APAC's Transition to "Cashless Societies"

Mobile Payments is Key to a Successful Transition

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FROST & SULLIVAN

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Key Findings

Asia-Pacific's Transition to "Cashless Societies"

1. **Asia-Pacific is transitioning to "Cashless Societies"**
   Different countries are at different stages. Some are front runners, some have just started.

2. **Different approaches are being used to achieve the same goal**
   All countries need to find an approach that works for them as the benefits are common to all.

3. **Mobile Payments is spearheading the transition to Cashless**
   It is likely to be the underlying driver behind Asia-Pacific's successful transition due to the high smartphone penetration in Asia-Pacific.

4. **Removal of cash will aid the transition to Cashless**
   However, this needs to coincide with the availability of alternative solutions such as cards and mobile payments.

5. **A Cashless Australia is likely and as soon as 2022**
   Australia may the 1st country in Asia-Pacific to achieve a true "Cashless Society" status.

Source: Frost & Sullivan

Asia-Pacific’s Transition to “Cashless Societies”

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Asia-Pacific is Transitioning to "Cashless Societies"

Different countries are at different stages. Some are front runners, some have just started

- A "Cashless Society" refers to a society that utilizes e-payment methods such as e-money and debit/credit card, rather than physical cash. By definition, this scenario ideally means 100% use of e-payment.
- Based on recent trends taking place throughout Asia-Pacific, quite clearly the question seems to be not whether a society will become a cashless society rather when it will become a cashless society. As it is, most countries are already working toward going cashless with the eventual goal of transitioning to cashless societies.
- With progress in some countries market driven and some others regulatory driven, a common requirement that cuts across all countries is the fact that getting to 100% will require a concerted regulatory push by local governments.
- Being able to use e-payments most of the time helps the consumer but for a country, getting to 100% means reaping the full benefit of going cashless and eliminating cash completely.
- In the race to become cashless, developed countries such as South Korea and Australia are definite front runners while at the other extreme are countries in the emerging world that have recently embarked on their journey toward cashless with their foray into financial services.
    - Myanmar, for example, has only recently introduced the ATM, debit card, and international card acceptance with CB Bank being the first MasterCard licensee.
    - However, starting late does not translate into slow progress. On the contrary, an increasing number of companies are keen to pay salaries through cards to increase work force efficiency and use of mobile payment applications such as Alipay, WeChat Pay, and Baidu Wallet is increasing rapidly.
    - These same applications are also growing in popularity in Thailand, Vietnam, and Cambodia.

Source: Frost & Sullivan

Different Approaches to Achieve the Same Goal

All countries need to find an approach that works for them as the benefits are common to all

- Regulatory push, local consumer behaviour, and the availability of a ubiquitous payments infrastructure play a role in determining how fast the transition to cashless is going to be. While regulatory push plays an important part, local consumer behaviour takes time to change unless there was an underlying influencing factor or the consumer sees the benefit.
  - In South Korea where credit card usage is the highest world at 89%, the Bank of Korea plans to stop issuing coins by 2020 and currency notes by 2030. In Australia where a strong preference for contactless payments over cash is driving growth in mobile payments, the Australian Payments Clearing Association (APCA) is working on a code of conduct. In both countries a combination of regulatory push and inherent local consumer behaviour is helping to propel their countries towards becoming cashless societies.
  - In countries where credit card terminal rollout costs are not easily recovered through merchant sales such as in Thailand and Vietnam, a strong regulatory push is instrumental in driving the transition. This same strategy, however, will not work in Indonesia and the Philippines where e-money had been widely used until today and credit/debit card penetration is the lowest in the region. In these countries, a national interoperable retail payment system will make use of limited infrastructure to boost e-payments.
- While across Asia-Pacific the approach taken to achieve a cashless society may not necessarily be the same, a common theme is the fact that each country has to find an approach that works for them as the benefits of a cashless society are common to all.
  - Directly, it eases monetary policy and reduces cash handling costs.
  - Indirectly, it tackles counterfeiting and reduces use of cash in the black economy and for funding of illegal activities.

Source: Frost & Sullivan

Mobile Payments is Spearheading the Transition to Cashless

It is likely to be the underlying driver behind Asia-Pacific's successful transition

- Asia-Pacific's decided transition to and/or consistent progress toward a cashless society will directly benefit the mobile payments market.
    - More specifically, the top down regulatory push toward cashless societies will spur the $71.92 billion mobile payments market in Asia-Pacific (excluding China and India) to grow exponentially to reach $271.47 billion by 2021.
    - The number of active customers will also double to 130.8 million users.
- As smartphone penetration in Asia-Pacific is the highest in the world, Asia-Pacific's lead in mobile payment developments is likely to be the underlying driver behind its successful transition to cashless societies.
    - Apple, Samsung, and Google with Apple Pay, Samsung Pay and Android Pay having addressed existing security concerns through tokenization in the payment infrastructure, supplemented by biometrics on the smartphone.
    - With the impending onset of standardization such as work on a code of conduct by APCA in Australia, FinTech regulation, for example, in Malaysia and Singapore, and increasing openness of banks toward FinTech, competition is intensifying for the entire supply-side ecosystem.

ImageSource: http://www.straitstimes.com/

Source: Frost & Sullivan

The Road to Cashless is Fraught with Difficulty

Failure to replicate the physical wallet and the availability of cash will slow down the transition

- As the main objective of going cashless is to save cost, the end solution should be cost efficient.
  - It does not make sense for the emerging world to start issuing cards, especially if the consumers in these countries are not used to cards and cash out their money even if paid through cards.
  - It also does not make sense for the developed and developing world to continue issuing cards as card issuance costs grows proportionately.
  - In fact, the concept of going cardless is not new to banks. Samsung already offers a mobile card service in South Korea that issues credit cards for Korean issuers through Samsung Pay.
- A cost effective solution in Asia-Pacific with the highest mobile phone penetration in the world should be an app.
  - However, the problem with the mobile phone as a form factor today is the lack of user interface and payment flow standardization, the need for additional security features such as tokenization and biometrics authentication, and effective resolution of data privacy issues.
  - Above all, it does not replicate the physical wallet.
- What we are seeing today is the road toward cashless societies. While it is widely acknowledged that the transition toward cashless is finally making progress, cash looks set to be around for quite a while longer.
  - In Singapore, despite the availability a mature payments infrastructure, only Apple Pay seems to have made headway. The recent launch of soCash with its cash withdrawal service further backs local belief that cash will be around for at least another 10-15 years. This is where the Singapore government can do more in transitioning Singapore toward a cashless society sooner.

Source: Frost & Sullivan

Removal of Cash Will Aid the Transition to Cashless

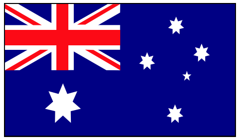
But before this is executed, there is need to ensure an alternative solution is available

- To accelerate the transition to 100% cashless, local governments should consider removing currency notes from circulation as this is the most effective means of going cashless.
  - South Korea was the first to announce that the Bank of Korea plans to stop issuing coins by 2020 and currency notes by 2030.
  - This was followed by the Indian government making a bold, immediate move to withdraw high value rupee notes from circulation and subsidise the use of cashless payment methods.
  - Both countries had considered the need for alternative solutions, for example, cards and digital/mobile payments, to cash prior to execution of their plan. Indian service providers Paytm and MobiKwik recorded increases of 200-250% in usage of digital/mobile payments shortly after implementation.
- Other measures that can be undertaken include:
  - Local governments can offer tax benefits as incentive to use cashless payment methods and increasing costs for cash handlers.
  - Regulators can lead standardization efforts that bring banks and Fintech solution providers together to work holistically towards meeting the needs and expectations of the consumer through smartphones. Plans should include use of low cost terminals and mPOS, catering for small merchants and reaching areas outside of major towns and city centres that have traditionally been cash based.
  - Governments can lead the incorporation of identification into the mobile phone and can encourage use of solutions on all mobile phones, for example, by offering tax free NFC mobile phones and encouraging use of QR code as an alternative.
- Ultimately, the focus now should shift to mobile payments in order to build a 100% cashless future across Asia-Pacific.

Source: Frost & Sullivan

Case Study – A Cashless Australia by 2022

Australia may be the 1st country in Asia-Pacific to achieve a true "Cashless Society"



- Australia is uniquely positioned to be a world leader in mobile payment developments with a technology savvy population, availability of contactless infrastructure and high smartphone penetration at 74% among adults. MasterCard estimates that Australia has all the factors in place for a substantial move away from cash and Westpac analysts are predicting an entirely cashless Australia by 2022.
- Although progress to date has mainly been market driven, the supporting regulatory push factor is starting to come together for the critical last push toward 100% cashless.
    - For Australia, the cash economy results tax revenue losses of at least AUD 3.3 billion if not more. If recovered, this money could go toward essential public services. It is for this reason that the Australian government has recently announced the formation of a task force to study the role of cash in the "black" economy.
    - This task force will also study the ramifications of deliberate phasing out of AUD 50 and AUD 100 bills, which make up 93% of Australian physical currency. This move will address tax evasion and crime as well as spur the transition to digital/mobile payments. It will be the perfect driver for mobile payments already operating below the cap at AUD 100.
    - Moreover, Australia's planned removal of surcharging as early as June 1, 2017, and implementation of the real time New Payments Platform (NPP) to simplify money transfers targeting introduction in 2H 2017, will further reduce cash payments. These factors combined will see the AUD 3 billion ($2.08 billion) mobile payments market in Australia grow exponentially to reach AUD 17.71 billion ($12.28 billion) by 2021. The number of active users too will double to 5.5 million users.

Source: Frost & Sullivan

Case Study – A Cashless Australia by 2022 (continued)

Australia may be the 1st country in Asia Pacific to achieve a true "Cashless Society"

- Locally, a strong preference for contactless payment over cash is behind Australia's worldwide lead in contactless payments. The underlying influencing factors for this local preference were the fact that credit card was a key payment method in Australia and that Australians were already used to paying for food and drink using their credit/debit cards every day.
- The introduction of contactless payments effectively made the user experience faster, easier and more convenient. Since then, ubiquitous contactless payments facilities beyond just retail e.g. for public transport tickets, parking meters, roads tolls and so on, and the complementary cashless facilities such as cardless ATM withdrawals using smartphones, have made going cashless a conscious choice and a part of everyday life in Australia.
- However, there is still work to be done to arrive at a comprehensive solution for Australia to transition to. To really work, the solution has to replace the physical wallet and offer a seamless user experience. Moreover, as past regulatory measures have been successful in changing consumer behaviour, the Australian governments should also consider tax benefits as incentive to use cashless payment and increasing costs for cash handlers.
- Industry bodies and regulators can lead standardization efforts that work toward meeting the needs and expectations of the consumer holistically through smartphones. Plans should include use of low cost terminal solutions and mPOS, catering for small merchants and reaching areas outside of major towns and city centres that have traditionally cash based.
- The government can even go a step further and lead the incorporation of identification into the smartphone and can encourage use of solutions on all smartphones such as by offering tax free NFC smartphones and encouraging use of QR code as an alternative. Ultimately, the focus now should shift to mobile payments in order to build a 100% cashless future.
- With Australia's track record of taking pro-active measures, there is a high chance it could be amongst the first in the world to achieve a true cashless society.

Source: Frost & Sullivan

Forecasts and Trends—Total Market

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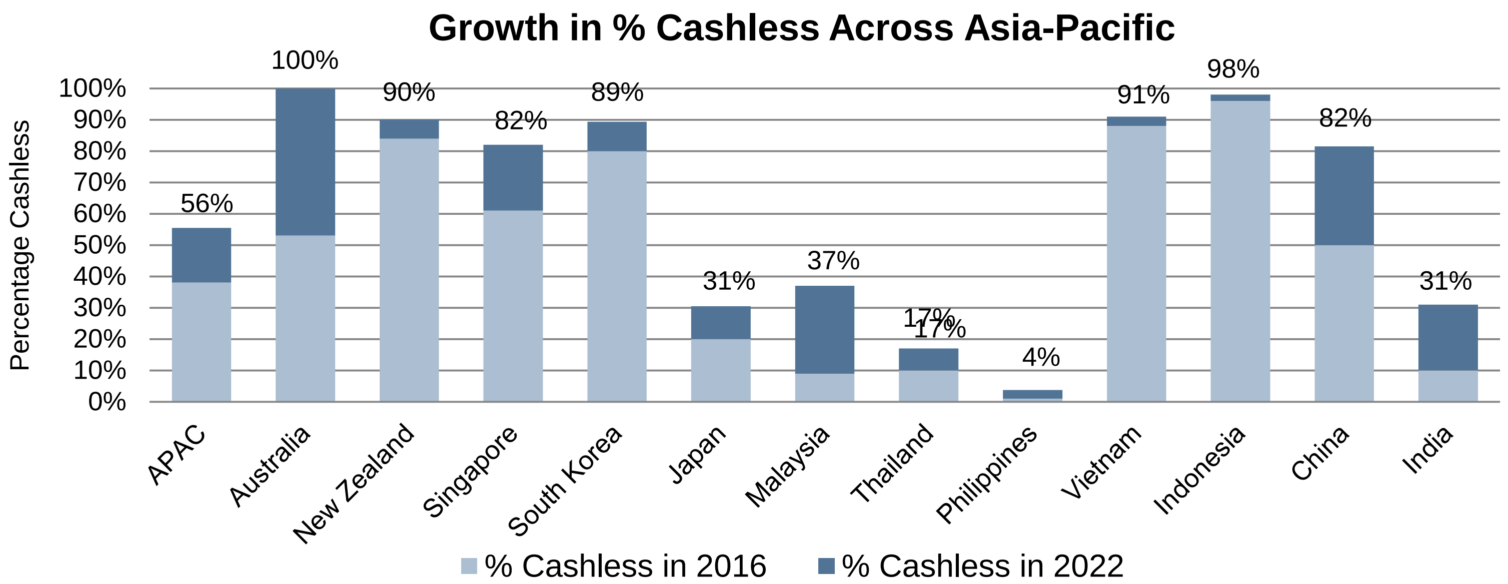
Asia-Pacific Countries to be 56% cashless by 2022

Regulatory push through policy is driving the cashless transformation across Asia-Pacific



Note: Percentages are based on volume with exception of Vietnam and Thailand which is based on value

- Australia may be the 1st country in Asia-Pacific to achieve a true "Cashless Society". A key assumption leading to this forecast is the phasing out of AUD 50 and AUD 100 bills.
- Bold policy moves in populous countries such as China and India, will result in Asia-Pacific countries being 56% cashless by 2022.
- Leading the cashless transformation within Asia-Pacific are high income nations with the exception of Malaysia and China. The road toward cashless societies will take longer for Thailand, the Philippines, Vietnam, and Indonesia due to their much lower GDP per capita, as studies have shown there to be a strong linkage between GDP per capita and e-payment readiness.

Conclusion

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Key Takeaways

1 There needs to be realization that 100% cashless societies are looming in Asia-Pacific. Different countries are at different stages of the transition, but all governments need to realize that the final critical push to 100% cashless is within their purview and that mobile payments will be key to a successful transition to a truly "Cashless Society".

2 There is still a lot of work ahead, especially in replicating physical wallets and offering a truly seamless user experience. Payments has to be facilitated virtually everywhere, that is from toilets to trolleys, and the e-wallet needs to cope with loyalty, receipts and identification. Some areas not yet thought of needs a closer look. For example, if there will no longer be cash, there needs to be solutions for foreign exchange, payments by tourists and the older generation as well as donations to the homeless.

Source: Frost & Sullivan

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The Journey to Visionary Innovation

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The Frost & Sullivan Story

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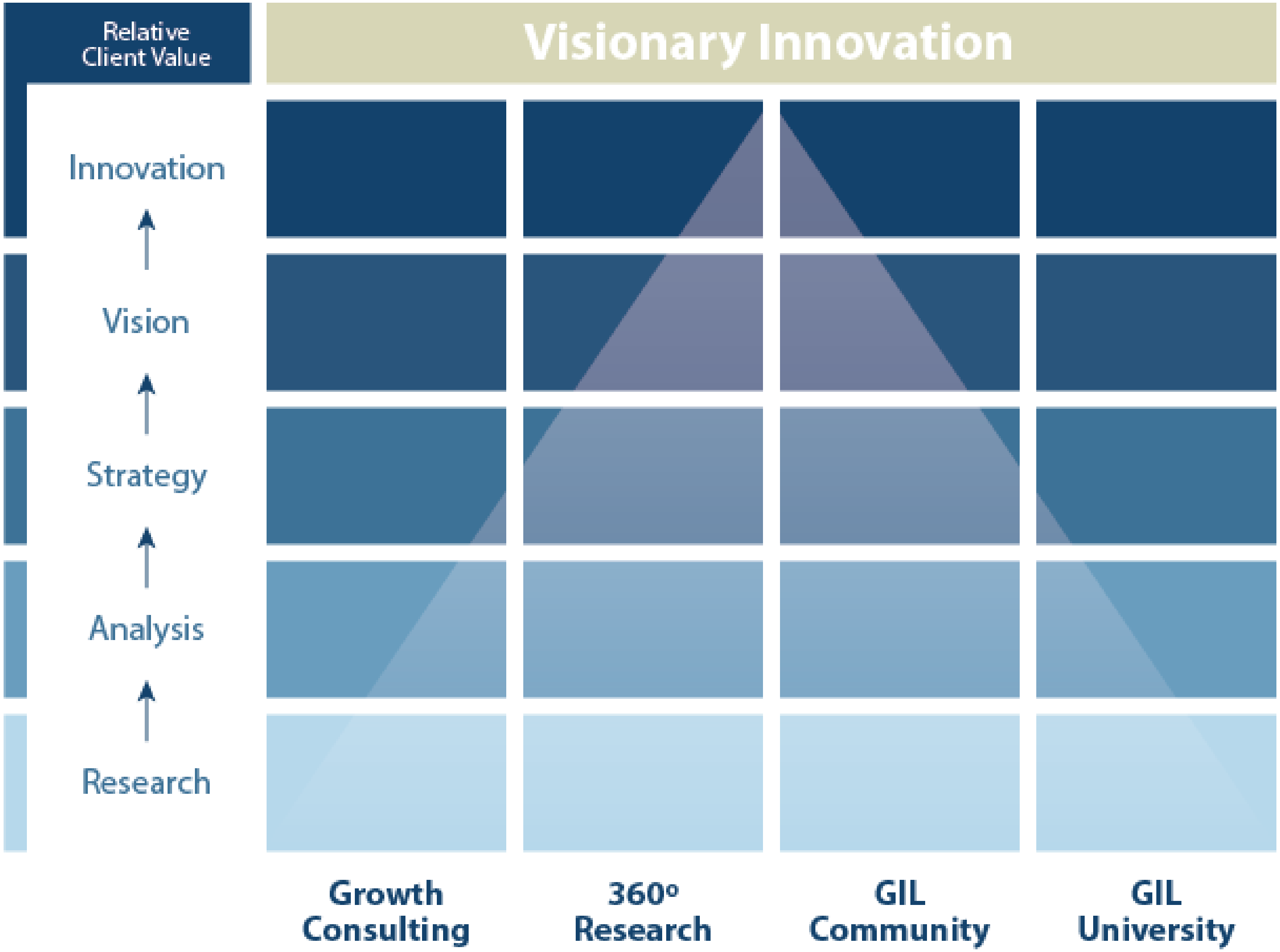
Our 4 Services Drive Each Level of Relative Client Value



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