

Sell strangles and go on holidays

Position for spreads to stay in the recent range in mid-January

- **Neutral into the holiday season.** After the aggressive tightening in early October, CDS index spreads have traded in a narrow range (Main has fluctuated between 77 and 88bp since mid-October). We expect this to continue into year-end and early January; we moved our tactical strategy view from overweight to neutral a few weeks back and we still think that is the right view for the next few weeks. We do not see compelling reasons to either get long or short ahead of the holiday season.
- **Position for spreads to remain range-bound and take advantage of the recent increase in short dated implied volatility to sell January strangles.** The January expiry is on the 15th, with only 9 business days in January.
- **Trade: Sell 75-85 Main January strangles;** no delta.
 - **71/89bp breakeven spreads at expiry.** The trade generates around 21c of profit if spreads at expiry are within the two strikes (75/85), which corresponds to a positive average theta of ~1c per each of the 22 business days from here to expiry. The negative initial Vega of the trade is less than 1c per year.
 - Investors who want to position for a narrower trading range or want to limit the spread exposure to a tapering-led widening should consider 80bp straddles and 75-85-90 receiver ladders respectively.

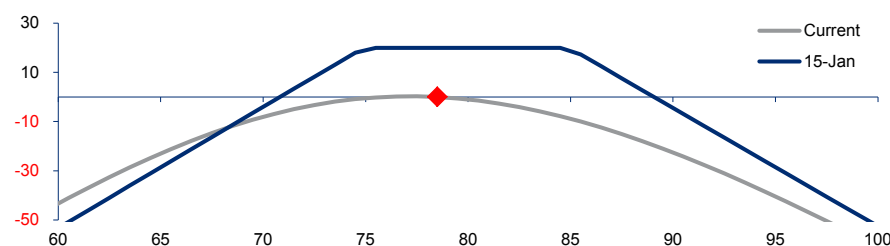
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Figure 1. Trade spread exposure – 71/89bp breakeven at expiry

P&L in cents of the straddle notional in Figure 2. X-axis: index spread, bp.



Source: Citi Research.

Figure 2. iTraxx Main 75-85 January Straddle – Trade details

Type	Strike	Expiry	Price	Position	Notional	Upfront
Receiver	75	15-Jan-14	8.0c	Sell	-100,000,000	80,000
Payer	85	15-Jan-14	13.0c	Sell	-100,000,000	130,000
Index	@ 78.5		No position			
					Total	210,000

Source: Citi Research. Indicative prices shown.

See Appendix A-1 for Analyst Certification, Important Disclosures and non-US research analyst disclosures.

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Neutral into the holiday season – expect spreads to stick to the recent trading range

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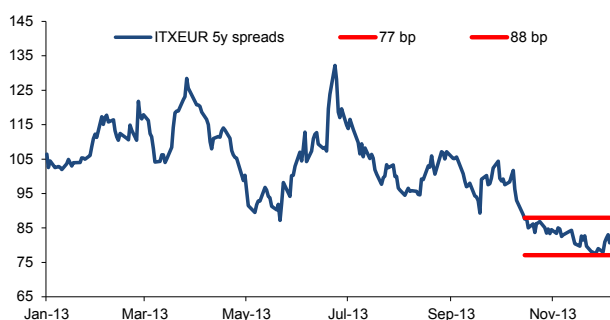
Tactical strategy view into year-end:
Neutral – see our latest [credit weekly](#).

After the aggressive tightening in early October, CDS index spreads have been trading in a narrow range (see Figure 3): Main has fluctuated in an 11bp range, between 77 and 88bp since mid-October. We expect this to continue into year-end and early January; we moved our tactical strategy view from overweight to neutral a few weeks back and we still think that is the right view for the next few weeks.

Although the recent dislocation between synthetics and cash can be a structural feature going forward (see Figure 4), we believe **synthetics do not have much room to continue tightening from these levels in the near term.**

Figure 3. Index spreads vs. range since mid-October

On-the-run spreads, in bp.



Source: Citi Research, Markit.

Figure 4. IG cash vs. CDS indices recent spread performance

In bp; iTraxx* is a weighted average of iTraxx Non-Financials (60%), Senior Financials (30%) and Sub Financials (10%).



Source: Citi Research, Markit.

At the same time, we do not expect spreads to widen much before mid-January. The market clearly showed last Friday that early tapering may not trigger the feared aggressive widening: spreads posted a solid tightening on the back of a strong Nonfarm Payrolls report (the second consecutive one above 200k). The market, it seems, is already pricing in that tapering will start soon; if the Fed announces, in their next meeting (17-18th Dec), that tapering will start before the end of the year it should not take anybody by surprise. Moreover, the next potential episode of market volatility on the back of the US debt-ceiling is not meant to start until late January: on 16th Oct., the Senate agreed to fund the government until 15th Jan. and to suspend the debt ceiling until 7th Feb.

All in all, we do not see compelling reasons to either get long or short ahead of the holiday season. We'd rather position for spreads to remain range-bound and we would take advantage of the recent increase in short dated implied volatility to sell January strangles. The January expiry is on the 15th, with only 9 business days in January.

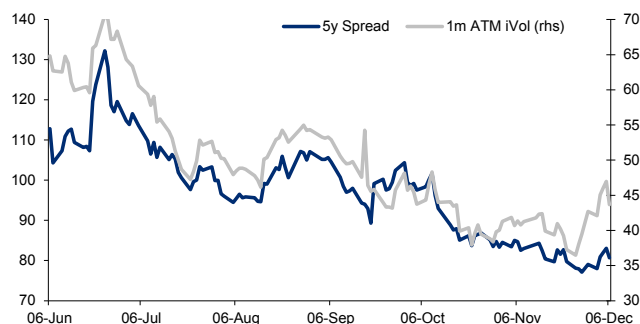
Implied volatility has recently increased – take advantage

Track movements in volatility with our daily analytics: [iTraxx](#) and [CDX](#)

iTraxx implied vol has recently underperformed both spreads (Figure 3) as well as CDX IG volatility – see Figure 3 and Figure 4 respectively – providing a good entry point to sell options, in our view.

Figure 5. iTraxx Main spreads vs. 1m implied volatility

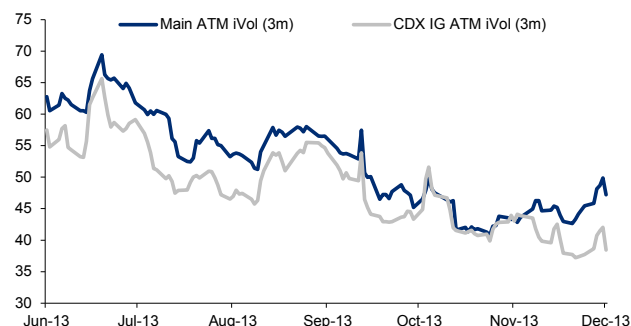
LHS: 5y on-the-run spreads, bp. RHS: 1m ATM implied volatility, %.



Source: Citi Research, Markit.

Figure 6. iTraxx Main vs. CDX IG implied volatility

3m ATM implied volatility, %.

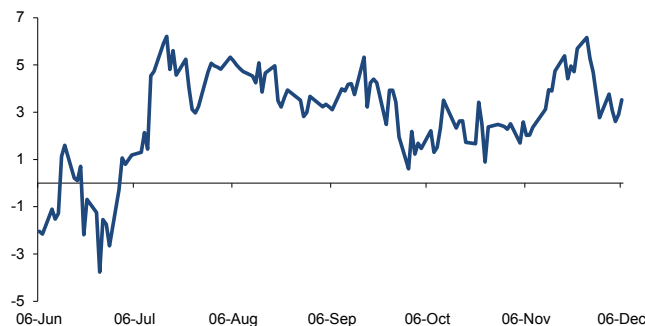


Source: Citi Research, Markit.

Moreover, it has been 1m volatility the one that has increased the most, causing the 1-3m term structure to flatten from the very steep levels it reached during November (see Figure 7), taking the ratio of 1m implied to realized ratio to 1.3 (2.3bp implied daily move vs. 1.7bp realized over the past month) – see Figure 8.

Figure 7. 1-3m implied volatility term structure

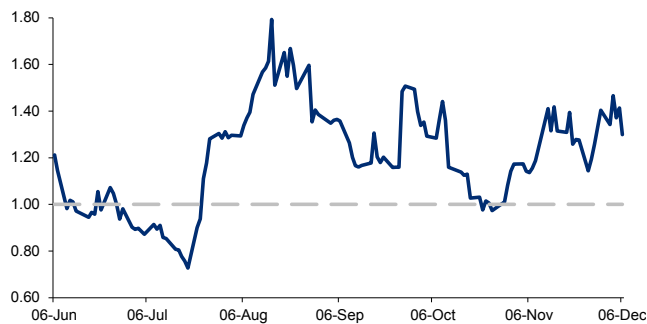
3m minus 1m ATM implied volatility, in %.



Source: Citi Research, Markit.

Figure 8. Ratio of 1m implied to realized volatility

1m ATM implied volatility divided by 1m realized volatility.



Source: Citi Research, Markit.

Thus, range-bound spreads tie-up with our tactical strategy view and the entry point to sell 1m volatility is not bad – all in all, we think selling strangles is a good way to potentially earn some carry during the holidays. **Considering how tough can be to make any money in 2014, we'd rather start the year trying to making some.**

Trade: 75-85 January Strangle; no-delta; iTraxx Main

Figure 10 shows the trade details, Figure 11 shows its spread exposure and Figure 12 shows the trade breakeven spreads (71/89bp) at expiry vs. the recent history of Main spreads. The trade generates around 21c of profit if spreads at expiry are within the two strikes (75/85), which corresponds to a positive average theta of ~1c per each of the 22 business days from here to expiry. The negative Vega of the trade is less than 1c per day. The trade would lose money if iTraxx Main is outside the 71/89 range at expiry.

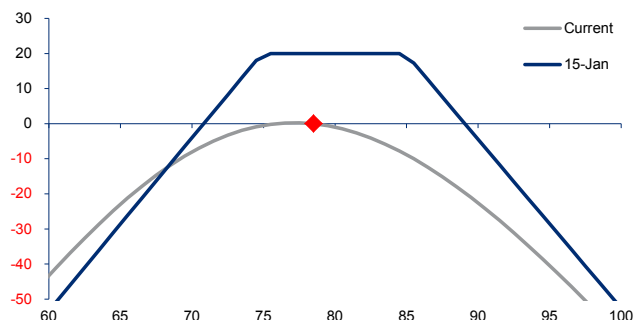
Figure 9. Trade Details

Type	Strike	Expiry	Price	Position	Notional	Upfront	Delta	Gamma	Theta	Vega
Receiver	75	15-Jan-14	7.0c	Sell	-100,000,000	70,000	14,145	-1,551	2,062	-4,070
Payer	85	15-Jan-14	13.0c	Sell	-100,000,000	130,000	-18,365	-1,576	3,340	-4,464
Index	@ 78.5		No position							
					Total	200,000	-4,220	-3,127	5,402	-8,534

Source: Citi Research. Indicative prices shown; COB yesterday. Delta: MtM if index spreads widen 1bp // Change in delta if spreads widen 1bp // Theta: MtM if one day goes by // Vega: MtM if implied vol increases 1%.

Figure 10. Trade spread exposure – 70/90bp breakeven at expiry

P&L in cents of strangle notional in Figure 10. X-axis: index spread, bp.



Source: Citi Research, Markit.

Figure 11. Index spreads vs. trade breakevens at expiry

On-the-run spreads, in bp.

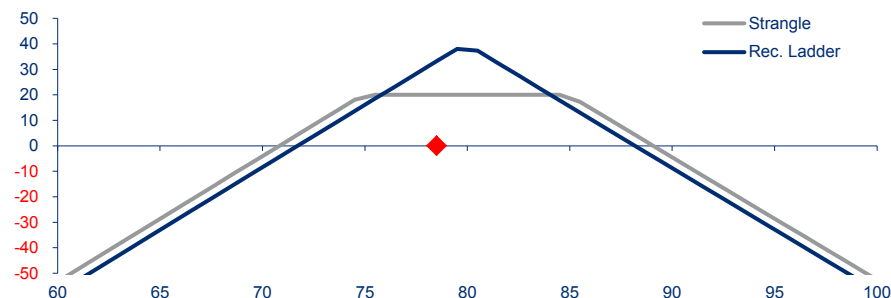


Source: Citi Research, Markit.

Investors who share our range-bound view and want to position for a narrower range should consider, for example, 80bp straddles (~71/88bp breakeven spreads at expiry). Figure 13 compares the P&L of the 75-85bp strangle with the P&L of a 80bp straddle.

Figure 12. Spread exposure at expiry (15th Jan.): 75-85 strangle vs. 80 straddle

P&L in cents at the option expiry. X-axis: index spread, bp.

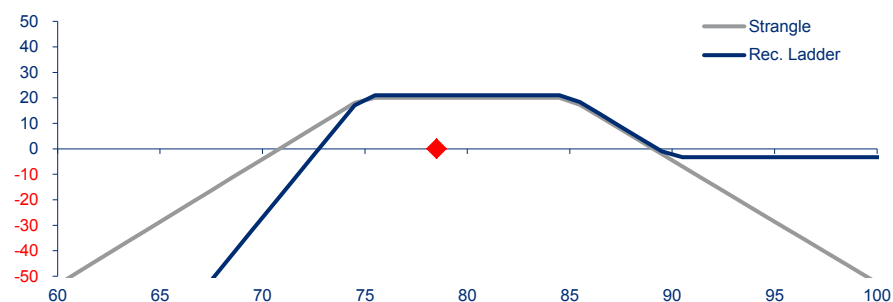


Source: Citi Research, Markit.

Finally, investors concerned about the risk of December tapering causing a sharp widening in the market should find attractive 75-85-90 receiver ladders: eliminating the downside of the trade for wide spreads by taking a larger downside if spreads tighten. Figure 14 compares the P&L of the strangle with the P&L of a receiver ladder (sell 2x 75 rec., sell 1x 85 rec., buy 1x 90 rec.).

Figure 13. Spread exposure at expiry (15th Jan.): 75-85 strangle vs. 75-85-90 receiver ladder

P&L in cents at the option expiry. X-axis: index spread, bp. Receiver ladder: sell 2x 75 rec., sell 1x 85 rec., buy 1x 90 rec.



Source: Citi Research, Markit.

Trade Recommendations Summary

This section provides details of the trade ideas recommended in our published research.

We are opening the trade recommended in this report, taking profits on our Senior Financials vs. Main trade and taking losses on our Series 19 equity vs. 3-6% trade.

Figure 14. Open trades – Summary and P&L

Trade Description	Leg	Format	Direct.	Notnl.	Entry Upfront	Entry Spread	Entry Coupon	Current Upf.	Current Spread	P&L* Total	P&L* Month**
iTraxx Main Eq. Notional Flattener 05-Sep-13	Main S19 3y	Prot.	Buy	1.00	-0.97%	65	100	-1.57%	38	-0.85%	-0.20%
	Main S19 5y	Prot.	Sell	1.00	0.24%	105	100	-1.25%	72	1.74%	0.36%
Total										0.89%	0.17%
S9 6-9% vs. S20 Crossover 15-Nov-13	Main S9 6-9% Jun-18	Prot.	Sell	1.17	-0.25%	294	300	-1.06%	275	1.16%	
	Crossover S20 Dec-18	Prot.	Buy	1.00	-7.07%	344	500	-7.65%	326	-0.87%	
Total										0.29%	
S9 super senior vs. light delta 15-Nov-13	Main S9 22-100% Jun-18	Prot.	Sell	1.00	0.18%	30	25	0.23%	30	-0.03%	
	Main S9 index Jun-18	Prot.	Buy	0.33	-3.65%	93	175	-3.75%	90	-0.07%	
Total										-0.10%	
75-85 Main January strangle 09-Dec-13	75bp Jan Main receiver	Price	Sell	1.00	0.08%			0.08%			
	85bp Jan Main Payer	Price	Sell	1.00	0.13%			0.13%			
Total											

Source: Citi Research. Spreads and coupons in bp. * P&L expressed as % of the leg with notional equal to 1. ** Over the last month. Prices as of COB yesterday. Past performance is no indicator of futures results. Calculations do not include transaction fees and other costs.

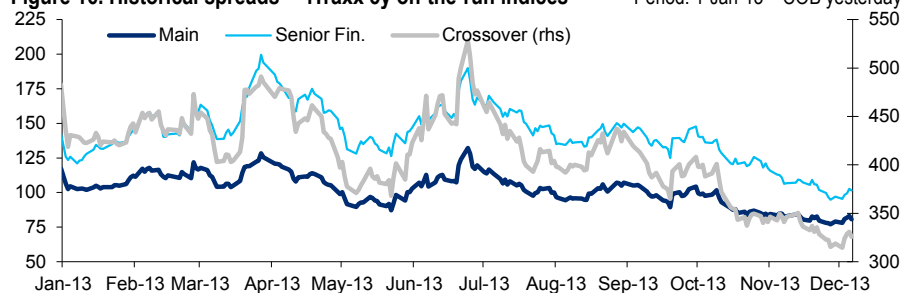
Figure 15. Open and closed trades summary statistics

Number	Open	Closed*	Percentage	Open	Closed*
In profit	4	10	In profit	80%	83%
In loss	1	2	In loss	20%	17%
	5	12			

Source: Citi Research. * Since 1-Jun-13. Excluding the trade ideas opened in the current publication.

Representative Market Conditions

Figure 16. Historical spreads – iTraxx 5y on-the-run indices



Source: Citi Research, Markit. In bp.

Figure 17. Closed trades since Jun-13 – Summary and P&L

Trade Description	Leg	Format	Direct.	Notnl.	Entry Upfront	Entry Spread	Entry Coupon	Current Upfront	Current Spread	P&L* Total
Main July Receiver Fly	105bp Receiver	Price	Buy	1.00	0.25%			0.23%		-0.01%
Opened: 18-Jun-13	90bp Receiver	Price	Sell	2.00	0.04%			0.00%		0.07%
Closed: Expiry	75bp Receiver	Price	Buy	1.00	0.00%			0.00%		0.00%
									Total	0.06%
Senior Fin vs. CDX IG Receivers	SenFin October 140bp receiver	Price	Buy	1.00	0.53%			0.69%		0.17%
Opened: 26-Jul-13	CDX IG October 75bp receiver	Price	Sell	2.00	0.19%			0.18%		0.02%
Closed: 13-Aug-13									Total	0.19%
Series 9 vs. Series 19 equity	iTraxx Main S9 0-3% Jun-18 (10y)	Prot.	Buy	1.00	46.25%	1,720	500	39.82%	1,703	-7.98%
Opened: 5-Jun-13	iTraxx Main S9 Index Jun-18 (10y)	Prot.	Sell	5.00	-2.05%	132	175	-2.73%	114	6.12%
Closed: 25-Sep-13	iTraxx Main S19 0-3% Jun-18 (5y)	Prot.	Sell	1.00	31.75%	1,227	500	25.15%	1,188	8.15%
	iTraxx Main S19 Index Jun-18 (5y)	Prot.	Buy	6.20	0.39%	108	100	-0.53%	88	-7.63%
									Total	-1.34%
S19 Jun-16 3-6% vs. S9 Jun-18 Index	iTraxx Main S19 3-6% Jun-16 (3y)	Prot.	Sell	1.00	-3.59%	375	500	-7.23%	229	4.72%
Opened: 9-Jul-13	iTraxx Main S9 Index Jun-18 (10y)	Prot.	Buy	2.50	-1.58%	138	175	-2.73%	114	-3.83%
Closed: 25-Sep-13									Total	0.89%
Commerzbank sub/senior compr.	Sub CDS	Prot.	Sell	1.00	-5.65%	375	500	-8.03%	327	3.24%
Opened: 13-Aug-13	Senior CDS	Prot.	Buy	2.51	2.37%	150	100	1.95%	140	-1.49%
Closed: 14-Sep-13									Total	1.75%
RBS sub/senior compr.	Sub CDS	Prot.	Sell	1.00	-7.71%	339	500	-11.10%	254	4.25%
Opened: 13-Aug-13	Senior CDS	Prot.	Buy	2.02	2.80%	168	100	1.77%	139	-2.43%
Closed: 14-Sep-13									Total	1.82%
BNP sub/senior compr.	Sub CDS	Prot.	Sell	1.00	-14.42%	198	500	-16.21%	168	2.65%
Opened: 13-Aug-13	Senior CDS	Prot.	Buy	1.68	0.86%	118	100	0.26%	105	-1.30%
Closed: 14-Sep-13									Total	1.36%
S19 3-6% vs. S20 Crossover	Main S19 3-6% Jun-18	Prot.	Sell	1.00	-3.25%	422	500	-5.70%	366	2.99%
Opened: 26-Sep-13	Crossover S20 Dec-18	Prot.	Buy	1.00	-5.18%	386	500	-6.96%	343	-2.32%
Closed: 4-Nov-13									Total	0.67%
iTraxx vs. CDX IG super senior	Main S9 22-100% Jun-18	Prot.	Sell	1.00	0.60%	37	25	0.34%	32	0.29%
Opened: 26-Sep-13	CDX IG S9 30-100% Dec-17	Prot.	Buy	1.00	-3.54%	13	100	-3.43%	16	0.00%
Closed: 4-Nov-13									Total	0.29%
Senior Fin vs. Xover straddle	Xover Dec-13 400bp straddle	Price	Sell	1.00	2.64%			2.63%		0.00%
Opened: 9-Oct-13	SenFin Dec-13 140bp straddle	Price	Buy	2.05	1.29%			1.48%		0.40%
Closed: 15-Nov-13									Total	0.40%
325-350-375 Nov. Crossover Receiver Ladder	325 Xover Nov Rec	Price	Sell	2.00	0.18%			0.02%		0.32%
Opened: 23-Oct-13	350 Xover Nov Rec	Price	Sell	1.00	0.61%			0.47%		0.14%
Closed: 15-Nov-13	375 Xover Nov Rec	Price	Buy	1.00	1.45%			1.46%		0.01%
									Total	0.47%
CDX IG vs. Main Receivers	CDX IG S21 Nov 85 Receiver	Price	Buy	1.00	0.47%			0.62%		0.15%
Opened: 15-Oct-13	Main S20 Nov 100 Receiver	Price	Sell	1.00	0.52%			0.91%		-0.39%
Closed: Expired 20-Nov-13									Total	-0.24%
S19 Jun-16 0-3% vs. 3-6%	Main S19 0-3% Jun-16	Prot.	Sell	1.00	8.00%	839	500	3.88%	725	5.11%
Open: 26-Sep-13	Main S19 3-6% Jun-16	Prot.	Buy	2.00	-7.00%	234	500	-9.75%	132	-7.47%
Closed: 9-Dec-13									Total	-2.36%
SenFin vs. Main	Senior Fin. 5y S20	Prot.	Sell	1.00	0.60%	112	100	0.07%	102	0.61%
Open: 26-Sep-13	Main 5y S20	Prot.	Buy	1.35	-0.79%	84	100	-0.94%	81	-0.32%
Closed: 9-Dec-13									Total	0.29%

Source: Citi Research. Spreads and coupons in bp. * P&L expressed as % of the leg with notional equal to 1.

Notes: The list of open trades reflects our current views; we have no plans to provide regular coverage or updates to these trades. P&L on trade ideas includes carry and roll costs but not trading commissions/costs. Results should not, and cannot, be viewed as an indicator of future performance.

Risks: When buying calls and puts (or receivers and payers) the maximum loss is the premium paid. When selling calls (or receivers), the maximum potential loss would occur as the index spread decreases but is limited by the index spread being floored at zero. For puts (or payers), the maximum potential loss (amount below the strike) would eventuate should the index price fall to zero. Sector index options are cash settled. The above calculations do not include any additional fees or transaction costs. Note that ratio writing would leave the writer uncovered in one leg of the trade.

Analytics, Recent Trade Ideas & Publications

Figure 18. Analytics – Available at Citi Velocity

Options	iTraxx Volatility Report CDX Volatility Report Volatility P&L Report – Credit Indices	Tranches	iTraxx Series 9 Tranche Report iTraxx Series 19 Tranche Report
Indices	CDS Indices Positioning Report CDS Indices Trading Volumes Report	Curves	iTraxx Curve P&L Report

Source: Citi Research.

Figure 19. Recent Trade Ideas

Sell S9 Jun-18 6-9% protection vs. Xover 5y S20	15 Nov 2013
Sell S9 Jun-18 22-100% protection vs. light delta	15 Nov 2013
Long risk Senior Fins. vs. short risk Main	5 Nov 2013
Crossover receiver ladders	23 Oct 2013
Long risk CDX IG vs. Main via Receivers	15 Oct 2013
Buy Senior Financials straddles vs. sell Crossover straddles	9 Oct 2013
Long risk equity vs. short risk 3-6% in S19 Jun-16 (3y)	26 Sep 2013
Long risk S19 Jun-18 (5y) 3-6% vs. 5y S20 Crossover	26 Sep 2013
Long risk iTraxx S9 Jun-18 (10y) super senior vs. short risk CDX IG S9 Dec-17 (10y) super senior	26 Sep 2013
Equal Notional 3s5s Flatteners: Adding cautious longs by selling forward protection	5 Sep 2013
Sub/Senior compression trades in European banks	13 Aug 2013
iTraxx Senior Financials vs. CDX IG via Receivers	7 Aug 2013
Sell Jun-16 3-6% Series 19 protection vs. Buy Jun-18 Series 9 index protection	9 Jul 2013
Option trades ahead of the FOMC	18 Jun 2013
iTraxx Series 9 vs. Series 19 Jun-18 equity tranches	5 Jun 2013
Hedging via Crossover Bearish Ladders	16 May 2013
Buy Main straddles; sell CDX IG straddles	1 May 2013
Views & Trades on iTraxx Series 9 Tranches	18 April 2013
Beware of retail and food releveraging – short risk retailers & food vs. Main Non-Financials	18 April 2013
Receiver 1x2s – Mind the tail if going long	2 Apr 2013
Hedging menu: payer spreads, 3s5s flatteners and Jun 15/18 equity tranche flatteners	28 Mar 2013
Long insurers vs. short premium autos	19 Mar 2013
Flatteners in iTraxx Equity Tranches	6 Mar 2013
Long risk 3-6% vs. short risk 0-3% - Jun-15 iTraxx Series 9 tranches	12 Feb 2013
Long risk Main vs. Crossover via indices and receiver options	12 Feb 2013

Source: Citi Research.

Figure 20. Other publications

2013 Trading Volumes in European Credit: CDS Indices, Single Name CDS and IG Bonds	5 Dec 2013
Europe Returns: Assessing value across flow and structured credit assets	22 Nov 2013
iTraxx Tranches Views & Trades: Mezz may be back next year	15 Nov 2013
Financial CDS to get a re-vamp	7 Aug 2013
What bail-in means for CDS	11 Feb 2013

Source: Citi Research.

RISKS

When buying calls and puts (or receivers and payers) the maximum loss is the premium paid. When selling calls (or receivers), the maximum potential loss would occur as the index spread decreases but is limited by the index spread being floored at zero. For puts (or payers), the maximum potential loss (amount below the strike) would eventuate should the index price fall to zero. Sector index options are cash settled. The above calculations do not include any additional fees or transaction costs. Note that ratio writing would leave the writer uncovered in one leg of the trade.

OPTIONS RISK DISCLOSURE — PLEASE READ CAREFULLY

This section discusses possible options strategies that you may choose to employ in conjunction with the company securities discussed herein. If you choose to engage in the options transactions discussed within this document, you must have an approved options account and will be subject to certain criteria which may ultimately prevent you from engaging in certain option strategies. It is important for you as an investor to know and understand that Options do involve risk and sometimes, significant risk, therefore may not be appropriate for all investors. If you buy options, the maximum loss is the premium. If you sell put options, the risk is the entire notional below the strike. If you sell call options, the risk is unlimited. The actual profit or loss from any trade will depend on the price at which the trades are executed. The prices used herein are historical and may not be available when you order is entered. Commissions and other transaction costs are not considered in these examples.

Please speak to your Financial Advisor to ensure you have a full understanding of the risk and reward of the strategy you are considering. Strategies that are opened or closed differently than what is discussed in this document could have a significantly different outcome from what is described. It should be noted that certain Index options might have special settlement dates or settlement requirements that are different from traditional equity options. Commissions, taxes, and margin costs have not been included but will affect the outcome of any option transaction and should be considered. However, they can have a significant impact on the profitability of options transactions and should be considered carefully before entering into any option strategy. Because of the importance of tax considerations to all option transactions, the investor considering options should consult with his/her tax advisor as to how their tax situation is affected by the outcome of contemplated options transactions. Certain options trades/strategies must be executed in a margin account. Transactions executed in a margin account can require the investor to periodically deposit additional collateral into the account in order to maintain the positions. The preceding language is not a full description of all possible risks associated with options trading.

For a more complete description on the uses and risks of options, please see the document titled Characteristics and Risks of Standardized Options. If you would like an additional copy of this document please contact Citigroup Global Markets Inc., Options Department, 390 Greenwich Street, New York, NY 10013. Options are not suitable for all investors. Before entering into any transaction using listed options, investors should read and understand the current Options Clearing Corp. Disclosure Document (Characteristics and Risks of Standardized Options) at <http://www.theocc.com/about/publications/character-risks.jsp>, http://www.theocc.com/components/docs/January_2011_ODD_Definitive_Supplement.pdf,

http://www.theocc.com/components/docs/March_2011_ODD_Definitive_Supplement.pdf, and
http://www.theocc.com/components/docs/January_2012_ODD_Definitive_Supplement.pdf

Investing in options other than Standardized Options may entail additional risks.

Appendix A-1

Analyst Certification

The research analyst(s) primarily responsible for the preparation and content of this research report are named in bold text in the author block at the front of the product except for those sections where an analyst's name appears in bold alongside content which is attributable to that analyst. Each of these analyst(s) certify, with respect to the section(s) of the report for which they are responsible, that the views expressed therein accurately reflect their personal views about each issuer and security referenced and were prepared in an independent manner, including with respect to Citigroup Global Markets Inc and its affiliates. No part of the research analyst's compensation was, is, or will be, directly or indirectly, related to the specific recommendation(s) or view(s) expressed by that research analyst in this report.

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