FSIReview

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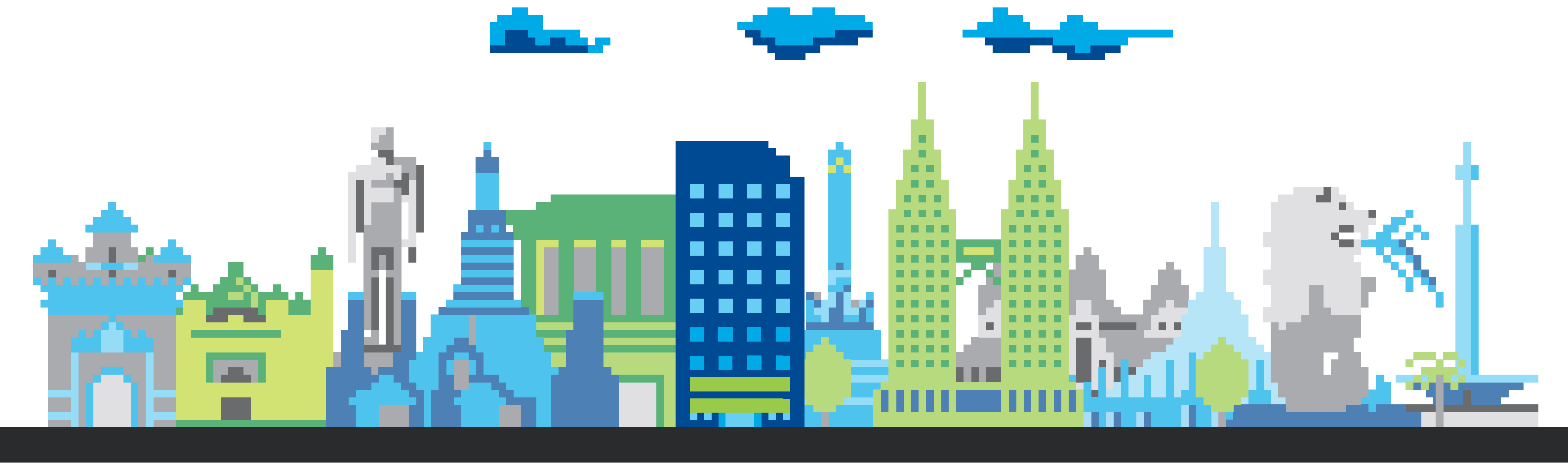
Taking a closer look
What's on the horizon for Financial Services in 2016?



In this issue:

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Foreword

The financial services industry is at the brink of disruptive innovation. While disruptive trends may not take shape until the longer term, 2016 will undoubtedly provide new challenges that executives need to stay in front of. From the Internet of Things (IoT) to cyber risk and the changing regulatory landscape, executives will have their hands full.

The forces of regulation and technological development are having great influence on the industry both in the short- and long-term. The articles in this issue of FSI*Review* identify some of these challenges to help our readers seize opportunities through the change and uncertainty.

We begin with an outlook for financial services regulation by the Deloitte Asia Pacific Centre for Regulatory Strategy. The Centre has identified four major regulatory themes for the Asia Pacific financial services industry in 2016, all of which reflect the influence of the G-20-led post-crisis international regulatory reform on the Asia Pacific region. We provide a high-level view of the themes that Asia Pacific institutions should be considering for action both internally and within the broader policy context.

Next, we examine the key drivers of M&A activity going forward in 2016; specifically, market disruption and technology; consolidation and growth; and regulatory change. Looking at recent M&A activity, the article highlights key predictions on how these trends will impact M&A across the different sectors in financial services for 2016.

IoT is expected to have an enormous impact on the financial services industry, generating a range of future opportunities emerging from better data about clients and their physical assets. We explore future scenarios for IoT in financial services.

Cyber security threats are not just for information technology specialists anymore. Today, cyber security is drawing attention from the very top, and it has become a huge concern for corporate boards. We provide insight on how boards can begin building a cyber secure organisation. We also provide an overview of how the Personal Data Protection Act (PDPA) will affect companies in Singapore and what consumer banks, in particular, can do to protect themselves.

We round things off with a special report discussing how the recent strong global impact of weakness in the Chinese economy has solidified China's position as a powerful economic force and how the economic influence of other Asian countries - including India, Japan and South Korea - continues to grow.

Change and increasing complexity are the new normal. Deloitte's Financial Services Industry professionals understand that your organisation needs to not only adapt to these pressures, but also to grow.

Deloitte Southeast Asia's FSI practice aims to help guide our clients through challenging times and provide timely insights on the most pressing issues facing the industry, helping keep your organisation a step ahead.

We hope you enjoy this edition of the FSI*Review*.

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In this issue

Asia Pacific regulatory themes for 2016: Global change, regional context

The following is an extract from a financial services regulation outlook report by the Deloitte Asia Pacific Centre for Regulatory Strategy.

The outlook report titled, *Global Change, Regional Context,* sets out the major regulatory themes and reforms that the Deloitte Asia Pacific Centre for Regulatory Strategy believes will impact financial services firms in the region in 2016. It explores these themes at an international and national level, and provides a clear view of the regulatory events expected in the year ahead and beyond. The themes cover:

- Substantial changes to how capital requirements are calculated and other ongoing crisis-driven and stability-related reforms;
- Ongoing pressure to improve and demonstrate good conduct and culture;
- Important discussions concerning the interplay between technology and regulation; and
- Overlaying these regulatory initiatives, the ever-present challenge of regulatory change implementation.

Resilience

Much crisis response regulation has concerned making institutions and markets resilient to financial stress. Despite substantial reforms already, these initiatives will continue through 2016 and beyond. They include:

- Implementation of Basel III's Net Stable Funding Ratio (2018) and calibration of the Leverage Ratio (2017)
- Changes to how bank RWAs are calculated and a capital floor (end 2015 and through 2016)
- Implementation of total loss absorbing capacity for G-SIBs (starting 2019), with possible application of similar requirements to D-SIBs
- A new comprehensive Pillar 3 framework (end 2016)
- Ongoing work on OTC derivative reforms, including the September 2016 commencement of margining for non-cleared transactions and resiliency work on CCPs
- Finalisation of insurer capital standards and higher loss absorbency for G-SIIs

Further work on potential regulation of asset management. These initiatives will require institutions to watch the policy space, understand the potential impact of regulatory initiatives and prepare for implementation

Culture and conduct

Recent years have seen conduct and culture within financial institutions come under intense scrutiny. The behaviour of financial institutions and their staff, with respect to consumer and investor protection and market integrity, has been a major area of concern.

The Financial Stability Board now sees misconduct as a systemic risk and is overseeing policy reforms to address it. At the domestic level, strong supervisory expectations concerning conduct and culture will impact Asia Pacific institutions through 2016. Institutions will need to ensure they have robust processes to assess and, where necessary, improve their culture and conduct standards. Evidencing cultural improvements will be particularly challenging.

Technology

Technological innovation will be a defining competitive dynamic for financial services in 2016 and beyond. We see a debate emerging concerning the appropriate regulatory response, with different players contributing different perspectives.

- Regulators will be concerned to facilitate innovation but also regulate new activities to meet their objectives of stability, market integrity and investor protection;
- FinTechs may seek to exploit low regulatory costs to facilitate market entry but ultimately want regulatory approval to bestow legitimacy and engender trust; and
- Incumbents will be concerned about asymmetric regulatory burdens hampering their competitive response but forward-looking institutions will also be optimistic about opportunities.

Regulators are also increasingly concerned that institutions manage the risks associated with technology, particularly with respect to cybersecurity. In response, institutions will need to maintain awareness of regulatory requirements and ensure their risk measures are appropriately aligned.

Implementation

Beyond the themes arising from new or recalibrated regulations, we believe that financial institutions will continue to face implementation challenges in 2016:

- First, the cumulative impact of the ongoing regulatory agenda risks reform fatigue and confusion concerning the cumulative impact of regulatory change;

- Second, institutions that operate across borders face ongoing challenges to reconcile different domestic rules, which can frustrate the desire for uniform operating models; and

- Third, branch institutions active in the Asia Pacific region may face challenges in securing regulatory change and compliance funding as European and United States headquarters face greater regulatory burdens.

We believe that responding to these themes well requires institutions to have a strong understanding of the regulatory change agenda, the ability to assess the impact of proposed changes on business lines and incorporate upcoming changes into strategic planning.

Conclusion

The Asia Pacific regulatory policy agenda remains wide-ranging, comprehensive and impactful. All four themes reflect the influence of the G-20-led post-crisis international regulatory reform on the Asia Pacific region. Because of this, 2016 will be an important year for Asia as China assumes the presidency of the G-20 and sets the agenda and tone for the year. The region and its institutions will have a heightened opportunity to voice their opinions on the international agenda and its impact across our divergent financial systems, economic needs and stages of development. The report gives a high-level view of the themes that Asia Pacific institutions should be considering for action both internally and within the broader policy context.

While each theme may have a varying relative level of importance across each institution and jurisdiction, we believe that in combination these themes will dominate strategic considerations in the coming period across the Asia Pacific region.

For the full report, please visit our Financial Services Industry pages at www2.deloitte.com/fsi.

"Financial institutions in the region are under increasing pressure to meet international regulatory timelines while managing varied local regulatory requirements. Implementing individual requirements and adapting business strategy to regulatory initiatives are best done with an understanding of policy intent and future reforms. Understanding this in a holistic context is important."

Ho Kok Yong, Southeast Asia FSI Leader

2016 and beyond: Key international and APAC

By **end of 2015** it is expected that the **BCBS** will have:
- Finalised the fundamental review of the trading book for approaches to **market risk**
- Commenced consultations on a more risk sensitive approach to **operational risk** and on revisions to standardised and IRB approaches to **credit risk**.

BCBS risk exposure **policy work that is currently open** but is expected to be finalised in 2016, include: interest rate risk in the **banking book**; review of the **credit valuation adjustment** framework; capital treatment for **STC securitisation**; and haircut floors for non-centrally cleared securities financing transactions. These policy initiatives will be underpinned by revisions to the Pillar 3 disclosure requirements that are expected to be released by the end of 2016.

International

Q1 2016 Jan-Mar

- **G-SIIs to report HLA** to group-wide supervisors (Jan)
- **G-SIBs** must comply with BCBS **risk data aggregation and risk reporting principles** (Jan)
- BCBS QIS on **credit risk and operational risk**
- IOSCO to publish report on **interest rate benchmarks**
- IOSCO to begin follow-up review of **FX benchmark** providers
- FSB **shadow banking** publication on harmonisation of approaches to **re-hypothecation** of client assets and issues related to **collateral re-use**
- Phase in period for Basel III **HLA** requirements for **G-SIBs**.

Q2 2016 Apr-Jun

- IOSCO report on further strengthening global framework to address **misconduct by firms and individuals** in professional markets
- BCBS to finalise treatment of **STC securitisations**
- IAIS to publish second **ICS and ComFrame consultation**
- CPMI-IOSCO to consult on **CCP resilience and recovery**
- FSB recommendations to address gaps or weakness identified during **shadow banking** peer reviews.

Q3 2016 Jul-Sep

- BCBS/IOSCO **margin requirements** for non-centrally cleared **OTC derivatives** phase-in period starts
- FSB report on jurisdictions' planned steps to implement **OTC derivative trade reporting**
- FSB report on reforming **interest rate benchmarks**.

Q4 2016 Oct-Dec

- **Basel III Pillar 3 revised disclosure** requirements take effect
- Joint BCBS, CPMI, FSB and IOSCO report on **interdependencies** between **CCPs and clearing members**
- FSB Resolution Steering Group to report on need for further guidance for **CCP resolution, prefunded financial resources and liquidity** in resolution
- FSB report on **misconduct** risks
- Possible CMCG/FSB recommendations on strengthening **disincentives to misconduct through compensation-related tools**
- FSB recommendations on possible measures of **'collateral velocity'**
- **G-SII cohort 2015** must have systemic risk management plan and liquidity management/planning (Dec).

During 2016 >

- IAIS to undertake **BCR field testing for Cohort 2015**
- IOSCO to consider plans for monitoring and reporting on implementation of **MMF** and **securitisation recommendations**
- FSB to work on **market liquidity** and **asset management risks**, including policy options to mitigate structural vulnerabilities.

National

Australia

- **Central clearing of OTC derivatives** commence for certain entities meeting A$100 billion threshold (April)
- Legislation providing a **professional standards framework for financial advisers** and to **ban excessive card surcharges** and better **protect consumers using electronic payment systems**
- Legislation to reduce **disclosure requirements for 'simple' corporate bonds**
- Consultation on ASIC **product intervention powers and accountabilities** for financial product **issuers and distributors**
- APRA consultation on **recapitalisation frameworks, NSFR** leverage ratio and other prudential issues
- Government to consult on tools for **managing any future financial crisis.**

China

- CBRC policy framework for Basel III capital for equity investments in funds and for **CCPs, SA-CCR, securitisation framework, NSFR, Pillar 3 disclosure and large exposures.**

Hong Kong

- New rules for clearing of **OTC derivatives** to come into effect
- Large scale roll out of requirement that banks accept **e-Cheque deposits.**

Japan

- JFSA to publish a summary report reviewing progress with 2015-2016 strategic directions and priorities, which include: **FinTech, cyber security; algo trading**; intermediary prioritisation of **customers' interests**; enhancing skills of asset managers and institutional investors.

Singapore

- Basel III **D-SIBs capital conservation and counter-cyclical buffer** and **LCR disclosure** requirement to take effect (1 Jan)
- Basel III **liquidity** requirements extend to **merchant banks** (1 Jan)
- **Draft rules** to be issued on Basel III **NSFR** and **large exposures** requirements
- Consultation in progress or completed for draft rules on Basel III capital for equity investments in funds and for **CCPs, SA-CCR, securitisation framework**.

Australia

- **APRA to set capital standards and ratios** that ensure ADIs unquestionably strong
- **Legislation** giving ASIC the power to **ban individuals** from managing financial firms
- Legal effect given to the **Asian Region Funds Passport** initiative
- Consultation on strengthening **ASIC's enforcement tools** in relation to the financial services and credit **licensing regimes**
- ASIC review of remuneration arrangements in the mortgage broking industry
- Government to consider **technology neutrality** in financial sector regulation.

Hong Kong

- **Draft rules** for Basel III requirements **re capital for equity investments** in funds and for **CCPs, SA-CCR, pillar 3 disclosure and large exposures** to be published.

Singapore

- **VM and IM requirements** for non-centrally cleared derivatives planned to be effective for commercial banks **exceeding S$4.8 tn** threshold (1 Sep 2016).

regulatory events

Notes:

- We expect regulators and governments in the Asia Pacific region to announce further regulatory initiatives in the aftermath of the G20 summit; as international intentions are clarified.
- Text in navy blue indicates deadline for industry or commencement of new requirements.

2017

- **Basel III** capital requirements for **equity investments** in funds. **CCP exposures and SA-CCR** effective (1 Jan)
- End of phase in period for BCBS **OTC derivatives (VM)** margin requirements (1 March)
- BIS Markets Committee to **finalise FX Code** and proposals to ensure greater adherence (May)
- **Approval of ICS v1.0** for confidential reporting
- National/regional authorities to begin reporting **securities financing data** to the global data aggregator in accordance with FSB standards
- FSB progress report on **compensation practices**
- **G-SII cohort 2016** must have systemic risk management plan and liquidity management/ planning (Dec).

2018

- **Basel III securitisation framework and Pillar 1** (minimum capital) requirements in effect (1 Jan)
- **IFRS9** effective (1 Jan)
- BCBS **NSFR** becomes minimum standard (1 Jan)
- FSB **numerical haircut floors** framework to apply to non-bankto- non-bank securities financing
- Jurisdictions must have removed legal barriers to full **reporting of OTC derivatives to TRs**
- Deadline to **cease masking** identifying data for **OTC derivative counterparties**
- Jurisdictions must have legal framework to permit authorities **access to TR held OTC derivatives data**
- Consultation on **ComFrame and ICS v.2**
- **G-SII cohort 2017** must have systemic risk management plan and liquidity management/ planning (Dec).

2019 and beyond

- **Basel III capital requirements** on CET1,capital conversion buffer, G-SIB buffer, countercyclical capital buffer, min T1 ratio and min total capital ratio fully implemented (1 Jan 2019)
- **Basel III** liquidity requirements on **LCR and large exposures** fully implemented (1 Jan 2019)
- **G-SIBs** required to meet min **TLAC** of **16%** RWA and **6%** LRE (1 Jan 2019)
- **G-SIIs'** to comply with **BCR and HLA** requirements (2019)
- Adoption of **ComFrame**, including **ICS v.2.0** (2019)
- Phase-in period ends for BCBS **margin requirements for OTC derivatives (IM)** (1 Sep 2020)
- **G-SIBs** required to meet min **TLAC** of **18%** RWA and **6.75%** LRE (1 Jan 2022)
- **Emerging market G-SIBs** to meet min **TLAC** of 16% RWA and 6% LRE by **2025** and 18% RWA and 6.75% LRE by **2028**.

Australia

- Draft rule on Basel III **large exposure** requirements (2017)
- APRA to ensure **banks** have appropriate **TLAC and leverage ratios** in place
- **Legislation** to enable **innovative disclosure** for financial products
- **Legislation** to improve the regulation of **managed investment schemes**
- ASIC review of **stockbroking remuneration** arrangements
- Rationalisation of life insurance and managed investment scheme **legacy products.**

Hong Kong

- **Rules** on **OTC derivatives reporting** come into effect (early 2017)
- Draft rules for Basel III **securitisation framework** and **NSFR** requirements (2017).

Singapore

- **VM requirements** for non-centrally cleared derivatives planned to be effective for all commercial and merchant banks (1 Mar 2017)
- **IM requirements** for non-centrally cleared derivatives planned phase in period for all commercial and merchant banks **exceeding S$13** billion threshold (1 Mar 2017–1 Sep 2020).

Glossary of terms

ADI	Authorised deposit taking institution (Australia)
APRA	Australian Prudential Regulation Authority
ASIC	Australian Securities and Investments Commission
BCBS	Basel Committee on Banking Supervision
BCR	Basic capital requirement
BIS	Bank for International Settlements
CET1	Common equity tier I (capital ratios)
CCP	Central counter-party
CMCG	Compensation Monitoring Contact Group
ComFrame	Common Framework for the Supervision of Internationally Active Insurance Groups
CPMI	Committee on Payments and Market Infrastructures
D-SIB	Domestic systemically important bank
FinTech	Financial technology
FSB	Financial Stability Board
FX	Foreign exchange
G-SIB	Global systemically important bank
G-SII	Global systemically important insurer
HLA	Higher loss absorbency
IAIS	International Association of Insurance Supervisors
IBOR	The group of interest rate benchmarks that are considered to play the most fundamental role in the global financial system, namely LIBOR (London Interbank Offered Rate), EURIBOR (Euro Interbank Offered Rate) and TIBOR (Tokyo Interbank Offered Rate)
ICS	Insurance Capital Standard
IM	Initial margin
IOSCO	International Organisation of Securities Commissions
IFRS	International Financial Reporting Standards
IRB	Internal ratings-based (approach to credit risk)
JFSA	Japanese Financial Services Agency
LCR	Liquidity coverage ratio
MMF	Money market fund
NSFR	Net stable funding ratio
OTC	Over-the-counter (derivatives)
QIS	Quantitative impact study
RWA	Risk weighted assets
SA-CCR	Standardised approach for measuring counterparty credit risk exposure
STC	Simple, transparent and comparable
TLAC	Total loss-absorbing capacity
TR	Trade repository
VM	Variation margin

2016 Financial Services M&A Predictions: Rising to the challenge

The following is an extract from this year's Financial Services M&A Predictions report, which explores the key drivers of M&A activity going forward and predicts how these trends will impact M&A across the Banking, Insurance and Investment Management sectors in 2016.

It was another very busy year for M&A in the Financial Services Industry. Wall Street Journal reported in December 2015 that an estimated US$4.7 trillion of mergers would be signed in 2015.[1] There was also the return of large, transformational deals. This activity has covered all sectors of Financial Services, with acquirers including UK-based corporates, private equity and inbound investment from continental Europe, China and Japan.

Key trends to lookout for in 2016

In 2015, there were three key underlying trends that drove M&A activity in the financial services industry. We expect these trends to continue during 2016:

- **Market disruption and technology:** A range of disruptive forces are impacting the Financial Services Industry, with the rise of peer-to-peer networks in the Banking and Insurance sectors being a key theme. Other factors include the implementation of new digital underwriting solutions in the Insurance sector, increased competition in the payments arena from new, technology driven entrants and the continued development of online distribution by the Investment Management industry.

  The report predicts that this disruption will not only provide consumers with new and improved services, but also drive M&A activity as existing players find their business models under pressure from new products and entrants, and look to acquisitions to plug in missing services and skills.

- **Size matters:** Consolidation in order to achieve top-line growth and diversification, as well as improved profitability via cost synergies, has long been a driver of M&A activity. The underlying drivers for consolidation in the Financial Services Industry are broad in nature and include the capital benefits of diversification achieved in insurance combinations, the desire to broaden business models along the value chain in the investment management sector and the attractiveness of challenger banks, with their outperforming levels of return on equity but low levels of market share, as acquisition targets.

- **Regulatory change:** Recent years have seen a significant change in the regulatory environment and the pace of change shows no sign of slowing. With new regulations such as Solvency II, MiFID II, the introduction of IFRS 9 and a further round of European Central Bank stress tests coming into effect during 2016 we expect Financial Services institutions to have to re-evaluate their business models, plans and balance sheets to make sure they are in the best possible position to deal with these changes and to take advantage of the opportunities presented.

1 Maureen Farrell, "2015 Becomes the Biggest M&A Year Ever", The Wall Street Journal, December, 3, 2015, http://www.wsj.com/articles/2015-becomes-the-biggest-m-a-year-ever-1449187101.

Key predictions

- **Challenger banks** have outperformed the incumbents on a return on tangible equity basis by 13.5 percentage points but face increasing disadvantages in terms of capital and funding costs as they try to grow out of the smaller niche sectors in which they operate in to more mainstream markets. This makes the Challengers clear targets either for self-consolidation or for acquisition by larger banks.

- Due to **banking regulatory pressures** as a result of the phasing in of Basel III and the introduction of IFRS 9 the €2.2 trillion of non-core assets and €800 billion of non-performing loans are likely to be a driver of European M&A activity as banks try to release and re-deploy their tied-up capital.

- For **Investment Management Funds**, the maxim that bigger is better isn't strictly true as AUM was negatively correlated with return on equity in 2014. Future growth expectations, rather than simply scale, were positively correlated with return on equity. Therefore firms should focus on a growth strategy, including selective M&A targets, and not seek scale for scale's sake only.

- **Digital disruption** will force Insurance companies to invest heavily in research and digital capabilities, either in-house or via acquisition, in order to keep up with developments such as the internet of things, peer to peer insurance and the sharing economy in this increasingly disrupted market.

For the full report, please visit our Financial Services Industry pages at www2.deloitte.com/fsi.

"2015 has seen a significant volume of M&A activity within the global financial services industry. Barring a major economic collapse, 2016 will surely see a continuation of this high level of M&A activity, driven by three broad themes: technological disruption, a flight to scale and regulatory pressures."

Suresh Marimuthu, Executive Director, Financial Advisory Services, FSI

Future scenarios for IoT in financial services

The article, by Jim Eckenrode, Executive Director, Deloitte Centre for Financial Services, Deloitte US, first appeared on CIO Journal on 6 January 2016. Published by The Wall Street Journal (WSJ) and sponsored by Deloitte, CIO Journal is a news and information service for Chief Information Officers and senior business executives interested in technology.

Financial services firms have long trafficked largely in intangibles, from counterparty risk and online bill payment to assets that were previously tangible but increasingly are not, such as stock certificates and even money itself. So the Internet of Things (IoT) - a suite of technologies and applications that use embedded sensors in physical items to generate customer, operational, and other data that can be aggregated and analysed for valuable insights - might not seem directly relevant to the way financial services institutions do business.

But IoT may, in fact, transform financial services. Most pieces of information have roots in the physical world-for instance, a logistics firm's stock price may depend on the number of packages shipped, while wheat futures may change based on rainfall levels. Already, many are using sensor data to improve operational performance, customer experience, and product pricing. Perhaps the most mature example involves the development of usage-based insurance, in which sensors in automobiles or, increasingly, smartphone apps automatically provide insurance carriers with information on vehicle driving history and driver performance.[2] Another example is in commercial real estate, where sensors in commercial buildings can help companies better manage energy usage, environmental comfort, and security.[3]

To gain some insight into future IoT scenarios in this industry, the Deloitte Centre for Financial Services engaged with a group of academics, analysts, and entrepreneurs with expertise in financial services and technology to imagine how IoT technologies might generate new use cases for various segments in the future.[4]

Banking

Physical, performance, and behavioural data generated from biometric and positional sensors for individuals, as well as shipping and manufacturing control sensors for businesses, could provide new opportunities for credit underwriting, especially for customers lacking a credit history. A challenge would involve developing an understanding of which data points best predict an individual's creditworthiness.

In addition, given that banks finance the lease or purchase of many physical items, there may be opportunities to tap into data from sensors monitoring the condition of these goods. For example, lenders could partner with electronics or household appliance manufacturers to proactively make credit offers to individuals if their purchased items begin to show noticeable wear or face imminent failure. Leasing companies, too, could monitor the condition of leased assets in order to determine a more precise residual value of assets at lease expiration.

Capital markets

Firms on both the "buy" and "sell" sides of trading and investing activities could benefit from enhancing their capacity and capability to gather, store, and analyse huge amounts of real-time, IoT-generated data, especially when combined with continued acceleration in algorithmic trading. By removing the human element and obtaining more comprehensive real-time data flows, for instance, from sensors that monitor manufacturing plant activity or foot traffic in retail stores, capital market analysts might develop analytics that could better evaluate suspected market bubbles. However, it is also possible that algorithms might be unable to account for shifts in consumer demand or geopolitical events, leading to faulty conclusions that could actually create bubbles.

2 *Simon Ninan, et al., Who owns the road? The IoT-connected car of today—and tomorrow, Deloitte University Press, August 18, 2015, http://dupress.com/articles/internet-of-things-iot-in-automotive-industry/.*

3 *John Moore, "Building automation systems: Internet of Things meets facilities management," TechTarget, January 27, 2014, accessed September 24, 2015, http://searchitchannel.techtarget.com/feature/Building-automation-systems-Internetof-Things-meets-facilities-management.*

4 *The insights on future IoT scenarios are based in part on a crowdsourced simulation exercise conducted on behalf of the Deloitte Center for Financial Services. The project, fielded during July 2015, involved more than 50 analysts across 20 countries. These analysts had varied backgrounds, including technology entrepreneurs; business and technology leaders within the financial services industry; academics with doctorates in economics, business, and technology; analysts in government and research centres; and cybersecurity consultants.*

Insurance

The longer-term impact of the adoption of automotive sensors is one of the more interesting IoT scenarios for insurance carriers. Already, the industry is grappling with the strategic implications of self-driving cars, suggesting a shift from automobile casualty insurance, where the driver is at fault, to product liability insurance, where the manufacturer may be held liable.[5] With IoT, insurers may also gain better information on potential product defects, allowing them to more accurately price coverage. However, these changes in traditional coverage models, as well as the potential for fewer accidents, could result in insurers seeing decreased income from premiums.

In addition, usage-based insurance may lead policyholders to request more on-demand coverage to reduce their costs. For example, in personal life and injury insurance, all manner of risks are covered under a single policy, but with the development of more fine-grained data about personal behaviours, firms could tailor and essentially unbundle coverage to potentially add or eliminate certain risks. This would make underwriting and pricing a more complex undertaking for insurers, but could also yield improved customer satisfaction.

In commercial insurance, deploying sensors on shipping containers and transport vehicles could provide insurers with the opportunity to enhance shipping insurance coverage. The ability to better detect and model risks due to theft or damage could move the pricing of these products from an actuarial exercise to one that better assesses risks and losses in real time.

Investment and wealth management

In the future, firms could utilize information from clients' IoT ecosystems to tailor investment decisions and asset allocations based on their individual behaviours, preferences, and locations. A more intimate understanding of a client's interests and purchasing patterns could enable increasingly personalised investment offerings. This analytical approach could also potentially provide a more accurate model of investor risk tolerance than typically provided by client on boarding surveys. Traders, equity analysts, and portfolio managers in mutual fund companies might also use real-time data flows to better automate fund management, which could lead to increased competitive differentiation between types of investment management firms, funds, and pricing strategies.

Commercial real estate

With IoT technology, firms could potentially combine data from sensors used to manage building energy and security with activity sensors that monitor human interactions within the building and in the surrounding neighbourhood. With this information, commercial real estate analysts could value properties even more accurately. These data flows, if exposed to a public marketplace, could also reduce friction in the leasing or buying processes, and give investors greater transparency into property values.

5 *Noah Buhayar and Peter Robison, "Can the insurance industry survive driverless cars?" Bloomberg Businessweek, July 30, 2015, accessed September 24, 2015. http://www.bloomberg.com/news/articles/2015-07-30/can-the-insurance-industry-survive-driverless-cars-.*

Risk management in financial services institutions
Using IoT technologies, companies might draw on sensor-based information on financial services institutions employees' stress levels, patterns of movement, and other factors as a way of predicting potential for internal fraud. Portfolio managers could also improve their performance by understanding how they react during times of stress. Employees may resist being monitored so closely, but for those in positions of particular importance, agreeing to this collection of data may become a requirement of employment.

The coming avalanche of IoT-generated data will dwarf financial services institutions' current data volumes, and could threaten to overwhelm existing strategies and technologies intended to manage and capitalise on this information. Firms should start exploring the potential impact and opportunities related to the deployment of IoT technologies, and begin developing strategic partnerships with IoT innovators to better understand where the market may be headed and its effect on specific industry sectors.

To read the full report or view Deloitte's collection of research on the subject, visit dupress.com/collection/internet-of-things. For more economic and business research visit Deloitte University Press at www.dupress.com.

"By enabling the collection and exchange of information from objects, the IoT has the potential to be as broadly transformational to the financial services industry as the Internet itself. Firms that get ahead of the IoT trend will likely be at an information advantage, where faster, better, and cheaper insight can create opportunities for improved customer experience and operational performance."

Yacin Mahieddine, SEA Leader, FSI Consulting

How cyber savvy is your organisation?

This article, written by Thio Tse Gan and Harry Raduege, first appeared in the 2016 Directors' Alert, a publication from the Deloitte Centre for Corporate Governance. Tse Gan leads the Cyber Risk Services business in Singapore and Southeast Asia and Harry is a senior advisor and director for Cyber Risk Services at Deloitte US.

"In today's environment, with the widespread use of technologies, you can't be a responsible board member and not be concerned about cyber security. Boards need to inquire about the organisation's cyber strategy, what information the organisation exposes to third partners, and the security of the organisation's ecosystem."

Thio Tse Gan, SEA Cyber Risk Services Leader

It's no longer a matter of whether a cyber breach will occur; it's when it will occur if it hasn't already. Globally, in the first half of 2015, more than 245 million data records were stolen by cyber hackers every single day - or 16 records per second.[6] Cyber-attacks are becoming more sophisticated and harder to investigate and contain. Advanced Persistent Threats (APT), for example, are low-key attacks that slowly siphon off critical data and are difficult to detect using traditional methods.

Cyber-attacks come in various forms:

- **Data breaches:** Stealing an organisation's data or manipulating it so the organisation can no longer trust it.
- **Cyber-crimes:** The theft of data, such as credit card information, that hackers use for their own financial benefit.
- **Acts of sabotage:** Denial of service or other attacks that literally shut down the organisation.
- **Espionage:** Attacks on the industrial or economic security of the organisation.

Cyber-attacks are inevitable, and often the attackers are already inside the organisation's network.

In addition to the immediate disruption created by a cyber crisis, a cyber-attack often leads to drawn-out litigation, regulatory actions, ongoing operational disruptions, an impaired ability to execute strategy, and increased insurance liability - all of which diminish corporate value. It's not surprising, then, that cyber security is an increasingly important oversight responsibility for directors, and one with personal implications for members of the board.

6 Gemalto, "2015 First Half Review, Findings from Breach Level Index Report."

Following some cyber breaches, shareholders have called for the removal of directors or have filed derivative lawsuits against them. Class action lawsuits are also becoming more common following a cyber breach. The bad news is that the problem is likely to become worse because every organisation has a growing number of cyber risks. For example:

- Organisations are linked with others in their ecosystem through their supply chains that, to function effectively, require sharing of information among the ecosystem partners. Each of these links introduces vulnerabilities.

- Cyber espionage and data theft are becoming commonplace in mergers and acquisitions where hackers attempt to gain financial or operational intelligence to use as leverage in the negotiations or to devalue one of the organisations in the transaction.

- Employees often utilize their own personal digital devices to access an organisation's data - an entry point whose security depends largely on the cyber awareness and care employees take with their devices both in and out of the workplace.

- A growing number of companies and individuals are taking advantage of the cost-effective and convenient alternative of cloud technologies - something that is equally convenient for cyber criminals and malicious actors.

Building a cyber secure organisation

It has been said that an organisation's cyber security is only as strong as its weakest employee, since cyber hackers look for naïve, uneducated, or untrained employees to provide them with an entry point into their employer's network.

Hackers will use bogus email accounts designed to look as if they were sent by a friend or co-worker, which, when opened, will upload malicious software (malware) to the organisation's networks. Free gifts, such as thumb drives that are generously handed out at trade shows and other events, could also contain malware. Employees who use their digital devices to access unsecure WIFI could unknowingly be giving access to hackers.

In this environment, organisations need to build a culture of data security - a process that should be led by the board and management and needs to involve more than just the IT department. Today, organisations need their entire workforce to be cyber savvy to ensure that they continuously operate in a secure, vigilant, and resilient environment.

- **Secure:** Many organisations have spent significant amounts of time and money on traditional security controls and preventative measures, and most likely that investment will need to be increased in the future. Despite this, it is impossible to protect everything equally. Organisations need to focus on their "crown jewels"- the mission critical data that they absolutely must protect. Organisations must also know the cyber hygiene of their partners and authorised connections - contractors, vendors, and suppliers - who may be security allies or liabilities. It's important to think in terms of the information supply chain, and decide who will or will not be allowed to access the information network.

- **Vigilant:** Being vigilant means being cyber savvy. Awareness of cyber risks needs to be a priority for everyone within the organisation, and for every one of its external partners. Cyber vigilant organisations build, maintain, proactively monitor, and test their cyber defence. When hackers attempt to gain entry or other suspicious events occur, the organisation needs to respond appropriately to fend off the intrusion, and also learn from it so it can adjust its business and technology environment accordingly.

- **Resilient:** Inevitably, some cyber intrusions will succeed so organisations need a crisis management strategy and cyber risk management plan that enables them to respond and recover quickly.

Cyber security and the board

Boards of directors need to challenge management's assessment of the organisation's cyber posture and critically review the cyber crisis management capabilities that management has put in place. The board may also want to review its own processes for providing oversight of cyber security. For example, the board may want to expand the charter of the board-level committee responsible for overseeing cyber risk to include how the organisation allocates resources in managing cyber risk. Another consideration may be to create a board cyber chair to oversee management's activities and ensure that senior management is appropriately focused on cyber security. Boards may also want to establish a cyber risk process that defines cyber risk management priorities for the organisation and outlines mechanisms of accountability. The board may also want to have access to its own cyber security experts.

Questions for directors to ask

1. What is our organisation's cyber footprint? What information do we deliver? What channels do we use to deliver that information? What information do we share with third parties? Are we confident that our supply/information ecosystem is robust enough to protect information and data throughout the chain?

2. How well does the board understand cyber risk? Should the board engage outside experts to educate directors on cyber risk, how to mitigate it, and the signs that might signal a breach? How often does the board receive reports or updates from the people responsible for monitoring cyber risk?

3. What are our "crown jewels" - the critical information that, if compromised, would undermine our organisation's ability to continue operations? How do we protect this information?

4. Does our organisation have an overall enterprise cyber strategy and cyber risk management plan? Do they have both proactive and reactive components? Has management established working relationships with local law enforcement? Does our management team conduct regular cyber assessments and cyber security scenario planning exercises?

5. Is our organisation able to detect a compromise early? What controls have been put in place? How do we know those controls are operating effectively? Have they been validated recently? How many actual breaches have we had, how well did we respond to them, and what did we learn from them?

6. In mitigating our risk, do we have cyber insurance? If so, what is the extent of our coverage?

For the full report, please visit the Deloitte Centre for Corporate Governance page at www.global.corpgov.deloitte.com.

Managing banking relations: What Singapore's consumer banks should know about PDPA

This article, written by Ashley O'Reilly, first appeared on the Asian Banking & Finance website in January 2016. Ashley is a Consulting Manager at Deloitte Southeast Asia.

Copious amounts of personal data is collected by banks each day and frequently shared with third parties as technology continues to revolutionise the way we bank. Last year, the Association of Banks in Singapore released the Code of Banking Practices which outlines the responsibilities of banks under the Personal Data Protection Act (PDPA) and its regulations.

The Personal Data Protection Act

The PDPA 2012 was passed in Singapore to "govern the collection, use, and disclosure of personal data by organisations" – section 3, PDPA. Since it became effective on 2 July 2014 the PDPA has recognised both the data protection rights of individuals and the responsibilities of private organisations including banks to collect, use, or disclose their personal data for legitimate business purposes.

Personal data is defined as data – whether true or not – about an individual (living or deceased) who can be identified from that data alone or from that data and other information to which the organisation has or is likely to have access. This can include electronic and non-electronic data, including email addresses and phone numbers. It is not restricted to information on customers and targets – it also applies to employee personal data held within a business.

Business contact information is excluded from the data protection requirements of the PDPA, except for the requirements of the Do Not Call (DNC) registry. This includes the individual's name, position, business telephone number, business address, and business email address. Essentially, these are not considered personal data – as long as the details were given for business purposes rather than personal.

This doesn't mean that any data you have has to be erased or approval received from every recipient: for example, if you have personal data collected prior to the effective date of the data protection rules, you can continue to use this for the reasonable purposes for which it was collected – but you cannot, for instance, use it for direct marketing if it was collected originally for a different purpose.

Everyone in Singapore is affected by the regulations: in particular, listed and private companies, partnerships, and charities must adhere. The consequences for non-compliance include financial penalties up to S$1 million, criminal prosecution, and potentially lawsuits. Companies using cloud services should also be aware that it is they who are responsible for compliance, not the cloud service provider.

What can consumer banks do to protect themselves?

Banks must seek consent from their existing or potential customers for the collection, use, or disclosure of personal data.

Compliant consent might be explicit or implicit. An example of implicit consent might be an individual choosing to walk into a branch where surveillance cameras are obviously present to record images of customers.

When obtaining consent, banks need to ensure that there is no misleading or incomplete information. The ability to withdraw a customer's consent must also be made clear. These terms and conditions for consent to marketing information and personal data should be easily accessible to publicly available.

The purpose of data collection, for example, must be made clear to customers at or before the time of collection. Banks with mobile applications need to ensure that their app seeks users' permission to share their location information and informs them that the app uses the data to locate nearby branches and ATMs.

Under the PDPA, banks must ensure that the personal data they have is not revealed to other parties without the consent of the individual. Given the multiple systems in a bank's architecture and the various departmental transfers of data within the organisation, the verification principle must be carefully governed.

For the transfer of personal data outside of Singapore, banks first need to seek prior consent. Recipients are contractually bound and the recipient country will be subjected to similar personal data protection laws to Singapore.

Consumer banks must also ensure that the personal data they collect is accurate, up to date, and complete. The correction principle has costly ramifications for banks who are obliged to respond to identified errors or omissions and send corrected data to every other organisation to which the personal data was disclosed by the bank. The cost in time and effort to track and process such changes is relatively large for all banks in Singapore regardless of size.

Banks need to demonstrate the extent of personal data safeguards that is reasonable for the size and structure of the organisation and the type of personal data. Personal data safeguards must address unlawful loss, unauthorised access, copying, etc.

Banks can safeguard personal data via a variety of methods of varying degrees of cost and sophistication. These include physical measures (secured filing / pass cards), organisation measures (security clearance), and technical measures (passwords and encryption). The extent and scope of safeguards should also consider the sensitivity and size of the data, the technology available and the primary storage method in the data's initial format.

Personal data must only be retained by banks for the period necessary for the fulfilment of the bank's purpose i.e. a bank should only keep the data so long as it is required for business needs. Given the risk and cost to banks for storage of personal data, it would be more effective to discard irrelevant and obsolete personal data.

Conclusion

Banks in Singapore are obliged to put in place and document policies and practices that are necessary to enable these obligatory principles under PDPA to be met. It is important that clear processes are developed to comply with the PDPA for banks to receive and respond to complaints that may arise in relation to the Act.

It will be useful for banks to adopt data protection policies containing a feedback section with contact information. These policies and practices should be communicated and made available within the bank and its customers.

Today, most banks have adopted practices to enhance data governance and protection within their organisation. While we expect that advancements in technology will continue to disrupt the way we work, the basis of data protection policies are still evolving – and must continue to do so.

For more information on how the PDPA might impact your organisation, please contact our FSI team at enquiries@deloitte.com.

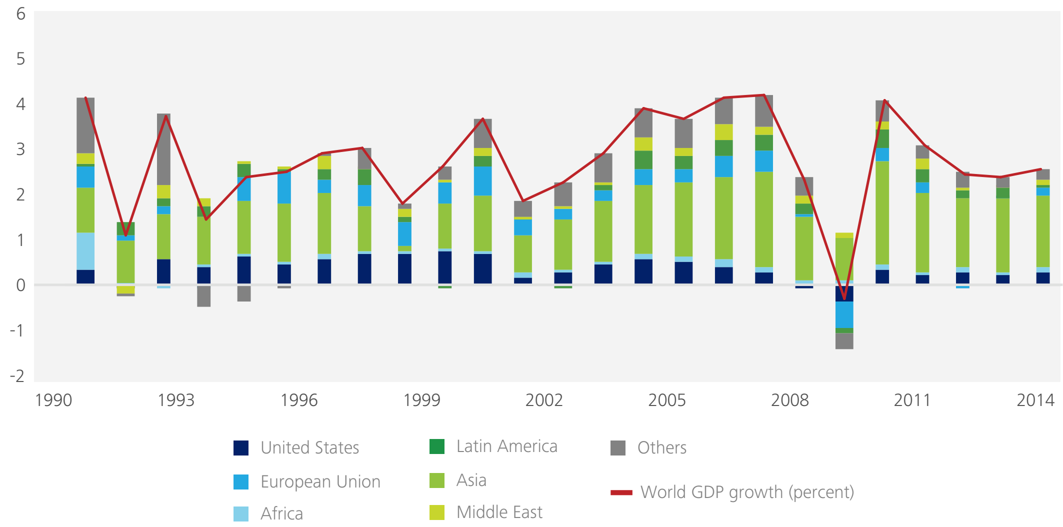
Packing a mightier punch: Asia's economic growth among global markets continues

The special topic report was originally published by Deloitte University Press as part of the Asia Pacific Economic Outlook, Q1 2016. It discusses how the recent strong global impact of weakness in the Chinese economy has solidified China's position as a powerful economic force and how the economic influence of other Asian countries - including India, Japan and South Korea - continues to grow.

In September, after much deliberation, the U.S. Federal Reserve (Fed) decided to keep the federal funds rate on hold. The decision to postpone a rate hike was primarily due to concerns about growth in key emerging economies and volatility in global financial markets.[7] A string of poor economic data from China and an equity sell-off there in Q3 had indeed raised risks to global growth. What was an eye-opener, however, was the strong impact of Chinese data on global markets, including the Fed's decision to defer a rate hike. The latter made one thing very clear - China is now a powerful force in the global economic order.[8]

The more one looks at Asia, the clearer it becomes that the region's ascendancy in the global economy will continue, providing strength and yet creating instability if risks are not addressed prudently. China's rise is yet another feather in the cap of Asia's massive economy. Once a poorer cousin of the United States and Europe, Asia now boasts some of the world's fastest-growing economies and is a major contributor to global growth **(Figure 1)**. In addition to China and its neighbour, India, Asia also has a former powerhouse in Japan, an increasingly affluent South Korea, and the fast-growing Association of Southeast Asian Nations (ASEAN). In fact, the more one looks at Asia, the clearer it becomes that the region's ascendancy in the global economy will continue, providing strength and yet creating instability if risks are not addressed prudently.

Figure 1. Asia's contribution to global GDP growth has gone up



Source: Oxford Economics, Deloitte Services LP economic analysis. Graphic: Deloitte University Press | DUPress.com

For the global economy, Asia's size does matter

A key factor behind Asia's rising influence is the size of its economy. In 1990, Asia's share in world GDP in real U.S. dollar (US$) purchasing power parity (PPP) was 23.2%. By 2014, this went up to 38.8%, much larger than the shares of the United States and the European Union.[9] In fact, Asia's share is likely to go up in the coming years if current growth trends in key regional economies continue. For example, forecasts by Oxford Economics put Asia's share at nearly 45% by 2025.[10]

7 *Howard Schneider and Ann Saphir, "Global economy worries prompt Fed to hold rates steady," Reuters, September 17, 2015, http://www.reuters.com/article/2015/09/18/us-usa-fed-idUSKCN0RH0GH20150918#Xfli3AOzGil46rDG.97.*

8 *Enda Curran and Christopher Condon, "It's a new world: How China growth concerns kept the Fed on hold," Bloomberg, September 18, 2015, http://www.bloomberg.com/news/articles/2015-09-18/it-s-a-new-world-how-china-growth-concerns-kept-the-fed-on-hold.*

9 *Oxford Economics, Global Economic Databank, November 2015.*

10 *Oxford Economics, Global Economic Databank, November 2015.*

Interestingly, there are major changes within Asia itself. In 2014, China's share in Asia's GDP (in real US$ PPP) was 43.1%, more than double its share in 1992. In contrast, Japan's share fell sharply during this period. Oxford Economics' forecasts indicate that this trend will continue.[11]

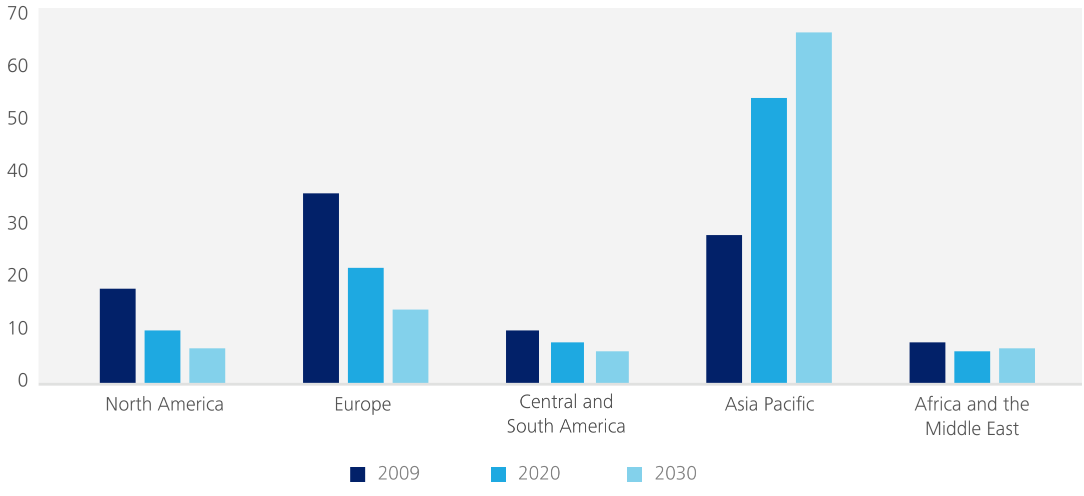
Asia's prominence in global supply and demand

For companies in the West, Asia has served as a factory. First, it was Japan. Then came countries like South Korea, Singapore and Taiwan. Finally, China made its presence felt. In fact, Asian economies have benefitted immensely by being part of global value chains (GVCs). Moreover, as certain countries moved up the value chain over time, others in the region occupied the space left vacant. Data from the Organization of Economic Cooperation and Development's (OECD's) Trade in Value Added (TiVA) database indicate that Asian countries have become ever more integrated with GVCs, thereby pushing up global trade, investments and development.[12]

Within Asia itself, there are now strong production links. For example, Japanese carmakers have hubs in countries like Thailand, China and India. These links have become stronger due to the rapid growth of regional economies, thereby providing large markets to global firms. For example, in 2010, China overtook the United States as the world's largest auto market.[13] Asia is now a key part of the growth strategies of multinational corporations (MNCs), ranging from banks to technology companies. For example, in the financial year ended September 2015, 24.2% of Apple Inc.'s revenues came from China, more than double the share in 2011.[14] When the downturn of 2008–2009 dented Western economies, banks like Standard Chartered were able to escape the worst of the crisis by betting on emerging markets in Asia and Africa.[15]

Given the expected rise in affluence and the numbers of the middle class, Asia's role in global demand is set to increase further **(Figures 2, 3)**.[16] Greater integration within the region (such as the ASEAN Economic Community) and trade agreements with global growth centres (like the Trans-Pacific Partnership) will only add to the lure of the Asian market.

Figure 2. Asia's share in the global middle class population is set to surge over 2009–30



Source: Brookings Institute, OECD, Deloitte Services LP economic analysis.

Graphic: Deloitte University Press | DUPress.com

11 Oxford Economics, Global Economic Databank, November 2015.

12 Akrur Barua, David Gruner, and Sunandan Bandyopadhyay, "Global value chains: More a development strategy than a mere process, " Global Economic Outlook Q4 2015, Deloitte University Press, November 2, 2015, http://dupress.com/articles/global-economic-outlook-q4-2015-global-value-chains/.

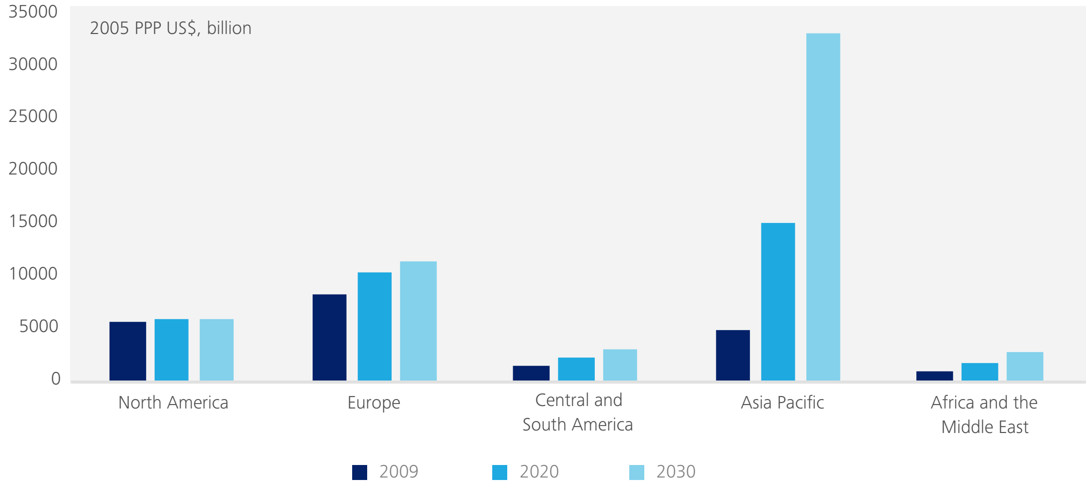
13 Reuters, "Factbox: China becomes the world's number one auto market," January 8, 2010, http://www.reuters.com/article/2010/01/08/us-auto-china-idUSTRE60722O20100108.

14 OneSource, Global Business Browser, November 2015.

15 George Smith Alexander and Anto Antony, "Standard Chartered's unraveling India bet means more pain ahead," Bloomberg, November 17, 2015, http://www.bloomberg.com/news/articles/2015-11-16/standard-chartered-s-unraveling-india-bet-means-more-pain-ahead.

16 Homi Kharas and Geoffrey Gertz, "The new global middle class: A cross-over from west to east," Wolfensohn Center for Development, Brookings Institute, November 2015, http://www.brookings.edu/~/media/research/files/papers/2010/3/china%20middle%20class%20kharas/03_china_middle_class_kharas.pdf; Homi Kharas, "The emerging middle class in developing countries," OECD Development Center, January 2010, http://www.oecd.org/dev/44457738.pdf.

Figure 3. Middle class spending in Asia is poised for sharp growth



Source: Brookings Institute, OECD, Deloitte Services LP economic analysis.

Graphic: Deloitte University Press | DUPress.com

Interestingly, Asia's large contributions to global supply and demand have not benefitted foreign firms alone. Links to GVCs have helped Asian companies attain global centre stage as well. In 2015, there were 190 Asian companies in the list of global Fortune 500 companies, up from 116 in 2001.[17]

Asian hunger for commodities is making a big impact

Asia's influence is arguably the greatest on commodity markets. A few decades ago, demand from the United States was the key driver of oil prices. Not anymore. Surely, the supply of U.S. shale has a key role to play in global oil markets, but equally important is demand from emerging economies, led by China. According to data from the U.S. Energy Information Administration (EIA), the Asia-Oceania region is now the world's leading consumer of petroleum and other liquid fuels.[18]

Increasing demand from Asia has contributed to growth in non-oil commodity-producing nations as well, especially those rich in iron ore, copper and coal. Nowadays, the fortunes of commodity producers such as Brazil, Chile and Indonesia are increasingly dependent on demand from emerging Asian countries, rather than the West alone.

Asia's rush for commodities has also led to rising investments in resource-rich economies in Africa and Latin America. A number of commodity producers are also diversifying away from Western markets to growth centres in Asia. Russia's major oil and gas deal with China in 2014 was as much a strategy to tap new demand sources as it was geopolitical grandstanding with the West.[19] Iran has managed to retain India as a major client despite sanctions, and is aiming to build pipelines between the two countries. Even Gulf Arab countries are pushing hard to preserve and expand market share in Asia.[20]

17 *Fortune, Global 500, November 2015, http://fortune.com/global500/.*

18 *US Energy Information Administration, Short-term energy outlook (Table 3d), November 10, 2015, http://www.eia.gov/forecasts/steo/tables/?tableNumber=30#startcode=1996.*

19 *Akrur Barua, "Russia: To China with love," Global Economic Outlook Q3 2014, Deloitte University Press, July 21, 2014, http://dupress.com/articles/global-economic-outlook-q3-2014-russia/.*

20 *Jacob Gronholt-Pederson, "In oil price war, Gulf producers grab market share in Asia," Reuters, February 6, 2015, http://www.reuters.com/article/2015/02/06/us-asia-gulf-crude-idUSKBN0LA0J720150206#Z3bRwWYMc8KelgLr.97.*

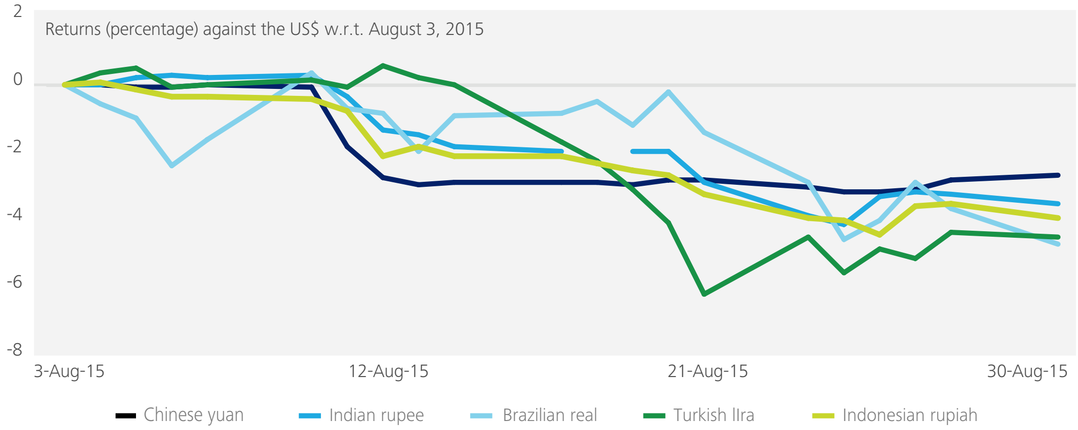
21 *Malcom Scott, "A hard landing in China could shake the world," Bloomberg, November 19, 2015, http://www.bloomberg.com/news/articles/2015-11-19/a-hard-landing-in-china-could-shake-the-world-.*

Rising influence on global financial markets

While Japan and a few affluent nations in Southeast Asia have always been a part of global investors' calculations, there is also a trend of increasing focus on fast-growing emerging economies in Asia. As a result, major global equity, bond and currency markets are more interlinked with Asia now than ever before. This relationship, however, is not a one-way street, where events in the West impact Asia.

Nowadays, movements in Asia have started impacting major markets in the West more profoundly. For example, currency weakness in Asia due to uncertainty over a Fed hike has dented the overseas dollar revenues of U.S. corporations this year, thereby weighing on stock prices. Then again, when the bull run in Chinese stocks ran out of steam in June, the impact was felt across the world. And as the Fed makes its intentions clearer, investor focus has yet again shifted to emerging market growth, especially China.[21] Ironically, within Asia, financial markets have become more interconnected due to growing trade and investment links within the region. When China devalued the yuan in August to free up the currency - a move praised by the International Monetary Fund-it created a flutter among other emerging market currencies, including Asian ones **(Figure 4)**.

Figure 4. Emerging market currencies dipped in August after the yuan was devalued



Source: Haver Analytics, Deloitte Services LP economic analysis.

Graphic: Deloitte University Press | DUPress.com

The need to match expectations with prudent leadership

Rising economic and financial links within the region and outside have ignited much debate on the need for more economic reforms in Asia. For example, China's attempts to develop a domestic demand-driven economy will not bear fruit without financial market reforms. In Japan, structural bottlenecks will not go away without changes in the labour market, agriculture and corporate governance. India's attempt to attract global investments will fail without reforms to the tax regime and easier business conditions. And in South Korea, concentration of economic power in a few firms cannot be remedied without sprucing up small and medium enterprises and entrepreneurship.

Are Asia's policymakers ready to match rhetoric on reforms with action? Are the region's giant emerging economies prepared for global economic leadership through more open and globally integrated financial systems including floating currencies? Will any sudden reforms by one country without information symmetry with global markets lead to short-term vulnerabilities (like the yuan devaluation in August)? Will Asian policymakers be able to broaden their focus to a more global one given the region's rising role in the world economy?

These are only some of the questions that will be asked of Asia's leaders as the region continues to progress. As they lead efforts to set up global development banks, fight climate change and increase their presence in world bodies like the United Nations, Asian countries will have to collaborate more. Only then will Asia's rise be a more credible one, helping to create a more stable world order, both economic and political.

Read the full Asia Pacific Economic Outlook, Q1 2016 on www2.deloitte.com/fsi to learn about the short-term economic prospects of Australia, Indonesia, Singapore and South Korea. For more economic and business research visit Deloitte University Press at www.dupress.com

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