## THINK GLOBAL: Finding the MAGIC

Global real estate investment prospects for 2014

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## Introduction

TIAA Henderson Real Estate's (TH Real Estate) assessment of the global investment environment for 2014 provides the foundation for investment strategy for our newly formed organisation. TH Real Estate was formed in early 2014 by fusing the two long-established real estate investment operations of TIAA-CREF and Henderson Global Investors.

Within our new organisation, a unified investment strategy has been formulated using top-down analysis to identify the geography and cycle timing of prospective property investments. Targeting countries is the first layer of investment strategy, as country-level factors are a primary driver of property performance. These factors include both long-horizon elements of economic and demographic structure that contribute to the attractiveness of real estate investing, as well as shorter-term dynamics of real estate cycles and their drivers that determine risk-adjusted pricing. This report offers a description of our top-down process and its conclusions for 2014. Bottom-up analysis dealing with individual sectors, sub-markets and specific properties draws from the experience and expertise of our real estate professionals across disciplines. This complements top-down analysis and is an integral component of executing strategy.

For countries defined as investment targets, the starting point for examining the property investment environment for 2014 is to take stock of the relative positions of the property market cycle across countries. While property investing is indeed a very local endeavour, performance prospects are heavily influenced by the macro-economic and financial sector
conditions that are national in nature. We therefore begin our analysis by identifying the position of each country's commercial real estate cycle in 2013, using available total return performance data from NCREIF for the US and IPD for the UK, Europe and Asia.

After identifying the position of the cycle, our analysis next examines 2014 prospects using an array of five factors that contain both the long-term structural and short-term cyclical underpinnings of market attractiveness. The five factors are called by the acronym "MAGIC", standing for Monetary policy, Aging \& demographics, Government fiscal policy, Innovation \& entrepreneurship, and Competitiveness. We rate these factors on a five point judgmental scale: ++ (very positive), + (positive), 0 (neutral), - (negative), -- (very negative). The nature and importance of each individual component of MAGIC differ on a country-by-country basis, but the power of MAGIC as a whole is pervasive around the globe.

In brief, our conclusions point to ongoing attractiveness in the US, albeit with a maturing real estate cycle driven by modest macro-economic growth. In this environment, transactions volumes should continue to experience the momentum
established in 2013 when volumes surged 19\% to \$355bn and widened to include a swath of local markets beyond the primary cities. This investment path is not dissimilar in Europe and Asia, where transactions volume soared by $23 \%$ and $27 \%$, respectively, in 2013, but with broad disparity across countries. For Europe particularly, a more divergent and slower economic growth outlook for 2014 will ensure a protracted path towards a broader real estate pricing recovery.

In a global hunt for yield, property will remain a sought-after asset class in a low interest rate, low inflation environment. Investor attention should remain skewed to those more dynamic economic regions globally, with liquid, mature real estate markets and strong demographic profiles. Investment decisions will be complicated, however, by the migration towards more normal monetary policy now underway in the US and its varied impact around the globe. With that in mind, investors should turn to sectors and markets that are most likely to produce stronger economic growth and, in turn, stronger rental growth. Eventually, in the absence of stronger rental growth, rising interest rates could push property yields outwards if real estate risk premia tightens much beneath their long-run averages.
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## Shrinking the world to a manageable size

Our top-down analysis begins with a high-level examination of the structure of country risk and commercial real estate market liquidity globally.

In our previous white paper "It's All Relative: Assessing Global Real Estate Investment Opportunities", we described the process that we use to set a ceiling for country risk and filter out countries with risks above that ceiling. The remaining countries are targets for direct property investment and accommodate investment analysis that can focus on the property market cycle and its fundamental drivers.

In order to make the cut, countries must demonstrate four characteristics: solid rule of law, low sovereign risk, high real estate market transparency and ample real estate market liquidity. The countries that make the cut are shown in Figure 1. They contain the vast bulk of global institutional-quality commercial property and substantial non-local purchase activity; in addition, they hold the bulk of TH Real Estate portfolio investments and are the focus of the subsequent sections of this paper.

Countries that do not make the cut might offer opportunity for real estate investment, but require approaches that buffer the uncertainties surrounding country risk. In some countries, uncertainty is associated with infrequent availability of institutional quality property and/or limited transparency that make deal sourcing laborious. For other countries, country risk is higher because of economic and/or legal deficiencies, but in the absence of consistent reliable data, it is impossible to measure accurately how much extra return is really enough.

| Figure 1: Size of opportunity in target countries |  |  |  |
| :---: | :---: | :---: | :---: |
|  | 2012 transaction volume (US\$bn) | 2012 non-domestic purchaser | 2012 stock (\% IPD Global) |
| United States (US) | 1,007 | 10\% | 38.2\% |
| United Kingdom (UK) | 324 | 45\% | 7.0\% |
| Australia (AUS) | 110 | 33\% | 4.2\% |
| Netherlands (NETH) | 56 | 40\% | 2.8\% |
| Canada (CAN) | 95 | 9\% | 3.7\% |
| France (FR) | 143 | 45\% | 5.9\% |
| Sweden (SW) | 70 | 32\% | 3.6\% |
| Hong Kong (HK) | 80 | 13\% | n/a |
| Germany (GER) | 208 | 54\% | 6.4\% |
| Singapore (SGN) | 40 | 27\% | n/a |
| Japan (JPN) | 178 | 19\% | 15\% |
| Austria (AU) | 14 | 49\% | 1\% |
| Spain (SP) | 47 | 57\% | 1\% |
| Italy (IT) | 35 | 51\% | 2\% |
| China (CH) | 111 | 30\% | n/a |

Source: IPD \& Real Capital Analytics

## Shrinking the world to a manageable size

One common approach to mitigating these concerns is to invest through joint ventures with local partners, where the local partner's expertise can deliver expected returns to justify the additional country risk or control that risk. TH Real Estate has employed that buffering strategy and others to successfully execute investments in deemed higher risk countries including Austria, China, Italy and Spain.

Within those countries that make the final cut, we turn now to evaluating the status of their property market cycles. This evaluation is no easy task largely because performance data are not standardised or uniformly available.

For most of our subject countries, benchmark measures of total return are available on an annual basis with history beginning in 2000. On an individual basis, data history goes back as far as 1978 for the US and 1981 for the UK, the two largest markets, respectively. Additionally, quarterly measures of total return are available for both the US and the UK.

As shown in Figure 2, property total return performance across countries varied widely in 2012 (the most recent data available for all countries) from a high of $14.1 \%$ in Canada to a negative $2.1 \%$ in Spain. The chart also shows the high and low returns for each country over the 2000-2012 period. In order to identify whether each country's property market is in an expansion or contraction phase, it is necessary to consider investment performance alongside information on the path of economic growth, property pricing, and property market fundamentals. The latter indicators are more up-to-date than total return measures and allow us to draw conclusions for the current phase of property market cycles despite lagged data for total returns.

For the US, property markets have been in the expansion phase since bottoming in 2010. Recovery from the financial collapse and Great Recession that followed, is the driver of the current US cycle and is of similar importance for almost all of our subject countries. Economic growth and job creation have been mediocre but positive. Property values have improved with steady compression of yields due in part to very accommodative monetary policy and historically low interest rates as well as to the steadily increasing appetite of investors for US properties. There are, however, sector differences in timing of recovery. Fundamental indicators of sector performance show that apartments were the first to recover with new supply deliveries in many local markets indicating that vacancy rates are at a cyclical trough. Other sectors are in earlier phases of recovery with vacancy rates still dropping, rents recovering, and new supply inflows near historically low proportions.

Europe's real estate emergence from the financial recession has lagged the US and proven to be more staggered. This is in part due to a more protracted banking sector recovery, but also due to sovereign debt fears which served to further polarise the real estate recovery by quality of asset and location. Unprecedented monetary easing, the emergence of positive economic growth across Northern Europe and low bond yields, led to an early improvement in real estate investment and pricing by 2010, albeit some countries experienced earlier recoveries. The situation became more polarised with the onset of the Eurozone crisis from mid-2011 with safe-haven markets benefitting from enhanced capital flows, in contrast with falling real estate values in those countries perceived to be at risk of exiting the Eurozone. Moreover, investors' attention focused upon the best assets

Figure 2: Country total returns, 2000-2012


Source: IPD, 2013
in the most liquid, transparent markets. With the wider Eurozone region returning to economic growth in mid-2013, rising business confidence and expected gains in employment, investment and consumer spending, has eased risk aversion. Investors appear confident that the Eurozone has turned a corner, and a number of key transactions has highlighted the migration of capital higher up the risk spectrum into prime assets in countries until recently considered to be off limits for traditional institutional investors.

## Shrinking the world to a manageable size

Overall transaction volumes have steadily increased since 2009, which brings Europe's combined position much closer to the US in terms of momentum. A shallower interest rate curve could highlight the attractiveness of Eurozone commercial real estate, particularly given emerging evidence of an improvement in occupier conditions. At present, improvements in property fundamentals, namely employment, business investment, consumer spending and access to credit is skewed to core Europe, but wider regional indicators of economic growth are rising, albeit from a low base.

In Asia-Pacific, the core property markets of Australia, Japan and Singapore recorded a marked decline in transaction volumes and capital values during the financial crisis. But mirroring other macro-regions, real estate investment volumes have risen progressively since the market trough in 2009, with domestic investors in search of yield quick to fill the void left by cautious offshore capital, ensuring a marked recovery in pricing. By end 2013, volumes had returned to pre-crisis levels, but with a focus on mature, established centers. Massive fiscal stimulus and accommodative monetary policies, coupled with China's ability to weather the financial crisis and support regional growth, has proven pivotal in driving this recovery in investor confidence.

Understandably given heighted risk aversion, the emerging markets of Asia-Pacific have not gained market share in terms of real estate investment volumes in recent years - a trend unlikely to change given the potential implications on capital flows and exchange rates from a gradual normalisation of interest rates in the US. However, from an occupier perspective,
the majority of multi-nationals in Asia-Pacific are through their period of consolidation, facilitating a better future period of investment and employment. The strong correlation between economic growth and net absorption of office space in Asia-Pacific should buoy returns, so that investment demand will be supported by growing fundamentals as well as abundant liquidity.

Having established each country's position in the current cycle, we argue that the attractiveness of the investment environment for real estate markets in 2014 will depend on the combination of the five factors that we call MAGIC. TH Real Estate has scored each 'target market' according to each component of MAGIC, and these results are set out in Figure 3.

Figure 3: Target markets and the property market cycle by MAGIC

|  | Late expansion | Early expansion | Neutral | Early decline | Late decline |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Property cycle position | GER, SW, AU, HK, SGP, CH | IT, SP, NETH, CAN, US, UK, JPN | FR, AUS |  |  |
|  | + + | + | 0 | - | -- |
| Monetary policy | US, UK, CAN, SW, AUS, JPN, SGP, HK | AU, FR, GER, SP, IT, NETH | CH |  |  |
| Aging \& demographics | UK, AUS, SGP | SW, CH | US, AU, CAN, HK | NETH, FR, GER | SP, IT, JPN |
| Government policy | SW, AUS, HK | GER, CH | AU, UK, NETH, CAN, US | JPN, SGP | IT, SP, FR |
| Innovation \& entrepreneurship | US, GER, SW, AU, JPN | FR, NETH, UK, AUS, CH, HK | CAN, SGP | SP, IT |  |
| Competitiveness | GER, SW, SGP, HK | US, CAN, UK, NETH, JPN, AUS | FR, AU, CH | SP, IT |  |

## Key

Europe, US \& Canada $\square$ Asia-Pacific

Source: TIAA Henderson Real Estate, Q1 2014

## Monetary policy

Monetary policy will be the most important driver of prospects for property investing globally in 2014 because its execution will determine whether expectations for stronger economic growth, and targeted inflation and employment come to fruition.

This year, the US Federal Reserve and monetary authorities globally have the unenviable task of unwinding extremely accommodative monetary policy without derailing economic growth. In the US, the transition toward normality is underway. The first phase of the transition is "tapering" the monthly purchases of securities under the quantitative easing program. Tapering began in January with an initial cutback from \$85 billion per month to $\$ 75$ billion and assurance that the pace of tapering will be dependent on the strength of the economy. The challenge for monetary policymakers is to make good on that assurance and maintain the confidence of financial markets. To date, the transition in policy has been wellmanaged and largely priced into yields on US Treasuries. In a similar vein, stronger than expected growth in the UK caused bond markets to rise in line with projections of earlier policy tightening. Bond yields in Europe and Japan are pricing in slower economic recoveries.

In Europe, the unified monetary agreement without fiscal or banking union has arguably exacerbated the recession, polarised economic recovery, and heightened the need for major structural, economic and labor policy reforms to improve competitiveness. Additionally, Europe's weaker economies, namely in the south, are suffering from ongoing fragility in their banking and consumer sectors and need longer to recover. These factors together, ensure that the ECB and other Central Banks will remain very accommodative in the near term. Assuming that economic strengthening does occur, investors in Europe will need to prepare for tighter monetary policy in the medium term. The ECB will need to manage this 'normalisation' carefully.

In Asia, governments have in general, effectively utilised available policy measures during the past five years to stimulate growth while keeping deficits manageable. 2013 was a year of remarkable economic transformation for the region, as governments looked beyond short term economic stimulus and began to address medium to long term structural issues particular to their respective economies. In the case of China, the region's biggest economy, this means rebalancing growth from manufacturing and exports, to domestic consumption and creating a more liberalised service sector.

The objective of such grand scale economic rebalancing is to ensure long term GDP growth is more sustainable. In comparison, Japan, the second largest economy in the region, has achieved perhaps the most substantial economic turnaround in recent memory. Under the steer of "Abenomics", its aim is to reverse chronic deflation by proactive "quantitative easing" combined with fiscal reform.

## Monetary policy

As shown in Figure 4, unprecedented monetary easing since 2007 has taken interest rates globally to historic lows, and projections for a very slow normalisation of borrowing rates should provide solid support for economic growth in 2014.

## Figure 4: The path to normalisation



Source: TIAA Henderson Real Estate, Q1 2014

We rate the monetary policy element of MAGIC as "++" for the US, indicating our confidence that the Federal Reserve can successfully support economic growth. We are similarly confident in the central banks of the UK, Canada, Sweden, Australia, Japan, Singapore and Hong Kong and award "++" as well. For the Eurozone, the very low interest rate curve of the ECB is conducive to real estate investment, but political tension and divergent national growth and inflation rates will hamper policy making, and for that reason we score the ECB monetary policy element of MAGIC as " + ". For China, the monetary policy challenge is on a grand scale and we score it a neutral " 0 ".

## Aging \& demographics

Aging and demographics are structural underpinnings of every country's real economy and demand for space of all types. Population growth and characteristics change slowly over time, though with some responsiveness to short-term pressures.

The US has stronger population growth versus most developed countries, but the pace of growth has eased since the Great Recession, leaving the US more vulnerable to the pressures associated with aging. Population growth in the US outpaced the averages for the 34 countries in the OECD, the 17 Eurozone countries, and the G7 economies. The median age in the US has, however, been on the rise; increasing from 35.4 years in 2000 to 37.3 years in 2012. This translates into an increasing burden upon the younger working-age population to support the older retired population. The employment-to-population ratio offers information on the capacity of a population to support its dependents. As shown in Figure 5, the US employment-to-population ratio has historically been above the average for the European Union, for the G7 and for the 34 OECD countries. Since the Great Recession, however, the US ratio has weakened sharply and is now below the G7 average. More importantly, the deterioration has been most severe among prime working-age adults in the 25-to-44 year category.

## Figure 5: Employment-to-population ratios and population growth



## Aging \& demographics

Looking in more depth at Europe and Asia-Pacific, major cultural, social and economic differences ensure significant variance in population forecasts, structure and employment growth. It is well documented that there is marked population shift taking place in developed world economies, as improvements in health and education, and a lower birth rate have led to an aging demographic. As our matrix shows, the major European markets, with the exception of the UK and Sweden are forecasted to experience either population or working age population decline. This ultimately means improvements will be needed in productivity, innovation and public policy, or positive net immigration. In Asia, of the larger more mature real estate markets, only Japan offers a major demographic headache.

Demographics can be diverse within countries. For example, it is not uncommon for certain cities or regions to enjoy relatively strong population growth within countries that have little or no population growth. Tokyo is demographically healthier than Japan as a whole. In Germany, where the population is set to shrink by one million people in the next decade, certain cities like Hamburg, Berlin and Munich will all see a notable influx of people, whether for education purposes, or reasons of economic prosperity. Spain will suffer from a shrinking working age population even as its total population rises, and certain cities like Madrid and Barcelona are projected to expand. China's policy-driven urbanisation of population will see a rearrangement of population with significant disparities in growth rates. We expect this increasing dominance and densification of global cities to continue over the long term and to enhance their influence on their domestic and international market. For property investors, understanding both local and country level
demographics is important because national policies aimed at dealing with aging and/or declining population will impact localities. Such national drags need to be netted out of local strengthens to score this element of MAGIC on a local level.

> We rate the aging and demographics element of MAGIC as "O" for the US, reflecting its stronger than average population growth and old-age support measures versus developed countries, but somewhat offset by the decline in the absolute level of these measures in the aftermath of the Great Recession. Those markets that score more favorably, "++" or "+", are the UK, Australia, Singapore, Sweden and China. In contrast, Southern Europe, Japan, France, Netherlands and Germany will underperform with scores of "_-" or "--".

## Government fiscal policy

Government fiscal policy influences the pace of economic growth through short-term policies that address the business cycle and through structural policies that affect long-term competitiveness.

In the US, fiscal policy contributed to the recovery from the Great Recession, but mutated into a drag on growth from 2011 to 2013. State and local government spending was also a material drag on GDP growth, starting in 2010 as the recession impaired tax revenues. For this year, state and local spending is continuing to recover, while federal spending policy is just beginning to stabilise. An initial budget agreement was passed by Congress in December 2013; it eased some of the 2014 sequestration cuts and allowed for tiny increases in federal spending for the year. The budget agreement was translated into spending plans in January 2014 and averted the threat of another federal government shutdown. In February 2014, the federal debt ceiling was increased with little Congressional drama. These milestones are a vast improvement versus earlier dysfunction and imply that federal government activity has become a more neutral factor affecting GDP growth this year.

There are, however, substantial longer-term concerns regarding the efficacy of federal government policy in the US. Worries over the size of the federal debt, rising pressures on spending associated with the aging of the baby boom generation, and an ideological distain for "government" among the divisive Tea Party contingent in Congress have together crimped federal spending in areas that contribute to growth and competitiveness.

Turning to the Eurozone, breakup fears are now relegated to the back burner. The compression in government bond yield spreads with the German Bund in Europe, and particularly southern Europe since mid-2013, reflects growing confidence of a return to economic expansion, albeit modest. A lull in political elections has also helped to lessen market stress and volatility. The commitment from the ECB to 'do whatever it takes' to protect the Eurozone from currency speculators and place a greater emphasis on delivering structural reform to aid growth rather than over-barring austerity, has underpinned this rise in economic confidence. However, the degree of public sector and banking sector deleveraging needed to meet European fiscal targets, combined with high unemployment, implies more restrictive government spending which will dampen economic growth over the medium term.

In our matrix, those economies with a low gross government debt as a percentage of National GDP, as shown in Figure 6, are scored most favorably. In Asia-Pacific, the healthy fiscal position of markets such as Australia and China could warrant further fiscal stimulus should their economic position deteriorate. In the more emerging economies of Asia, and in that we include China, government policy will have to focus on delivering the necessary health, education and social services that will develop as the growing needs and demands of their population increases.

Figure 6: Government debt as a percentage to GDP


Source: Oxford Economics, December 2013

We rate government fiscal policy as "O" for the US, reflecting the disruptions to smooth government operation in recent years and the failure to tackle policies related to long term growth. In Europe and AsiaPacific, we rate the economies of Sweden, Hong Kong and Australia as "++" and Germany and China as "+ . The UK government policy would also be in this category were it not for its debt to GDP ratio.

## Innovation \& entrepreneurship

Innovation \& entrepreneurship are important drivers of economic growth that operate together. Innovation is local only to the degree that new technology can be patented; in the absence of patents, innovations spread globally through the well-established networks of global economic interaction. The degree of benefit that any single country derives from innovation depends not only on developing innovations, but also on success in dispersing them through the economy. Entrepreneurs excel at spreading innovation.

Recognising the importance of innovation, the OECD tracks research and development spending around the world as a share of each country's GDP. Allowing for some bias towards military spending, Figure 7 shows that the US ranked ninth in the most recent data for 2011. That ratio exceeds both the European Union average and the overall OECD-34 country average, but the favorable technology driven dynamics of Europe and Asia-Pacific are evident in Japan, Sweden Germany and Taiwan

According to the World Economic Forum, the "research culture" that is embedded in R\&D spending is a component of the pillars that promote entrepreneurship. In their 2013 report, they define eight pillars that constitute the "entrepreneurial eco-system" of individual countries. The eight pillars include accessible markets, human capital \& workforce, funding \& finance, support system, regulatory framework, education \& training, universities as catalysts, and cultural support. Their survey ranks the US first, followed by the UK and Switzerland, with Singapore garnering the sixth spot and the highest rating within Asia.

Further insights into entrepreneurship are offered in the Global Entrepreneurship Monitor which arranges 69 countries according to their stage of development and then evaluates entrepreneurial activity. Stage of development is important because it helps distinguish need-driven from opportunity-
driven entrepreneurship. Figure 8 highlights those economies determined to be innovation-driven.

As discussed when looking at the importance of demographics at a city rather than national level, the same can be said for innovation. But unlike demographics, there are no standardised data sources for identifying cities that benefit from innovation activity. Dynamic cities and regions can exist, within efficiency driven or factor driven economies, very much dependent upon their labor forces, capital investment and government initiatives.

While innovation-driven countries and cities often offer strong economic growth prospects, it is important for property investors to keep sight of the value of diversification. Portfolios containing a variety of economic types may provide better risk-adjusted returns than portfolios concentrated on one economic type.

> We rate the US a "++" on innovation and
> entrepreneurship, reflecting the combination of aboveaverage innovation spending combined with high scores on measures of entrepreneurship. On an equal footing are the economies of Germany, Sweden, Austria and Japan. In the "+" category are France, Netherlands, UK, China, Hong Kong and Australia. In contrast, we rate the economies of Spain and Italy as "-".

## Figure 7: R\&D spending as share of GDP



Source: OECD, 2013

## Figure 8: GEM economies by geographic region \& economic development level




## Factor driven economies

Figure 8: GEM economies by geographic region \& economic development level


Source: GEM

## Efficiency driven economies

Figure 8: GEM economies by geographic region \& economic development level


Source: GEM

## Innovation driven economies

Figure 8: GEM economies by geographic region \& economic development level


Source: GEM

## Moving from factor to efficiency driven economies

Figure 8: GEM economies by geographic region \& economic development level


## Moving from efficiency to innovation driven economies

Figure 8: GEM economies by geographic region \& economic development level


Click on the buttons to see more information


Factor drive
economies


Efficiency driven economies


Innovation driven economies


Moving from factor to efficiency driven economiesMoving from efficiency to innovation driven economies

## Competitiveness

Competitiveness is the final component of MAGIC; like innovation and entrepreneurship, it is a structural factor that influences long-term economic growth prospects and, through those prospects, influences commercial real estate investment performance.

The seminal source of competitiveness metrics is the annual World Competitiveness Yearbook produced by the Swiss business school IMD's World Competitiveness Center (WCC). Figure 9 on the next page shows the results of the 2013 study, which is in its twenty-fifth edition. It contains scores for 60 countries based on economic performance, government and business efficiency, and infrastructure. These four factors are decomposed into 300 criteria covering both hard data and survey data. For 2013, the US was ranked \#1, reflecting its \#1 rank in economic performance, business efficiency and infrastructure and despite its \#25 ranking for government efficiency. We have already covered the strength of economic performance and the shortcoming of government elsewhere in this report. The new information offered in the WCC ranking addresses business efficiency and infrastructure. The \#1 rankings for both are valuable information, but within those categories it is worth noting that the rank of basic infrastructure is \#6. Hong Kong (\#3), Sweden (\#4), Singapore (\#5) Germany (\#9), Australia (\#16), UK (\#18) China (\#21) and Japan (\#24) were also notable strong performers.

Another source of competitiveness ranking is The Global Competitiveness Index produced by the World Economic Forum.

In this scheme, the US ranks \#5 for 2013-14, behind Switzerland, Singapore, Finland and Germany. This metric is also a combination of hard data and survey results, summarised into three general factors called basic requirements, efficiency enhancers, and innovation \& sophistication. The basic requirements factors overlap with the WCC but the other two factors offer new information. The US ranks \#1 in efficiency enhancers which includes the size and efficiency of its markets, human capital and technology. For innovation and sophistication, the US ranks \#6, reflecting survey information on business sophistication as well as already discussed on R\&D spending. Hong Kong, Japan, Sweden and the UK also make the top 10. Australia (\#21), France (\#23) and China (\#29) are ahead of Spain (\#35) and Italy (\#49).

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## Competitiveness

Figure 9: World Competitiveness 2013 Yearbook - Overall ranking

| Country | 2013 | 2012 | 1997 | Country | 2013 | 2012 | 1997 | Country | 2013 | 2012 | 1997 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| us | 1 | 2 | 1 | China Mainland | 21 | 23 | 27 | Latvia | 41 |  |  |
| Switzerland | 2 | 3 | 12 | Korea | 22 | 22 | 30 | Russia | 42 | 48 | 46 |
| Hong Kong | 3 | 1 | 3 | Austria | 23 | 21 | 20 | Peru | 43 | 44 |  |
| Sweden | 4 | 5 | 19 | Japan | 24 | 27 | 17 | Italy | 44 | 40 | 39 |
| Singapore | 5 | 4 | 2 | New Zealand | 25 | 24 | 11 | Spain | 45 | 39 | 26 |
| Norway | 6 | 8 | 5 | Belgium | 26 | 25 | 23 | Portugal | 46 | 41 | 32 |
| Canada | 7 | 6 | 6 | Thailand | 27 | 30 | 31 | Slovak Republic | 47 | 47 |  |
| UAE | 8 | 16 |  | France | 28 | 29 | 22 | Columbia | 48 | 52 | 45 |
| Germany | 9 | 9 | 16 | Iceland | 29 | 26 | 21 | Ukraine | 49 | 56 |  |
| Qatar | 10 | 10 |  | Chile | 30 | 28 | 24 | Hungary | 50 | 45 | 37 |
| Taiwan | 11 | 7 | 18 | Lithuania | 31 | 36 |  | Brazil | 51 | 46 | 34 |
| Denmark | 12 | 13 | 13 | Mexico | 32 | 37 | 40 | Slovenia | 52 | 51 |  |
| Luxembourg | 13 | 12 | 8 | Poland | 33 | 34 | 43 | South Africa | 53 | 50 | 42 |
| Netherlands | 14 | 11 | 4 | Kazakhstan | 34 | 32 |  | Greece | 54 | 58 | 36 |
| Malaysia | 15 | 14 | 14 | Czech Republic | 35 | 33 | 33 | Romania | 55 | 53 |  |
| Australia | 16 | 15 | 15 | Estonia | 36 | 31 |  | Jordan | 56 | 49 |  |
| Ireland | 17 | 20 | 10 | Turkey | 37 | 38 | 35 | Bulgaria | 57 | 54 |  |
| United Kingdom | 18 | 18 | 9 | Philippines | 38 | 43 | 29 | Croatia | 58 | 57 |  |
| Israel | 19 | 19 | 25 | Indonesia | 39 | 42 | 38 | Argentina | 59 | 55 | 28 |
| Finland | 20 | 17 | 7 | India | 40 | 35 | 41 | Venezuela | 60 | 59 | 44 |

Key
Indicates improvement rank vs 2012

## The bottom line

We have looked at the position of the property cycle and five further factors that contain both the long-term structural and short-term cyclical underpinnings of market attractiveness. Under the acronym "MAGIC", standing for Monetary policy, Aging \& demographics, Government fiscal policy, Innovation \& entrepreneurship, and Competitiveness, we have ranked these factors "++" (very positive), to "--" (very negative) for each country under consideration.

We are not encouraging property investors to use these results in a dogmatic fashion to support "yay" or "nay" decisions. Rather we recommend using them as we do in expansive processes that weigh each factor individually alongside risk appetite, investment time horizon, and the current relative yield offered in each country for each specific investment opportunity.

TH Real Estate is actively searching for property in each of the countries discussed in this report with every investment evaluated in the context of its respective property cycle and MAGIC metrics. Beyond this evaluation, we assess property and market quality; we employ detailed asset appraisals and market analysis, and we apply our deep research and asset management skills to final decisions on deployment of capital. In summary, principal to the TH Real Estate investment strategy is a process which incorporates our macro views in conjunction with local expertise to identify and unlock market opportunities in established and developing markets, as well as niche offerings.

## Summary by target country

Navigate by country code


## Size of opportunity in target countries

|  | $2012$ <br> transaction volume (US\$bn) | 2012 <br> non-domestic purchaser | $\begin{array}{r} 2012 \\ \text { stock } \end{array}$ |  | $2012$ <br> transaction volume (US\$bn) | $2012$ <br> non-domestic purchaser | $\begin{array}{r} 2012 \\ \text { stock } \\ \text { (\% IPD Global) } \end{array}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| United States | 1,007 | 10\% | 38.2\% | Germany | 208 | 54\% | 6.4\% |
| United Kingdom | 324 | 45\% | 7.0\% | Singapore | 40 | 27\% | n/a |
| Australia | 110 | 33\% | 4.2\% | Japan | 178 | 19\% | 15\% |
| Netherlands | 56 | 40\% | 2.8\% | Austria | 14 | 49\% | 1\% |
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| France | 143 | 45\% | 5.9\% | Italy | 35 | 51\% | 2\% |
| Sweden | 70 | 32\% | 3.6\% | China | 111 | 30\% | n/a |
| Hong Kong | 80 | 13\% | n/a |  |  |  |  |

[^1]

## Summary by target country

Navigate by country code

| US UK | AUS NETH | CAN FR | SW | HK GER | SGP JPN | $A U \quad S P$ | IT $\quad$ CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| United Kingdom |  |  |  |  |  |  |  |
| Figure 1 | Figure 2 | Figure 3 |  | Figure 6 | Figure 7 | Figure 8 | Figure 9 |
| Size of opportunity in target countries |  |  |  |  |  |  |  |
|  | 2012 <br> transaction volume (US\$bn) | 2012 <br> non-domestic purchaser | 2012 <br> stock <br> (\% IPD Global) |  | $2012$ <br> transaction volume (US\$bn) | 2012 non-domestic purchaser | 2012 stock |
| United States | 1,007 | 10\% | 38.2\% | Germany | 208 | 54\% | 6.4\% |
| United Kingdom | 324 | 45\% | 7.0\% | Singapore | 40 | 27\% | n/a |
| Australia | 110 | 33\% | 4.2\% | Japan | 178 | 19\% | 15\% |
| Netherlands | 56 | 40\% | 2.8\% | Austria | 14 | 49\% | 1\% |
| Canada | 95 | 9\% | 3.7\% | Spain | 47 | 57\% | 1\% |
| France | 143 | 45\% | 5.9\% | Italy | 35 | 51\% | 2\% |
| Sweden | 70 | 32\% | 3.6\% | China | 111 | 30\% | n/a |
| Hong Kong | 80 | 13\% | n/a |  |  |  |  |

[^2]

## Summary by target country

Navigate by country code


[^3]

## Summary by target country

## Navigate by country code

| US UK | AUS NETH | CAN FR | SW | HK GER | SGP JPN | $A U \quad S P$ | IT $\quad$ CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Netherlands |  |  |  |  |  |  |  |
| Figure 1 | Figure 2 | Figure 3 |  | Figure 6 | Figure 7 | Figure 8 | Figure 9 |
| Size of opportunity in target countries |  |  |  |  |  |  |  |
|  | 2012 <br> transaction volume <br> (US\$bn) | 2012 <br> non-domestic purchaser | 2012 stock (\% IPD Global) |  | 2012 <br> transaction volume (US\$bn) | 2012 <br> non-domestic purchaser | 2012 stock (\% IPD Global) |
| United States | 1,007 | 10\% | 38.2\% | Germany | 208 | 54\% | 6.4\% |
| United Kingdom | 324 | 45\% | 7.0\% | Singapore | 40 | 27\% | n/a |
| Australia | 110 | 33\% | 4.2\% | Japan | 178 | 19\% | 15\% |
| Netherlands | 56 | 40\% | 2.8\% | Austria | 14 | 49\% | 1\% |
| Canada | 95 | 9\% | 3.7\% | Spain | 47 | 57\% | 1\% |
| France | 143 | 45\% | 5.9\% | Italy | 35 | 51\% | 2\% |
| Sweden | 70 | 32\% | 3.6\% | China | 111 | 30\% | n/a |
| Hong Kong | 80 | 13\% | n/a |  |  |  |  |

[^4]

## Summary by target country

Navigate by country code

| US UK | AUS NETH | CAN FR | SW | HK GER | SGP JPN | $A U \quad S P$ | IT $\quad$ CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Canada |  |  |  |  |  |  |  |
| Figure 1 | Figure 2 | Figure 3 |  | gure 6 | Figure 7 | Figure 8 | Figure 9 |
| Size of opportunity in target countries |  |  |  |  |  |  |  |
|  | 2012 <br> transaction volume <br> (US\$bn) | 2012 <br> non-domestic purchaser | 2012 stock (\% IPD Global) |  | 2012 <br> transaction volume (US\$bn) | 2012 <br> non-domestic purchaser | 2012 stock (\% IPD Global) |
| United States | 1,007 | 10\% | 38.2\% | Germany | 208 | 54\% | 6.4\% |
| United Kingdom | 324 | 45\% | 7.0\% | Singapore | 40 | 27\% | n/a |
| Australia | 110 | 33\% | 4.2\% | Japan | 178 | 19\% | 15\% |
| Netherlands | 56 | 40\% | 2.8\% | Austria | 14 | 49\% | 1\% |
| Canada | 95 | 9\% | 3.7\% | Spain | 47 | 57\% | 1\% |
| France | 143 | 45\% | 5.9\% | Italy | 35 | 51\% | 2\% |
| Sweden | 70 | 32\% | 3.6\% | China | 111 | 30\% | n/a |
| Hong Kong | 80 | 13\% | n/a |  |  |  |  |

[^5]

## Summary by target country

Navigate by country code

| US UK | AUS NETH | CAN FR | SW | HK GER | SGP JPN | AU SP | IT $\quad$ CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| France |  |  |  |  |  |  |  |
| Figure 1 | Figure 2 | Figure 3 |  | igure 6 | Figure 7 | Figure 8 | Figure 9 |
| Size of opportunity in target countries |  |  |  |  |  |  |  |
|  | 2012 transaction volume (US\$bn) | 2012 <br> non-domestic purchaser | 2012 stock (\% IPD Global) |  | 2012 <br> transaction volume (US\$bn) | $2012$ <br> non-domestic purchaser | 2012 stock (\% IPD Global) |
| United States | 1,007 | 10\% | 38.2\% | Germany | 208 | 54\% | 6.4\% |
| United Kingdom | 324 | 45\% | 7.0\% | Singapore | 40 | 27\% | n/a |
| Australia | 110 | 33\% | 4.2\% | Japan | 178 | 19\% | 15\% |
| Netherlands | 56 | 40\% | 2.8\% | Austria | 14 | 49\% | 1\% |
| Canada | 95 | 9\% | 3.7\% | Spain | 47 | 57\% | 1\% |
| France | 143 | 45\% | 5.9\% | Italy | 35 | 51\% | 2\% |
| Sweden | 70 | 32\% | 3.6\% | China | 111 | 30\% | n/a |
| Hong Kong | 80 | 13\% | n/a |  |  |  |  |

[^6]

## Summary by target country

Navigate by country code

| US UK | AUS NETH | CAN FR | SW | HK GER | SGP JPN | AU SP | IT $\quad$ CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Sweden |  |  |  |  |  |  |  |
| Figure 1 | Figure 2 | Figure 3 |  | igure 6 | Figure 7 | Figure 8 | Figure 9 |
| Size of opportunity in target countries |  |  |  |  |  |  |  |
|  | $2012$ <br> transaction volume (US\$bn) | $2012$ <br> non-domestic purchaser | 2012 stock (\% IPD Global) |  | 2012 <br> transaction volume <br> (US\$bn) | $2012$ <br> non-domestic purchaser | 2012 stock (\% IPD Global) |
| United States | 1,007 | 10\% | 38.2\% | Germany | 208 | 54\% | 6.4\% |
| United Kingdom | 324 | 45\% | 7.0\% | Singapore | 40 | 27\% | n/a |
| Australia | 110 | 33\% | 4.2\% | Japan | 178 | 19\% | 15\% |
| Netherlands | 56 | 40\% | 2.8\% | Austria | 14 | 49\% | 1\% |
| Canada | 95 | 9\% | 3.7\% | Spain | 47 | 57\% | 1\% |
| France | 143 | 45\% | 5.9\% | Italy | 35 | 51\% | 2\% |
| Sweden | 70 | 32\% | 3.6\% | China | 111 | 30\% | n/a |
| Hong Kong | 80 | 13\% | n/a |  |  |  |  |

[^7]

## Summary by target country

Navigate by country code

| US UK | AUS NETH | CAN FR | SW HK GER |  | SGP JPN | $A U \quad S P$ | IT $\quad$ CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Hong Kong |  |  |  |  |  |  |  |
| Figure 1 | Figure 2 | Figure 3 |  |  | Figure 7 | Figure 8 | Figure 9 |
| Size of opportunity in target countries |  |  |  |  |  |  |  |
|  | 2012 transaction volume (US\$bn) | 2012 <br> non-domestic purchaser | 2012 <br> stock <br> (\% IPD Global) | Germany | 2012 <br> transaction volume <br> (US\$bn) | 2012 <br> non-domestic purchaser | 2012 stock (\% IPD Global) |
| United States | 1,007 | 10\% | 38.2\% |  | 208 | 54\% | 6.4\% |
| United Kingdom | 324 | 45\% | 7.0\% | Singapore | 40 | 27\% | n/a |
| Australia | 110 | 33\% | 4.2\% | Japan | 178 | 19\% | 15\% |
| Netherlands | 56 | 40\% | 2.8\% | Austria | 14 | 49\% | 1\% |
| Canada | 95 | 9\% | 3.7\% | Spain | 47 | 57\% | 1\% |
| France | 143 | 45\% | 5.9\% | Italy | 35 | 51\% | 2\% |
| Sweden | 70 | 32\% | 3.6\% | China | 111 | 30\% | n/a |
| Hong Kong | 80 | 13\% | n/a |  |  |  |  |

[^8]

## Summary by target country

Navigate by country code

| US UK | AUS NETH | CAN FR | SW HK GER |  | SGP JPN | AU SP | IT $\quad$ CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Germany |  |  |  |  |  |  |  |
| Figure 1 | Figure 2 | Figure 3 |  |  | Figure 7 | Figure 8 | Figure 9 |
| Size of opportunity in target countries |  |  |  |  |  |  |  |
|  | 2012 <br> transaction volume <br> (US\$bn) | 2012 <br> non-domestic purchaser | 2012 stock |  | 2012 <br> transaction volume <br> (US\$bn) | 2012 <br> non-domestic purchaser | $\begin{array}{r} 2012 \\ \text { stock } \\ \text { (\% IPD Global) } \end{array}$ |
| United States | 1,007 | 10\% | 38.2\% | Germany | 208 | 54\% | 6.4\% |
| United Kingdom | 324 | 45\% | 7.0\% | Singapore | 40 | 27\% | n/a |
| Australia | 110 | 33\% | 4.2\% | Japan | 178 | 19\% | 15\% |
| Netherlands | 56 | 40\% | 2.8\% | Austria | 14 | 49\% | 1\% |
| Canada | 95 | 9\% | 3.7\% | Spain | 47 | 57\% | 1\% |
| France | 143 | 45\% | 5.9\% | Italy | 35 | 51\% | 2\% |
| Sweden | 70 | 32\% | 3.6\% | China | 111 | 30\% | n/a |
| Hong Kong | 80 | 13\% | n/a |  |  |  |  |

[^9]

## Summary by target country

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## Summary by target country

Navigate by country code


[^11]

## Summary by target country

Navigate by country code

| US UK | AUS NETH | CAN FR | SW | GER | SGP JPN | AU SP | IT $\quad$ CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Austria |  |  |  |  |  |  |  |
| Figure 1 | Figure 2 | Figure 3 |  |  | Figure 7 | Figure 8 | Figure 9 |
| Size of opportunity in target countries |  |  |  |  |  |  |  |
|  | 2012 transaction volume (US\$bn) | 2012 <br> non-domestic purchaser | 2012 stock |  | 2012 <br> transaction volume (US\$bn) | 2012 <br> non-domestic purchaser | 2012 stock (\% IPD Global) |
| United States | 1,007 | 10\% | 38.2\% | Germany | 208 | 54\% | 6.4\% |
| United Kingdom | 324 | 45\% | 7.0\% | Singapore | 40 | 27\% | n/a |
| Australia | 110 | 33\% | 4.2\% | Japan | 178 | 19\% | 15\% |
| Netherlands | 56 | 40\% | 2.8\% | Austria | 14 | 49\% | 1\% |
| Canada | 95 | 9\% | 3.7\% | Spain | 47 | 57\% | 1\% |
| France | 143 | 45\% | 5.9\% | Italy | 35 | 51\% | 2\% |
| Sweden | 70 | 32\% | 3.6\% | China | 111 | 30\% | n/a |
| Hong Kong | 80 | 13\% | n/a |  |  |  |  |

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## Summary by target country

Navigate by country code


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## Summary by target country

Navigate by country code

| US UK | AUS NETH | CAN FR | SW HK GER |  | SGP JPN | AU SP | IT CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Italy |  |  |  |  |  |  |  |
| Figure 1 | Figure 2 | Figure 3 | Figure 6 |  | Figure 7 | Figure 8 | Figure 9 |
| Size of opportunity in target countries |  |  |  |  |  |  |  |
|  | 2012 transaction volume (US\$bn) | 2012 <br> non-domestic purchaser | 2012 <br> stock <br> (\% IPD Global) |  | 2012 <br> transaction volume (US\$bn) | 2012 <br> non-domestic purchaser | 2012 stock (\% IPD Global) |
| United States | 1,007 | 10\% | 38.2\% | Germany | 208 | 54\% | 6.4\% |
| United Kingdom | 324 | 45\% | 7.0\% | Singapore | 40 | 27\% | n/a |
| Australia | 110 | 33\% | 4.2\% | Japan | 178 | 19\% | 15\% |
| Netherlands | 56 | 40\% | 2.8\% | Austria | 14 | 49\% | 1\% |
| Canada | 95 | 9\% | 3.7\% | Spain | 47 | 57\% | 1\% |
| France | 143 | 45\% | 5.9\% | Italy | 35 | 51\% | 2\% |
| Sweden | 70 | 32\% | 3.6\% | China | 111 | 30\% | n/a |
| Hong Kong | 80 | 13\% | n/a |  |  |  |  |

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## Summary by target country

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## Summary by target country

Navigate by country code

| us | UK | AUS | NETH | CAN | FR | sw | HK | GER | SGP | JPN | AU | SP | IT | CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| United States |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Figure 1 |  | Figure 2 |  | Figure 3 |  | Figure 6 |  |  | Figure 7 |  | Figure 8 |  | Figure 9 |  |

## Target markets and the property market cycle by MAGIC

|  | Late expansion | Early expansion | Neutral | Early decline | Late decline |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Property cycle position | GER, SW, AU, HK, SGP, CH | IT, SP, NETH, CAN, US, UK, JPN | FR, AUS |  |  |
|  | + + | + | 0 | - | -- |
| Monetary policy | US, UK, CAN, SW, AUS, JPN, SGP, HK | AU, FR, GER, SP, IT, NETH | CH |  |  |
| Aging \& demographics | UK, AUS, SGP | SW, CH | US, AU, CAN, HK | NETH, FR, GER | SP, IT, JPN |
| Government policy | SW, AUS, HK | GER, CH | AU, UK, NETH, CAN, US | JPN, SGP | IT, SP, FR |
| Innovation \& entrepreneurship | US, GER, SW, AU, JPN | FR, NETH, UK, AUS, CH, HK | CAN, SGP | SP, IT |  |
| Competitiveness | GER, SW, SGP, HK | US, CAN, UK, NETH, JPN, AUS | FR, AU, CH | SP, IT |  |

Key
Europe, US \& Canada

[^16]

## Summary by target country

Navigate by country code



## Summary by target country

Navigate by country code

| us | UK | AUS | NETH | CAN | FR | sw | HK | GER | SGP | JPN | AU | SP | IT | CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Australia |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  | Figure 2 |  | Figure 3 |  | Figure 6 |  | Figur |  | Figu |  |  |  |

## Target markets and the property market cycle by MAGIC

|  | Late expansion | Early expansion | Neutral | Early decline | Late decline |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Property cycle position | GER, SW, AU, HK, SGP, CH | IT, SP, NETH, CAN, US, UK, JPN | FR, AUS |  |  |
|  | + + | + | 0 | - | -- |
| Monetary policy | US, UK, CAN, SW, AUS, JPN, SGP, HK | AU, FR, GER, SP, IT, NETH | CH |  |  |
| Aging \& demographics | UK, AUS, SGP | SW, CH | US, AU, CAN, HK | NETH, FR, GER | SP, IT, JPN |
| Government policy | SW, AUS, HK | GER, CH | AU, UK, NETH, CAN, US | JPN, SGP | IT, SP, FR |
| Innovation \& entrepreneurship | US, GER, SW, AU, JPN | FR, NETH, UK, AUS, CH, HK | CAN, SGP | SP, IT |  |
| Competitiveness | GER, SW, SGP, HK | US, CAN, UK, NETH, JPN, AUS | FR, AU, CH | SP, IT |  |

Key
Europe US \& Canada

[^17]

## Summary by target country

Navigate by country code



## Summary by target country

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## Summary by target country

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## Summary by target country

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## Summary by target country

Navigate by country code



## Summary by target country

Navigate by country code



## Summary by target country

Navigate by country code

| us | UK | AUS | NETH | CAN | FR | sw | HK | GER | SGP | JPN | AU | SP | IT | CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Singapore |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  | Figure 2 |  | Figure 3 |  | Figure 6 |  | Figur |  | Fig |  |  |  |

## Target markets and the property market cycle by MAGIC

|  | Late expansion | Early expansion | Neutral | Early decline | Late decline |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Property cycle position | GER, SW, AU, HK, SGP, CH | IT, SP, NETH, CAN, US, UK, JPN | FR, AUS |  |  |
|  | + + | + | 0 | - | -- |
| Monetary policy | US, UK, CAN, SW, AUS, JPN, SGP, HK | AU, FR, GER, SP, IT, NETH | CH |  |  |
| Aging \& demographics | UK, AUS, SGP | SW, CH | US, AU, CAN, HK | NETH, FR, GER | SP, IT, JPN |
| Government policy | SW, AUS, HK | GER, CH | AU, UK, NETH, CAN, US | JPN, SGP | IT, SP, FR |
| Innovation \& entrepreneurship | US, GER, SW, AU, JPN | FR, NETH, UK, AUS, CH, HK | CAN, SGP | SP, IT |  |
| Competitiveness | GER, SW, SGP, HK | US, CAN, UK, NETH, JPN, AUS | FR, AU, CH | SP, IT |  |

Key
Europe, US \& Canada $\square$ Asia-Pacific

[^18]

## Summary by target country

Navigate by country code



## Summary by target country

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## Summary by target country

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## Summary by target country

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## Summary by target country

Navigate by country code



## Summary by target country

Navigate by country code

| us | UK | AUS | NETH | CAN | FR | sw | HK | GER | SGP | JPN | AU | SP | IT | CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| United States |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  |  |  | Figure 2 |  | Figure 3 |  | Figure 6 |  | Figure 7 |  | Figure 8 |  | Fi |  |

Government debt as a percentage to GDP


[^19]

## Summary by target country

Navigate by country code


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## Summary by target country

Navigate by country code


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## Summary by target country

## Navigate by country code



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## Summary by target country

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## Summary by target country

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## Summary by target country

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## Summary by target country

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## Summary by target country

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## Summary by target country

Navigate by country code

| us | UK | AUS | NETH | CAN | FR | sw | HK | GER | SGP | JPN | AU | SP | IT | CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| United States |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Figure 1 |  | Figure 2 |  | Figure 3 |  | Figure 6 |  | Figure 7 |  | Figure 8 |  | Figure 9 |  |
| R\&D spending as a share of GDP |  |  |  |  |  |  |  |  |  |  |  |  |  |  |



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## Summary by target country

Navigate by country code


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## Summary by target country

Navigate by country code


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## Summary by target country

Navigate by country code


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## Summary by target country

Navigate by country code


[^38]

## Summary by target country

Navigate by country code

| us | UK | AUS | NETH | CAN | FR | sw | HK | GER | SGP | JPN | AU | SP | IT | CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Germany |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Figure 1 |  | Figure 2 |  | Figure 3 |  | Figure 6 |  | Figure 7 |  | Figure 8 |  | Figure 9 |  |
| R\&D spending as a share of GDP |  |  |  |  |  |  |  |  |  |  |  |  |  |  |



[^39]

## Summary by target country

Navigate by country code

| US | UK | AUS | NETH | CAN | FR | sw | HK | GER | SGP | JPN | AU | SP | IT | CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Japan |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Figure 1 |  | Figure 2 |  | Figure 3 |  | Figure 6 | Figure 7 |  |  | Figure 8 |  | Figure 9 |  |
| R\&D spending as a share of GDP |  |  |  |  |  |  |  |  |  |  |  |  |  |  |



[^40]

## Summary by target country

Navigate by country code

| us | UK | AUS | NETH | CAN | FR | sw | HK | GER | SGP | JPN | AU | SP | IT | CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Austria |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Figure 1 |  | Figure 2 |  | Figure 3 |  | Figure 6 |  | Figure 7 |  | Figure 8 |  | Figure 9 |  |
| R\&D spending as a share of GDP |  |  |  |  |  |  |  |  |  |  |  |  |  |  |



[^41]

## Summary by target country

Navigate by country code

| us | UK | AUS | NETH | CAN | FR | sw | HK | GER | SGP | JPN | AU | SP | IT | CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Spain |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Figure 1 |  | Figure 2 |  | Figure 3 |  | Figure 6 |  | Figure 7 |  | Figure 8 |  | Figure 9 |  |



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## Summary by target country

Navigate by country code

| us | UK | AUS | NETH | CAN | FR | sw | HK | GER | SGP | JPN | AU | SP | IT | CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Italy |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|  | Figure 1 |  | Figure 2 |  | Figure 3 |  | Figure 6 |  | Figure 7 |  | Figure 8 |  |  |  |



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## Summary by target country

Navigate by country code



## Summary by target country

Navigate by country code



## Summary by target country

Navigate by country code



## Summary by target country

Navigate by country code
Figure 1


## Summary by target country

Navigate by country code



## Summary by target country

Navigate by country code



## Summary by target country

Navigate by country code



## Summary by target country

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## Summary by target country

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## Summary by target country

| us uk | AUS | NETH | CAN | FR | sw |  | HK | GER | SGP | JPN |  | AU | SP | IT | CH |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| China |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Figure 1 |  | Figure 2 |  | Figure 3 |  |  | igure 6 |  | Figure 7 |  |  | Figure 8 |  |  |  |
| World competitiveness 2013 yearbook |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Country |  | 2013 |  | 2012 |  | 1997 |  | Country |  |  | 2013 |  | 2012 |  | 1997 |
| US |  | 1 |  | 2 |  | 1 |  | Australia |  |  | 16 |  | 15 |  | 15 |
| Switzerland |  | 2 |  | 3 |  | 12 |  | United Kingdom |  |  | 18 |  | 18 |  | 9 |
| Hong Kong |  | 3 |  | 1 |  | 3 |  | China Mainland |  |  | 21 |  | 23 |  | 27 |
| Sweden |  | 4 |  | 5 |  | 19 |  | Austria |  |  | 23 |  | 21 |  | 20 |
| Singapore |  | 5 |  | 4 |  | 2 |  | Japan |  |  | 24 |  | 27 |  | 17 |
| Canada |  | 7 |  | 6 |  | 6 |  | France |  |  | 28 |  | 29 |  | 22 |
| Germany |  | 9 |  | 9 |  | 16 |  | Spain |  |  | 45 |  | 39 |  | 26 |
| Netherlands |  | 14 |  | 11 |  | 4 |  | Italy |  |  | 44 |  | 40 |  | 39 |
| Key |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |



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 investment products and services. Telephone calls may be recorded and monitored.


[^0]:    We rate the US a "+" on competitiveness, reflecting these metrics and focusing on the long-term need for attention to basic infrastructure. Alongside the US are the Netherlands, UK, Japan and Australia. Germany, Sweden, Singapore and Hong Kong score higher at +++", while France, Austria and China are weaker at " 0 " and Italy and Spain weaker still at "

[^1]:    Source: IPD \& Real Capital Analytics

[^2]:    Source: IPD \& Real Capital Analytics

[^3]:    Source: IPD \& Real Capital Analytics

[^4]:    Source: IPD \& Real Capital Analytics

[^5]:    Source: IPD \& Real Capital Analytics

[^6]:    Source: IPD \& Real Capital Analytics

[^7]:    Source: IPD \& Real Capital Analytics

[^8]:    Source: IPD \& Real Capital Analytics

[^9]:    Source: IPD \& Real Capital Analytics

[^10]:    Source: IPD \& Real Capital Analytics

[^11]:    Source: IPD \& Real Capital Analytics

[^12]:    Source: IPD \& Real Capital Analytics

[^13]:    Source: IPD \& Real Capital Analytics

[^14]:    Source: IPD \& Real Capital Analytics

[^15]:    Source: IPD \& Real Capital Analytics

[^16]:    Source: TIAA Henderson Real Estate, Q1 201

[^17]:    source: TIAA Henderson Real Estate, Q1 2014

[^18]:    Source: TIAA Henderson Real Estate, Q1 2014

[^19]:    Source: Oxford Economics, December 2013

[^20]:    Source: Oxford Economics, December 2013

[^21]:    Source: Oxford Economics, December 2013

[^22]:    Source: Oxford Economics, December 2013

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[^26]:    Source: Oxford Economics, December 2013

[^27]:    Source: Oxford Economics, December 2013

[^28]:    Source: Oxford Economics, December 2013

[^29]:    Source: Oxford Economics, December 2013

[^30]:    Source: Oxford Economics, December 2013

[^31]:    Source: Oxford Economics, December 2013

[^32]:    Source: Oxford Economics, December 2013

[^33]:    Source: Oxford Economics, December 2013

[^34]:    Source: OECD, 2013

[^35]:    Source: OECD, 2013

[^36]:    Source: OECD, 2013

[^37]:    Source: OECD, 2013

[^38]:    Source: OECD, 2013

[^39]:    Source: OECD, 2013

[^40]:    Source: OECD, 2013

[^41]:    Source: OECD, 2013

[^42]:    Source: OECD, 2013

[^43]:    Source: OECD, 2013

