An Electronic Payments Society

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Distinguished guests, ladies and gentlemen, good morning.

Singapore has embarked on a journey to become a Smart Nation.

• We want to embrace innovation and harness technology so as to increase the productivity of our businesses and enhance the welfare of our citizens.

The financial services sector is well placed to play a leading role in the Smart Nation project. MAS has been partnering the financial industry to create a *Smart Financial Centre*, where innovation is pervasive and FinTech is used widely. We want to do this to:

- increase efficiency;
- manage risks better;
- create new opportunities; and
- improve people's lives.

A key component of the FinTech agenda is payments.

- All of us as consumers, employees, or businesses use payments.
- Payments impacts every sector of the economy
- So, getting payments right is important; and we need to get it right for the future.

That future is *digital* and *mobile*, and it is already here.

- Our wallets are overflowing with cards of every type and form. We can dip them, tap them, and now, add them to our mobile phones.
- All the major mobile wallets Apple Pay, Android Pay, Samsung Pay are available in Singapore.
- They can be used at any merchant that accepts contactless Visa, MasterCard, or American Express payments.

Our banks have been active in payments innovation, with several home grown mobile payments apps.

• DBS has PayLah! and Standard Chartered has Dash.

- These pioneering apps allow users to easily pay friends and businesses that use the same app.
- And the newer apps can do even more.
 - ➤ OCBC's *Pay Anyone* allows customers to send money to friends in Singapore, using only their mobile number, Facebook ID, or email address.
 - ➤ UOB has created *UOB Mighty*, an all-in-one mobile banking app and wallet similar to Android Pay.

But the rest of the world has not been standing still. China, for instance, has been a hotbed for payments innovation.

- WeChat integrates social media and payments to let users make seamless peer-topeer payments, shop online, and even pay at physical merchants.
- These solutions have made themselves an indispensable part of their users' daily lives.

So, while there has been quite a bit of payments innovation in Singapore, our payments experience needs to be as good as the best we see globally.

Our vision is to make Singapore an electronic payments society. A society:

- that spurs continuous innovation in payments technology;
- that gives consumers maximum convenience and confidence in making payments;
- that enables firms to increase productivity through payments integrated with business processes; and
- where swift, simple, and secure payments is a reality for everyone.

MAS has been working closely with the financial industry and other government agencies to drive electronic payments. We have also engaged KPMG Advisory to study Singapore's payments landscape; KPMG's report will be released later today.

Let me elaborate on the four key strategies to create an e-payments society:

- streamlined regulation;
 - inclusive governance;
 - interoperable infrastructure; and
 - pervasive digitisation.

Streamlined Regulation – Targeted, Activity Based, Risk Appropriate

First, we will streamline our regulatory framework for payments; strengthen consumer protection; and make regulation more targeted based on the specific payment activities that businesses undertake.

The existing regulatory framework for payments cuts across the Money-Changing and Remittance Businesses Act ("MCRBA") and the Payment Systems (Oversight) Act ("PS(O)A").

The MCRBA was introduced in 1979, an era when bricks-and-mortar money changers and remittance agents were the norm.

- For more than three decades, it has served us well.
- We have a thriving remittance industry that provides an essential service to residents, including the many foreign workers in Singapore.

The PS(O)A was enacted in 2006, with the objective of keeping our key payment systems safe and efficient.

- The PS(O)A also protects customer funds held in widely-accepted stored value facilities such as the Ez-Link and NETS FlashPay cards that commuters on public transportation use every day.
- Thanks to the PS(O)A, our key payment systems continue to operate safely and efficiently.

But FinTech is changing the face of payments.

- Every month, MAS meets many FinTech firms that do not fit neatly into categories like remittance or stored value.
- Most internet-based stored value wallets today would be regulated under both the MCRBA and PS(O)A.
- It is not efficient for companies to be regulated under two pieces of legislation, which were not written with the FinTech solutions of today in mind.

The nature of risk in the payments ecosystem is also changing.

- The current regulatory regime aims to ensure financial stability, protect stored values, and prevent money laundering and counter the financing of terrorism.
- But with the proliferation of innovative e-payment solutions and the rise of e-commerce, payment firms have become more enticing targets for cyber criminals.

MAS will therefore update its regulatory framework.

- We will streamline the MCRBA and PS(O)A to create a single piece of legislation governing both traditional and innovative payment companies.
- We will enhance the provisions for consumer protection and strengthen cyber security requirements.
- We will make regulation modular and activity-based, so that firms need to meet only those regulations pertinent to the specific payment activities they undertake, rather than the full gamut of payments regulations.

What will this new framework mean?

- Providers of payment services will require only one licence to conduct multiple payment activities.
- Users of payment services consumers or businesses can take more comfort that their financial information is safe from the threat of cyber-attacks and theft.

Inclusive Governance – A Payments Council

Second key strategy: we will put in place an inclusive governance framework that brings together different stakeholders to guide the development of Singapore's payments landscape in a coherent way.

Specifically, MAS is considering the formation of a broad-based Payments Council that will include senior representation from both providers and users of payments systems.

The Council will help to align payment initiatives with national strategies and public interest. Specifically, this means to:

- develop common payments infrastructure;
- promote open access and inter-operability in payments solutions;
- enhance the quality of payments systems through the adoption of relevant standards and best practices; and
- make electronic payments accessible to all.

MAS will put out next week for public consultation, proposals for updating our payments regulatory framework and forming a Payments Council.

Inter-operable Infrastructure

The third strategy for an e-payments society is a payment infrastructure that is interoperable, that will enable swift, simple, and secure electronic payments for everyone.

We are starting from a good position.

- To quote the KPMG report on Singapore's payment landscape, "the underlying infrastructure is world-class"
- And Singapore has one of the highest smartphone penetration rates in the world and wireless internet access is pervasive.

Yet, our payments preferences remain largely paper-based: cash and cheques.

- For consumers, the use of cash for daily payments is high.
- For businesses, the use of cheques is relatively high.

As pointed out by the KPMG report, "consumer payments in Singapore are unique among highly developed economies".

- Cash in circulation in Singapore is 8.8% of GDP, compared to 4.4% in Australia and 2.12% in Sweden.
- 12.7 cheques per person were written in Singapore in 2014, compared to 7.1 in Australia.

• In Sweden, the total number of cheques issued is so small that it is effectively zero on a per person basis!

The economic cost of this heavy reliance on cash and cheques is not trivial.

- Our studies, conducted together with KPMG, estimate that the social costs¹ of cash and cheques is around 0.5% of GDP, or about S\$2 billion per year.
- A good part of these costs can be attributed to the cost of securing cash, both in transit and in storage, and processing cheques.

The encouraging thing is that a growing number of our consumers and businesses would like to move towards e-payments.

- The infrastructure is there.
- But we need to make the payment experience seamless and convenient before adoption can take off.

Let me highlight the key infrastructure initiatives:

- promote online fund transfers;
- simplify acceptance of card payments at retail outlets;
- facilitate online payment of bills; and
- enable mobile payments for public transport.

Online Fund Transfers – FAST and Central Addressing

As I mentioned earlier, we have a world-class infrastructure for electronic fund transfers.

- In 2014, Singapore became one of the first countries in the world to build a 24/7, real-time inter-bank fund transfer system.
- We call it FAST; Fast and Secure Transfers.

FAST is almost as convenient as cash, but safer and cheaper.

- You can make a payment securely from your computer or mobile device at any time of the day.
 - You can receive confirmation of payment within seconds.
 - If you are a company, near-instant payment and confirmation round-the-clock makes a huge difference to cashflow management.

But FAST is grossly under-utilised. One key barrier is that making a payment through FAST requires you to know the bank account number of the person you are sending money to.

¹ Social costs include costs incurred by banks, infrastructure providers, and merchants in using the payment systems, such as IT costs, manpower, etc., but do not include fees paid to other parties in the payments landscape. e.g. merchant acquiring fees paid by merchants to banks would be netted off when considering the entire payment landscape as a whole

• Most of us, I think, do not remember our own bank account numbers, let alone will know the account numbers of those we want to send money to.

The Association of Banks in Singapore, or ABS, is therefore developing a *Central Addressing Scheme (or CAS)*.

- CAS will allow payments to be made through FAST using only a recipient's mobile number, or NRIC number, or Unique Entity Number.
- The industry is also working to provide a seamless and common user interface for making FAST transfers regardless of the customer's bank.
- If all goes well, by this time next year, we will no longer need to remember bank account numbers for a majority of our electronic fund transfers.

A second key barrier to using FAST is cost.

- SMEs have told us that some banks can charge up to \$10 for fund transfers using FAST. But they offer free cheque payments every month!
- This is surprising. Our own studies indicate that the marginal cost of e-payments, including FAST funds transfers, should be far lower than that of cheques.
- Cheque processing is a resource intensive operation that is far from costless.
- Banks should not be reluctant to accurately reflect the true marginal cost of their various payment instruments.

Acceptance of Card Payments – Unified Point-of-Sale Terminals (UPOS)

Debit and credit cards are widely used by Singaporeans but the experience at the acceptance points in our retail outlets and restaurants needs to be enhanced.

- Not all cards can be used everywhere, and we often have to ask merchants if our card of choice is accepted.
- A common sight in Singapore stores is the array of multiple point-of-sale terminals cluttering up cashiers' counters. This is confusing for customers and unproductive for counter staff.

The ABS has tapped on the payments industry to develop a unified point-of-sale terminal or UPOS, which can accept all major card brands, including those that are contactless or embedded in smartphones. UPOS terminals are already being rolled out.

- About 1,000 of them have been deployed at convenience stores such as 7-Eleven and other retailers.
- Another 10,000 are expected to follow over the next two years.
- Large supermarket chains, such as Cold Storage, FairPrice, and Sheng Shiong are also piloting and gradually deploying these UPOS terminals.

Online Payment of Bills – Seamless Payments and Collections

Payment of bills in Singapore needs to be made less cumbersome. The future should be one where we can securely and seamlessly pay our bills online, without having to:

- fill in our card details for the umpteenth time; or
- fill out lengthy paper-based GIRO forms to authorise standing payment instructions which take weeks to be approved.

Our vision is to create a bill payment experience where consumers and businesses can:

- electronically apply for GIRO bill payments;
- seamlessly pay bills via a 'request for payment' function that leverages off FAST fund transfers without needing to bank with the same bank as the biller; and
- manage their standing payment instructions online or on their mobile phones.

MAS is working with the banks and the payments industry to create seamless bill payments and collections.

Mobile Payments for Public Transport – Account-Based Ticketing

The way we pay for public transport is also due for a refresh. The Land Transport Authority has recently announced that by the end of this year, it will be conducting a pilot for its Account-Based Ticketing System.

- This system will allow commuters to use their existing contactless credit and debit cards to pay for train and bus rides.
- No longer will users have to queue to top-up their stored value transit cards.
- Users will even be able to use their mobile wallets to pay for public transport.

An Account-Based Ticketing System will bring Singapore in line with other cities with world-class public transport payment infrastructure such as London.

Pervasive Digitisation - Maximising Productivity Gains from E-Payments

The fourth strategy is to help businesses to digitise their processes and integrate them with electronic payments solutions, so as to maximise productivity and efficiency gains.

Minister Iswaran spoke yesterday about how government agencies are working with SMEs to help digitise their business processes and take advantage of e-payments. I need not elaborate.

I will just give an example.

- It often does not make sense, especially for an SME, to adopt an e-payment solution or platform but continue to use paper invoices.
- Reconciliation of paper invoices with e-payments becomes a challenge, and the potential efficiency gains from e-payments will remain elusive.

• Only if the business processes from front-to-back are all digitised and integrated with e-payments, will it make commercial sense and raise productivity.

Conclusion

Let me conclude.

This is a conference on FinTech and financial inclusion. Of all the developments in FinTech, it is in payments where the gains in financial inclusion are potentially strongest – for the simple reason that we all need to use payment services to participate in the economy and society.

As we proceed along our path towards becoming an e-payments society, the way we live and work will change.

- Diners will pay for dinner seamlessly and securely with a mobile phone.
- Parents will send pocket money to their children via an app.
- Young couples will make the down-payment for their HDB flats on their tablets using FAST
- SMEs will use electronic inventory management platforms to make and receive payments.

An e-payments society will be inclusive, innovative, and perhaps, even inspiring.

Thank you.

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