ASIA PACIFIC REAL ESTATE STRATEGIC OUTLOOK

January 2019 / Research Report

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The opinions and forecasts expressed are those of Asia Pacific Real Estate Strategic Outlook and not necessarily those of DWS. All opinions and claims are based upon data at the time of publication of this article (January 2019) and may not come to pass. This information is subject to change at any time, based upon economic, market and other conditions and should not be construed as a recommendation.
1 / Executive Summary

While macroeconomic conditions in Asia Pacific saw a significant recovery in 2017 and the first half of 2018 supported by the cyclical upturn in global trade conditions, the latter half of the year saw signs of weakening economic indicators which suggest growth is likely to moderate ahead. Meanwhile, unemployment rates either held steady or continued to decline, particularly in Japan and Australia. Despite the tightening in global financial conditions, monetary policies in Asia remain broadly accommodative underpinned by low inflationary pressures. Nonetheless, risk factors persist ranging from uncertainties surrounding China’s growth and economic health, tightening of interest rate policies in major developed nations to global trade risks, which could adversely impact regional trade and export demand. Barring any shocks or unexpected shifts in the baseline, regional economic growth is expected to remain broadly stable at 5.6% in 2018 and 5.4% in 2019.

Real estate performance across much of the Asia Pacific region remains healthy on the back of strong capital markets and stable occupier fundamentals. Across the region, key cities in Japan, China, Hong Kong, Singapore and Australia continued to see healthy office leasing demand in 2018, while the weight of capital targeting quality assets have contributed to further cap rate compression in core markets. The regional markets in Japan with healthy fundamentals appear increasingly attractive from a risk-return perspective within the context of a core strategy portfolio.

While property returns in recent years have been underpinned by rental growth and cap rate compression, total returns in the coming years are likely to be driven mostly by income yields with capital growth likely capped by yield expansion given increasing prospects of higher interest rates. Nevertheless, in our view, Asia Pacific commercial real estate markets are expected to deliver healthy core unlevered aggregate total returns ranging between 5.4% - 7.4% per annum (by sector) over the next five years with industrial returns outperforming office, retail and residential returns.

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1 IMF Regional Economic Outlook: Asia Pacific, October 2018.
2 Source: DWS, as at December 2018.
Note: f = forecast. There is no guarantee the forecasts will materialize.
### ASIA PACIFIC REAL ESTATE KEY STRATEGIES:

<table>
<thead>
<tr>
<th>Theme</th>
<th>Sector</th>
<th>Countries/Cities</th>
<th>Main Rationale</th>
</tr>
</thead>
<tbody>
<tr>
<td>Core Locations with Strong Fundamentals</td>
<td>Office</td>
<td>Sydney, Melbourne and Osaka</td>
<td>Further rental upside potential with stable occupier demand outpacing limited supply in the next couple of years.</td>
</tr>
<tr>
<td></td>
<td>Prime Retail/ Suburban/ Neighbourhood centres</td>
<td>Sydney, Melbourne and Osaka</td>
<td>Limited supply across prime retail. Suburban/neighbourhood centres provide cushion against fluctuations in discretionary spending.</td>
</tr>
<tr>
<td>High Yields Underpinned by Stable Cash Flows</td>
<td>Logistics</td>
<td>Japan, South Korea, Singapore, Australia</td>
<td>High income yields and stable rental growth underpinned by favourable demographic dynamics and rising e-commerce retail trends.</td>
</tr>
<tr>
<td>Regional Markets</td>
<td>Office/Retail/Logistics</td>
<td>Regional cities in Japan</td>
<td>Historical low vacancy rates and borrowing costs present opportunities for high levered returns with local financing in place.</td>
</tr>
<tr>
<td>Mid-Term Opportunities</td>
<td>Office/Retail</td>
<td>Tokyo, Seoul</td>
<td>Selective approach with near-term returns in Central Tokyo capped by tough competition from local J-REITs. Subdued office demand in Seoul with limited rental growth till 2019.</td>
</tr>
<tr>
<td>Cyclical Uplift in Recovery Markets</td>
<td>Office/ Business Parks</td>
<td>Singapore</td>
<td>Cyclical rental recovery underway as leasing sentiment improves coupled with diminished supply pressures over next few years.</td>
</tr>
<tr>
<td>Active Asset Management</td>
<td>Office</td>
<td>Japan, South Korea, Australia, Shanghai, Beijing</td>
<td>Utilize asset management specialty and local knowledge to enhance asset performance and improve cash flows of older but well-located assets.</td>
</tr>
<tr>
<td>Retail</td>
<td>Japan, South Korea, Australia, Shanghai, Beijing</td>
<td>Improvement of foot traffic and reposition tenant mix for underperforming high street retail and shopping centres.</td>
<td></td>
</tr>
<tr>
<td>Forward Commitments</td>
<td>Office/Retail/Logistics/Hotel</td>
<td>Japan, South Korea and Australia</td>
<td>Potential for higher returns compared to investments in core stabilized assets.</td>
</tr>
</tbody>
</table>

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2 See chapter 3 for further discussion on Core Strategy, Core Plus and Value Added Strategy.

No assurance can be given that investment objectives will be achieved.
2 / The Economy

2.1 Regional Economic Outlook

Economic conditions in Asia Pacific held up in 2018, supported by the recovery in global trade and robust domestic demand. China’s economy continued to demonstrate signs of stabilization, though recent economic indicators suggest further cooling in economic growth ahead, as fixed asset investment and retail sales growth moderated from previous quarters. Australia’s transition towards a more diversified growth led by the non-mining sectors has continued, particularly in the main Eastern states. In Japan, South Korea and Singapore, export growth remained strong while business sentiment held up in Japan and Singapore for most of 2018, though economic activities have noticeably moderated towards the end of the year owing to uncertainties around global and regional trade. Labour market conditions across the region stood firm except for South Korea, as evidenced by the declining or stable unemployment rates in most countries.

The region’s growth momentum remains partially supported by favourable monetary policies where central banks continue to balance between the risks of high asset prices and stimulating domestic demand amidst low inflationary pressures. Nonetheless, risks persist from rising anti-globalisation sentiments which could potentially lead to increased protectionism involving higher trade tariffs impeding export demand, which poses risks to the recent global recovery. Barring any unexpected shocks or shifts in the baseline, growth for the region is expected to remain relatively stable at 5.4% in 2019, albeit lower than the estimated growth figure of 5.6% in 2018.

EXHIBIT 1: ASIA PACIFIC REAL GDP GROWTH & UNEMPLOYMENT RATES

<table>
<thead>
<tr>
<th></th>
<th>GDP (YoY)</th>
<th>Unemployment Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Australia</td>
<td></td>
<td></td>
</tr>
<tr>
<td>China</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hong Kong</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Japan</td>
<td></td>
<td></td>
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<tr>
<td>Malaysia</td>
<td></td>
<td></td>
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<tr>
<td>Singapore</td>
<td></td>
<td></td>
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<tr>
<td>South Korea</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Notes: f – forecast. There is no guarantee the forecasts will materialize. Sources: DWS, Oxford Economics, Bloomberg. As of December 2018

IMF Regional Economic Outlook: Asia Pacific, October 2018.
External demand

In the U.S, growth momentum remains supported by consumer spending, a steady labor market, and further boosted by recent tax reforms and increased government stimulus. In contrast, the Eurozone saw GDP growth moderating to 1.7% year on year in the third quarter of 2018, down from the stronger growth rates of above 2% in the preceding quarters.

In the Asia Pacific region, a healthy external environment in the first half of 2018 underpinned regional export and economic growth on the back of import demand recovery from China. However, downside risks have increased following the escalating trade conflicts between the United States and major trading partner, China, with US$250 billion of tariffs on Chinese imports already in place. While the negative impact of these tariffs have yet to disrupt the region’s growth momentum for most of 2018, slower export growth and weaker PMI readings across the region since the second half of the year underline concerns over the strength of global demand and near-term growth outlook, as evidenced by the rising volatilities and share price corrections across the global and Asian stock markets in recent months.

EXHIBIT 2: GROWTH IN ASIA’S EXPORTS AND CHINA’S IMPORTS (Y-O-Y %)

Source: DWS, Oxford Economics. As at December 2018.

Monetary policy

Over the course of 2018, a total of four interest rate hikes in the United States have led to higher interest rates in the smaller economies of Hong Kong and Singapore, given their close monetary policy ties with the U.S. However, recent signaling by the U.S Federal Reserve has provided investor optimism that future rate increases could at implemented at a measured pace and more gradual compared to previous hikes. Elsewhere, major central banks in China, Japan and Australia have kept monetary policies accommodative by maintaining domestic policy rates at all-time lows in support of domestic demand. Going forward, central banks in the region are expected to keep monetary policies supportive in favour of growth amidst rising uncertainties over global demand.
**Inflation**

Inflationary pressures have remained largely stable across Asia Pacific, especially in the major economies of China, Japan, South Korea and Australia, though inflation is expected to pick up gradually on the back of improving demand and consumption, averaging 1.8% - 2.7% over the next five years in the key countries in our coverage (excluding Japan). Vis-a-vis current levels, ten year bond yields in key core countries (excluding China/HK) are generally expected to rise by 10-60 basis points over the next five years. The risks of cap rate increases are higher in some markets, especially in the trade dependent economies of Hong Kong and Singapore.

**EXHIBIT 4: INFLATION AND LONG TERM INTEREST RATES**

Note: f = forecast. There is no guarantee the forecasts will materialize.
2.2 Country Outlook

Japan: Japan’s real GDP growth is expected to grow by 1.1% in 2018 and 2019 respectively, backed by healthy corporate activity and a recovery in private consumption. The unemployment rate remained tight at 2.5%, the lowest level in 25 years, with core CPI at 0.9% in November 2018. Bank of Japan maintained its long-term bond yield target near 0% to meet its inflation goal of 2%, while allowing more operational flexibility in an effort to lessen the risks of the long-term monetary easing policy. Overseas tourist arrivals to the country are expected to hit an historical high exceeding 30 million in 2018, almost tripling over the last six years.

South Korea: South Korea’s real GDP growth is expected to moderate to 2.5% in 2019 with concerns looming over the slowdown of export activities. Though its export volume grew resiliently by 9% year-to-date in November 2018, the export to China, the country’s largest trade partner, shows the weakening signs due to the impact from the US-China trade conflict. Bank of Korea raised the base interest rate from 1.5% to 1.75% in November 2018, in an effort to cool down the swelling household debt and alleviate concerns of capital flight, though further hikes are expected to be limited in 2019.

China: China’s economic growth has moderated in recent quarters towards the government’s targeted level of 6.5% in 2018, underpinned by domestic consumption, despite higher U.S. tariffs on Chinese imports. While tighter capital controls and deleveraging economic reforms remain on the table, the Chinese government has also maintained supportive measures such as targeted monetary easing and encouraged bank lending to non SOEs. Barring unexpected shocks in the global economy and foreign relations, growth is generally expected to ease further to 6-6.5% in 2019.

South East Asia: Growth in ASEAN economies is expected to remain relatively strong. While exports growth has slowed since early 2018, private investment and consumption remain major drivers of domestic demand supported by long-term structural trends of rising urbanization and household incomes. Notwithstanding, risks abound from volatility in commodity prices and potential capital outflows atop currency weakness triggered by the prospect of higher U.S. interest rates. Latest projections by IMF forecast GDP growth of 4.8% for the leading ASEAN economies in 2019.

Singapore: While the positive impact of the cyclical manufacturing-led growth seen in early 2018 is unlikely to be repeated, the services industries continue to perform well, including the expanding wealth, insurance and healthcare sectors. GDP growth is expected to range between 2.5 – 3.0% over the next five years. Domestic interest rates have risen gradually in line with U.S. rate hikes, with the trend likely to continue in the near future, leading to higher borrowing costs.

Australia: Over the five year horizon, GDP growth is expected to range between 2.6% - 3.0% supported by an increase in commodity exports while consumer spending is anticipated to grow at a fairly subdued pace. Labour market conditions remain healthy although the pace of job creation is expected to moderate to 1.4% per annum from 2019-2023. Inflation is unlikely to accelerate significantly due to the limited inflationary pressures globally and in particular, the weaker wage growth domestically. Given the inflation outlook, the Reserve Bank of Australia (RBA) is expected to hold the cash rate in the near term before any hikes in 2020.

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5 IMF Regional Economic Outlook: Asia Pacific, October 2018.
2.3 Risks to the Forecast

**Slowdown in China:** Risks to the Asia Pacific region center around the outlook for China’s growth. Being the largest trading partner for most APAC nations from natural resources in Australia to intermediate electronic and machinery products of export dependent nations such as Singapore and South Korea, a sharper-than-expected slowdown in China’s economy would see trade flow and economic growth decline in the region. A deceleration in housing activity amid high home prices could weigh on investment and consumption while the relatively high debt-to-GDP ratio remains a concern.

**Interest rate volatility and cap rate widening:** Further rate hikes in the United States in the coming years could widen the spread between the U.S. bond yield and domestic bond yields, leading to tighter monetary policies and higher borrowings costs in the region. This could affect key REIT markets which are interest rate sensitive, and negatively impact the broader direct real estate markets in terms of transaction volume, yields and market sentiment. We have reflected this in our cap rate assumptions although risks remain that cap rates might widen more significantly than anticipated.

**Rising Trade Conflicts:** Despite increasing domestic consumption, Asia Pacific’s economies remain highly dependent on exports trade. Rising anti-globalisation sentiments pose a serious threat, particularly the recent tariff conflicts between the United States and China. The rising threat of a tit-for-tat retaliatory trade conflict between both nations, if left unchecked, could directly reduce China’s demand for industrial exports and adversely impact export and trade volumes, limiting economic growth across the region.

**Increased Government Debt levels:** High levels of foreign debt was a major contributor leading to the Asian financial crisis in 1997-98. Though many countries in the Asia Pacific are now on stronger financial footing, government debt levels have generally increased across the region over the past 20 years. As of 2017, the Debt-to-GDP ratio in Japan was 200%, much higher than other APAC countries such as South Korea (38%), Australia (38%) and Singapore (113%)\(^6\). In Japan, risks from high government debt levels are partly mitigated by the fact that the majority of government debt is domestically held with limited reliance on external borrowings, supported by significant levels of foreign exchange reserves and ultra-low interest rates. Nonetheless, higher debt levels present a potential long-term risk, limiting the flexibility of governments to either adopt expansionary fiscal policies to stimulate economic growth or tighten monetary policies.

\(^6\) Bank for International Settlements Database, June 2018.
3 / Strategic Real Estate Outlook

3.1 Real Estate Performance

Real estate performance across much of the Asia Pacific region has been relatively healthy on the back of sustained cap rate compression in key core markets. The gateway cities of Singapore, Auckland, Sydney and, Melbourne led office rental growth in the region, underpinned by stable occupier demand and limited new supply. Leasing activity also remained healthy in key Tier 1 cities in China, driven by domestic financial services and technology firms. Vacancy rates in Tokyo and regional cities in Japan continued to fall on the back of healthy occupier demand and controlled supply levels. However, performance in other markets including Perth and Seoul remain subdued due to a surge in new supply or weak tenant demand.

Core unlevered aggregate total returns in the region fell marginally to 8.1% in 2017, lower compared to 8.8% recorded in 2016 and the three-year average of 9.9% recorded from 2014 to 2016. The weight of capital targeting quality assets in the region has contributed to further cap rate compression (albeit less pronounced compared to the earlier years which led to significant capital gains), especially in Australia and Japan (where regional cities have experienced cap rate compression trends seen in the key gateway cities). The trend was compounded by active investments from sovereign capital, pension funds and insurance firms, which have increased their real estate allocations. As such, much of the capital growth was front loaded and realized in recent years, leading to diminished prospects of further capital growth in the forecast horizon. We anticipate negative impacts from the possible widening of cap rates in most markets in coming years, albeit offset by positive income growth trends, with future returns likely driven mostly by income yields.

Looking ahead, in terms of sector performance, core unlevered aggregate total returns are expected to range between 5.4% - 7.4% annually over the next five years with the industrial sector likely to yield higher returns compared to office, retail and residential. Near term returns are capped in Tokyo and Seoul given strong competition for good quality assets and subdued tenant demand, respectively. Nevertheless, the potential widening of cap rates in the medium term could create good entry opportunities for investors seeking higher exposure within the region.

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7 DWS. This information is subject to change at any time, based upon economic, market and other considerations and should not be construed as a recommendation. Past performance is not indicative of future returns. Forecasts are based on assumptions, estimates, opinions and hypothetical models that may prove to be incorrect.

8 Source: DWS Calculations, July 2018, from Colliers, Miki Shoji, JREI, BAC, CBRE, Mateplus, Cushman & Wakefield, Korea Appraisal Board.

3.2 Strategic Investment Themes

Since the second half of 2016, real estate cap rates continued to tighten in Japan, Australia and South Korea, and remained at tight levels in Singapore and Hong Kong as interest rates remain at historically low levels. Investors are increasingly finding it challenging to secure good income producing core-type opportunities which fit their target returns in these markets, with some investors opting to move up the risk curve and/or diversify their target sectors. Notably, in spite of cap rate compression trends, spreads to long-term bond yields across some Asia Pacific markets such as Australia and South Korea remain above their historical long-term averages, providing investors some buffer in the event of rising domestic bond yields in the future.

We continue to hold the view that while cap rate compression was in part driven by the anticipation of a stronger rental outlook, other structural factors were also at play: (1) geographical diversification needs as evident from the gradual increase in cross-border transactions, and (2) a continuous amount of capital available for real estate investments with an estimated US$31 billion11 of dry powder available through Asia-focused closed-end private real estate funds, an increase from US$29 billion as at the end of 2017.

We favour markets with relatively good yield spreads to mitigate risks arising from the potential widening of cap rates, and healthy leasing fundamentals to provide rental income growth to drive returns going forward. While investors are likely to retain interest in core gateway cities with good fundamentals, elevated asset prices in these locations have enhanced the appeal of quality assets in secondary locations and regional cities. As such we expect to see increasing investment activities into the secondary markets as investors seek higher-yielding assets to fulfill their returns requirements.

10 Japan – Tokyo (All sectors), Osaka/Yokohama/Nagoya/Fukuoka (Office); Australia – Sydney/Melbourne/Brisbane/Perth/Adelaide; China Tier 1 – Beijing/Shanghai (All sectors), Guangzhou (Office & Retail); South Korea – Seoul.
11 Preqin Quarterly Update: Real Estate, Q1 2018.
Core Strategy

Core Locations with Strong Fundamentals: Good income producing assets providing meaningful returns in key gateway cities, i.e. Osaka, Sydney and Melbourne, have continued to attract global capital. Although forward returns are projected to moderate vis-à-vis the strong outperformance achieved in the past two years, this strategy continues to offer investors the potential for further income growth with stable corporate occupier demand outpacing limited supply. Prime retail assets in major shopping destinations with access to high footfall as well as suburban or neighbourhood retail centres with large catchments in Osaka, Sydney and Melbourne also remain attractive. Supply is tight across major prime locations while suburban neighborhood centres provide a cushion against fluctuations in discretionary spending, although accessing stock may often require partnership with a retail specialist. Another option could also include tie ups with experienced retail operators to leverage their scale and asset management capabilities.

High Yields Underpinned by Stable Cashflows: For investors looking for higher income returns, attractive opportunities persist in the logistics sector given the steady income stream nature underpinned by favourable demographic dynamics and ongoing proliferation of online retail, and higher yields of logistics properties – typically in excess of 6% (4% for greater Tokyo). Target markets which appear attractive include prime logistics centres in key transportation hubs including Japan, Korea, Singapore and Australia.

Regional Markets with Good Fundamentals and attractive excess returns: The ten-year Japan government bond yield remains near zero levels and borrowing costs are extremely cheap. Vacancy rates have declined to historical lows while supply is limited in the next couple of years, which underpins future rental growth.

Mid-term Opportunities: Monitor progress and look out for optimal entry timing in core investable markets with near-term returns capped by intense competition for assets with domestic REITs i.e. Central Tokyo or facing short-term vacancy issues i.e. Seoul. Despite current weak rental prospects in the latter markets, demand supply dynamics are expected to improve gradually in favour of landlords as occupier demand recovers, leading to cyclical rental uplifts in later years.

Cyclical Uplift in Recovery Markets: For investors willing to look beyond the current low rental trends, markets poised for a near-term recovery offer an attractive combination of higher entry yields and potential for market-driven returns. We see opportunities in the office markets in Singapore, where rentals are in the midst of a recovery following improved leasing sentiments and lower supply pressures, and in Brisbane with improved occupier demand supported by low development pipeline and shortage of Grade A space.

Core Plus and Value Added Strategy

Active Asset Management: We see opportunities in key cities in mature North Asian and Australian markets by taking on leasing risks for vacant office properties or refurbishment/re-positioning of older but well-located properties. Prime retail and shopping centres are also strong candidates for a value-add proposition including improvements in retail footfall and repositioning of tenant mix. In China, opportunities could arise from repositioning underperforming office assets and improving tenant mix for retail assets in prime locations such as Beijing and Shanghai. Investors should be mindful of the higher leasing risks involved which require asset managers with strong local networks and deep market knowledge to successfully create value enhancement.

Forward Commitments: In certain markets, entering into joint ventures with strong local operating partners for forward commitments provides a viable route to access good real estate assets with the potential for enhanced returns compared to investments in core stabilized assets. We see selective opportunities in commercial sectors including the hotel, office and logistics sectors in Japan, South Korea and Australia. Construction risk and lease-up risk are key considerations that can be mitigated through partnerships with reputable local operators and leasing agents.

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12 Source: DWS Forecasts, December 2018.
3.3 Capital Markets

Transactions
Across the Asia Pacific region, commercial real estate transaction activities remained robust as transaction volumes reached new highs in the second quarter of 2018. This was achieved on the back of tight yields and higher asset prices underpinned by strong investor appetite. Japan and China remained the top two destinations for capital inflows, accounting for 24% and 23% of APAC volumes respectively, with Australia (19%) and Hong Kong (18%) following behind.

EXHIBIT 6: APAC REAL ESTATE TRANSACTION VOLUME

Volume By Country

At the city level, Hong Kong and Tokyo remain the most active transaction markets, with Seoul, Shanghai, and Sydney following close behind. Foreign investors continued to participate actively, accounting for over 30% of recent transaction volumes in major Australian cities (Sydney, Melbourne, Brisbane), as well as in Singapore and Yokohama.

EXHIBIT 7: COMMERCIAL REAL ESTATE TRANSACTION VOLUME BY CITY (AS AT 2018 3Q)

Note: Figures shown based on rolling 12-month period. Exclude land transactions.
Source: DWS, Real Capital Analytics. As of December 2018.
From a global perspective, Australia, Japan, China ranked among the top ten investment destinations for foreign cross border real estate buyers, just behind the United States and leading European nations in 2017.

**EXHIBIT 8: CROSS-BORDER REAL ESTATE INVESTMENTS BY DESTINATION**

![Cross-border real estate investments by destination](image)

Notes: Commercial real estate transactions exclude non-income producing assets, such as development site transactions. Source: DWS, Real Capital Analytics. As of July 2018.

**Investor Profile:**

Cross-border investors remain active in the region, accounting for 32% of transaction volumes in Asia Pacific in the 12-month period to the third quarter of 2018. Foreign investors participated in billion dollar deals in Hong Kong and Seoul, while overseas capital accounted for between 30-40% of investments in Sydney, Melbourne and Singapore. Domestic institutional investors and listed funds/REITs form the next largest buyer groups in the region, each accounting for 19% of transaction volumes, followed closely by private investors (17%).

**EXHIBIT 9: COMMERCIAL REAL ESTATE TRANSACTION IN APAC (BY INVESTOR TYPE)**

![Commercial real estate transaction in APAC](image)

Note: Figures shown exclude land transactions. Source: DWS, Real Capital Analytics. As of December 2018.
In recent times, Chinese investors have been emerging as a significant buyer group in global and Asia Pacific real estate markets. This is especially so in the Hong Kong and Australian markets, where in 2016, Chinese investors accounted for a peak share of 30% and 10% of the respective market transaction volumes. However, going forward, in lieu of the tighter restrictions on outbound Chinese investments in place since early 2017, we expect to see less participation from this group of investors, though this is unlikely to create any major distortions on transactional activities in the region, with the exception of the Hong Kong market where Chinese capital has been particularly influential.

EXHIBIT 10: CHINA OUTBOUND REAL ESTATE INVESTMENTS IN ASIA PACIFIC

Note: Figures shown exclude land transactions. Source: DWS, Real Capital Analytics. As of December 2018.

REITs
The REIT market in developed Asia Pacific is gradually approaching maturity since the initial stages of development at the start of the millennium. Following strong performances over the last two years, Asia Pacific REITs turned in a mixed performance in 2018. The Tokyo Stock Exchange REIT Index gained close to 9% in 2018, a healthy performance in contrast to the declines of -3%, -11% and -12% in major REIT indices in Hong Kong, Singapore and Australia respectively.

EXHIBIT 11: MARKET CAPITALIZATION OF LISTED REITS IN ASIA PACIFIC

Office

The trend of global and domestic capital chasing income producing office assets has contributed to cap rate compressions in the majority of countries across the region including Japan, South Korea and Australia, while cap rates remain broadly flat in other markets such as China and Hong Kong, in line with interest rate movements. The tight conditions were supported by active investments by sovereign capital, pension funds, and insurance firms and cross border investors chasing large deals. Nonetheless, while continued capital flows are likely to keep cap rates low in the short run, we expect the rising interest rate environment to bring forth a marginal expansion in cap rates over the next few years, with the smaller economies of Singapore and Hong Kong being more susceptible to rising yields.

Exhibit 12: Office Sector: Cap Rate Spreads to 10Y Government Bond Yield

<table>
<thead>
<tr>
<th>City</th>
<th>Cap Rate Spread to 10Y Gov. Bond Yield</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sydney CBD</td>
<td>-4%</td>
</tr>
<tr>
<td>Melbourne CBD</td>
<td>-2%</td>
</tr>
<tr>
<td>Brisbane CBD</td>
<td>0%</td>
</tr>
<tr>
<td>Auckland</td>
<td>2%</td>
</tr>
<tr>
<td>Hong Kong Overall</td>
<td>4%</td>
</tr>
<tr>
<td>Tokyo</td>
<td>6%</td>
</tr>
<tr>
<td>Osaka</td>
<td>2%</td>
</tr>
<tr>
<td>Seoul CBD</td>
<td>0%</td>
</tr>
<tr>
<td>Beijing Overall</td>
<td>-2%</td>
</tr>
<tr>
<td>Shanghai Overall</td>
<td>-4%</td>
</tr>
</tbody>
</table>

Note: f = forecast. There is no guarantee the forecast returns shown will materialize. LT denotes period of past 20 years or shorter where data is available.

Retail

Sizable institutional grade assets in the retail sector remain tightly held by local developers and REITs in markets such as Singapore and Australia, capping deal volumes. In Hong Kong, while transactions of prime retail centres remain scarce, a portfolio of neighbourhood retail centres have been sold by Link REIT. High street retail sales benefited from increasing tourist arrivals in Japan and Australia, while private wealth capital is more dominant in transactions in prime high street areas in Hong Kong, Shanghai, Tokyo Ginza and Seoul Gangnam where cap rates remain extremely tight. Institutional investors have been observed to be exploring suburban assets in Japan, Australia and to a lesser degree in South Korea, where investors and REITs have tried to reshuffle existing portfolios. For instance, Australia saw a number of regional and sub-regional assets being traded as REITs look to recycle their capital and reposition their portfolios.

Industrial

Investor interest in the industrial and logistics sector remains strong due to the relatively higher yields and the recent evolution and gradual maturity of the sector, though acquisition opportunities of institutional grade assets remain limited. The supply of modern facilities is catching up to increasing demand with multiple large assets currently in the development pipeline in major metros in Japan, South Korea and China. Further yield compression (albeit marginal) could occur in regional cities in Japan, while yields have stabilized in other markets.
Credit markets
The financing environment remains largely positive due to favorable monetary policies and supportive measures. Compared to six months ago, base reference rates and loan spreads have remained largely stable across the region. With the exception of China and Hong Kong, office cap rate spreads over financing costs remain positive across core markets with the highest positive carry of circa 200-300 basis points in the Australian and Japan markets.

While credit financing generally remains accessible to core investors, loan-to-value covenants remain stable while there are signs that lenders are becoming sensitive to high valuations especially for assets with weaker leasing covenants or in inferior locations. This could potentially lead to moderate cap rate widening in future.

Exhibit 15: Typical commercial lending terms (Up to 5Y Swap)

<table>
<thead>
<tr>
<th>Market</th>
<th>LTV (%)</th>
<th>Base Reference rate</th>
<th>Spread (bps)</th>
<th>Financing Cost (bps)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Australia</td>
<td>50-55%</td>
<td>5Y Swap Rate: 2.55%</td>
<td>160 - 200</td>
<td>415 – 455</td>
</tr>
<tr>
<td>China</td>
<td>50-60%</td>
<td>1-5 year base lending: 4.75%</td>
<td>200 - 500</td>
<td>675 - 975</td>
</tr>
<tr>
<td>Japan</td>
<td>50-60%</td>
<td>5Y JPY swap rate + TL spread: 0.2%</td>
<td>40 - 60</td>
<td>60 - 80</td>
</tr>
<tr>
<td>Singapore</td>
<td>50-60%</td>
<td>4Y Swap Rate: 2.3%</td>
<td>120 - 180</td>
<td>350 - 410</td>
</tr>
<tr>
<td>South Korea</td>
<td>50-60%</td>
<td>5Y KTB: 2.05%</td>
<td>145 - 185</td>
<td>350 - 390</td>
</tr>
</tbody>
</table>

Source: DWS, Bloomberg. As at November 2018. For illustrative purposes only.
EXHIBIT 16: TYPICAL BASE REFERENCE RATES FOR COMMERCIAL LENDING

Source: DWS, Bloomberg. As at December 2018.
* Figures before Dec 2014 refer to the 1-3 year PBOC rate.
Property Sectors and Returns

4.1 Office

Current Conditions: Office markets in core cities across Asia Pacific continued to perform relatively well, underpinned by steady occupier demand trends. Over the past twelve months, Singapore, Auckland, Sydney and Melbourne were the region’s outperformers with effective rent growth ranging 8-13%, driven by a broad-based recovery in tenant demand led by business services. Rents in Hong Kong Central also performed well, supported by occupier demand from mainland Chinese financial services firms, and in Tokyo rental growth was supported by tight vacancy levels. At the other end, rents in markets such as Seoul (Yoido) remain in cyclical downturn weighed down by subdued demand and significant supply pressures. Other Australian cities have shown some early signs of stabilization with Brisbane and Adelaide experiencing marginal rental growth amidst a recovery in tenant demand.

Looking back a decade since the global financial crisis, office rents in most cities across the region have recovered significantly from lows in recent years. Falling interest rates contributed to the ongoing yield compression and growth in asset values which led to the significant outperformance of capital value growth to date compared to rental growth in the past decade.

EXHIBIT 17: OFFICE SECTOR: DECLINE AND RECOVERY IN PRIME RENTS AND CAPITAL VALUES (LAST PEAK = 100)

From an occupier perspective, structural shifts in office demand remain underway in the region, underpinned by the increasing usage of technology-related applications, rising number of millennials in the workforce, and the changing conceptualization of the typical workplace environment. Technology firms ranging from big multinational corporations to smaller local technology start-ups have been increasingly taking up office spaces in the CBD, at the same time when major financial institutions are

DWS. This information is subject to change at any time, based upon economic, market and other considerations and should not be construed as a recommendation. Past performance is not indicative of future returns. Forecasts are based on assumptions, estimates, opinions and hypothetical models that may prove to be incorrect.
consolidating their office space requirements, with the exception of growing niche sectors such as Fintech or wealth management activities.

Co-working operators have been expanding rapidly in Asia Pacific, with larger established operators increasingly venturing from secondary locations or lower-grade offices to higher specification offices in core locations. One notable example was the U.S. co-working giant WeWork which has grown rapidly across Asia through acquisitions of local rival co-operators and new office set-ups, with the firm making its first foray into Singapore and Southeast Asia in late 2017 having already established operations in North Asia and in Sydney. There are also increasing trends of collaboration opportunities between major real estate developers and local co-working operators in core office locations around the region.

Though the market share of space leased by these firms remains relatively small and hinges on the sustainability of demand from end-users (i.e. start-ups, small business owners and corporations looking at flexible working arrangements), the segment’s rapid growth and increasing trends of collaboration opportunities with office landlords should likely exert some influence on the leasing market over time.

Outlook: The regional outlook for the office sector remains broadly positive with a reacceleration in economic activity and favorable demand-supply dynamics for most key office markets. Over the five year forecast period till 2023, vacancy rates in key office markets in Japan, Australia and Hong Kong are expected to increase only marginally from the current tight levels. On the other hand, while short-term vacancy pressures currently persist in the Australian regional cities of Brisbane, Adelaide and Perth, occupancy levels are forecast to improve gradually on the back of a recovery in occupier demand. Singapore, which experienced a supply surge in 2017, is expected to benefit from a strong cyclical recovery as supply pressures subside significantly. On the other hand, vacancy levels are projected to increase in Kuala Lumpur and Guangzhou where large development pipelines are underway.

EXHIBIT 18: OFFICE SECTOR: PROJECTED VACANCY RATES IN SELECTED MARKETS (2019F – 2023F)

Note: f = forecast. There is no guarantee the forecasts will materialize.
The medium term rental growth outlook remains relatively healthy across the region. We expect to see the highest rental growth momentum in the Australian cities of Melbourne and Sydney as a result of declining incentives underpinned by stable occupier demand combined with limited near term supply. Robust growth is also expected in the other Australian cities on the back of tenant demand recovery, while rental growth in Japan’s regional cities is supported by the historically low vacancy rates and strong corporate demand. At the other end, weak demand and significant incoming supply pressures are likely to cause negative rental reversions in Kuala Lumpur in the same period.

Combining our rental growth and vacancy projections, we expect improving occupancy levels to underpin moderate to strong rental growth in Australia, China, Singapore, and the regional cities in Japan. Markets with projected high vacancy levels such as Guangzhou over the five year forecast period should see a more modest rental growth profile with further downside risks should demand pan out to be weaker than expected. Moderate rental growth is expected in Auckland as supply pipeline is beginning to rise. On the other hand, rents in Kuala Lumpur remain curtailed by significant oversupply and vacancy issues.
**EXHIBIT 20: OFFICE SECTOR: PROJECTED VACANCY RATE VS RENTAL GROWTH (2019F-2023F)**

Note: *f* = forecast. There is no guarantee the forecasts will materialize.
Source: DWS. As of January 2019.

**Performance:** The APAC office sector is projected to yield annual total returns of 4-7% in most cities over the next five years through to 2023, on the back of healthy demand and moderate supply. While we continue to expect good returns from the core Australian cities of Sydney and Melbourne, regional cities in Japan such as Osaka, Fukuoka and Nagoya look increasingly attractive providing decent income and capital returns, and in turn some of the highest excess returns over the local risk free rate as well as levered returns with local financing. Office assets in Seoul are projected to yield moderate returns underpinned by decent income yields. On the other hand, returns in Tokyo should be more subdued due to current tight cap rates, while forecast five-year performance in Hong Kong is also projected to be relatively weak due to weaker rental growth and potential rise in future cap rates.
4.2 Retail

**Current conditions:** The rise in e-commerce remains a major driver in redefining the retail landscape in Asia Pacific. Multi-channel or ‘Omni-channel’ retailing as well as the emergence of mobile-based transactions have seen retailers changing their retail operating models and increasing the selection of goods and services available online often at lower prices than in-store. As a result, this could undermine profit margins for physical retail stores and consequently turnover rents at retail centres. Notwithstanding, anecdotal evidence has also showed that some pure play e-commerce companies are merging their online and high street presence by venturing into bricks and mortar store operations for brand building as well as for showroom display.

Based on data from eMarketer¹⁴, the e-commerce market in Asia Pacific is estimated to have grown strongly by 30% in 2018, far outpacing the 7.1% growth in total retail sales in the region. These trends were most notably observed in China, the largest e-commerce market in the world, which currently accounts for 85% of the online retail sales in Asia Pacific. The share of e-commerce sales as a proportion of total retail sales in China had grown rapidly from approximately 15% in 2015 to over 29% in 2018. Similarly, online retail sales in South Korea have grown strongly, ahead of the United States where e-commerce accounts for only about 10% of retail sales. E-commerce share levels in Japan and Australia currently trail behind the United States, but emerging trends such as the entry of Amazon into the Australian market towards end-2017 indicate that the online retail is likely to gain momentum in the region.

Diverging trends have also developed in the retail environment across the region. Retail sales continue to underperform in some major markets in the region including Singapore and Malaysia due to soft domestic consumption and subdued tourist

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¹⁴ eMarketer – Asia-Pacific Retail and Ecommerce Sales, January 2018.
spending. Rents have declined in Australia and remain stagnant in Singapore and Hong Kong, as retailers face margin pressures from weaker retail spending as well as increasing labour costs.

On the other hand, key cities in China, South Korea and Japan continue to see healthy, moderate rental growth underpinned by resilient domestic consumption trends or strong tourist arrivals, despite competition from the ongoing proliferation of online retail. Nonetheless, structural shifts in consumer shopping behavior continue to exert pressures on retailers to divert resources from traditional bricks-and-mortar sales building up Omni-channel marketing strategies. As a result, the retail environment remains in favour of tenants as landlords are increasingly forced to offer better incentives especially in the discretionary retail space. Vacancy rates could start to inch upwards in decentralized areas on the back of growing supply while occupier demand from retailers is likely to remain stable in the most markets.

Outlook: Over the five-year forecast horizon, major cities in Australia and China are expected to experience the strongest growth in retail rents in the region, although growth should be modest in sub regional centers (SRC) in Australia, where demand could be adversely affected by e-commerce and a slowdown in the housing market. In Seoul and Tokyo, retail rental growth is likely to be modest below 2% per annum, broadly in line with inflation expectations. Near-term rental growth is projected to be minimal in Hong Kong, Singapore and Kuala Lumpur where retailers contend with high occupancy costs and diminished tourist spending.


Note: f = forecast. RC= Regional Centres SRC= Sub-regional centres. ¹ Projected returns are based on compounded basis. There is no guarantee the forecasts will materialize.
Source: DWS. As of January 2019.

Performance: Given the emergence of online retailing, there is a preference among investors toward long term leases in the retail sector. The impact from online retail is expected to be felt more keenly in the discretionary retail segments such as apparel and electronics, compared to the non-discretionary segments such as staple food and daily necessities. Correspondingly, the divergent trends across different retail assets is likely to intensify with a “winner-takes-all” outcome, as
well-located malls with strong positioning and good tenant mix continue to command premium rents while poorly-managed malls with weak or unclear positioning may be forced to reduce rents or explore significant repositioning or exit strategies.

Looking ahead, retail assets in Seoul, China and Australia appear attractive underpinned by higher income yields. While Tokyo looks attractive with the highest projected excess returns (i.e. annual total returns minus bond yields), healthy spreads of circa 2%-4% are expected in most other key retail markets in the region.


Note: f = forecast. Projected returns are based on compounded basis. RC= Regional Centres SRC= Sub-regional centres. There is no guarantee the forecasts will materialize. Excess return is calculated from income return plus capital appreciation over the local 10 year sovereign bond rate.


4.3 Industrial

Current Conditions: Prime logistics space across the region continues to see healthy take-up driven by e-commerce and third party logistics providers, resulting in positive rental growth trends across the region. The availability of prime development land and quality modern warehousing facilities is critical for logistics markets undergoing modernization changes coupled with rising domestic consumption, particularly for locations such as Seoul and tier-one cities in China.

The rise of e-commerce trends is also gradually taking place in Southeast Asia, driven by the region’s rapidly rising middle class population and consumption trends. This is exemplified by both Amazon’s foray into the Singapore and Australian markets late 2017, and Alibaba’s expansion through several acquisitions of local and regional e-commerce players operating within and outside China, outlining the increasing growth potential of online retail and needs for logistics spaces in the region.
EXHIBIT 24: INDUSTRIAL SECTOR: NET RENT INDEX (BASE YEAR 4Q2006 = 100)


Outlook: In the industrial sector, e-commerce and third party logistics (3PL) companies are expected to remain major leasing demand drivers in the modern logistic space across the region, underpinned by rising e-commerce trends as described in the retail section. Rental growth is expected to be moderate in the region at around 1%-4% per annum, broadly in line with inflation trends as tenants, 3PL companies, retailers and consigners remain mindful of logistics costs, with the exception of Perth and Adelaide where industrial conditions remain tough due to weaker leasing demand.


Note f = forecast. Projected returns are based on compounded basis. There is no guarantee the forecasts will materialize.
Source: DWS. As of January 2019.
**Performance:** Owing to higher yields, increased transparency and strong underlying occupier demand, the industrial sector has provided consistently higher returns than the office and retail sectors, and is expected to remain attractive in the next five years (see Exhibit 5 on page 11). Five-year return forecasts for key cities in Australia, China, Singapore and Seoul look favourable at high levels in excess of 7%, though investment opportunities could be limited by the scarce availability of high quality completed assets in most of these markets. While total returns in Tokyo look to be one of the lowest in the comparison group, excess returns could turn out to be the highest on the back of expected low bond yields.


Note: f = forecast. Projected returns are based on compounded basis. There is no guarantee the forecast returns will materialize. Excess return is calculated from income return plus capital appreciation over the local 10 year sovereign bond rate.


4.4 Residential

**Current conditions:** The institutional residential sector in Asia Pacific continues to lack maturity, with major local developers focusing on for-sale condominiums. Rent houses exist in large cities, but these are usually strata units (as opposed to enbloc or entire buildings) owned by individual private investors, with a lack of participation from majority of institutional investors. Japan is the only exception in the region that has a mature, sizable, institutionalized residential market. Residential transaction volume in Japan amounts to around US$5 billion annually with liquidity underpinned by multiple listed residential J-REITs. As of November 2018, the residential sector accounted for 15.2% of the aggregate asset value of all listed J-REITs, compared to the retail sector (17.9%) and industrial sector (15.1%).

Nationwide home ownership rate is 62%, but this figure is significantly lower at 46% in Tokyo where housing prices are expensive. Of the over 1,600 assets held by all listed REITs across Japan, by aggregate value, Tokyo 23 wards account for 67% while greater Tokyo accounts for 77%, followed by greater Osaka (10%) and greater Nagoya (5%). However, capital has recently started to flow into regional cities, and non-Tokyo assets accounted for over 50% of total transaction volumes in the last two years.
The Japanese residential market brings forth an important defensive element into investors’ portfolios. It is characterised by a less cyclical occupier demand for housing with much lower void risks compared to commercial sectors. Hence it is also typically less exposed to market corrections. The exception is high end rent houses in Tokyo, majority of which are let to expatriates or senior executives, and therefore more vulnerable to economic downturns. Nonetheless, the downside protection of the residential market will be welcomed by an increasing number of investors as more commercial segments move into a mature cycle. Asset size tends to be relatively small in the residential sector, around JPY 1.6 billion or $14 million per asset, and even smaller in regional cities, hence larger sized portfolio deals are strongly sought after by institutions, especially global investors. Since the sector requires heavy asset management duties with tens or hundreds of individual tenants and frequent turnovers, many foreign investors form partnerships with local residential operators to minimize operational risks.

Outlook: The condominium unit price in Tokyo remain close to the highest level in two decades and this has helped sustain strong demand in the rent houses. The average for-sale condominium price per unit in greater Tokyo is around JPY60 million, or US$500,000, and the majority of first time buyers with affordability issues have little choice but to stick to rent houses. As such apartment demand is extremely strong in central locations in Tokyo with good access to public transportation. The vacancy rate in the second quarter of 2018 was 2.3% in Tokyo, and 3.1% in Osaka in the same period. Prime rental growth in the Central 3 wards in Tokyo was 2.7% per annum over the last three years; rental growth for average assets in Tokyo was more modest at 0.6%, while being almost flat in other regional cities in Japan.

Given the ultra-low interest rate environment in Japan is expected to persist, at least for the foreseeable future, the affordability constraints and growing popularity of flexible work-life concepts among millennials, demand for rent houses should remain strong and average rents are expected to see healthy growth at around 1.0% per annum in the next five years, slightly above inflation expectations.
EXHIBIT 29: RESIDENTIAL RENT INDEX VS. CONDO PRICE INDEX (2001-2021F, 12MONTHS ROLLING)

Source: DWS, Real Estate Economic Institute, Real Estate Information Network System, DWS, As of January 2019.

**Performance**: Over the long run, the performance of the residential sector in Japan has been less volatile than other commercial sectors, while only Central Tokyo has experienced strong income growth. The average total return of the residential sector in Japan was 8.0% in the last five years. Looking ahead, leasing demand for residential assets in Tokyo looks supported by elevated housing prices, while the trend of cap rate compression that drove returns in the past, seems to be over. Total returns are forecast to be slightly below 6% per annum in the next five years, predominantly driven by income returns.
5 / Risk Return Profile (office sector)

It is insufficient to compare property-level total returns on a stand-alone basis without factoring the associated risks, especially in the Asia Pacific region where a significant divergence in market maturity and transparency persists. Several factors were considered in the computation of associated risks related to each submarket such as volatility, liquidity, transparency and the effect of obsolescence, along with domestic risk free rates. The associated risks were formulated using a combination of quantitative and qualitative modeling which have been integrated in our House View.

Exhibit 30 highlights the positioning of the various markets in reference to this framework. The total forecast returns on the vertical axis are plotted against associated risks on the horizontal axis for each office market. Returns are based on the same office sector forecasts outlined on Exhibit 21. A Market Neutral zone (shaded) is added to indicate the level of attractiveness of each market from a risk-return perspective (cities above this line are deemed more attractive and vice versa). We categorize the major office markets into the following three groups:

**Overweight:** Core target markets include major regional cities in Japan and core cities in Australia where total return forecasts look favorable compared to their associated risks. These are among the most established and mature markets in the region and core investors focused on income yields should center their portfolio investments mainly in these markets. This is broadly in line with the Core Strategy in the Strategic Investment Themes outlined on page 11.

**Market Neutral:** Markets with a lower but nonetheless favourable risk-return profile. This includes Tokyo where lower returns are balanced with lower associated risks, and other cities currently either in the mid-late cycle downturn or early stages of market rental recovery such as Seoul, Singapore and Brisbane. A cyclical market recovery is expected in the mid-term as demand-supply fundamentals improve. These are similar to the “Mid-Term Opportunities” and “Recovery Markets” in the Strategic Investment Themes outlined on page 12.

On the other hand, while top tier markets in China are expected to provide higher returns in the next five years, the associated risks are higher partly due to the high risk free rate as well as lower market transparency and other investment hurdles. These markets should be more suitable for value added strategies in line with “Active Asset Management” in the Strategic Investment Themes on page 12.

**Underweight:** Markets where forecast returns lag associated risks on the back of low forecast returns, high risks or a combination of both. Kuala Lumpur is an example where demand-supply fundamentals remain largely in favour of tenants at the expense of office landlords.
Despite favourable performance expectations in some markets there are other challenges and constraints that should be factored for commercial real estate investments which cannot be fully captured in the risk scoring computations, especially for cross border investors.

Currency hedging costs remain relatively expensive in Australia and South Korea for Euro-denominated investors and this can be an impediment for cross border investors when competing with domestic investors, despite favourable returns projections. In Japan, local investors and developers command the upper hand due to extremely cheap borrowing costs in the local debt market, whereas access to cheap capital is limited for foreign investors.

Foreign investors also face additional regulatory and compliance risks compared to domestic investors. In China, onshore holding structures with equity investments from foreign parties require the formation of foreign-invested enterprises (FIEs) or wholly owned foreign enterprises (WOFEs). Conversion of structures is required if the existing holding structure is not in either of these forms and is subjected to regulatory approval, which introduces regulatory uncertainties. Foreign investors also have to deal with the complexities of capital controls and taxation issues which pose considerable challenges to new foreign investors.

Therefore, it is critical for investors to find capable investment managers who have a good foothold in each of these markets when making investments.
6 / Overview of Key Asia Pacific Markets

COUNTRY REAL ESTATE OUTLOOK: JAPAN

Economy: The third largest economy in the world. GDP growth is expected at 1.1% in 2019, supported by the strong corporate activity. The unemployment rate remains below 3%, the lowest level in decades, while overseas tourist arrivals to the country hit a historical record, more than triple in the last five years.

Real Estate Market: One of the largest real estate markets in the region. Good transparency with a well-established REIT market. Relatively healthy yield spreads attracting more cross-border investors, despite domestic investors remaining dominant due to the extremely low capital cost.

Main Target Markets: Tokyo, Osaka, Nagoya, Fukuoka

Risks: Slowdown in global trade and appreciation of Japanese Yen affecting exports

Real Estate Performance Outlook 2019-2023f

<table>
<thead>
<tr>
<th>Sector</th>
<th>Outlook</th>
<th>Summary View</th>
</tr>
</thead>
<tbody>
<tr>
<td>Office</td>
<td>Positive</td>
<td>- Historical-low vacancy rates with limited office supply in all major cities in Japan.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>- Attractive real estate spreads over government bond yield.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>- Returns capped in central Tokyo due to tight cap rate at around 3%.</td>
</tr>
<tr>
<td>Retail</td>
<td>Neutral</td>
<td>- An increasing number of overseas tourists to Japan but retail sales in high streets and suburban shopping centers moderating along with the growth of e-commerce retail sales.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>- Opportunities in assets with exposure to non-discretionary spending.</td>
</tr>
<tr>
<td>Industrial</td>
<td>Positive</td>
<td>- Modern logistics assets with higher yields relative to other sectors remain highly sought after by institutional investors.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>- Vacancy rates expected to remain elevated in some sub markets, such as Osaka Bay area where supply is concentrated.</td>
</tr>
<tr>
<td>Residential</td>
<td>Neutral</td>
<td>- Comparably large transaction volumes, diverse investor profile and affluent market data provide enough depth, liquidity and transparency, while the average asset size tend to be smaller</td>
</tr>
</tbody>
</table>

EXHIBIT 31: ECONOMIC INDICATORS (YEAR 201 = 100)

EXHIBIT 32: TOKYO OFFICE SUPPLY AND VACANCY RATE (%)

Note: F = forecasts. There is no guarantee the forecasts will materialize. *Percentage share of enterprises responding ‘favourable’ minus percentage share of enterprises responding ‘unfavourable’ over business conditions.

COUNTRY REAL ESTATE OUTLOOK: SOUTH KOREA

Economy: The fourth largest economy in the region (after China, Japan and India). GDP growth is expected to moderate to 2.5% in 2019. Concerns are looming over the slowdown of export activities along with the escalation of the US-China trade conflict. Bank of Korea raised the base interest rate from 1.5% to 1.75% in November 2018, though further hikes are expected to be limited in 2019.

Real Estate Market: The market is recently upgraded from "semi-transparent" to “transparent” amid the ongoing modernization and institutionalization. The office sector is relatively mature and more established, while other sectors have yet to be fully institutionalized.

Main Target Market: Seoul.

Risks: Slowdown in global trade affecting exports and geopolitical risks over the denuclearization of North Korea

Real Estate Performance Outlook 2019-2023f

<table>
<thead>
<tr>
<th>Sector</th>
<th>Outlook</th>
<th>Summary View</th>
</tr>
</thead>
</table>
| Office  | Neutral | - Vacancy rate remains relatively high at 10% in Seoul CBD due to weaker office demand.  
              - Effective rents pressured by elevated tenant incentives, though a gradual recovery is expected in the medium term. |
| Retail  | Neutral | - High street retail sales still remain soft given the slow recovery of the employment market. It is expected to grow modestly, boosted by an increase in overseas tourist arrivals. |
| Industrial | Positive | - Despite rapid institutionalization and modernization, there remains a shortage of good quality assets to meet the strong demand from e-commerce and 3PL industries  
              - Assets with strong leasing covenants are highly sought after by investors, notwithstanding the record new supply in 2018 and 2019. |

EXHIBIT 33: ECONOMIC INDICATORS (YEAR 2010 = 100)

EXHIBIT 34: SEOUL OFFICE SUPPLY AND VACANCY RATE

F = forecast. There is no guarantee the forecasts shown will materialize.
Sources: DWS, Bank of Korea, Mateplus, Oxford Economics. As of January 2019.
*Percentage share of enterprises responding ‘favourable’ minus percentage share of enterprises responding ‘unfavourable’ over business conditions.
COUNTRY REAL ESTATE OUTLOOK: CHINA

Economy: China’s economy held up well in 2018, underpinned by resilient export growth and domestic consumption, despite higher U.S. tariffs on Chinese imports. Barring unexpected shocks in the global economy and foreign relations, growth is generally expected to ease further to 6 – 6.5% in 2019.

Real Estate Market: China constitutes one of the largest real estate markets in Asia though affected by modest albeit improving transparency levels. Domestic capital remains the predominant source of funds; foreign investor participation is limited to select Tier-1 cities due to challenges from limited transparency, cash repatriation and taxation issues.

Risks: Export dependency risks to global demand, worsening of foreign relations with trade partners and a buildup of excessive corporate leverage.

Real Estate Performance Outlook 2019-2023f

<table>
<thead>
<tr>
<th>Sector</th>
<th>Outlook</th>
<th>Summary View</th>
</tr>
</thead>
</table>
| Office | Positive| - Leasing demand remains relatively robust, mainly from domestic finance and professional firms.  
- New supply completions have peaked in Shanghai, supporting occupancy levels though Beijing should see near-term vacancy rise from significant supply in 2019. |
| Retail | Neutral| - Prime retail remains driven by demand from new retail entrants, expansion and high income growth, though growing e-commerce sales and rising supply in decentralized areas pose stiff competition particularly to retailers in non-prime areas.  
- Currently one of the world’s most advanced e-commerce markets with leading online retail sales exceeding US$ 1 trillion in 2017. |
| Industrial | Positive| - Stable cashflows underpinned by growing occupier demand catering to domestic demand and high industrial yields in excess of 6%. Opportunities for foreign investors limited by small pool of investable core assets. |

EXHIBIT 35: ECONOMIC INDICATORS

EXHIBIT 36: OFFICE SUPPLY IN BEIJING AND SHANGHAI

E – estimate. F – forecast. There is no guarantee the forecasts shown will materialize.  
COUNTRY REAL ESTATE OUTLOOK: HONG KONG

Economy: Growth momentum is expected to slow further as the property market softens and slowing demand from China amidst escalating US-China trade tensions. While the tight labour market should continue to underpin consumer spending, the negative wealth effect from the weaker stock and property markets could weigh on consumer sentiments.

Real Estate Market: Strong transparency levels but lack of investment opportunities as institutional grade assets are tightly held by local developers and REITs.

Risks: Slowing demand from mainland China will affect Hong Kong via trade and tourism. Interest rates to move higher due to its currency peg to the USD.

Real Estate Performance Outlook 2019-2023f

<table>
<thead>
<tr>
<th>Sector</th>
<th>Outlook</th>
<th>Summary View</th>
</tr>
</thead>
</table>
| Office | Weak    | - Increasing economic uncertainty could see demand soften particularly from Chinese companies while tenant decentralisation trend is expected to continue.  
  - Office investment remains predominantly driven by end-users. |

Retail | Weak | - F&B operators and mass-market retailers are likely to be the main drivers of demand, while luxury retailers likely to focus on optimising their portfolio.  
  - Rising external headwinds may limit transactions although investors remain keen on neighbourhood retail assets. |

Industrial | Weak | - The supply constrained market conditions should support rents albeit weaker economic outlook.  
  - Industrial properties with redevelopment and repositioning potential should continue to attract investment interest. |

EXHIBIT 37: ECONOMIC INDICATORS

EXHIBIT 38: HONG KONG OFFICE SUPPLY AND VACANCY RATE

E = estimate, F = forecast. There is no guarantee the forecasts shown will materialize.  
Sources: DWS, Hong Kong Rating and Valuation Dept, Oxford Economics. As of January 2019.
COUNTRY REAL ESTATE OUTLOOK: SINGAPORE

**Economy:** Brighter economic prospects led by recovery in manufacturing output and exports, with projected GDP growth of 2.5% - 3% per annum over the next few years. Growth industries include wealth management, insurance and healthcare sectors. Technology, Fintech and Co-working constitute other major office demand drivers.

**Real Estate Market:** Strong transparency levels, highly liquid market. One of the largest REIT markets after Japan and Australia. High levels of foreign investor participation.

**Risks:** High export dependency risks to global demand and interest rate volatility from rising global rates.

**Real Estate Performance Outlook 2019-2023f**

<table>
<thead>
<tr>
<th>Sector</th>
<th>Outlook</th>
<th>Summary View</th>
</tr>
</thead>
</table>
| Office   | Positive| • Office leasing conditions underpinned by improving occupier sentiment and significantly lower completions over the next few years till 2022.  
• Moderate rental recovery expected led by higher quality offices. |
| Retail   | Neutral | • Prime retail continues to face challenges from competition posed by suburban retail and weaker tenant sales.  
• Suburban retail with excellent resident catchment provides better cushion against fluctuations in discretionary spending. |
| Industrial | Positive | • Turnaround in industrial rents expected with significantly lower supply pipeline. High industrial yields in excess of 6%.  
• Focus on logistics warehouses with underlying exposure to non-discretionary spending (refrigerated) or growing regional consumption. |

**EXHIBIT 39: ECONOMIC INDICATORS**

![Economic Indicators Graph](image)

**EXHIBIT 40: SINGAPORE OFFICE SUPPLY AND VACANCY**

![Office Supply and Vacancy Graph](image)

E = estimate, F = forecast. There is no guarantee the forecasts shown will materialize.

COUNTRY REAL ESTATE OUTLOOK: AUSTRALIA

Economy: GDP growth is expected to range between 2.6% - 3.0% supported by an increase in commodity exports while consumer spending is anticipated to grow at a fairly subdued pace. Labour market conditions remain healthy although the pace of job creation is expected to moderate to 1.4% per annum from 2019-2023.

Real Estate Market: Strong transparency levels, highly liquid with a mature Australian REIT market. High levels of foreign investor participation.

Main Target Markets: Sydney, Melbourne, Brisbane

Risks: Low wage growth, persistently low inflation and moderating residential prices may weigh on consumer sentiments and constrain spending.

Real Estate Performance Outlook 2019-2023f

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<th>Sector</th>
<th>Outlook</th>
<th>Summary View</th>
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| Office      | Positive| - Positive business confidence and healthy employment growth to support demand across major markets.  
- Rental growth in Sydney and Melbourne to remain healthy albeit at a more measured pace. |
| Retail      | Positive| - CBD shopping centres and prime high street retail continue to enjoy strong levels of demand supported by population growth within the CBD and strong inbound tourism.  
- Prime quality retail centres which are food, entertainment and services oriented continue to be sought after, although accessing stock may often require partnership with experienced retail specialist. Given the divergence in the performance within each retail sub-sector, asset selection will be necessary. |
| Industrial  | Positive| - Strong demand in Sydney and Melbourne underpinned by population growth and infrastructure investment. Rising e-commerce to support demand over the medium to long term.  
- Industrial assets remained keenly sought after with increasing trends towards capital partnering and joint ventures. |

EXHIBIT 41: ECONOMIC INDICATORS

EXHIBIT 42: SYDNEY OFFICE SUPPLY AND VACANCY

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The value of investments can fall as well as rise and you might not get back the amount originally invested at any point in time.

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- Adverse changes in economic conditions including changes in the financial conditions of tenants, buyer and sellers, changes in the availability of debt financing, changes in interest rates, real estate tax rates and other operating expenses;
- Adverse changes in law and regulation including environmental laws and regulations, zoning laws and other governmental rules and fiscal policies;
- Environmental claims arising in respect of real estate acquired with undisclosed or unknown environmental problems or as to which inadequate reserves have been established;
- Changes in the relative popularity of property types and locations;
- Risks and operating problems arising out of the presence of certain construction materials; and
Currency / exchange rate risks where the investments are denominated in a currency other than the investor's home currency.

An investment in real estate involves a high degree of risk, including possible loss of principal amount invested, and is suitable only for sophisticated investors who can bear such losses. The value of shares/units and their derived income may fall or rise.

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