PhillipCapital

US Debts

Debt ceiling and the impact of an interest rate hike

MACRO | STRATEGY | US TREASURY

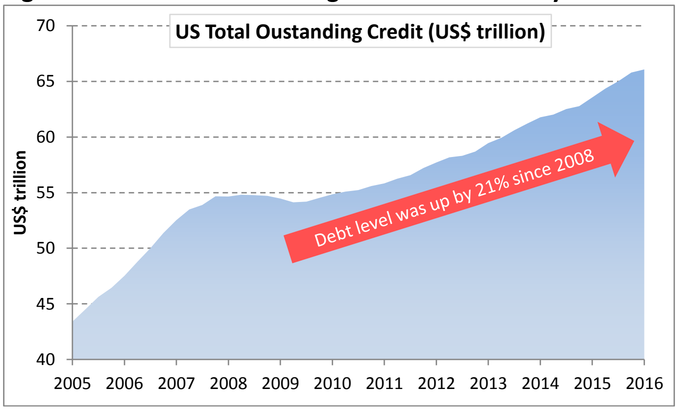
28 March 2017

Background of U.S. Debt

The United States of America (U.S.) holds the largest amount of debt in the world. This should not be a surprise since U.S. is also the country with the largest Gross Domestic Product (GDP). However, what is startling is its rate of growth of its debt as compared to its GDP growth.

Since the Global Financial Crisis (GFC), U.S. as a country have not deleveraged as most of us would have expected. In fact total outstanding credit have increased by c21% from the high of US$55 trillion in 2008, to US$66 trillion at the end of 2016. During the same period of time, U.S. real GDP grew a little over 15%.

Figure 1: US Total Outstanding Credit ballooned by 21% since 2008

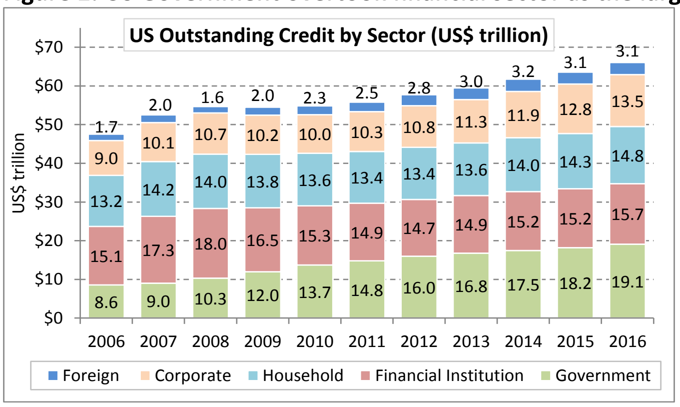


Source: U.S. Federal Reserve

U.S. Government taking up the credit binge

To have a better understanding of the debt growth, we breakdown the total outstanding credit by sectors. The main sectors are government, financial institutions, corporates, household and foreign. Looking at the breakdown of the debt, it is clear that the U.S. Government took on a huge amount of debt after 2008. At the end of 2008, the U.S. Government held an approximate 19% of the total credit outstanding. However by the end of 2016, the U.S. Government accounts for approximately 29% of the total credit.

Figure 2: US Government overtook financial sector as the largest debtor



Source: U.S. Federal Reserve, PSR

Tradeable Instrument

Securities:

- GLD US$ ETF (SGX:O87)

Unit Trust:

- UOB United Gold & Gen Fd
- FTIF Franklin Gold and Precious Metals Fd A (Acc) SGD
- Deutsche Noor Precious Metals Securities Fund Class J - SGD
- Deutsche Noor Precious Metals Securities Fund Class A - USD
- BlackRock World Gold H A2 EUR (LU0326422689)
- BlackRock World Gold Fd A2 (Acc) USD (LU0055631609)
- BlackRock World Gold Fd A2 (Acc) SGD H (LU0368265764)
- Schroder ISF Glb Gold Fd A Acc USD
- Schroder ISF Glb Gold Fd A Acc SGD Hedged
- BlackRock World Gold A2 EUR (LU0171305526)

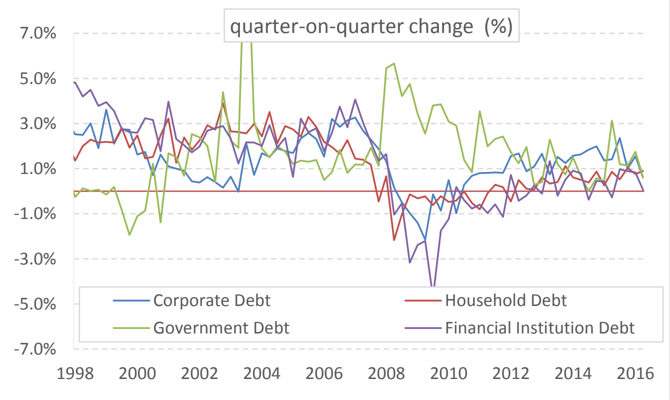
Pei Sai Teng (+65 6212 1856)
Investment Analyst
peist@phillip.com.sg

MCI (P) 076/10/2015
Ref. No.: SG2017_065

The increase in U.S. Government debt was largely due to the huge amount of funding needed to stabilised the economy during the aftermath of GFC. At the depth of GFC, the liquidity crunch within the financial system has forced household, corporates and financial sectors to deleverage. In order to maintain the integrity of the financial system and prevent the economy from going into a depression, the U.S. Treasury department, together with the Federal Reserve (Fed), took extra-ordinary measure to inject liquidity into the system via Quantitative Easing (QE).

In Figure 3, which shows the quarter-on-quarter changes in outstanding debt, depict clearly that as household, corporate and financial institutions deleveraged in late 2008, U.S. Government increase their outstanding debt by issuing more U.S. Treasuries.

Figure 3: Government levered up when all other sector deleveraged

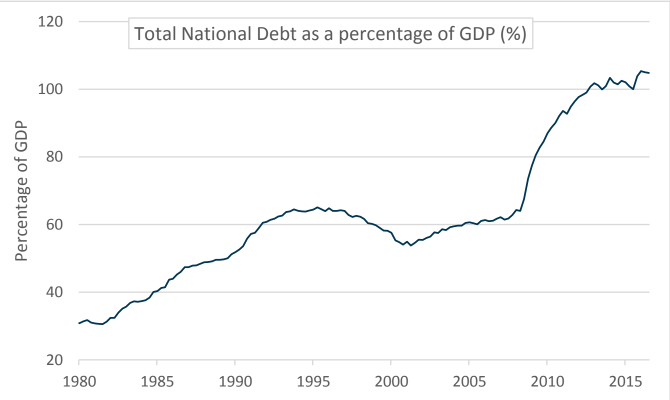


Source: U.S. Federal Reserve, PSR

U.S. National Debt Growth

U.S, Government debt, also referred to as the National Debt grew to US$19.9 trillion as at 15 March 2017. This brings the national debt over GDP to well over 105%. The U.S government has never been this leveraged before.

Figure 4: Outstanding National Debt over GDP



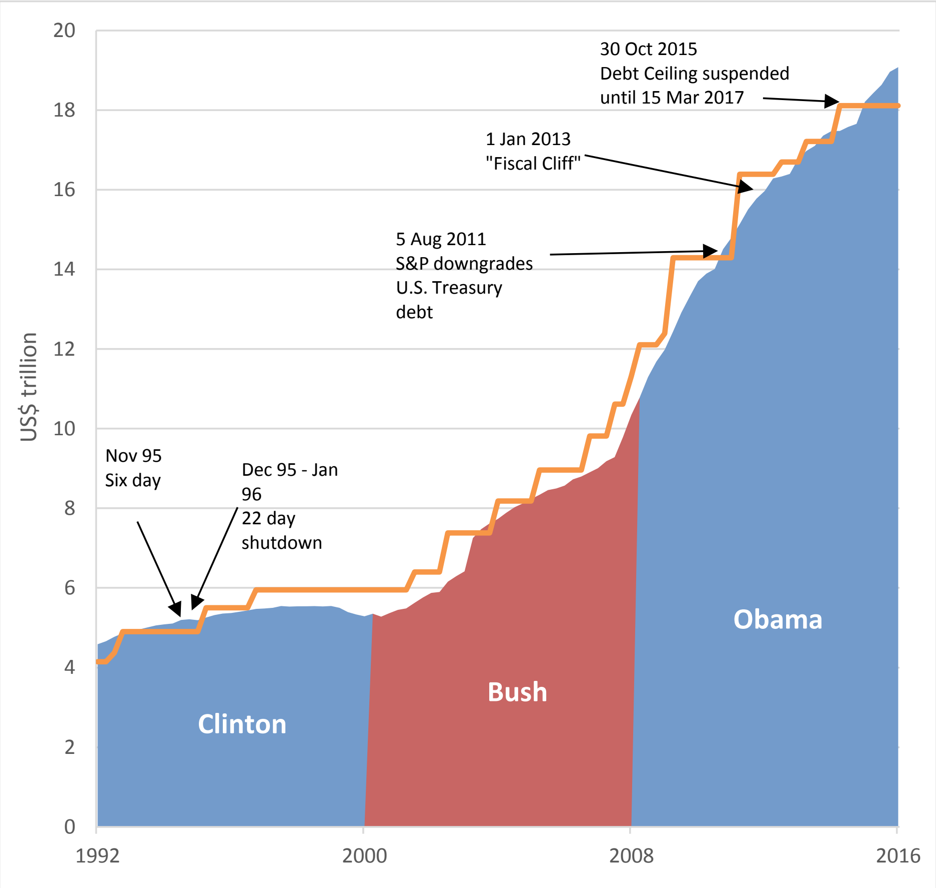
Source: St Louis Federal Reserve

U.S. Debt Ceiling

Under the eight years of Obama's administration, the nation debt grew 69% from US$11.3 trillion. During the eight years, Obama struggled to pull-off any meaning bipartisan agreement with regards to the national debt. Without a full control of the government by Democratic Party, Obama and his administration was constantly at the losing end of any debt negotiation. His regime oversaw the downgrade of U.S. Treasuries by S&P in August 2011 and a Fiscal Impasse in January 2013. This ultimately led to the government shutting down for 16 days between the period of 1 October to 16 October 2013.

A bipartisan agreement was final passed by congress in November 2015. The ***Bipartisan Budget Act of 2015*** will essentially suspend the debt ceiling through till 15 March 2017. On 16 March 2017 the limit will reset to reflect the cumulative borrowing as of then. The new ceiling is estimated to be at US$ 19.85 trillion.

Figure 5: Outstanding National Debt under different presidents



Source: US Federal Reserve, PSR

Current Situation

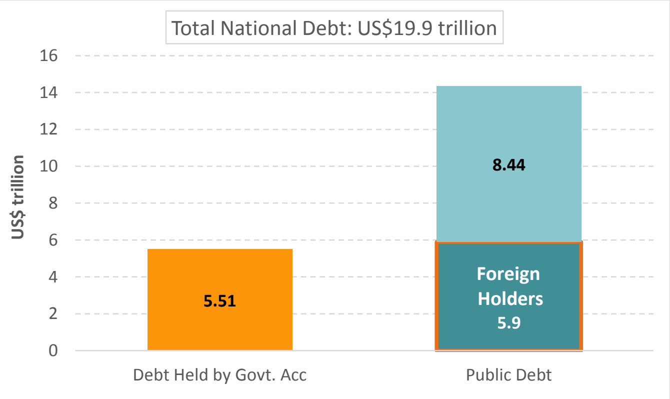
Earlier in March 2017, U.S. Secretary of Treasury, Steven Mnuchin, addressed a letter to Congress, on the event and actions related to the debt limit. In the letter, the secretary announce the use of extraordinary measures to temporaily prevent the United States from defaulting on its obligations. Additional extraordinary measures will be taken unitl the debt limit is either raised or suspended.

According to the Congressional Budget Office (CBO), the measures are projected to be exhausted in the Fall of 2017 (September to November), though an earlier or later date is possible.

Default Risk

In the event of default, the repercussion will be huge as U.S. Treasuries are one of the most widely held securities in the world. 41% of the US treasuries available to the public are held by foreign investors.

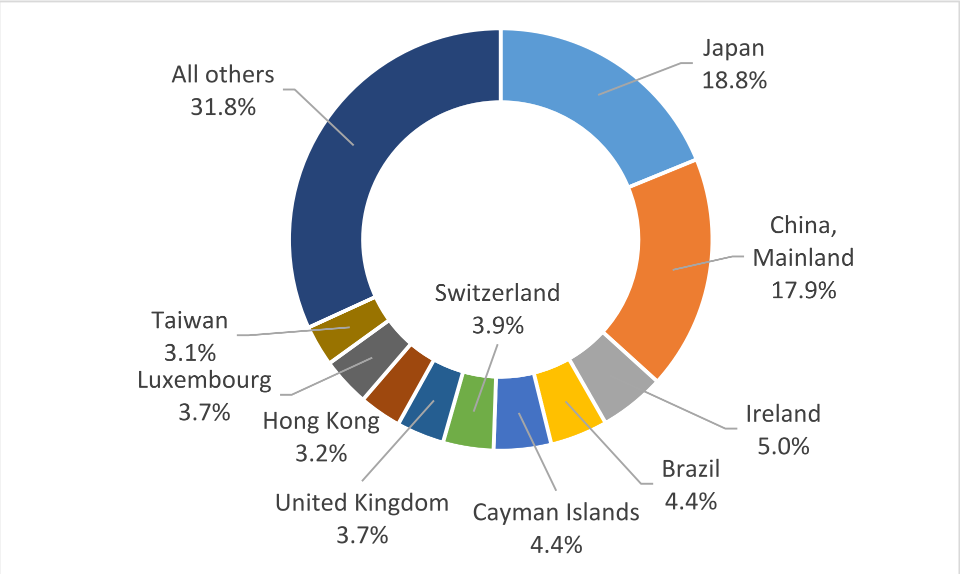
Figure 6: US$14.4 trillion of public debt is at risk in the event of a default



Source: U.S. Treasury Department

As at end of January 2017, Japan is the largest foreign holder of U.S. Treasuries surpassing China, which has tapered their holding of U.S. Treasuries since the start of 2016.

Figure 7: Major Foreign Holders of U.S. Treasuries



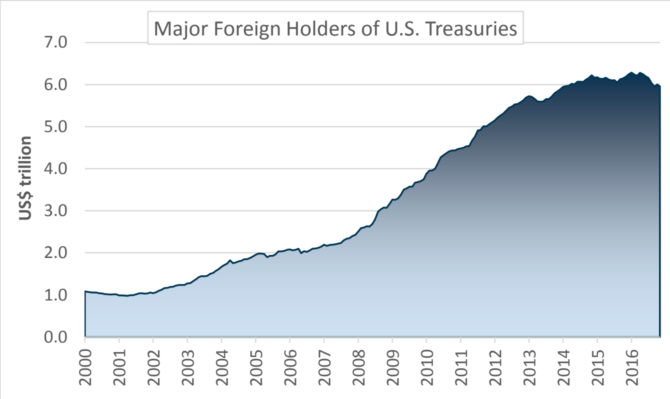
Source: U.S. Treasury Department

Trend of Major Foreign Holders of Treasuries

A study of the major foreign holders shows a significant change in the trend for the foreign holders. Debt held by foreigner peaked in March 2016 at US$ 6.3 trillion and has decrease since then.

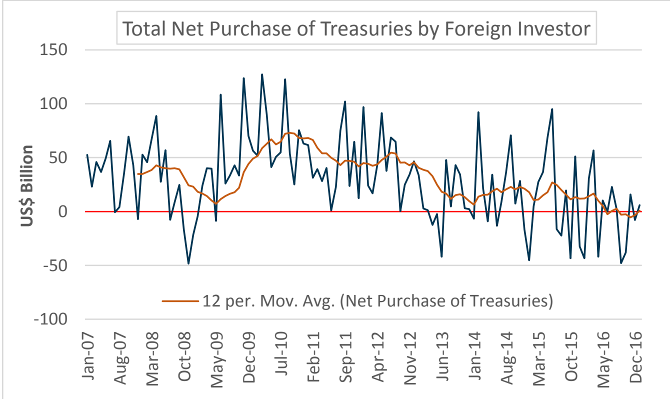
Net purchase of U.S. Treasuries also reinforced the notion that foreign holders are decreasing their holding of U.S. debts. We interpret this as a weakening confidence of the U.S. credibility by foreign investors.

Figure 8: Major Foreign Holders of U.S. Treasuries has plateaued



Source: U.S. Treasury Department

Figure 9: Net Purchase has been trending down



Source: U.S. Treasury Department

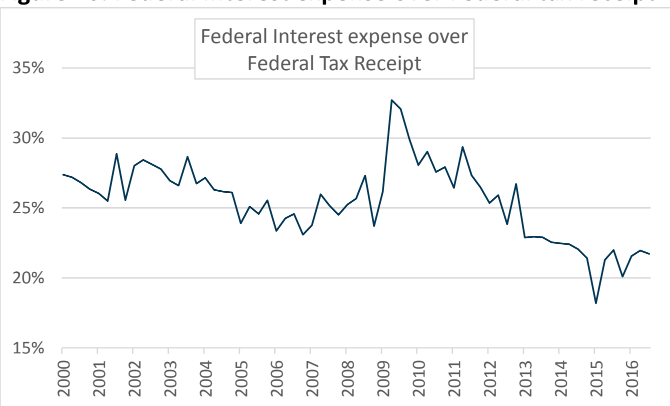
Impact of Federal Reserve Rate Hike

To further complicate the situation, the Fed raise its targeted interest rate by another 0.25 percentage point to 1 percent on 15 March 2017. This was the second consecutive rate hike since December 2016 and we believe that the Fed will stick to the rate hike cycle as we discussed in an earlier report.

The rate hike in March was considered a "dovish" hike as the Fed reiterate their view of just two more rate hikes this year. This is contrarian to the view of the market as most participants was expecting more than two hikes.

As with all debts, an increase in increase rate will put pressure on the interest expense burden of the U.S. Government. Although current interest expense is only at 22% of tax receipt, we could see the downward trend reversing after reaching a low in 2015. This is consistent with the Fed first interest rate increase in 2015. As we expect the interest rate to continue increasing, interest expense as a percentage of tax receipt will continue to increase as well.

Figure 10: Federal Interest expense over Federal tax receipt



Source: St Louis Federal Reserve

Conclusion

The United States is currently at an unprecedented level of debt. In rising interest rate environment, U.S. government will feel the pressure on its interest payment. However, a default at this point is unlikely as the ratio of interest payment to tax receipts is still at a sustainable level of 22%.

As long as the U.S. Treasury is allowed to issue more Treasuries once the debt ceiling is lifted, the U.S. fiat monetary system will continue to accumulate more debt in a bid to achieve higher growth rate.

The even increasing indebtedness of the U.S. government have not gone unnoticed. Major foreign holders of U.S. treasuries have taken the initiative to reduce their holding of U.S. treasuries.

We believe that as investors move away from U.S. treasuries, they were still seek to invest in similar safe haven asset. We believe the recent increase in gold purchase by central banks of some of the world's largest economies is not a coincidence. Gold is an alternative asset as a reserve currencies for most central banks. In an event of a failure of the fiat currency system, a return to gold standard or a standard which involve gold is highly possible.

Please refer to the following report "shining bright like a diamond" for a more detailed analysis on Gold.

Contact Information (Singapore Research Team)

Research Operations Officer
Mohamed Amiruddin - amiruddin@phillip.com.sg

Consumer | Healthcare
Soh Lin Sin - sohls@phillip.com.sg

Transport | REITs (Industrial)
Richard Leow, CFTe, FRM - richardleowwt@phillip.com.sg

Banking and Finance
Jeremy Teong - jeremyteongfh@phillip.com.sg

Property | Infrastructure
Peter Ng - peterngmc@phillip.com.sg

REITs (Commercial, Retail, Healthcare) | Property
Dehong Tan - tandh@phillip.com.sg

US Equity
Ho Kang Wei - hokw@phillip.com.sg

Macro
Pei Sai Teng - peist@phillip.com.sg

Technical Analysis
Jeremy Ng - jeremyngch@phillip.com.sg

Oil & Gas | Energy
Chen Guangzhi - chengz@phillip.com.sg

Contact Information (Regional Member Companies)

SINGAPORE
Phillip Securities Pte Ltd
Raffles City Tower
250, North Bridge Road #06-00
Singapore 179101
Tel +65 6533 6001
Fax +65 6535 6631
Website: www.poems.com.sg

MALAYSIA
Phillip Capital Management Sdn Bhd
B-3-6 Block B Level 3 Megan Avenue II,
No. 12, Jalan Yap Kwan Seng, 50450
Kuala Lumpur
Tel +603 2162 8841
Fax +603 2166 5099
Website: www.poems.com.my

HONG KONG
Phillip Securities (HK) Ltd
11/F United Centre 95 Queensway
Hong Kong
Tel +852 2277 6600
Fax +852 2868 5307
Websites: www.phillip.com.hk

JAPAN
Phillip Securities Japan, Ltd.
4-2 Nihonbashi Kabuto-cho Chuo-ku,
Tokyo 103-0026
Tel +81-3 3666 2101
Fax +81-3 3666 6090
Website: www.phillip.co.jp

INDONESIA
PT Phillip Securities Indonesia
ANZ Tower Level 23B,
Jl Jend Sudirman Kav 33A
Jakarta 10220 – Indonesia
Tel +62-21 5790 0800
Fax +62-21 5790 0809
Website: www.phillip.co.id

CHINA
Phillip Financial Advisory (Shanghai) Co Ltd
No 550 Yan An East Road,
Ocean Tower Unit 2318,
Postal code 200001
Tel +86-21 5169 9200
Fax +86-21 6351 2940
Website: www.phillip.com.cn

THAILAND
Phillip Securities (Thailand) Public Co. Ltd
15th Floor, Vorawat Building,
849 Silom Road, Silom, Bangrak,
Bangkok 10500 Thailand
Tel +66-2 6351700 / 22680999
Fax +66-2 22680921
Website www.phillip.co.th

FRANCE
King & Shaxson Capital Limited
3rd Floor, 35 Rue de la Bienfaisance 75008
Paris France
Tel +33-1 45633100
Fax +33-1 45636017
Website: www.kingandshaxson.com

UNITED KINGDOM
King & Shaxson Capital Limited
6th Floor, Candlewick House,
120 Cannon Street,
London, EC4N 6AS
Tel +44-20 7426 5950
Fax +44-20 7626 1757
Website: www.kingandshaxson.com

UNITED STATES
Phillip Futures Inc
141 W Jackson Blvd Ste 3050
The Chicago Board of Trade Building
Chicago, IL 60604 USA
Tel +1-312 356 9000
Fax +1-312 356 9005
Website: www.phillipusa.com

AUSTRALIA
Phillip Capital Limited
Level 12, 15 William Street,
Melbourne, Victoria 3000, Australia
Tel +61-03 9629 8288
Fax +61-03 9629 8882
Website: www.phillipcapital.com.au

SRI LANKA
Asha Phillip Securities Limited
2nd Floor, Lakshmans Building,
No. 321, Galle Road,
Colombo 03, Sri Lanka
Tel: (94) 11 2429 100
Fax: (94) 11 2429 199
Website: www.ashaphillip.net

INDIA
PhillipCapital (India) Private Limited
No.1, 18th Floor, Urmi Estate
95, Ganpatrao Kadam Marg
Lower Parel West, Mumbai 400-013
Maharashtra, India
Tel: +91-22-2300 2999 / Fax: +91-22-2300 2969
Website: www.phillipcapital.in

TURKEY
PhillipCapital Menkul Degerler
Dr. Cemil Bengü Cad. Hak Is Merkezi
No. 2 Kat. 6A Caglayan
34403 Istanbul, Turkey
Tel: 0212 296 84 84
Fax: 0212 233 69 29
Website: www.phillipcapital.com.tr

DUBAI
Phillip Futures DMCC
Member of the Dubai Gold and
Commodities Exchange (DGCX)
Unit No 601, Plot No 58, White Crown Bldg,
Sheikh Zayed Road, P.O.Box 212291
Dubai-UAE
Tel: +971-4-3325052 / Fax: + 971-4-3328895

CAMBODIA
Phillip Bank Plc
Ground Floor of B-Office Centre,#61-64,
Norodom Blvd Corner Street 306,Sangkat
Boeung Keng Kang 1, Khan Chamkamorn,
Phnom Penh, Cambodia
Tel: 855 (0) 7796 6151/855 (0) 1620 0769
Website: www.phillipbank.com.kh

Important Information

This report is prepared and/or distributed by Phillip Securities Research Pte Ltd ("Phillip Securities Research"), which is a holder of a financial adviser's license under the Financial Advisers Act, Chapter 110 in Singapore.

By receiving or reading this report, you agree to be bound by the terms and limitations set out below. Any failure to comply with these terms and limitations may constitute a violation of law. This report has been provided to you for personal use only and shall not be reproduced, distributed or published by you in whole or in part, for any purpose. If you have received this report by mistake, please delete or destroy it, and notify the sender immediately.

The information and any analysis, forecasts, projections, expectations and opinions (collectively, the "Research") contained in this report has been obtained from public sources which Phillip Securities Research believes to be reliable. However, Phillip Securities Research does not make any representation or warranty, express or implied that such information or Research is accurate, complete or appropriate or should be relied upon as such. Any such information or Research contained in this report is subject to change, and Phillip Securities Research shall not have any responsibility to maintain or update the information or Research made available or to supply any corrections, updates or releases in connection therewith.

Any opinions, forecasts, assumptions, estimates, valuations and prices contained in this report are as of the date indicated and are subject to change at any time without prior notice. Past performance of any product referred to in this report is not indicative of future results.

This report does not constitute, and should not be used as a substitute for, tax, legal or investment advice. This report should not be relied upon exclusively or as authoritative, without further being subject to the recipient's own independent verification and exercise of judgment. The fact that this report has been made available constitutes neither a recommendation to enter into a particular transaction, nor a representation that any product described in this report is suitable or appropriate for the recipient. Recipients should be aware that many of the products, which may be described in this report involve significant risks and may not be suitable for all investors, and that any decision to enter into transactions involving such products should not be made, unless all such risks are understood and an independent determination has been made that such transactions would be appropriate. Any discussion of the risks contained herein with respect to any product should not be considered to be a disclosure of all risks or a complete discussion of such risks.

Nothing in this report shall be construed to be an offer or solicitation for the purchase or sale of any product. Any decision to purchase any product mentioned in this report should take into account existing public information, including any registered prospectus in respect of such product.

Phillip Securities Research, or persons associated with or connected to Phillip Securities Research, including but not limited to its officers, directors, employees or persons involved in the issuance of this report, may provide an array of financial services to a large number of corporations in Singapore and worldwide, including but not limited to commercial / investment banking activities (including sponsorship, financial advisory or underwriting activities), brokerage or securities trading activities. Phillip Securities Research, or persons associated with or connected to Phillip Securities Research, including but not limited to its officers, directors, employees or persons involved in the issuance of this report, may have participated in or invested in transactions with the issuer(s) of the securities mentioned in this report, and may have performed services for or solicited business from such issuers. Additionally, Phillip Securities Research, or persons associated with or connected to Phillip Securities Research, including but not limited to its officers, directors, employees or persons involved in the issuance of this report, may have provided advice or investment services to such companies and investments or related investments, as may be mentioned in this report.

Phillip Securities Research or persons associated with or connected to Phillip Securities Research, including but not limited to its officers, directors, employees or persons involved in the issuance of this report may, from time to time maintain a long or short position in securities referred to herein, or in related futures or options, purchase or sell, make a market in, or engage in any other transaction involving such securities, and earn brokerage or other compensation in respect of the foregoing. Investments will be denominated in various currencies including US dollars and Euro and thus will be subject to any fluctuation in exchange rates between US dollars and Euro or foreign currencies and the currency of your own jurisdiction. Such fluctuations may have an adverse effect on the value, price or income return of the investment.

To the extent permitted by law, Phillip Securities Research, or persons associated with or connected to Phillip Securities Research, including but not limited to its officers, directors, employees or persons involved in the issuance of this report, may at any time engage in any of the above activities as set out above or otherwise hold an interest, whether material or not, in respect of companies and investments or related investments, which may be mentioned in this report. Accordingly, information may be available to Phillip Securities Research, or persons associated with or connected to Phillip Securities Research, including but not limited to its officers, directors, employees or persons involved in the issuance of this report, which is not reflected in this report, and Phillip Securities Research, or persons associated with or connected to Phillip Securities Research, including but not limited to its officers, directors, employees or persons involved in the issuance of this report, may, to the extent permitted by law, have acted upon or used the information prior to or immediately following its publication. Phillip Securities Research, or persons associated with or connected to Phillip Securities Research, including but not limited its officers, directors, employees or persons involved in the issuance of this report, may have issued other material that is inconsistent with, or reach different conclusions from, the contents of this report.

The information, tools and material presented herein are not directed, intended for distribution to or use by, any person or entity in any jurisdiction or country where such distribution, publication, availability or use would be contrary to the applicable law or regulation or which would subject Phillip Securities Research to any registration or licensing or other requirement, or penalty for contravention of such requirements within such jurisdiction.

This report is intended for general circulation only and does not take into account the specific investment objectives, financial situation or particular needs of any particular person. The products mentioned in this report may not be suitable for all investors and a person receiving or reading this report should seek advice from a professional and financial adviser regarding the legal, business, financial, tax and other aspects including the suitability of such products, taking into account the specific investment objectives, financial situation or particular needs of that person, before making a commitment to invest in any of such products.

This report is not intended for distribution, publication to or use by any person in any jurisdiction outside of Singapore or any other jurisdiction as Phillip Securities Research may determine in its absolute discretion.

IMPORTANT DISCLOSURES FOR INCLUDED RESEARCH ANALYSES OR REPORTS OF FOREIGN RESEARCH HOUSES

Where the report contains research analyses or reports from a foreign research house, please note:

(i) recipients of the analyses or reports are to contact Phillip Securities Research (and not the relevant foreign research house) in Singapore at 250 North Bridge Road, #06-00 Raffles City Tower, Singapore 179101, telephone number +65 6533 6001, in respect of any matters arising from, or in connection with, the analyses or reports; and

(ii) to the extent that the analyses or reports are delivered to and intended to be received by any person in Singapore who is not an accredited investor, expert investor or institutional investor, Phillip Securities Research accepts legal responsibility for the contents of the analyses or reports.