CNH CCS curve: deeper inversion ahead

Dariusz Kowalczyk
Senior Economist/Strategist - Asia ex-Japan
dariusz.kowalczyk@ca-cib.com
+852 2826 1519

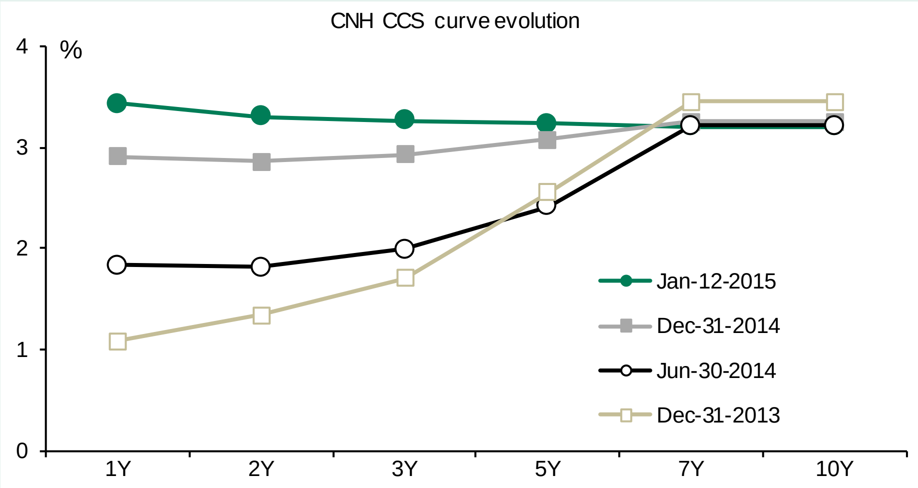
- **The SAFE has been reporting a net outflow of RMB funds from offshore to onshore markets since October 2014.**
- **Resulting tight CNH liquidity conditions are likely to prevail in coming months before easing later in the year.**
- **We expect the short end to lead the CNH CCS curve higher in H115. The move will reverse in H215 as CNH liquidity improves and the Fed starts hiking USD rates.**
- **We recommend betting on further inversion of the curve by receiving the 3Y tenor vs paying the 1Y tenor. Entry point: -17bp, target: -60bp, stop loss: +5bp.**

Up, up and away

CNH CCS rates have trended higher YTD, approaching record levels hit in late 2014. Their rise has been driven by two factors. Firstly, CNH liquidity has tightened back after a temporary respite towards the end of December, as shown by rising short-term money market rates. We believe that this has been caused by an **outflow of CNH funds from the offshore market** to the Mainland. Moreover, hedge funds have been betting on the tightness extending in coming months by paying forward CNH CCS rates.

Forces behind rising CNH CCS rates YTD:
– tightening of CNH liquidity
– shift to the right of CNH FX swap points

The curve has become inverted



Source: Bloomberg, Crédit Agricole CIB

Secondly, CNH FX swap points, with which CNH CCS rates are highly correlated, have moved to the right. **Higher CNH FX swap points reflect client hedging, bets on liquidity tightening onshore and unwinding of short positions**. Client hedging may be driven by fears of a further fall in the CNH spot. Expectations of tighter CNY liquidity were triggered by a relaxation of onshore loan-to-deposit ratio requirements, which stoked speculation that a cut in the RRR would be delayed. Short CNH FX swap positions had been built to capitalise on expected bank selling to hedge the client flow of structured products

Crédit Agricole Corporate and Investment Bank is authorised by the Autorité de Contrôle Prudentiel et de Résolution (ACPR) and supervised by the ACPR and the Autorité des Marchés Financiers (AMF) in France and subject to limited regulation by the Financial Conduct Authority and the Prudential Regulation Authority. Details about the extent of our regulation by the Financial Conduct Authority and the Prudential Regulation Authority are available from us on request.

at the start of the year; the flow has practically not materialised, forcing dealers to unwind the shorts.

While all CNH CCS tenors have moved upwards, the short end has seen the steepest increase, leading to a clear inversion of the 2/1Y segment of the curve. However, the curve is inverted up to the 7Y tenor.

It's all about liquidity

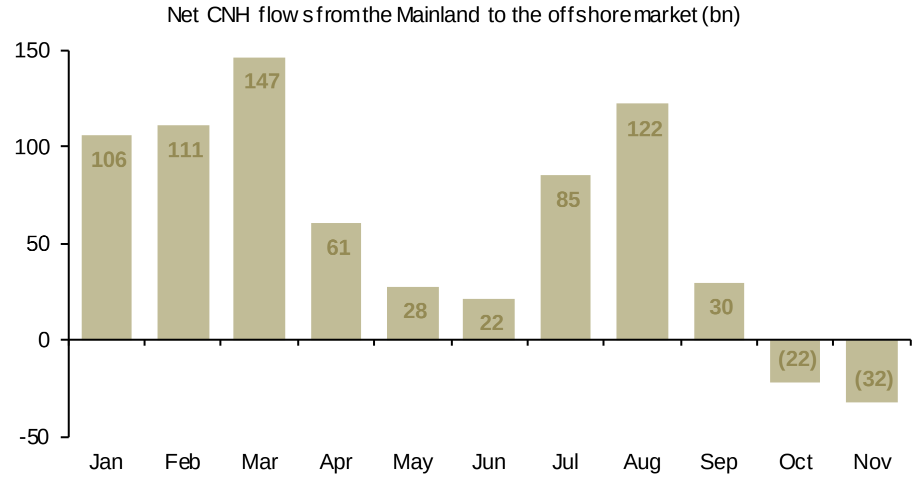
The outlook for CNH CCS rates depends largely on CNH liquidity, although the evolution of CNH FX swap points and asset swap transactions will continue to play their part. By and large, as long as liquidity remains tight, **the entire curve will likely be gravitating higher due to the positive carry of paying positions** resulting from the fact that funding costs are sharply above CCS rates. In particular, shorter tenors – 1Y and 2Y – will be pushed up in the process.

A relatively new series of SAFE data, which started to be released last year, explains the reason for the tight liquidity situation. After months of RMB flows moving from the Mainland to the rest of the world, **since October the direction has been reversed and the RMB has, in net terms, been leaving the offshore market** and moving back onshore.

In Q1-Q314, a net RMB711bn in liquidity was moved from onshore to offshore markets…

…but in the first two months of Q414 the direction of the flows reversed and a net RMB54bn returned to the Mainland

The RMB has recently been returning to China



Source: CEIC, Crédit Agricole CIB

We believe that **liquidity will remain tight for the foreseeable future as net flows should continue to move from the global markets to the Mainland**. This is because key sources of outflows of the RMB from the offshore market to the onshore market – CNY settlement of direct investment, RQFII program and the Shanghai–Hong Kong Stock Connect program – are cumulatively larger than the main source of inflows: CNY-settled trade in goods.

Main avenues of liquidity flows from offshore to onshore markets:
– CNY-settled direct investment
– RQFII program
– Shanghai–Hong Kong Stock Connect program

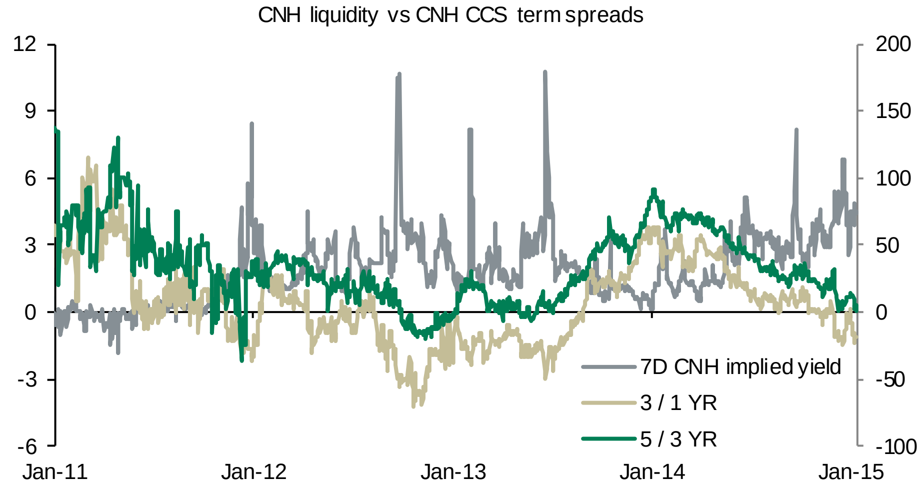
The biggest source of drainage of offshore CNH liquidity has been the CNY-settled direct investment program. In the first 11 months of 2014, it resulted in a net flow of RMB504bn from offshore to onshore markets. The RQFII program, which allows foreign portfolio investors to use CNH to buy onshore financial assets, saw its cap increased by RMB375bn last year, and allocated quotas were boosted by RMB142bn to RMB300bn. The Shanghai–Hong Kong Stock Connect has so far resulted in RMB68bn in net buying of Mainland assets (see CNH CCS: high enough for detailed analysis).

As a result of the liquidity tightness, **in H115 we expect the CNH CCS curve to become fully inverted across its term structure and the degree of inversion to increase in coming months**. This would be consistent with the past, when the curve was upward-sloping at times of low CNH money market rates and inverted when they were high.

While longer-term trends for CNH CCS are notoriously difficult to predict, we think **it is likely that in H215 the liquidity situation will improve**. This is primarily because China's globalisation policy calls for net outflow of RMB from the Mainland, and we expect regulatory adjustments and initiatives to end the recent reversal of flows. Moreover, we expect 100bp in RRR cuts in H115, which would push onshore money market rates down, and – through increasingly easy arbitrage – have a similar impact on CNH money market rates.

CNH liquidity should improve in H215 due to:
– RMB globalisation policy
– RRR cuts and resulting liquidity easing onshore

Inverted relationship between CNH liquidity and CNH CCS term spreads



Source: Bloomberg, Crédit Agricole CIB

As a result, **CNH CCS rates should decline in the second half of the year**. The move downwards will be led by the short end, likely leading to partial or complete dis-inversion of the curve. Rates will also come under downward pressure as a result of the likely move to the left of CNH FX swap points triggered by the rise in USD rates as the Fed begins to hike rates.

The CNH CCS curve should see downward pressure and at least partial dis-inversion in H215 due to:
– the improvement in CNH liquidity
– the likely fall in CNH FX swap points as USD rates rise on Fed tightening

Bet on further inversion in the near term

We recommend a trade that considers further inversion of the curve likely in the coming weeks in the 1Y-3Y segment. Judging by historical standards, **at current levels of 1W CNH money market rates, the CNH CCS curve should be significantly more inverted**. We expect CNH liquidity conditions to remain tight for longer and possibly to tighten further as a result of continued net flows of RMB from the offshore market to the Mainland in coming months. The 1Y tenor is likely to be more heavily impacted than the 3Y tenor.

In addition, **there should be some receiving flows in the 3Y space connected with dim sum bond issuance** by non-Chinese corporates, who could be incentivised to swap them back to the USD or to domestic currencies as the 3Y CNH CCS rate is trading relatively high compared to the 3Y CGB yield. The 3Y tenor should see a large share of dim sum issuance and more receiving flows than the 1Y tenor.

We recommend betting on further inversion of the curve by receiving the 3Y tenor and paying the 1Y tenor. The entry point is -17bp, the target is -60bp and the stop loss +5bp.

Spread trade recommendation: receive 3Y and pay 1Y
– Entry point -17bp
– Target -60bp
– Stop loss +5bp

Forecasts

	'12	'13	'14	'15	'16
Economy					
GDP (%, YoY)	7.8	7.7	7.4	7.1	6.9
Contributions (ppt)					
Consumption	4.2	3.9	3.8	3.8	3.8
Investment	3.6	4.2	2.8	3.6	3.5
Trade	-0.1	-0.3	0.8	-0.3	-0.4
CPI (%, YoY)					
Year-end	2.5	2.5	1.5	2.5	2.7
Average	2.7	2.6	2.1	2.4	2.8
Current account balance					
% of GDP (PBoC)	2.6	1.9	2.1	1.2	0.5
Trade balance (goods)					
USD bn (Customs)	233	261	384	456	431
% of GDP (PBoC)	2.8	2.8	3.8	4.0	3.4
Exports (volume, %, YoY)	9.5	7.9	5.3	5.5	5.0
Imports (volume, %, YoY)	5.2	7.2	2.9	5.3	6.3
Budget balance					
Official, CNY bn	-800	-1200	-1350	-1650	-1950
Official, % of GDP	-1.5	-2.1	-2.2	-2.4	-2.6
Our estimate, % of GDP	-6.6	-8.9	-7.5	-6.5	-6.0

	'12	'13	'14	'15	'16
Monetary policy					
1Y PBoC deposit rate (%)	3.00	3.00	2.75	2.50	3.00
1Y PBoC lending rate (%)	6.00	6.00	5.60	5.35	5.85
Required reserve ratio (%)	20.0	20.0	20.0	19.0	18.0
Market					
FX					
USD/CNY	6.23	6.05	6.21	6.16	6.05
USD/CNH	6.22	6.06	6.22	6.15	6.04
EUR/CNY	8.22	8.33	7.54	7.39	7.32
EUR/CNH	8.21	8.34	7.56	7.38	7.31
CNY IRS					
2Y	3.35	5.20	3.42	2.70	2.85
5Y	3.64	5.25	3.55	3.06	3.23
10Y	3.83	5.44	3.74	3.35	3.55
CGB					
2Y	3.05	4.35	3.31	2.65	2.75
5Y	3.33	4.56	3.51	3.01	3.08
10Y	3.64	4.78	3.62	3.30	3.40
CNH CCS					
1Y	2.56	1.08	2.91	3.20	3.25
2Y	2.33	1.34	2.86	3.00	3.05
5Y	2.18	2.55	3.07	3.35	3.40

	Q113	Q213	Q313	Q413	Q114	Q214	Q314	Q414	Q115	Q215	Q315	Q415	Q116	Q216	Q316	Q416
GDP																
QoQ (%)	1.6	1.8	2.3	1.7	1.5	2.0	1.9	1.7	1.4	1.9	1.8	1.7	1.5	1.7	1.7	1.6
QoQ (%, annualised)	6.6	7.4	9.5	7.0	6.1	8.2	7.8	7.1	5.7	7.6	7.4	7.0	6.1	7.0	6.8	6.6
YoY (%)	7.7	7.5	7.8	7.7	7.4	7.5	7.3	7.4	7.2	7.1	7.0	6.9	7.0	6.9	6.7	6.6
CPI (%, YoY)																
Average	2.4	2.4	2.8	2.9	2.3	2.2	2.0	1.5	1.7	1.9	2.0	2.3	2.5	2.6	2.7	2.6
Quarter-end	2.1	2.7	3.1	2.5	2.4	2.3	1.6	1.5	1.9	1.8	2.0	2.5	2.5	2.6	2.7	2.7
Monetary policy																
1Y PBoC deposit rate (%)	3.00	3.00	3.00	3.00	3.00	3.00	3.00	2.75	2.50	2.50	2.50	2.50	2.75	2.75	3.00	3.00
1Y PBoC lending rate (%)	6.00	6.00	6.00	6.00	6.00	6.00	6.00	5.60	5.35	5.35	5.35	5.35	5.60	5.60	5.85	5.85
Required reserve ratio (%)	20.0	20.0	20.0	20.0	20.0	20.0	20.0	20.0	19.5	19.0	19.0	19.0	18.5	18.0	18.0	18.0
FX rates																
USD/CNY	6.21	6.14	6.12	6.05	6.22	6.20	6.15	6.21	6.28	6.30	6.27	6.16	6.20	6.21	6.13	6.05
USD/CNH	6.20	6.14	6.12	6.06	6.22	6.21	6.14	6.22	6.27	6.29	6.26	6.15	6.19	6.20	6.12	6.04
EUR/CNY	7.96	7.99	8.26	8.33	8.56	8.47	7.74	7.54	7.66	7.69	7.59	7.39	7.32	7.20	7.05	6.96
EUR/CNH	7.95	7.98	8.26	8.34	8.52	8.47	7.73	7.56	7.65	7.68	7.58	7.38	7.31	7.20	7.04	6.95
CNY IRS																
2Y	3.37	3.85	3.98	5.20	4.35	3.74	3.30	3.42	2.40	2.40	2.55	2.70	2.85	3.00	3.10	3.15
5Y	3.67	3.80	4.17	5.25	4.55	4.10	3.53	3.55	2.65	2.70	2.88	3.06	3.23	3.41	3.57	3.70
10Y	3.87	4.01	4.37	5.44	4.72	4.29	3.72	3.74	2.85	2.95	3.15	3.35	3.55	3.75	3.95	4.15
CGB																
2Y	3.01	3.33	3.71	4.35	3.57	3.73	3.93	3.31	2.55	2.45	2.55	2.65	2.75	2.85	2.90	2.90
5Y	3.38	3.44	3.94	4.56	4.25	4.06	4.05	3.51	2.90	2.85	2.93	3.01	3.08	3.16	3.22	3.25
10Y	3.70	3.68	4.06	4.78	4.63	4.11	4.02	3.62	3.05	3.10	3.20	3.30	3.40	3.55	3.65	3.80
CNH CCS																
1Y	2.13	2.49	1.78	1.08	0.97	1.83	2.61	2.91	3.75	3.65	3.40	3.20	3.25	3.30	3.35	3.40
2Y	1.99	2.23	1.82	1.34	1.18	1.81	2.58	2.86	3.45	3.35	3.20	3.00	3.05	3.15	3.20	3.25
5Y	1.92	2.24	2.46	2.55	2.24	2.41	3.04	3.07	3.35	3.30	3.30	3.35	3.40	3.45	3.55	3.60

Source: Bloomberg, Crédit Agricole CIB

Global Markets Research contact details

Jean-François Paren Head of Global Markets Research +33 1 41 89 33 95

	Asia (Hong Kong & Tokyo)	Europe (London & Paris)	Americas (New York)
	TBC	**Sébastien Barbé** Head of Global Markets Research for Europe and Head of EM Research and Strategy +33 1 41 89 15 97	**David Keeble** ** Head of Global Markets Research for the Americas and Global Head of Interest Rates Strategy +1 212 261 3274
Macro Strategy	Kazuhiko Ogata Chief Economist – Japan +81 3 4580 5360	Frederik Ducrozet Senior Economist – Eurozone +33 1 41 89 98 95	Michael P. Carey ** Chief Economist – North America +1 212 261 7134 Brittany Baumann ** US Associate +1 212 261 7140
Interest Rates (Head: David Keeble)	Yoshiro Sato Economist/Strategist-Japan +81 3 4580 5337	Romain Blanchet IRD Strategist +33 1 41 89 00 64 Orlando Green Senior Interest Rates Strategist +44 20 7214 7467 Jean-François Perrin Inflation Strategist +33 1 41 89 94 22	David Keeble ** Global Head of Interest Rates Strategy +1 212 261 3274 Jonathan Rick ** IRD Strategist +1 212 261 4096
Emerging Markets (Head: Sébastien Barbé)	Dariusz Kowalczyk Senior Economist/Strategist – Asia ex-Japan +852 2826 1519	Sébastien Barbé Head of EM Research and Strategy +33 1 41 89 15 97 Jakub Borowski Chief Economist - Crédit Agricole Bank Polska SA + 48 22 573 18 40 Alexander Pecherytsyn Chief Economist – Crédit Agricole Bank Ukraine + 38 44 493-9014 Guillaume Tresca Senior Emerging Market Strategist +33 1 41 89 18 47	Mark McCormick ** ‡ FX Strategist +1 212 261 4108
Foreign Exchange	TBC	Adam Myers European Head of FX Strategy +44 20 7214 7468 Manuel Oliveri FX Strategist +44 20 7214 7469	Mark McCormick ** ‡ FX Strategist +1 212 261 4108

** employee(s) of Crédit Agricole Securities (USA), Inc.

Certification

The views expressed in this report accurately reflect the personal views of the undersigned analyst(s). In addition, the undersigned analyst(s) has not and will not receive any compensation for providing a specific recommendation or view in this report.

Dariusz Kowalczyk

Important: Please note that in the United States, this fixed income research report is considered to be fixed income commentary and not fixed income research. Notwithstanding this, the Crédit Agricole CIB Research Disclaimer that can be found at the end of this report applies to this report in the United States as if references to research report were to fixed income commentary. Products and services are provided in the United States through Crédit Agricole Securities (USA), Inc.

‡ This commentary has been produced by Crédit Agricole Securities (USA) Inc.'s ("CAS-USA") Fixed Income FX Department and is not a fixed income research report prepared by a research analyst. These views may differ from those of the Research Department.
The material contained in this commentary is intended solely for accredited, expert institutional investors and is provided for informational purpose only. This commentary is based on data obtained from sources we believe to be reliable, but is not guaranteed as to accuracy and does not purport to be complete. Any comments regarding the future direction of financial markets is illustrative and is not intended to predict actual results. It should not be construed as advice designed to meet the particular investment needs of any investor, nor as an offer or solicitation to buy or sell the securities or other products mentioned herein. Changes to assumptions may have a material impact on any returns detailed. Price and availability are subject to change without notice. No representation is made that any transaction can be effected at the values provided. The values provided are not necessarily the values carried on CAS-USA's books.

Disclaimer

© 2015, **CRÉDIT AGRICOLE CORPORATE AND INVESTMENT BANK All rights reserved.**

This research report or summary has been prepared by Crédit Agricole Corporate and Investment Bank or one of its affiliates (collectively “Crédit Agricole CIB”) from information believed to be reliable. Such information has not been independently verified and no guarantee, representation or warranty, express or implied, is made as to its accuracy, completeness or correctness.

This report is a “commercial communication” as defined in article 6 of the Directive 2000/31/CE of 8 June 2000. For the avoidance of doubt, it is not a “*communication à caractère promotionnel*” within the meaning of the *Règlement General AMF*. It is provided for information purposes only. Nothing in this report should be considered to constitute investment, legal, accounting or taxation advice and you are advised to contact independent advisors in order to evaluate this report. It is not intended, and should not be considered, as an offer, invitation, solicitation or personal recommendation to buy, subscribe for or sell any of the financial instruments described herein, nor is it intended to form the basis for any credit, advice, personal recommendation or other evaluation with respect to such financial instruments and is intended for use only by those professional investors to whom it is made available by Crédit Agricole CIB. Crédit Agricole CIB does not act in a fiduciary capacity to you in respect of this report.

Crédit Agricole CIB may at any time stop producing or updating this report. Not all strategies are appropriate at all times. Past performance is not necessarily a guide to future performance. The price, value of and income from any of the financial instruments mentioned in this report can fall as well as rise and you may make losses if you invest in them. Independent advice should be sought. In any case, investors are invited to make their own independent decision as to whether a financial instrument or whether investment in the financial instruments described herein is proper, suitable or appropriate based on their own judgement and upon the advice of any relevant advisors they have consulted. Crédit Agricole CIB has not taken any steps to ensure that any financial instruments referred to in this report are suitable for any investor. Crédit Agricole CIB will not treat recipients of this report as its customers by virtue of their receiving this report.

Crédit Agricole CIB, its directors, officers and employees may effect transactions (whether long or short) in the financial instruments described herein for their own accounts or for the account of others, may have positions relating to other financial instruments of the issuer thereof, or any of its affiliates, or may perform or seek to perform securities, investment banking or other services for such issuer or its affiliates. Crédit Agricole CIB may have issued, and may in the future issue, other reports that are inconsistent with, and reach different conclusions from, the information presented in this report. Crédit Agricole CIB is under no obligation to ensure that such other reports are brought to the attention of any recipient of this report. Crédit Agricole CIB has established a “Policy for Managing Conflicts of Interest in relation to Investment Research” which is available upon request. A summary of this Policy is published on the Crédit Agricole CIB website: http://mediacommun.ca-cib.com/sitegenic/medias/DOC/91928/2011-politique-gestion-conflits-interets-ca-cib-va.pdf. This Policy applies to its investment research activity.

None of the material, nor its content, nor any copy of it, may be altered in any way, transmitted to, copied or distributed to any other party without the prior express written permission of Crédit Agricole CIB. To the extent permitted by applicable securities laws and regulations, Crédit Agricole CIB accepts no liability whatsoever for any direct or consequential loss arising from the use of this document or its contents.

France: Crédit Agricole Corporate and Investment Bank is authorised by the Autorité de Contrôle Prudentiel et de Résolution (“ACPR”) and supervised by the ACPR and the Autorité des Marchés Financiers (“AMF”). **United Kingdom:** Approved and/or distributed by Crédit Agricole Corporate and Investment Bank, London branch. Crédit Agricole Corporate and Investment Bank is authorised by the ACPR and supervised by the ACPR and the AMF in France and subject to limited regulation by the Financial Conduct Authority and the Prudential Regulation Authority. Details about the extent of our regulation by the Financial Conduct Authority and the Prudential Regulation Authority are available from us on request. **United States of America:** This research report is distributed solely to persons who qualify as “Major U.S. Institutional Investors” as defined in Rule 15a-6 under the Securities and Exchange Act of 1934 and who deal with Crédit Agricole Corporate and Investment Bank. Recipients of this research in the United States wishing to effect a transaction in any security mentioned herein should do so by contacting Crédit Agricole Securities (USA), Inc. (a broker-dealer registered with the Securities and Exchange Commission). The delivery of this research report to any person in the United States shall not be deemed a recommendation of Crédit Agricole Securities (USA), Inc. to effect any transactions in the securities discussed herein or an endorsement of any opinion expressed herein. **Italy:** This research report can only be distributed to, and circulated among, professional investors (*operatori qualificati),* as defined by the relevant Italian securities legislation. **Spain:** Distributed by Crédit Agricole Corporate and Investment Bank, Madrid branch and may only be distributed to institutional investors (as defined in article 7.1 of Royal Decree 291/1992 on Issues and Public Offers of Securities) and cannot be distributed to other investors that do not fall within the category of institutional investors. **Hong Kong:** Distributed by Crédit Agricole Corporate and Investment Bank, Hong Kong branch. This research report can only be distributed to professional investors within the meaning of the Securities and Futures Ordinance (Cap.571) and any rule made there under. **Japan:** Distributed by Crédit Agricole Securities Asia B.V. which is registered for securities business in Japan pursuant to the Law Concerning Foreign Securities Firms (Law n°5 of 1971, as amended), and is not intended, and should not be considered, as an offer, invitation, solicitation or recommendation to buy or sell any of the financial instruments described herein. This report is not intended, and should not be considered, as advice on investments in securities which is subject to the Securities Investment Advisory Business Law (Law n°74 of 1986, as amended). **Luxembourg:** Distributed by Crédit Agricole Corporate and Investment Bank, Luxembourg branch. It is only intended for circulation and/or distribution to institutional investors and investments mentioned in this report will not be available to the public but only to institutional investors. **Singapore:** Distributed by Crédit Agricole Corporate and Investment Bank, Singapore branch. It is not intended for distribution to any persons other than accredited investors, as defined in the Securities and Futures Act (Chapter 289 of Singapore), and persons whose business involves the acquisition or disposal of, or the holding of capital markets products (as defined in the Securities and Futures Act (Chapter 289 of Singapore)). **Switzerland:** Distributed by Crédit Agricole (Suisse) S.A. This report is not subject to the SBA Directive of January 24, 2003 as they are produced by a non-Swiss entity. **Germany:** Distributed by Crédit Agricole Corporate and Investment Bank, Frankfurt branch and may only be distributed to institutional investors. **Australia:** Distributed to wholesale investors only**.** This research, and any access to it, is intended only for “wholesale clients” within the meaning of the Australian Corporations Act.

THE DISTRIBUTION OF THIS DOCUMENT IN OTHER JURISDICTIONS MAY BE RESTRICTED BY LAW, AND PERSONS INTO WHOSE POSSESSION THIS DOCUMENT COMES SHOULD INFORM THEMSELVES ABOUT, AND OBSERVE, ANY SUCH RESTRICTIONS. BY ACCEPTING THIS REPORT YOU AGREE TO BE BOUND BY THE FOREGOING. *30/12/14*