbreak; however, there have been gradual signs of dollar liquidity returning--mainly for larger, stronger entities; and selectively in the high yield space. For weaker issuers with looming maturities, the funding challenge will be much more difficult. We anticipate that funding and capital flows will remain selective and uneven in this early stage of recovery.

Sources: S&P Global Ratings.

- * Risk levels may be classified as very low, moderate, elevated, high, or very high, and are evaluated by considering both the likelihood and systemic effect of such an event occurring over the next one to two years. Typically these risks are not factored into our base case rating assumptions unless the risk level is very high.
- ** Risk trend reflects our current view on whether the risk level could increase or decrease over the next 12 months.

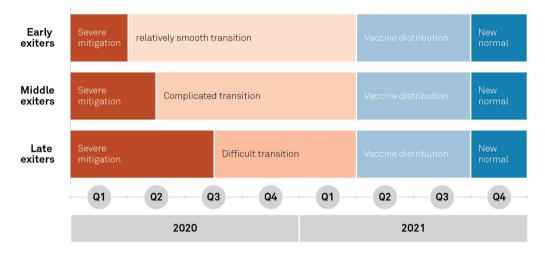
S&P Global Ratings acknowledges a high degree of uncertainty about the evolution of the coronavirus pandemic. The consensus among health experts is that the pandemic may now be at, or near, its peak in some regions but will remain a threat until a vaccine or effective treatment is widely available, which may not occur until the second half of 2021. We are using this assumption in assessing the economic and credit implications associated with the pandemic (see our research here: www.spglobal.com/ratings). As the situation evolves, we will update our assumptions and estimates accordingly.

Shape of Recovery: Asia-Pacific

Three Stages Of COVID-19 And Exit

The Asia-Pacific region has been hit by three waves of COVID 19 infection: first, China; then the more developed economies; and now, other emerging markets. Correspondingly, we can categorize these economies into three duration-related scenarios (see Appendix 1 in Sector Round-Up, and "Sector Roundup Asia-Pacific: Net Negative Bias Spikes To One In Six Issuers", published June 30, 2020) in arriving at our baseline economic and analytical assumptions. These scenarios involve assumptions about the timeline of the COVID-19 pandemic, exit from government mitigation policies, agent behavior, and national macro-level programs (see charts 1, 2a, 2b, and 2c).

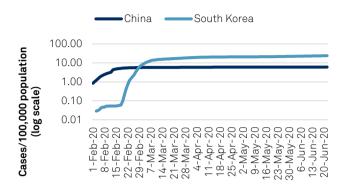
Chart 1
Three Scenarios Of COVID-19 Exit



Source: S&P Global Ratings.

Chart 2a.

Examples Of Early Exiters: China And Korea's COVID-19 Trends

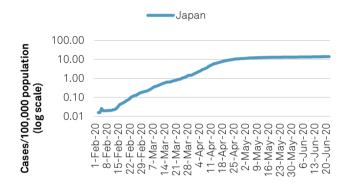


Baseline assumptions of early exiters

- Mid Q2 2020: Pandemic largely or fully contained.
- Q3 2020 to Q3 2021: Isolated COVID-19 clusters. Economic growth above trend, but level of activity still below potential.
- Q4 2021 onward: Vaccine broadly available to a sufficient proportion of the population. Long-term output costs between zero and 2%.

Chart 2b.

Examples Of Middle Exiters: Japan's COVID-19 Trend

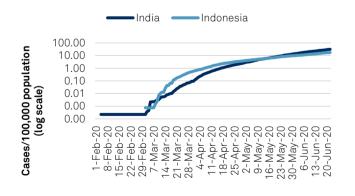


Baseline assumptions of middle exiters

- End Q2 2020: Pandemic largely contained but cases are still some way above zero.
- Q3 2020 to Q3 2021: Isolated COVID-19 clusters with somewhat higher risks of broader spread. Economic growth above trend, but level of activity still below potential with significant country variation.
- Q4 2021 onward: Vaccine broadly available to a sufficient proportion of the population. Long-term output costs between 2% and 4%.

Chart 2c.

Examples Of Late Exiters: India And Indonesia's COVID-19 Trends



Baseline assumptions of late exiters

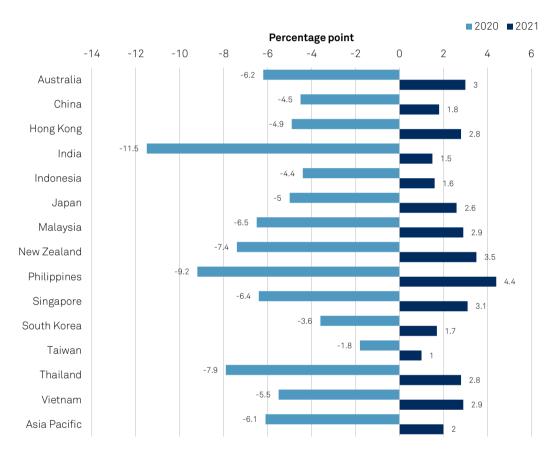
- End Q2 2020: Pandemic not largely contained, new daily infection rates stubbornly high.
- Q3 2020 to Q3 2021: Periodic COVID-19 clusters with material risks of broader spread. Economic growth above trend, but level of activity still below potential with significant country variation.
- Q4 2021 onward: In certain emerging markets, there may be a lag in the wide distribution of the vaccine. Long-term output costs in most cases above 4%.

Confirmed cases data source: John Hopkins University Centre System Science and Engineering. Data as of June 22, 2020.

Economies Back To Trend Only By 2023

Assumptions on the exit scenario from COVID-19 influence our view about the strength of an economic rebound (see chart 3). Indeed, the economic fallout from COVID-19 has been significant. We had revised Asia-Pacific growth to -1.3% for 2020 from 4.6% before the pandemic emerged. This means that our forecast for total U.S. dollar GDP for the region for 2020 and 2021 is about US\$2.7 trillion lower than our pre-COVID forecast. We expect the region's activity level to reach close to the pre-COVID-19 trend only by 2023.

Chart 3
Asia-Pacific: Change In GDP Growth Projections For 2020 Versus December 2019 Forecasts

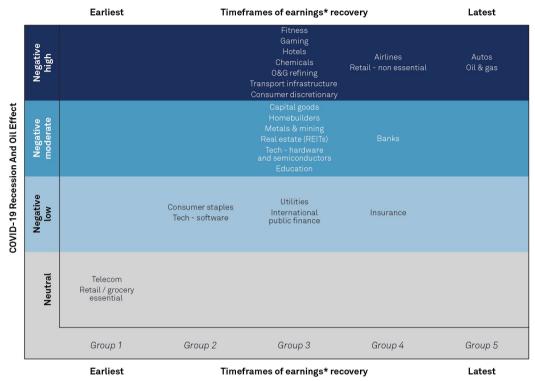


Note: For India, the year runs April to March, e.g. 2019-- fiscal 2019 /2020, ending March 31, 2020. ppt--percentage point. Source: S&P Global Economics.

Sector Recovery Depends On Essential Demand

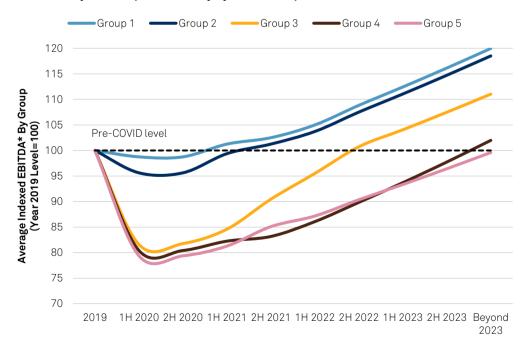
The effect of COVID-19 on, and the pace of recovery across, Asia-Pacific nonfinancial corporate sectors differs (for a detailed analysis, see "COVID-19 Heat Map: Post-Crisis Credit Recovery Could Take To 2022 And Beyond For Some Sectors," published June 24, 2020). Chart 4 shows the effect and pace of recovery while chart 5 is a stylized representation of the recovery timeline grouped by industry sectors.

Chart 4
Asia-Pacific: Sector-Level Impact And Recovery



^{*}For years 2022 and after, our opinion on credit metrics is used as a proxy for EBITDA (earnings before interest expense, tax, depreciation and amortization). Note: Our opinions are on broad sectors not just rated issuers.

Chart 5
Asia-Pacific: Stylized Shape Of Recovery By Sector Group



Group 1	Group 2	Group 3	Group 4	Group 5
Recovery: 1H 2021	Recovery: 2H 2021	Recovery: 2022	Recovery: 2023	Recovery: Beyond 2023
- Retail / grocery essential	- Tech - software	- Utilities	- Airlines	- Oil & gas
- Telecom	- Consumer staples	- Real estate (REITs)	- Retail - non essential	- Autos
		- Homebuilders		
		- Tech - hardware and semiconductors		
		- Capital goods		
		- Chemicals		
		- Consumer discretionary		
		- Transport infrastructure		
		- Gaming		
		- Fitness		
		- Hotels		
		- Oil & gas refining		
		- Metals & mining		

^{*}For years 2022 and after, our opinion on credit metrics is used as a proxy for EBITDA (earnings before interest expense, tax, depreciation and amortization).

S&P Global Ratings has grouped industry sectors based on our expected time of full recovery (to 2019 equivalent levels) (see chart 5; and "COVID-19 Heat Map: Post-Crisis Credit Recovery Could Take To 2022 And Beyond For Some Sectors," published June 24, 2020). The first two groups are more stable sectors broadly closer to servicing the needs of "stay-at-home" or "work-from-home" consumers and businesses, while the latter groups are more cyclical and somewhat further away from these needs. For sectors in Group 1, we expect there to be no significant negative effect in 2020. Here, essential retail or grocery industries are not only hardly affected, but actually benefit from "stay-at-home"-related consumption.

The remaining three groups (Groups 3 to 5) are either "less essential" to consumers, less able to meet the stay-at-home needs of consumers, or suffered collateral damage from the economic activity shutdown. Hence, for sectors in Group 5, we expect recovery to pre-COVID-19 credit metrics to be not until the second half 2023 or later. This group includes autos, and oil and gas exploration and production.

Generally, there is a correlation between the effect of COVID-19 on credit metrics and time to recovery. For those sectors where COVID-19 and other stresses have a high negative effect, we expect the path to recovery to 2019 levels to take the longest.

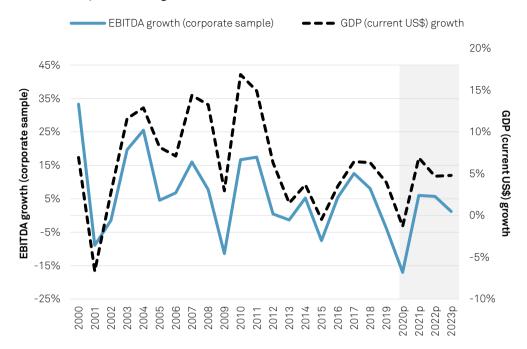
Sectors' Recovery Shape Similar To GDP's

The paths of sector recovery in chart 5 echo the possible routes of economies returning to their GDP growth trendlines. Further, we examined earnings growth for a sample of Asia-Pacific nonfinancial corporates (unrated and rated, total sample size: 8,444) against nominal GDP growth (see chart 6).

We note that there is some directional relationship between the growth of nonfinancial corporate earnings and nominal GDP for historical years 2000 to 2019. There is a similar directional relationship between our rough estimate of nonfinancial corporate earnings (unrated and rated, sectors are weighted by estimated gross value added) and our economic forecasts for 2020 to 2023. (The chart findings are preliminary; we would like to conduct more research in this area).

Note: Our opinions are on broad sectors not just rated issuers. Once an index line reaches 100, projections are then based on the region's nominal GDP growth rate.

Chart 6
Asia-Pacific: Corporate Earnings Versus GDP Growth



EBITDA--Earnings before interest, tax, depreciation and amortization expense. p--Projection by S&P Global Ratings. Data source for years 2000 to 2019: Corporate sample--S&P Global Market Intelligence; GDP--International Monetary Fund.

One-Third Of Ratings Affected

We consider economic, industry, and issuer-specific risks at arriving at our credit rating opinions. Consequently, our macroeconomic and sector views, as well credit assessments of issuers, have triggered a significant number of rating actions, reflecting the fallout of COVID-19 and oil price decline. A third of our ratings on corporations and sovereigns in Asia-Pacific have either had revised rating outlooks, been placed on CreditWatch with negative implications, or have been downgraded (with or without revisions to CreditWatch) (see "COVID-19 And Oil Price-Related Public Rating Actions On Corporations, Sovereigns, And Project Finance To Date", published June 24, 2020; and Sector Roundup Asia-Pacific: Net Negative Bias Spikes To One In Six Issuers", published June 30, 2020).

Macroeconomic Outlook

Asia-Pacific Will Flirt With Balance Sheet Recession

(Editor's Note: The views expressed in this section are those of S&P Global Ratings' economics team. While these views can help to inform the rating process, sovereign and other ratings are based on the decisions of ratings committees, exercising their analytical judgment in accordance with publicly available ratings criteria.)

We now forecast that Asia-Pacific GDP will shrink 1.3% in 2020 and grow 6.9% in 2021. This means that our forecast for total U.S. dollar GDP for the region for 2020 and 2021 is about US\$ 2.7 trillion lower than our pre-COVID forecast. At the start of the pandemic, we had assumed that the productive capacity of the region's economies would emerge largely unscathed, but this now appears less likely. As a result, by the end of 2023, three years after the recession began, we expect permanent damage to the level of output of between 2% and 3% in most cases and much higher for some emerging market economies.

The recovery path largely hinges on the evolution of the pandemic. We assume, but do not predict, that the complicated transition from lockdowns to the "new normal," which will likely benefit from a widely distributed vaccine, will persist for the next 12 months. We also assume periodic outbreaks and moderate, temporary re-tightening of COVID-19 mitigation policies, but we do not factor in additional waves of infection and widespread lockdowns. By late 2021, we assume that COVID-19 mitigation policies are being gradually phased out and consumer and firm behavior is normalizing. Uncertainty remains high, of course, and there remain difficult-to-quantify risks on the upside and downside.

The external environment will be tough. The U.S. and eurozone economies are forecast to contract by 5.0% and 7.8% in 2020, respectively. The rebound is already underway but after the initial bounce, the recovery will become a slow grind with output unlikely to get back to late 2019 levels for at least 18 months. Central banks in these economies will maintain extremely loose monetary policies. Emerging markets outside Asia will fall sharply this year and we expect large permanent losses in output in some cases, in excess of the losses we expect in Asia-Pacific.

Indeed, a rising concern is that, while the COVID-19 recession did not start as a balance sheet recession, it may end up as one. The pandemic caused a sudden-stop and will depress demand for a sustained period. To prevent a collapse, policymakers, helped by banks, have provided extraordinary financial support to firms and households. Some money was given away but much of it was lent. This resulted in weaker balance sheets across the economy. There was no good alternative to "save everyone and worry about the implications later" but this will not come cost free.

Once the economy normalizes, banks, firms, and households may look to repair their balance sheets--banks could lend less, households could cut back on spending, and firms may hold back investment. Past balance sheet recessions have been costly, and we expect the COVID recession to have a similar profile regionally as the global financial crisis, albeit with a sharper fall.

A second concern is accelerating de-globalization, although we see this as a risk to growth over the long run rather than 2020. Economic nationalism has hardened as a result of COVID, and this may spur new attempts by large economies to disrupt supply chains and use trade as a diplomatic tool. U.S.-China relations remain strained on three economic and financial fronts: trade, access to U.S. financial markets, and technology. Short-term effects of an escalation could present in the currency markets and financial conditions, while longer term effects will be centered on supply chains that have been a driver of productivity growth.

We expect policies, especially monetary, to remain supportive. The U.S. Federal Reserve's accommodative policy stance and forward guidance have provided room for central banks in the region to maintain highly supportive monetary policies. We expect that the low interest rate environment is here to stay, with most central banks in the region hiking policy rates only in 2022, when some emerging market central banks will tighten policy ahead of G7 central banks as market focus shifts to exit strategies from global monetary policy easing. A risk to growth is that some economies prematurely tighten policies, especially fiscal, for example by allowing temporary measures such as wage subsidies or tax cuts to expire.

China's economy is healing, helped by building stimulus, but fragile private sector confidence remains a drag. We will likely maintain our growth forecasts at 1.2% and 7.4% for 2020 and 2021, respectively, but a handover from stimulus to consumption-driven demand will be needed to secure a self-sustaining recovery. We have revised Japan's growth lower to -4.9% and 3.0% in 2020 and

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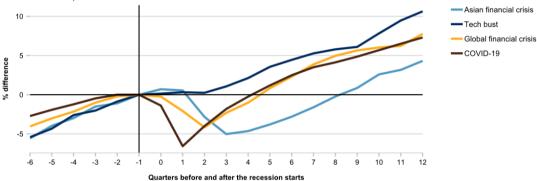
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2021 as consumers look set to save more for an uncertain future. We will likely keep our forecasts for Australia unchanged as recent data have been tracking our expectations. The two outperformers in the region remain Korea and Taiwan, boosted by effective pandemic response and high exposures to the resilient technology industry. Growth will decline moderately in both economies and permanent losses will be lower than elsewhere.

Asia's emerging markets economies are exiting lockdowns and starting to recover. Still, the lockdowns have had a larger effect on activity than we expected. In addition, we have lowered our forecasts for 2020 for the group, excluding India and China, by about 1 percentage point in 2020 and this is unlikely to be recovered in 2021. India has already entered a very deep recession where difficulties in containing the virus, an anemic policy response, and underlying vulnerabilities have led us to expect growth to fall by 5% this fiscal year before rebounding off a very low base in 2021. The damage to balance sheets and labor markets will be especially large in some of these economies, especially where lockdowns have been severe, policy support has been moderate, or where exposure to vulnerable sectors, like tourism, is high. In turn, this will lead to potentially large permanent output losses, in some cases of 5% or even higher.

Chart 7
Asia-Pacific Recession Compared





Note: Purchasing power parity weighted real seasonally-adjusted GDP for Asia-Pacific excluding China and India. Source: CEIC and S&P Global Economics.

Financing Conditions

Easing Financing Conditions With Some Economies Lifting Lockdowns

After months of numerous government and central bank support measures in Asia-Pacific as a result of the COVID-19 pandemic, the economic slowdown, and lockdown restrictions, some authorities have lifted or are easing lockdowns to spur the economy. With the slowdown in global economic growth and the pandemic's dampening on economic activity more broadly, we will likely continue to see reduced demand for capital through lower industrial production and output globally.

Issuance, however, among higher quality borrowers is likely to continue, as they take advantage of substantially low interest rates, as well as demand through various central bank asset purchase programs. The easing in financing conditions will remain regional for the time being. Meanwhile, uncertainty remains about authorities' ability to contain COVID-19 in some countries in Asia-Pacific.

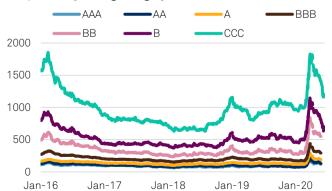
Credit spreads saw marked volatility with unprecedented speed from the beginning of this year through April (see chart 8), and has slowed considerably to present levels. The U.S. investment-grade credit composite spread is at 208 basis points, while the U.S. speculative-spread is at 683 basis points (for data as of June 15, 2020). These levels come after hitting the five-year peak for both investment-grade credit composites (at 366 basis points) and speculative-grade (at 1,047 basis points) on March 23, 2020.

Risks surrounding the coronavirus, economic slowdown, and oil price collapses began to weigh on investor sentiment quickly, causing the rapid expansion in credit spreads. Despite the improvement more recently, however, credit spreads remain higher than that of the end of Q2 last year, especially for speculative-grade credit spreads composites.

What To Look For

For the year to date, Asia-Pacific's cumulative new corporate (for both financial and nonfinancial) bond issuance (as of June 12, 2020) totaled US\$838 billion, ahead of that at this time last year (see chart 9). Asia-Pacific's refinancing needs remain robust with over US\$1.13 trillion in debt scheduled to mature by year 2024 (data as of Jan. 1, 2020). The overall corporate (both financial and nonfinancial) maturity wall will arrive by the end of this year with financial debt of US\$158 billion and nonfinancial debt of US\$114 billion coming due by the end of 2020. However, considering the current situation, refinancing needs may be pushed into next year, for some cases, in hope that financing conditions may become more favorable.

Chart 8 U.S. Spreads By Rating Category



Note: Option-adjusted spreads computed on a pool of over 20,000 U.S.-domiciled bonds with par values of over US\$100 million that are rated by S&P Global Ratings. Data as of June 15, 2020. Source: S&P Global Ratings; Thomson Reuters.

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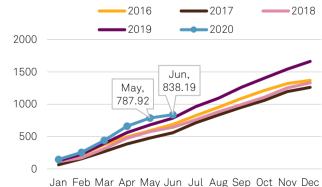
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Asia-Pacific's Cumulative Corporate Bond Issuance



Data as of June 12, 2020. Source: S&P Ratings Research; Thomson Reuters.

Sector Trends

Regional Credit Conditions--What's Changed?

Our regional GDP growth rate estimate of -1.3% for 2020 is now in the "red", joining North America, Latin America, and the eurozone. Meanwhile, government fiscal and monetary policy actions continue to ramp up--grappling with the challenge of keeping borrowers afloat and kick-starting economies while contending with a surge in leverage. U.S.-China relations continue to remain strained, broadening into the geopolitical sphere most recently (Hong Kong and Taiwan). Lowergrade borrowers are largely struggling to access U.S. dollar funding. We anticipate that the shape of recovery to pre-COVID 2019 credit metrics could be highly variable across geographies, industries, and issuers.

Rating actions

We have taken 199 ratings actions (as of June 22, 2020) related to COVID-19 and oil prices in the Asia-Pacific (see charts 10a and 10b). While businesses and consumers in China are moving toward normalcy, the recovery process could well drag out for months. In the region, lower official interest rates and government stimulus are providing some relief, but the slump in demand is pressuring credit quality and raising default risk, particularly among issuers with weaker credit profiles (see "COVID-19 And Oil Price-Related Public Rating Actions On Corporations, Sovereigns, And Project Finance To Date", published June 24, 2020; and "Sector Roundup Asia-Pacific: Net Negative Bias Spikes To One In Six Issuers", published June 30, 2020.

Chart 10a.

Asia-Pacific: Number Of Issuers Affected By Rating Actions Related To COVID-19 And Oil Prices, By Geography, As Of June 22, 2020

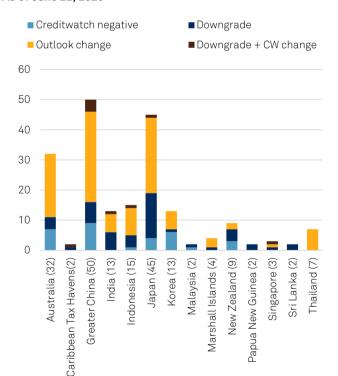
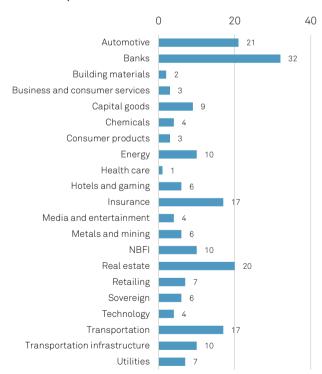


Chart 10b.

Asia-Pacific: Number Of Issuers Affected By Rating Actions Related To COVID-19 And Oil Prices, By Sector, As Of June 22, 2020



Note: These rating actions pertain to ratings where we mention COVID-19 as one factor or in combination with others. Source: S&P Global Ratings. COVID-19: Coronavirus- And Oil Price-Related Public Rating Actions On Corporations, Sovereigns, And Project Finance To Date, June 24, 2020.

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Nonfinancial Corporates

A Protracted Recovery

- We expect operating conditions and credit metrics for most sectors to recover to 2019 levels only in the second half of 2021 or 2022, given the demand shock created by the pandemic.
- Financial conditions are likely to remain difficult or expensive for high-yield issuers regionally as investors digest the financial fallout on various sectors and the likely pace of recovery.

What's changed?

Recovery in corporate credit ratios unlikely before 2022. Under our revised base case, the credit ratios of the majority of rated sectors, including homebuilders, capital goods, gaming, hospitality, consumer discretionary, and technology, will recover to 2019 levels only toward the second half of 2022. Recovery of credit metrics to 2019 levels is likely to be pushed to 2023 for the more cyclical airlines, autos, oil and gas, and nonessential retail sectors. Besides sharply reduced profits, these sectors will see absolute debt increase by 5%-10% given significant cash burns. Credit metrics in the more resilient sectors of essential retail, telecoms, and consumer staples will recover to 2019 levels in 2021, thanks to a more modest decline in EBITDA and broadly stable absolute debt levels.

Funding access to stay challenging for smaller issuers. Assuming the health and safety situation slowly improves toward end 2020, we believe it may take another three to six months before investor sentiment settles and capital markets open up for more fragile corporate issuers. Except for investment-grade firms and a few real estate developers in China, U.S. dollar debt funding has been severely restricted for smaller issuers in more volatile sectors. Meanwhile, domestic bank funding across the region has been more selective and usually more expensive for such borrowers.

Key assumptions

A gradual revenue recovery for most sectors in 2021 and 2022. We expect operating conditions at issuers in most rated sectors to recover to their 2019 levels only in late 2021 or 2022 at the earliest. That's on the basis of gradually recovering GDP growth, slowing improving consumer confidence through 2022, and a 'catch-up' effect on demand volumes for the most affected sectors (albeit still likely pressured pricing conditions as companies continue to offer discounts to stimulate volumes).

Stabilizing profitability. The large majority of rated companies are cutting costs amid a sharp drop in activity to try to stabilize margins, including reducing overheads, labor cuts, and cutting unprofitable operations. The full-year effect of those cost savings on profits are likely to materialize from 2021. Still-subdued commodity prices, especially oil, will also help reduce the cost base of companies in the most affected sectors such as airlines and shipping companies. Our base case price assumption for Brent in 2020 is US\$30 per barrel (/bbl), strengthening to US\$50/bbl in 2021.

Key risks

A second wave of infections. A further wave of containment measures will hit consumer sentiment, the pace of operating and financial recovery. That may in turn weaken further credit metrics against our current base case of recovering balance sheet quality.

Liquidity crunch. In an extended period of stressed cash flows, small and mid-size companies will face liquidity concerns due to limited operational flexibility and not-so-robust bank relationships against the backdrop of a tighter credit market for high-yield issuers.

What to look for

Recovery pace. Countries have started easing lockdown measures. However, the extent of economic recovery remains uncertain and a key risk factor. Revival of consumer confidence to stoke demand and smoothening of supply chains are key in the near term. Government stimulus measures across countries will also be crucial to shoring up system liquidity.

Easing financing conditions. Access to funding remains important for the prospective credit quality of issuers in Asia rated in the 'B' category or below. This segment represents nearly one quarter of outstanding corporate ratings in Asia-Pacific, and nearly 60% in a country like Indonesia.

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The risks of subsequent waves of infections will affect operating conditions and funding access for riskier issuers.

Financial Institutions

About US\$440 Billion In 2020 Credit Costs

- We estimate that COVID-19 will cause 2020 credit costs across Asia-Pacific banking to increase by about US\$440 billion.
- Banks' asset quality in China, India, and Indonesia will be hardest hit.
- Credit metrics may not recover to 2019 levels until 2023.

What's changed?

COVID-19. The pandemic is hitting banks hard and has caused a negative step-change in our outlook for bank credit quality. Many banks may be tested to preserve financial strength at current ratings over the next six to 18 months.

Negative rating direction in numerous countries. Negative changes in ratings or outlooks have occurred in India, Indonesia, Australia, New Zealand, Japan, Thailand, Sri Lanka, and Papua New Guinea. Driving these changes are the negative economic effects of the spillover of COVID-19 on banks, weakening sovereign credit trends affecting systemically important private sector commercial banks, or both.

Some resilient banking systems. Despite significant headwinds, the outlooks of most banks in China, Hong Kong, Korea, and some Southeast Asian jurisdictions are unchanged--so far--due to idiosyncratic factors offsetting the effects of COVID-19. In China, the standalone credit profile of banks (ex-government support) is already relatively low, accommodating some deterioration in financial strength with no change in ratings. In Hong Kong, softer property prices are ameliorating a previously identified risk of rampant price growth.

Key assumptions

Macroeconomic outlook does not weaken. The cyclical downturn in Asia-Pacific trade and other negative factors affecting regional economies—and, therefore, banks--does not worsen significantly.

Governments will remain supportive. In contrast with Western Europe and the U.S., systemically important banks in most jurisdictions will likely benefit from government support in case of need.

Key risks

COVID-19. A worsening of our baseline scenario for COVID-19--either because the health scenario becomes more entrenched or prolonged--will hurt the economic outlook and financing conditions with a consequent weaker outlook for financial institutions' ratings.

High debt, elevated asset prices, and property risks. High private sector indebtedness and still-high asset prices set the scene for future financial system stress. Banks' high exposure to property, still-high property prices that are likely to weaken, and corporate-sector property risks, could hurt banks' asset quality.

India. As the outlook for the Indian economic weakens, risks affecting banks are increasing in a jurisdiction that already is suffering from high levels of nonperforming assets.

What to look for

Financial profiles stable but vulnerable. Buffering the effects of COVID-19 is that the asset quality (ex-India) and profitability (ex-Japan) and capitalization of banks are in generally good shape as the pathway for the virus remains uncertain. We anticipate that buffers will significantly tested, however, over the next six to 18 months.

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There are negative rating directions in numerous countries.

Insurance

Social Distancing Ramps Up Digital-Selling

- Growing negative bias reflects diluting capital and earnings amid volatile investment market environment.
- Slower macroeconomic conditions following the COVID-19 outbreak present headwinds to growth.
- Social distancing initiatives to speed up insurers' digital selling strategy to reboot customer outreach.

What's changed?

Low interest rates, volatile capital markets. As long-term investors, insurers are facing mounting challenges in their hunt for yield amid narrowing capital buffers. To cope, some insurers may increase credit appetite through allocation toward private debt and longer-duration assets. Currency volatility may affect Taiwan, Japan, and Korea players with big overseas investments. We anticipate insurers will review their risk appetite for investment and actuarial pricing.

Social distancing measures to stay. Extreme social distancing measures affected traditional insurance distribution channels (tied agency and bancassurance). While we see gradual easing of lockdown initiatives, face-to-face customer outreach will likely remain subdued. Growth momentum for the region will continue to see significant headwinds through the rest of 2020. The worsening economic outlook will affect trade-related insurance (marine cargo and credit) and mortgage insurance providers. For Hong Kong life insurers, the premium contraction in 2020 will be drastic as travel restrictions imposed on cross-border visitors remain.

Key assumptions

Capital buffers. Capital buffers will narrow given capital markets volatility and lower prospective earnings. Increasing frequencies of natural catastrophes within the region will also mean that costs to seek reinsurance will rise.

Asset growth. The chase for yield may prompt insurers to undertake more credit risk and buy less-liquid investments. Given the inherent asset-liability mismatch positions among many insurers, reinvestment challenges will take increasing focus.

Key risks

COVID-19. Prolonged social distancing and rising unemployment will point to top-line contraction and increasing lapses/surrenders.

Offshore investments. More aggressive overseas investment exposes insurers to greater balance-sheet volatility. Insurers with unhedged buys could see foreign exchange volatility and hedging costs rise amid low rates.

Nonmodeled risks. Urbanization and changing weather patterns--exemplified by Japan's recent typhoons and Australian's bushfires and storm events--require insurers to revisit catastrophe budgets, affecting reinsurance arrangements.

What to look for

Yield chase to pick up. Amid prolonged low interest rates, insurers' chase for yield will pick up, increasing appetite for credit and market risk.

Pent-up demand following strengthened insurance awareness. COVID-19 brings about stronger awareness among consumers to seek insurance protection, particularly for health and medical coverage.

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Digital selling will displace traditional sales mediums.

Public Finance

Post-COVID Period Poses Risks

- The pandemic continues to weigh on economic growth and the credit metrics of local and regional governments (LRGs).
- China's and India's LRGs, and Australia universities' revenues are more sensitive to travel restrictions.
- Recovery will be slow, potentially undermining LRGs' fiscal positions.

What's changed?

Slow recovery despite some easing. China lifted its lockdown of Wuhan in early April 2020, and most other regions are also easing restrictions. Economic data, however, remain mixed. We expect a slow recovery.

Key assumptions

Subdued revenue rebound. The hit from COVID-19 will weaken GDP growth and LRGs' revenue. We expect GDP growth of most regions to recover from the second half of 2020. Compared with other sectors, LRGs' recovery will likely remain slow, especially those with higher dependence on services, tourism, and consumption-related sectors. Higher education in Australia might also recover later.

Mixed annual planning. China will continue its countercyclical measures through tax cuts that will help LRGs' revenue, and through increased infrastructure spending, further stressing budgetary balances. In Australia, falling revenues and higher spending will drive record deficits and borrowing needs amid a weak economy. Although India's state governments have generally not embarked on big stimulus packages, a prolonged pandemic will further weaken its economic growth, revenues, and budgetary metrics. Meanwhile, Japan's LRGs will further benefit from higher consumption tax, supporting budget surpluses and debt reduction.

Key risks

Virus duration. If the spread of the virus isn't contained in the second half of 2020 as we expect, our GDP forecasts for Asia-Pacific could suffer. Contagion fear will prevent travel and consumption from returning, dragging down revenue for China's and India's LRGs, and Australian universities.

Property slowdown. Property related revenue account for a large portion of some LRGs' revenues, especially in China and Australia, making them sensitive to property market volatility.

China's off-budget borrowing. If China's economic growth decelerates rapidly, LRGs' off-balance sheet debt may spike again, resulting in weaker transparency and another hike in LRGs' debt burden.

What to look for

Containment progress, recovery path. If the pandemic were to continue, further containment by more government actions such as travel restrictions could occur, affecting economic growth more widely.

Policy shifts. LRGs' fiscal expansion could become more aggressive, affecting longer term credit trends.

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Slow recovery is likely even as lockdowns ease in some systems.

Sovereign

Lower Rates Cushion Credit Quality

- Geopolitical tensions add to the difficulties in the recovery from COVID-19.
- Debt is materially higher for most sovereigns due to policies to support growth and employment.
- Prolonged low interest rates should ease sovereign financing burden in the absence of risk events.

What's changed?

Virus upended credit assumptions. Economic growth forecasts for 2020 are sharply lower across all major economies. International trade and travel are down. Many countries are running huge fiscal deficits to offset the pandemic shock, lifting debt. Credit support for many sovereigns has weakened guickly over the first half of 2020.

Lower global interest rates and energy prices. The serious deterioration in economic outlook has sharply cut demand for commodities. Further, central banks have eased monetary policies. Given significant uncertainty over the duration of the pandemic, interest rates and energy prices look likely to remain low for a while.

Key assumptions

Growth jump in 2021. Despite the economic damage, we believe activities will rebound by 2021. Economies should improve next year, enough for policy support to largely fall off. We don't expect trend economic or fiscal performances to be severely affected by the pandemic.

No sustained, serious market disruptions due to U.S.-China relations. Trade tariffs and other measures after worsening bilateral relations between the two largest economies have so far had moderate economic effect. We expect that tensions will not escalate such that further measures, likely to be more damaging, will occur.

Key risks

Sudden capital swings. A sharp deterioration in U.S.-China relations could trigger investor risk aversion. The risk in abrupt reversals of capital flows is larger where, in response to lower global interest rates, governments ease domestic funding conditions to increase leverage in the public or private sector.

Reversal of China's deleveraging. If economic or labor market pressures mount, China's deleveraging policy could reverse. Sovereign credit support will likely weaken due to growing risks of financial instability, with negative implications for other sovereigns in the region.

What to look for

Breakdown of U.S.-China relations. The pressures of a looming presidential election and still-elevated COVID-19 could harden U.S. attitudes toward China. With most relatively painless measures in force, escalating bilateral tensions could trigger more damaging policies. Apart from the direct economic effect, the associated uncertainties could also trigger volatility in international financial markets and capital reversals from emerging Asia.

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Intensifying U.S.-China tensions add to global economic uncertainties.

Structured Finance

COVID-19 Tests Resilience

- Full effects of COVID-19 on borrower performance may not be fully visible until emergency measures are eased and temporary supports, including payment holidays, are wound back.
- For consumer asset classes, the pace of employment recovery is key to securitization outlooks.

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What's changed?

China. Asset performance of China auto loan asset-backed and residential mortgage-backed securities appears to have stabilized but uncertainty remains. Arrears 1-30 days past due peaked in February and declined since March. Other overdue buckets inched up. A recent surge of COVID-19 cases in Beijing underscores the uncertain recovery path, although it is too early to determine any meaningful effect on asset performance.

Japan. The COVID-19 outbreak has improved to a degree in Japan, with the lifting of the national state of emergency in May. However, recovery in economic activity would be slow as restrictions remain in place.

Australia. Restrictions have started to ease and most sectors are starting to reopen. Government support has balanced the effects of shutdowns to employment. Lenders have been granting payment relief in the form of temporary payment holidays to borrowers during the crisis.

Key assumptions

Temporary hits to growth. Ratings should be stable, with low levels of noninvestment-grade ratings and structural supports to cushion some deterioration. Diversified consumer asset pools mitigate event risks.

Key risks

Second economic shock to China and Japan. Such shocks could be due to a revival of the pandemic, or ripple effects from weak overseas markets to export-related sectors. Such an outcome, if prolonged, may feed through to consumer credit-backed and mortgage-backed loan performance.

Employment hit in Australia. As restrictions ease, the extent of employment recovery is uncertain. Some sectors and areas will take longer to return to normal, affecting confidence and house prices.

What to look for

China. The cumulative default rate will rise as "default" kicks in after arrears are 90 days past due. We estimate the additional default rate due to COVID-19 for our rated deals to be 30-60 basis points based on the arrears trend in the past two months and our economic view. There is no rating effect for now in light of our rating stress assumptions and credit enhancements provided.

COVID-19 is testing RMBS and ABS but, under our base case, downgrades should be limited to speculative-grade classes.

Related Research

- Economic Research: Asia-Pacific Losses Near \$3 Trillion As Balance Sheet Recession Looms, June 25, 2020
- COVID-19 Heat Map: Post-Crisis Credit Recovery Could Take To 2022 And Beyond For Some Sectors, June 24, 2020
- COVID-19- And Oil Price-Related Public Rating Actions On Corporations, Sovereigns, And Project Finance To Date, June 24, 2020
- Sector Roundup Asia-Pacific: Net Negative Bias Spikes to One in Six Issuers, June 30, 2020

This report does not constitute a rating action.

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Appendix 1: Economic Data And Forecast Summaries

Table A1

Australia – S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	1.8	-4	5.3	3.1	2.6
CPI inflation %	1.6	1	1.5	1.8	2
Unemployment rate %	5.2	7.5	6.9	6.1	5.4
Policy rate % (EOP)	0.75	0.25	0.25	0.25	0.75
Exchange rate (US\$ per A\$)	0.7	0.69	0.7	0.71	0.72

Source: Oxford Economics; f.-S&P Global Ratings forecast; End of Period - Q4 values. Unemployment rate shown is the period average.

Table A2

China – S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	6.1	1.2	7.4	4.7	5.3
CPI inflation %	2.9	3.2	1.8	2.1	2.1
Unemployment rate %	5.2	6	5.7	5.4	5
Exchange rate (per US\$)	6.99	7.11	7.15	7.19	7.23

Source: Oxford Economics; f--S&P Global Ratings forecast; End of Period - Q4 values. Unemployment rate shown is the period average.

Table A3

Hong Kong - S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	-1.2	-4.7	4.9	2.4	2.1
CPI inflation %	2.9	0.8	1.9	2.2	2.2
Unemployment rate %	3	4.8	4.3	4	3.7
Exchange rate (per US\$)	7.79	7.77	7.8	7.8	7.8

 $Source: Oxford\ Economics; f--S\&P\ Global\ Ratings\ forecast; End\ of\ Period\ -Q4\ values.\ Unemployment\ rate\ shown\ is\ the\ period\ average.$

Table A5

India - S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	4.2	-5.0	8.5	6.5	6.6
CPI inflation %	4.7	3.9	4.4	4.3	4.2
Policy rate % (EOP)	4.40	3.00	4.50	5.00	5.50
Exchange rate (per US\$)	74.4	74	74.5	76.5	78.5

Source: Oxford Economics; f--S&P Global Ratings forecast; End of Period - Q4 values. 2019 figure is an estimate for India. For India, 2019 = FY 2019 / 20, 2020 = FY 2020 / 21, 2021 = FY 2021 / 22, 2022 = FY 2022 / 23, 2023 = FY 2023 / 24.

Table A6
Indonesia – S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	5	0.7	6.7	5.5	5.4
CPI inflation %	2.8	2.4	3.2	3.4	3.2
Unemployment rate %	5.1	5.8	5.5	5.4	5.3
Policy rate % (EOP)	5.00	4.25	4.25	4.50	4.75
Exchange rate (per US\$)	13883	14200	14300	14400	14500

Sources: Oxford Economics; f--S&P Global Ratings forecast; End of Period - Q4 values. Unemployment rate shown is the period average.

Table A7

Japan – S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	0.7	-4.9	3.4	1	0.9
CPI inflation %	0.5	-0.3	0.2	0.7	1
Unemployment rate %	2.4	3.1	2.9	2.6	2.4
Policy rate % (EOP)	-0.07	-0.05	-0.05	-0.05	-0.05
Exchange rate (per US\$)	109.12	106	105	103	101

Sources: Oxford Economics; f--S&P Global Ratings forecast; End of Period - Q4 values. Unemployment rate shown is the period average.

Table A8

Malaysia – S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	4.3	-2	7.5	6.1	4.7
CPI Inflation %	0.7	-2.4	2.4	2.3	2
Unemployment rate %	3.3	4.9	4.7	4.3	3.9
Policy rate % (EOP)	3.00	1.75	1.75	2.00	2.25
Exchange rate (per US\$)	4.09	4.15	4.15	4.19	4.23

 $Source: Oxford\ Economics; f--S\&P\ Global\ Ratings\ forecast; End\ of\ Period\ -Q4\ values.\ Unemployment\ rate\ shown\ is\ the\ period\ average.$

Table A9

New Zealand – S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	2.2	-5	6	3.4	3
CPI Inflation %	1.6	1.7	1.8	2	2.1
Unemployment rate %	4.1	5.8	5.6	5.2	4.9
Policy rate % (EOP)	1.00	0.25	0.25	0.50	1.00
Exchange rate (US\$ per NZD)	0.67	0.65	0.66	0.67	0.68

Source: Oxford Economics; f--S&P Global Ratings forecast; End of Period - Q4 values. Unemployment rate shown is the period average.

Table A10
Philippines – S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	6	-3	9.4	7.6	7.5
CPI inflation %	2.5	1.2	1.9	2.3	2.6
Unemployment rate %	5.1	11	7	5.6	4.8
Policy rate % (EOP)	4.00	2.00	2.00	3.00	3.00
Exchange rate (per US\$)	50.74	53	52.33	51.67	51

Source: Oxford Economics; f--S&P Global Ratings forecast; End of Period - Q4 values. Unemployment rate shown is the period average.

Table A11
Singapore - S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	0.7	-5	6.7	2.5	2.5
CPI inflation %	0.6	-0.9	0.5	1.8	1.8
Unemployment rate %	2.3	3.2	2.9	2.7	2.6
Exchange rate (per US\$)	1.35	1.39	1.4	1.39	1.38

Sources: Oxford Economics; f--S&P Global Ratings forecast; End of Period - Q4 values. Unemployment rate shown is the period average.

Table A12
South Korea – S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	2	-1.5	4	3.8	2.6
CPI inflation %	0.4	-0.1	0.2	0.5	1
Unemployment rate %	3.8	4.6	4.3	4	3.9
Policy rate % (EOP)	1.25	0.25	0.25	0.25	0.75
Exchange rate (per US\$)	1157.8	1200	1150	1100	1100

 $Source: Oxford\ Economics; f--S\&P\ Global\ Ratings\ forecast; End\ of\ Period\ -Q4\ values.\ Unemployment\ rate\ shown\ is\ the\ period\ average.$

Table A13

Taiwan – S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	2.7	0.6	3.2	2.5	2.4
CPI inflation %	0.6	-0.5	1.3	1.4	1.2
Unemployment rate %	3.7	4.1	3.9	3.8	3.7
Policy rate % (EOP)	1.38	1.13	1.13	1.13	1.13
Exchange rate (per US\$)	30.11	29.8	29.5	29.3	29

Sources: Oxford Economics; f--S&P Global Ratings forecast; End of Period - Q4 values. Unemployment rate shown is the period average.

Table A14

Thailand - S&P Global Ratings Economic Outlook

	2019	2020f	2021f	2022f	2023f
Real GDP %	2.4	-5.1	6	4.6	3.8
CPI inflation %	0.7	-1.9	0.5	1.4	1.2
Unemployment rate %	1	1.7	1.6	1.5	1.4
Policy rate % (EOP)	1.25	0.25	0.25	0.25	0.75
Exchange rate (per US\$)	30.15	30.8	30.4	30	29.7

Sources: Oxford Economics; f--S&P Global Ratings forecast; End of Period - Q4 values. Unemployment rate shown is the period average.

Table A15

Regional – S&P Global Ratings Economic Outlook

Real GDP (%)	2019	2020f	2021f	2022f	2023f
Asia Pacific	4.6	-1.3	6.9	4.7	4.8
Eurozone	1.2	-7.8	5.5	2.9	2.0
Latin America 5	0.5	-7.4	3.5	3.0	2.6
U.S.	2.3	-5.0	5.2	3.0	2.8

Asia Pac and Latin America 5 aggregate GDP growth numbers are based on current purchasing power parity GDP weights. U.S. percentages are annual average percentage changes. Latin America 5 comprises Argentina, Brazil, Chile, Colombia, and Mexico.

Appendix 2

Table 2

Shape Of Recovery For Asia-Pacific Sectors: S&P Global Ratings' Assumptions And Forecasts

Sector	Effect*	Comment
Auto	High	COVID-19 is likely to result in very weak car sales globally during April-June 2020, with recovery prospects highly uncertain
		Downward rating pressure could also increase due to global supply chain disruptions.
		Asia-Pacific automakers still retain generally solid financial standing with low debt.
		A full recovery of credit metrics to 2019 levels is unlikely considering severe competition and high research and development expenses in the sector.
Building materials	Medium	Recovery is in sight, but the extent remains uncertain.
		Credit trend remains resilient in the medium term, driven by steady economic recovery and companies' tendency to deleverage by controlling capital expenditure.
		Overcapacity, especially in China, could be an overhang in the long run.
Capital goods	Medium	The pandemic will continue to strain earnings and profitability on the sector in 2020, despite a recovery in China.
		Credit metrics are likely to deteriorate due to the weak economic activities globally
		Downward pressure on Asia-Pacific companies' credit quality has occurred gradually, but is still relatively limited compared with capital goods companies in the U.S. and EMEAs.
		Credit metrics for the industry could recover to 2019 levels by the first half of 2022.
Chemicals	High	Following a deteriorating global supply-demand balance in 2019, COVID-19, polymer spreads declined to new lows, with limited signs of recovery as lackluster demand continues throughout the region.
		Chemical operators in the region have lowered their utilization rates and prolonged maintenance shutdowns to accommodate for weaker demand.
		Global capacity expansion plans will likely be delayed as a result of current market condition, which could bring forward the sector's recovery.
		Credit metrics for chemical sector could recover to pre-COVID levels by 1H 2022. Taiwan and Thailand face a harsher fallout compared with that for Japan, Indonesia, Australia, India, and China.
Consumer products	Medium	Reopening of stores will spur recovery for consumer discretionary goods. However, lower footfall in shopping malls due to prolonged social distancing and weaker consumption sentiment stemming from recessionary expectations will delay sales normalization.
		Increased sales in online and off-premise channels cannot fully offset the decline in offline and food service sales.
		Strength of balance sheet, geographic and distribution channel diversification, brand positioning, and economic value-add will determine the extent of fallout from COVID-19 and differentiate credit quality.
		For consumer staples, credit metrics would return to pre-COVID levels in the second half of 2021. Meanwhile, recovery would occur by the first half of 2022 for the consumer discretionary sector because higher unemployment will limit demand in 2021.
Financial institutions	Medium	COVID-19 will cause 2020 credit costs across Asia-Pacific banking to increase by more than US\$440 billion.
		Banks' asset quality in China, India, and Indonesia will be hardest hit.
		While many Asia-Pacific banking sectors are showing some resilience, risks are categorically on the downside.
		Credit metrics may not recover to 2019 levels until 2023.
Gaming	High	Weakest quarter has passed as we expect casinos in the region to reopen in 3Q.
		Pace of recovery will depend on demand source, travel limitations, and consumer behavior.
		Companies' ability to reduce leverage quickly will be key if the outbreak is not contained soon.
	<u> </u>	The gaming, leisure, and hotels sector could see a recovery in credit metrics to 2019 levels by end of 2022.

Sector	Effect*	Comment
Insurance	Medium	Growing negative bias reflects diluting capital and earnings amid volatile investment markets.
		Slower macroeconomic conditions, following the COVID-19 outbreak, present headwinds to growth.
		Social distancing initiatives to speed up insurers' digital selling strategy will reboot customer outreach.
		Credit metrics for non-life insurance could recover to pre-COVID levels by early 2022, but for the life insurance sector, this is likely to happen only around early 2023.
Media and Entertainment	Medium	Many media and entertainment companies will experience sharp revenue declines due to the COVID-19 pandemic, especially those without robust online presence that strongly correlates to sales.
		Online services such as media streaming, online games, and some e-commerce platforms should be less affected by COVID-19, though not immune to prolonged economic downturns.
		Smaller media and entertainment companies, especially those exposed to live events, could face severe liquidity issues.
		Credit metrics for advertising-supported media companies in Asia-Pacific would recover to 2019 levels by end 2021.
Metals and mining	Medium	The full fallout of the COVID-19 outbreak remains a key source of uncertainty and could undermine growth prospects, shifting market sentiment and adding volatility to commodity prices.
		Commodity prices generally remain soft; however, fiscal stimulus measures could play a meaningful role in the path to recovery.
		Prudent balance sheets will provide some buffer for ratings to withstand some near-term volatility, while liquidity and access to funding remain key for highly indebted producers.
		Weaker commodity prices and lower production volumes will occur amid a drop in demand due to the outbreak. Government stimulus measures, particularly from China, could support a faster recovery. Credit metrics for the sector could recover to 2019 levels by the second half of 2022.
Oil and gas	High	Production cuts by oil producing countries and the pace of economic resumption based on COVID-19 are driving oil prices. Demand recovery is on track, especially in China, with the exception of air traffic. The risk remains the potential for a second or third wave of infections.
		Asian refining margins have been under pressure due to soft demand. Compared with low oil prices, the pace of demand recovery will be a bigger driver for refining margins. International Martitime Organisation 2020 is overshadowed by COVID-19.
		We assume Brent oil price to average US\$30 per barrel for the rest of 2020, and rise to US\$50 per barrel in 2021 and US\$55 per barrel in 2022 and thereafter. This is based on our assumption that COVID-19 will peak out around mid-2020 and economic activities will gradually resume in the second half. A longer than expected COVID-19 is the key downside risk to our assumptions.
		Credit metrics in the oil and gas refining industry may recover credit metrics to 2019 levels by the second half of 2022. However, we do not see this happening for the oil and gas sector even beyond 2023 given that our long-term oil price assumptions are below 2019 levels.
Public finance	Medium	The coronavirus outbreak challenges economic growth and local and regional governments' (LRGs) metrics.
		China's LRG sector, India's LRG sector, and Australia's education sector are more sensitive to a revenue decline due to travel restrictions.
		LRG sectors are gradually shifting to a recovery phase, but still faces challenges to accelerate growth.
		Recovery of credit metrics to 2019 levels could occur toward the end of 2022.
Real estate	Medium	Property sales in China are recovering but the sustainability remains uncertain given the economic downturn. Sales prospects still look grim for Indonesian developers.
		Rating pressure remains for select developers, as revenue recognition is slowing with intensifying margin contraction.
		Although cross-border issuance is showing initial signs of reopening, the market will likely remain selective at the moment. Developers with weak liquidity, mostly rated in low 'B' or the 'CCC' category, could still see considerable refinancing risks.
		Revenue for property development will only be moderately affected and will likely not decline given that revenue has been locked in via presales in 2018-2019. However, margin compression will likely exacerbate, which will weigh on EBITDA. Hence, we expect recovery of credit metrics to 2019 levels in early 2022.

Credit Conditions Asia-Pacific: China First To Recover

Sector	Effect*	Comment
Real estate investment trusts	Medium	The sector's rating trend is negative. That said, we do not expect any "fallen angels" to non-investment grade in the next 12 months.
		Asia-Pacific REITs' and landlords will see rents fall and vacancies to pick up, but intensity will vary greatly among property quality and type.
		More subdued consumer and cautious outlook by firms will affect leasing activity.
		A full recovery for REITs' credit metrics to pre-COVID levels would occur from 2022.
Retail	High	Social distancing measures caused a bifurcation within the retail sector, making essential retailers stronger and discretionary spending weaker.
		The pandemic has accelerated the shift in consumer behavior toward e-commerce and highlighted the importance of operating omnichannel platforms.
		While the overall credit quality of our rated Asia-Pacific retailers remain relatively steady compared with global peers', some vulnerable credits are being severely hit.
		While essential retail and groceries are not likely to worsen, credit metrics for nonessential retail will only recover to 90%-100% of 2019 levels by end 2022.
Sovereign	Low	Geopolitical tensions add to the difficulties in the recovery from COVID-19.
		Government debt is materially higher for most sovereigns due to policies to support growth and employment.
		Persistently low interest rates should help ease sovereign financing burden in the absence of risk events.
Structured finance	Medium	Full fallout of COVID-19 on borrower performance may not be fully visible until emergency measures are eased and temporary supports including payment holidays are wound back
		For consumer asset classes, the pace of employment recovery will be key securitization outlooks.
Technology	Medium	The COVID-19 pandemic and heated tech frictions could cause revenue losses for tech companies over the next three to four quarters after a weak first quarters.
		Faster digitalization could accelerate investments in cloud computing and 5G infrastructure, facilitating a recovery in 2021, though consumer demand could remain soft.
		Financial fallout on most tech companies remains absorbable, but an extended COVID-19 pandemic and an escalating tech war could weigh on most exposed companies with low rating buffers.
		The software sector could see recovery in credit metrics to 2019 levels in the latter half of 2021, while the hardware/semiconductors sector should see this recovery in the first half of 2022.
Telecom	Low	Telecom sector's low cyclicality and utility-like demand characteristics should limit its correlation to weak macroeconomic conditions stemming from COVID-19.
		However, we continue to see downward pressure on credit quality due to ongoing large capital spending needs and stiff competition.
		We expect broadband and fixed voice traffic to grow given the rising connectivity demand, but telcos could face some risks from disruptions in mobility (roaming), retail, and business-to-business related businesses.
		Telecom is one of the lesser affected sectors due to the growth in data and communication traffic. We expect complete recovery of credit metrics by 2021.
Transportation cyclical	High	Disruptions to people flows and supply chains due to COVID-19 will trigger a slump in transportation demand in the region.
		Airlines and shipping are most exposed and likely to see significant passenger and freight volume drop until the health emergency is contained and economic activity normalizes. Aircraft lessors can handle temporary disruptions, but in a scenario of prolonged air travel decline and possible failures of some airline companies, lessors could be exposed to a more significant second-order effect.
		Package express, postal services, and logistics companies are also negatively affected but less exposed given their main focus on domestic markets.
		Earnings recovery for airlines will be supported by normalization of travel activity and lower oil prices. We see credit metrics for airlines returning to 2019 levels only by 2023.

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Sector	Effect*	Comment
Transportation infrastructure	High	Lockdowns and movement restrictions due to COVID-19 are leading to significant loss of cash flows with airports the worst hit.
		Existing infrastructure deficit and growth will support long-term demand, though near-term economic uncertainties pose a big risk and traffic may take years to recover to pre-COVID levels.
		Funding and market conditions show signs of volatility due to the effect of the pandemic and macroeconomic uncertainties.
		Airports will be worst hit and slow to recover, Toll roads will be sharply down but recover fast, while ports will be relatively less affected and recover in line with economic growth. Overall, we expect a return of credit metrics to 2019 levels in the latter half of 2022.
Utilities	Medium to low	Progressive relaxation of lockdowns will see demand improving slowly, restrained by weak economic conditions arising from COVID-19 effects.
		Near-term pressure on cash flows will occur due to lower demand and working capital strain.
		The sector's mixed rating headroom and liquidity will withstand an indirect effect.
		This sector is exposed to varied trends across the region, It is largely stable in countries with strong regulations like Australia, slightly more exposed in countries like China, India, and Indonesia. Recovery of credit metrics to 2019 levels could occur by the second half of 2022.

^{*}The impact descriptor above (high, medium, low) is our qualitative view of the risk. It does not directly translate to risk of rating actions, which depend on a number of factors including initial headroom under a rating coupled with the expected length and severity of the pandemic.

Appendix 3: List Of Analytical Contacts

List of contacts in table 2

Sector	Analyst name and contact
Auto	Katsuyuki Nakai + 81 3 4550 8748 katsuyuki.nakai@spglobal.com
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Insurance	Eunice Tan + 852 2533 3553 eunice.tan@spglobal.com
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	Andy Liu, CFA +852 2533 3554 andy.liu@spglobal.com			
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