June 11, 2017

CROSS-ASSET STRATEGY

Cross-Asset Playbook – June 2017

Fear of Missing Out

Macro Outlook – Global Growth on a Surer Footing

DM and EM are both transitioning to self-sustaining growth, led by private sector demand, particularly capex. Combined with the contained inflation our economists expect, it means that central bank liquidity withdrawal can remain gradual and predictable through this year. 2018 looks more challenging, but we would not position for this yet.

Market Playbook – 'FOMO' on Late-Cycle Gains

Better growth and relatively slow tightening are supportive of risk assets. Admittedly, most assets look rich on their historical ranges, but late-cycle environments can be profitable for equity investors as valuations tend to overshoot, driven by investors' 'fear of missing out' . We think there remains scope for investor greed to increase, as fear of missing out ('FOMO') becomes more powerful.

Strategy Changes and Key Trades

We think that a late-cycle environment supports equities over credit. Within equities, we prefer Japan and the US. Within credit, we prefer EM and RMBS over high yield and CMBS. In rates, we prefer USTs over DBRs. In FX, we've turned strategically bullish on EUR, and like long EURAUD. We like buying USD against JPY, CHF and CAD, and selling it against MYR and MXN.

Current Cross-Asset Strategy Allocation

MS Asset Allocation Views	Top-Down Allocation		Relative Allocation		O/W vs. Benchmark
Equities	+4%		+1% +1%		+5% +1%
US	+1%	+	+1% +1%	=	+2% +1%
Europe	+1%		0%		+1%
Japan	+1%		+1% -1%		+2% -1%
EM	+1%		-1% +1%		0% +1%
Govt. Bonds	-4%		0%		-4%
Treasuries	-1%	+	+1%	=	0%
Bunds	-1%		-2% -1%		-3% -1%
JGBs	-1%		-1%		-2%
EM Local	-1%		+2% +1%		+1% +1%
Credit	0%		-1% -1%		-1% -1%
US Corp.	0%	+	-2%	=	-2%
EU Corp.	0%		-1% -1%		-1% -1%
EM Sov.	0%		+2% +1%		+2% +1%
Securitised	0%		0% -1%		0% -1%
Other					0%
Cash					0%

Current
Previous

Source: Morgan Stanley Research. Changes made as of Jun 4, 2017 in [Global Strategy Mid-Year Outlook: Climbing the Last Wall of Worry]

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Executive Summary | **Morgan Stanley Asset Allocation**

Source: Morgan Stanley Research

Executive Summary | **Our Top Trades**

Top Trades		Trade Type	Value	3m Mom.	Corr. To ACWI	E(r)	Vol.	ER/Vol	Size* ($MM/ $K dv01)
Trade #1 | Buy S&P 500 6m Calls (103 Strike)		Beta	●	△	86%	8%	7%	1.0x	40MM
Trade #2 | Long Japanese Equities (FX Hedged)		Beta	△	△	41%	9%	24%	0.4x	35MM
Trade #3 | Long European Value vs. Growth		Alpha	●	△	41%	11%	9%	1.3x	90MM
Trade #4 | Long MSCI China and India vs. EM	NEW	Alpha	◆	△	-31%	14%	13%	1.1x	60MM
Trade #5 | Long 30y US Treasuries vs. 30y Bunds	NEW	Alpha	●	●	-12%	10%	17%	0.6x	90K DV01
Trade #6 | Short GBP 10yr Breakevens	NEW	Alpha	●	△	19%	2%	5%	0.4x	110K DV01
Trade #7 | Buy Japan 10y Breakevens (JGBei)		Beta	△	△	3%	4%	4%	1.0x	50K DV01
Trade #8 | Pay ZAR 10y Swap	NEW	Alpha	●	◆	-22%	3%	8%	0.3x	70K DV01
Trade #9 | Buy Mbono Jun '22s, FX unhedged	NEW	Beta	●	◆	23%	10%	4%	2.7x	90K DV01
Trade #10 | Long USDJPY		Beta	◆	△	35%	7%	11%	0.6x	70MM
Trade #11 | Long EURAUD	NEW	Hedge	●	●	-49%	14%	12%	1.1x	65MM
Trade #12 | Short USDMYR	NEW	Beta	●	●	33%	3%	8%	0.4x	105MM
Trade #13 | Long Credit in Argentina, Indo, Russia (1:1:1)	NEW	Beta	◆	△	45%	4%	10%	0.4x	110K DV01
Trade #14 | Buy CDX HY Sep-17 Risk Reversal		Hedge	●	◆	-73%	2%	2%	0.9x	95MM
Trade #15 | Short CMBX.BBB- S8	NEW	Hedge	●	◆	-64%	3%	10%	0.3x	25MM
Trades removed		**Date removed**							
Short EUR 5y5y Breakevens		04-Jun-17							
Long GBPAUD		04-Jun-17							
Long China A Shares vs. EM		04-Jun-17							
Receive Korea 1y1y Rates		04-Jun-17							

Note: "Corr. to ACWI" is 10yr correlation to MSCI ACWI. Sizes are scaled to achieve similar volatility contribution (equivalent of 8% vol for a 100MM portfolio) unless liquidity is constrained. Value is flagged based on the 10yr percentile of the relevant metric. Momentum is flagged based on the 10yr percentile of current 3m Momentum. Return numbers are approximate. (See trades #1 and #14 for key risks on options trades.)

Executive Summary | Our ‘Top Trade’ Portfolio Characteristics

Reflation via Equities, Hedges in Credit

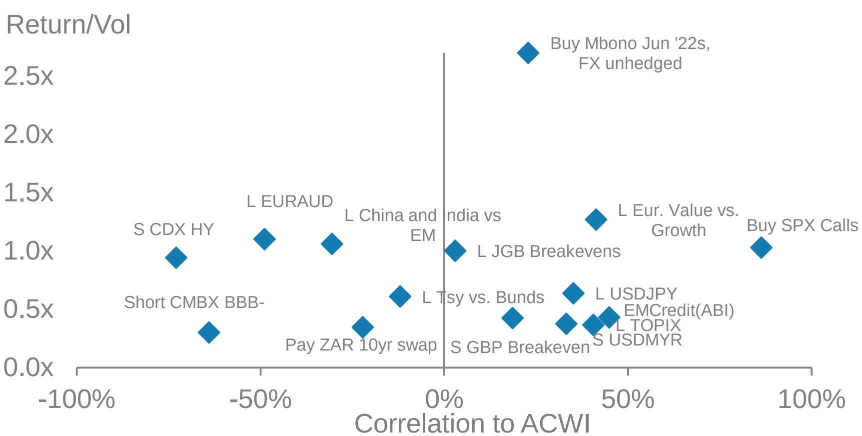
- **Modestly long stocks:** The portfolio has modest net long exposure to stocks via S&P, TOPIX and European value vs. growth) even as credit hedges and EURAUD long provide hedging offset.

- **Higher rates:** The portfolio exposure to higher rates is much lower vs. previous months with the addition of a Treasury vs. Bunds trade in the portfolio.

- **Long USD:** Portfolio exposure to the dollar has changed a lot, now benefitting from a weaker DXY.

- **Neutral oil:** Portfolio has marginal positive exposure to oil.

Trade Risk/Reward and Correlation to MSCI ACWI



Source: Bloomberg Morgan Stanley Research forecasts

Top Trades – Exposure to Stocks, Rates, DXY and Oil

	Asset	Beta to ACWI
	Wtd. Average Beta	44%
1	Buy SPX Calls	40%
2	L TOPIX	19%
3	L Eur. Value vs. Growth	18%
4	L USDJPY	15%
5	S USDMYR	15%
6	Buy Mbono Jun '22s, FX	11%
7	Long Brazil Credit	7%
8	Long Indonesia Credit	7%
9	S GBP Breakeven	6%
10	L JGB Breakevens	1%
11	Receive KRW 1Y1Y Rate	-2%
12	L Tsy vs. Bunds	-5%
13	Short CMBX BBB-	-9%
14	Pay ZAR 10yr swap	-10%
15	L China and India vs EM	-14%
16	L EURAUD	-22%
17	S CDX HY	-33%

	Asset	Beta to UST10yr
	Wtd. Average Beta	-26%
1	L Tsy vs. Bunds	72%
2	S CDX HY	43%
3	L EURAUD	25%
4	L China and India vs EM	17%
5	Buy Mbono Jun '22s, FX	11%
6	Short CMBX BBB-	9%
7	L JGB Breakevens	1%
8	Receive KRW 1Y1Y Rate	0%
9	Pay ZAR 10yr swap	-1%
10	S USDMYR	-10%
11	L TOPIX	-11%
12	S GBP Breakeven	-17%
13	Long Brazil Credit	-17%
14	L Eur. Value vs. Growth	-21%
15	Long Indonesia Credit	-24%
16	Buy SPX Calls	-50%
17	L USDJPY	-54%

	Asset	Beta to DXY
	Wtd. Average Beta	-40%
1	L USDJPY	30%
2	S CDX HY	25%
3	L China and India vs EM	24%
4	S GBP Breakeven	4%
5	Receive KRW 1Y1Y Rate	2%
6	L JGB Breakevens	0%
7	Short CMBX BBB-	0%
8	Long Indonesia Credit	-1%
9	Long Brazil Credit	-4%
10	L TOPIX	-5%
11	L EURAUD	-11%
12	Pay ZAR 10yr swap	-15%
13	Buy Mbono Jun '22s, FX	-16%
14	S USDMYR	-16%
15	L Tsy vs. Bunds	-18%
16	L Eur. Value vs. Growth	-20%
17	Buy SPX Calls	-20%

	Asset	Beta to Oil
	Wtd. Average Beta	9%
1	Buy SPX Calls	8%
2	L Eur. Value vs. Growth	6%
3	S USDMYR	4%
4	L TOPIX	3%
5	Pay ZAR 10yr swap	3%
6	L USDJPY	3%
7	Buy Mbono Jun '22s, FX	2%
8	Long Brazil Credit	2%
9	Long Indonesia Credit	2%
10	Receive KRW 1Y1Y Rate	0%
11	L JGB Breakevens	-1%
12	L Tsy vs. Bunds	-2%
13	Short CMBX BBB-	-2%
14	S GBP Breakeven	-3%
15	L China and India vs EM	-4%
16	L EURAUD	-6%
17	S CDX HY	-7%

Source: Morgan Stanley Research, Bloomberg

Executive Summary | Our Advice

What We Expect	What's Priced in	Our Advice
• **A positive first derivative:** Global synchronous growth is on a surer footing, despite softness in the second derivative, notably in China. 2018 will be more challenging.	• **Credit rich, volatility low:** Market pricing credit to perfection, with little late-cycle risks in the price. Credit and equity volatility extremely low.	• **Stocks > credit, select vol longs:** Late-cycle market supports equity over credit. Calls on S&P, and HY puts underprice tails (see trades #1 and #14), especially as US equities can still see boost from market euphoria typical in late-cycle.
• **Late-cycle environment:** An expansion that's long in the tooth means risks of fatter tails rise; animal spirits can also get more powerful.	• **Beatable earnings for 2017:** Despite solid synchronous global growth, earnings look beatable vs. our strategists' forecasts across most regions for this year.	
• **Japan recovery on track:** We think the prospects for reflation in Japan are very much alive, with a tight labour market and supportive currency base effects.	• **Little reflation priced in Japan:** FX, inflation and equities have all seen the post-election gains dissipate steadily.	• **Don't give up on Japan:** Long JGBei breakevens, long USDJPY and long TOPIX are ways to position for a continued Japan recovery.
• **EM isn't all 'trumped':** Overall, 2017 should see better growth, lower inflation and easier policy; lots of country-level divergence.	• **EM bonds better than stocks:** Credit and equity valuations are similarly 'average' on a 10yr range, but stocks are more vulnerable to a strong USD.	• **Further upside in idiosyncratic stories:** We prefer receiving local rates in Mexico and credit in Argentina, Indonesia and Russia. Bullish on EMFX.
• **Gradual withdrawal of CB liquidity:** Six more Fed hikes out to end-2018, normalising balance sheets for both Fed and ECB, BoJ to hike 10Y target rate in 1Q18.	• **Market pricing uneven:** Inflation and policy rate expectations in some markets do not fully reflect the risks of either inflation disappointments or a faster pace of hikes.	• **Hedge risk through rates and FX:** Short GBP breakevens, short AUD (vs. EUR), long UST vs. DBRs.

Note: See trades #1 and #14 for key risks on options trades.

Executive Summary | Where We Differ and Key Changes

Where We Differ

MACRO

- **Japan growth and inflation – higher:** Yen depreciation, demand recovery via a tight labour market and fiscal spending should help prices rise even after base effects recede.
- **Fed more hawkish:** We expect six more Fed hikes out to end-2018, in addition to balance sheet reinvestment wind-down.
- **Australia less hawkish:** We think that rates markets are priced more hawkishly than the macro warrants.

STRATEGY

- **Some more JPY weakness ahead, helping TPX:** USDJPY to 116 by 2Q18, lifting stocks.
- **More bullish on US and Japan equities:** Above-consensus 2017 EPS growth and currency tailwinds drive our regional equity preference.
- **Cautious on credit:** Late-cycle will not benefit credit; more hawkish Fed reduces liquidity.

Key Changes (Trades)

EQUITIES

- We switch from long China A-Shares vs. EM to long MSCI China and India vs. EM, as higher rates and regulatory tightening are headwinds to onshore Chinese equities.

RATES

- We switch our short EUR 5y5y inflation to a short GBP 10y breakevens trade, as UK inflation markets are pricing for more extreme inflation outcomes.
- We also add long 30y UST vs 30y Bunds.

EM

- We closed our ‘receive Korea 1Y1Y rates’ trade and see better risk/reward in other EM local trades.
- **New EM trades:** Buy Mbono Jun ’22s (FX-unhedged), long ‘AIR’ credit. Pay ZAR 10y swap,

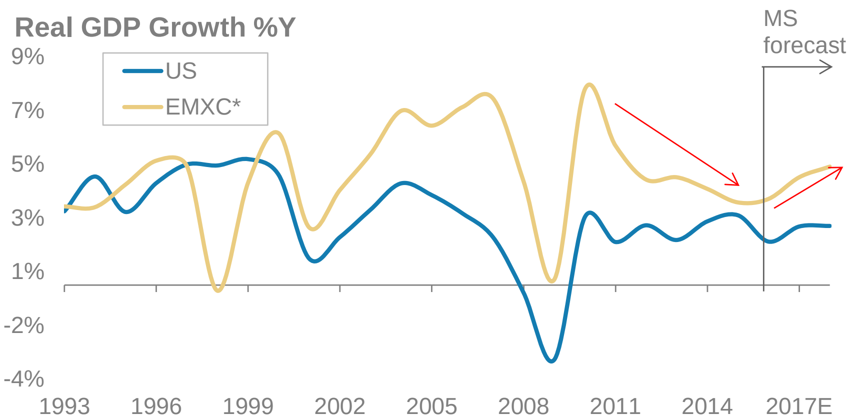
FX

- GBPAUD long has worked and we switch to long EURAUD for better risk/reward.
- We like short USDMYR, given cheap valuations and an improving growth backdrop.

The Outlook: Growth on a Surer Footing

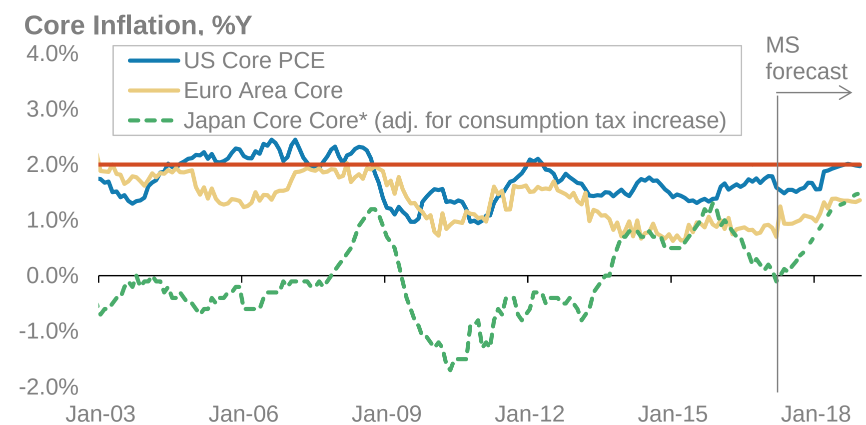
Macro Outlook | '1st Derivatives' Supportive: Growth and CPI% Higher, Policy Rates Still Low…

First Synchronous Recovery in Both DMs and EMs Since 2010



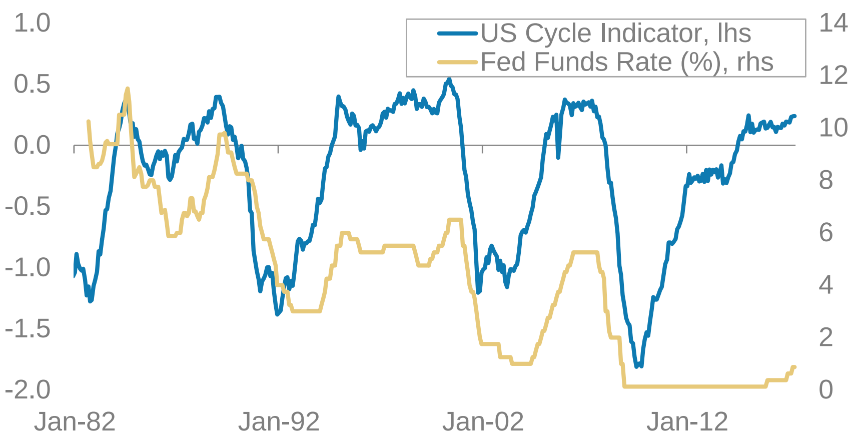
Source: IMF, National sources, Morgan Stanley Research forecasts. *Note: EMXC excludes China, Ukraine, Kazakhstan, Venezuela, Nigeria and Saudi Arabia.

G3 Core Inflation Grinding Higher



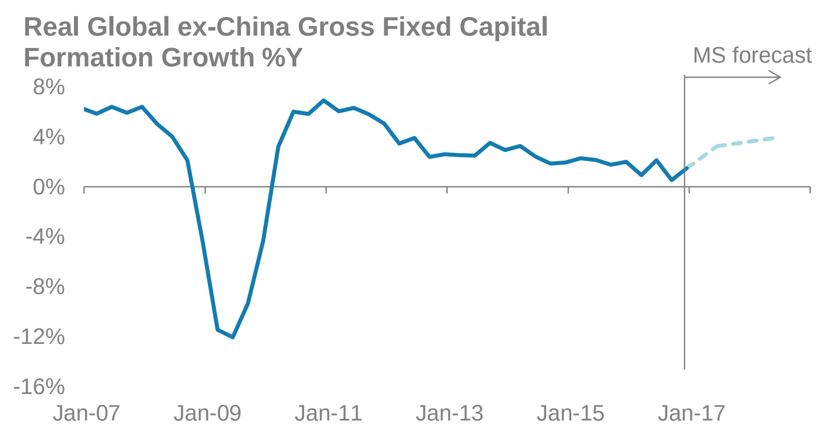
Source: Morgan Stanley Research forecasts, national sources

Policy Rates Have Remained Low Despite Late-Cycle



Source: Morgan Stanley Research, Bloomberg

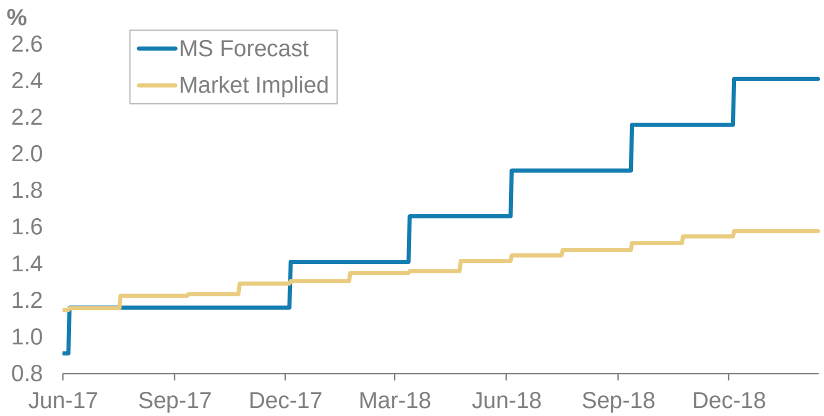
Investment Growth Recovery to Continue



Source: Morgan Stanley Research forecasts, National sources, IMF Note: The Global ex China aggregate includes eight DMs and 23 EMs under Morgan Stanley coverage, releasing quarterly GDP statistics, and accounting for 65% of global GDP

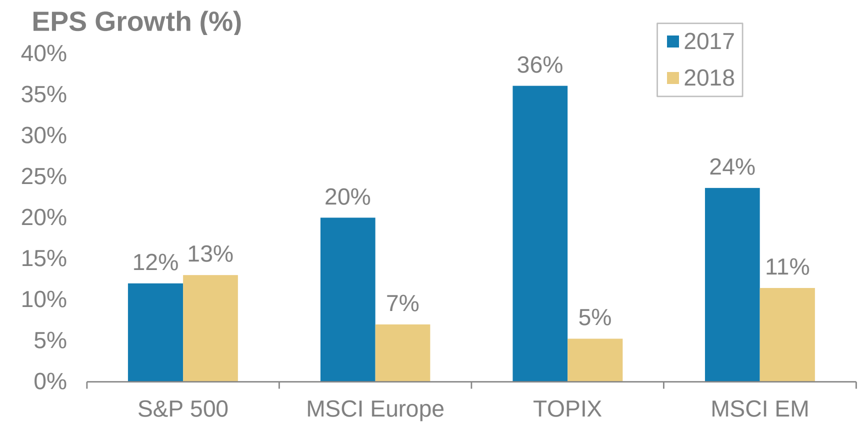
Macro Outlook | … Even as '2nd Derivatives' and 2018 Look More Challenged

We Expect More Fed Tightening than Market Is Pricing



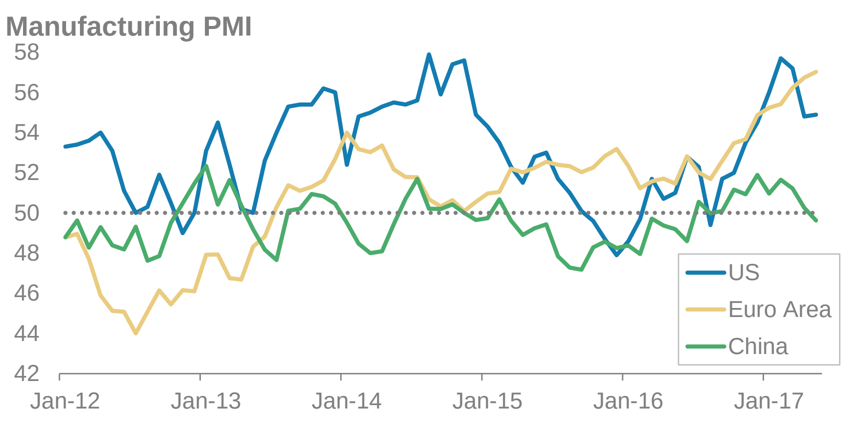
Source: Morgan Stanley Research forecasts, Bloomberg

Comps for 2018 Will Be Harder and EPS Growth Looks Worse



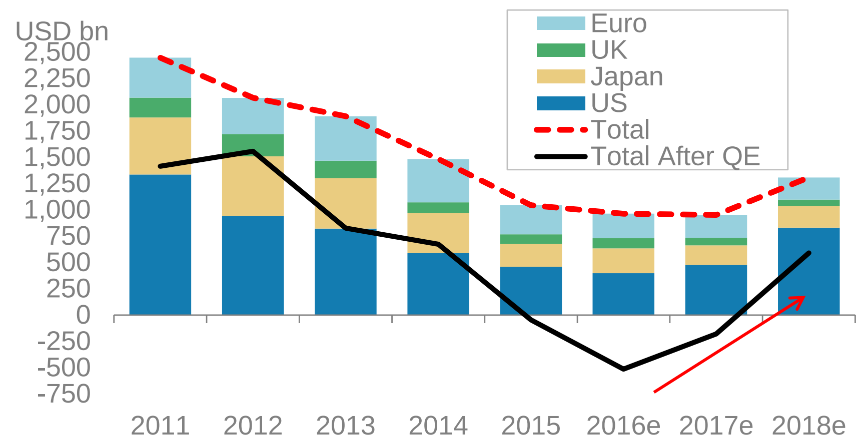
Source: Morgan Stanley Research forecasts

Some Regional PMIs Seem to Have Peaked



Source: Morgan Stanley Research, Haver Analytics

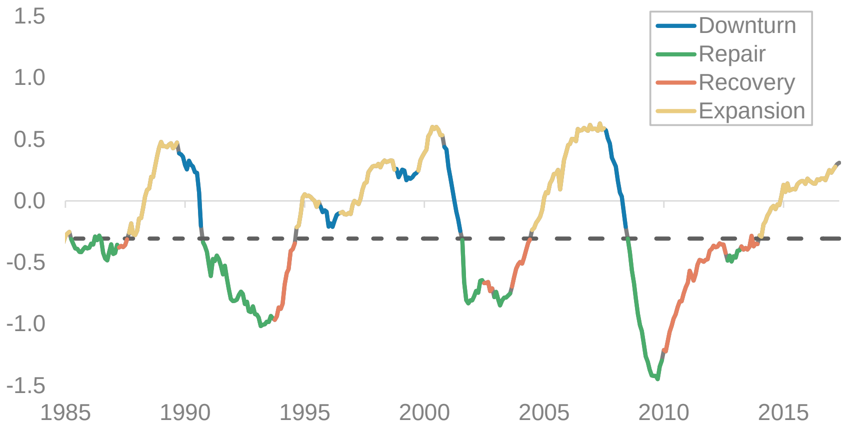
Global Bonds Net Issuance to Increase Materially Next Year



Source: Morgan Stanley Research forecasts, national sources

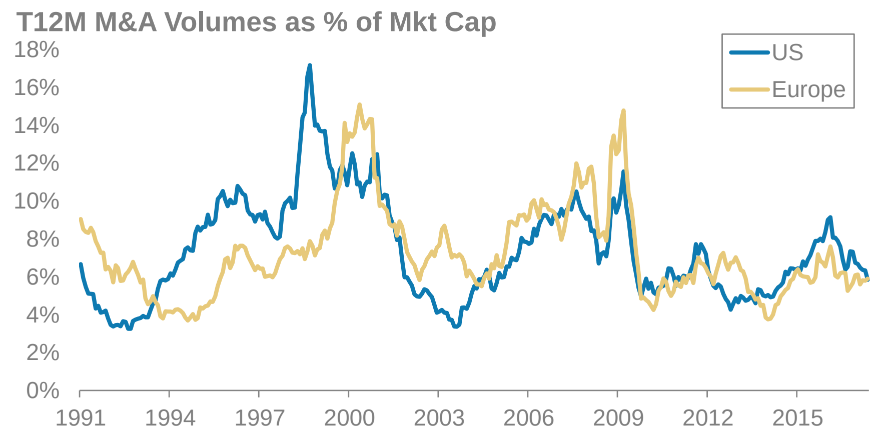
Fear of Missing Out | There Is Room for Risk Appetite to Increase

Our DM Cycle Indicator Points to Continued 'Expansion'



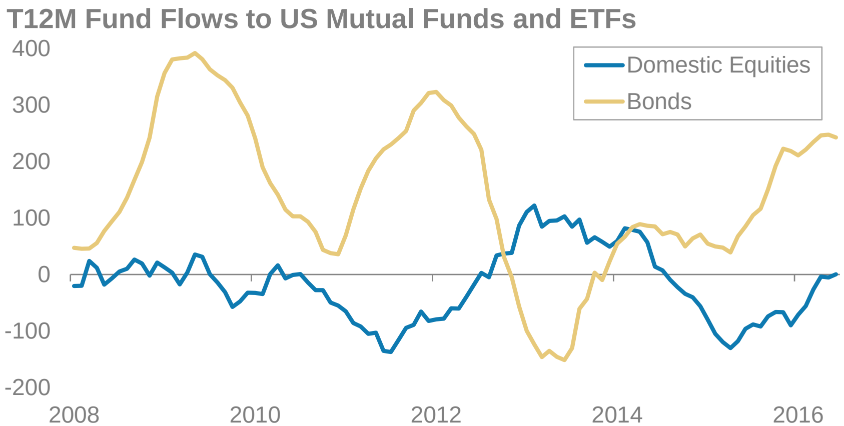
Source: Bloomberg, Haver Analytics, Morgan Stanley Research

But M&A Still Tepid…



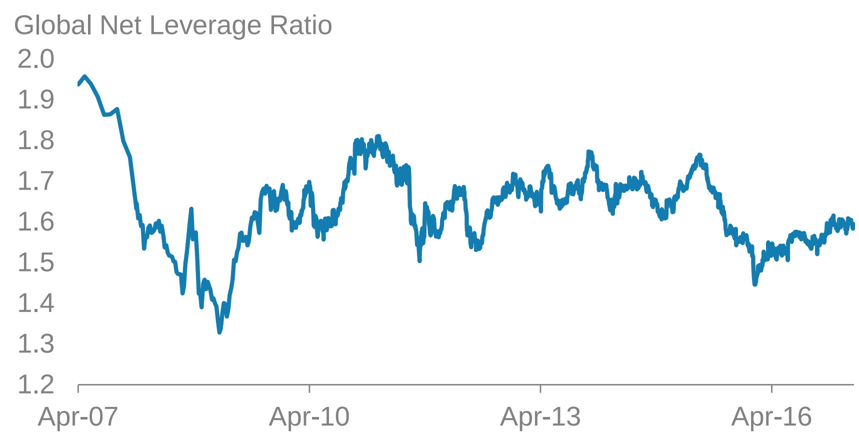
Source: Morgan Stanley Research, Thomson Financial

…and Flows into Equities Low vs. Fixed Income…



Source: Haver Analytics, Morgan Stanley Research

…and Funds Net Leverage Moderate, No Sign of Excess Yet



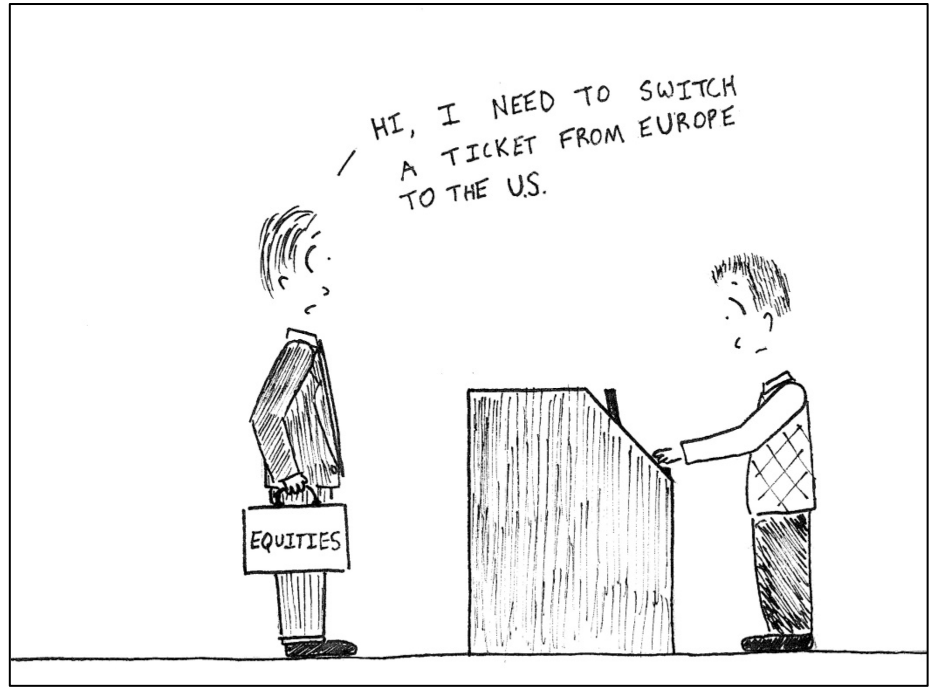
Source: Morgan Stanley Prime Brokerage

Outlook | Our Framework Favours Equities > Credit > Government Bonds

		#1: LR Valuations		#2: Cycle		#3: 12M Outlook	MS Asset Allocation vs. Bchmrk
		Risk Premium		Cycle Rtns Boost/Drag		MS 12M Rtn Forecast	
Equities	US	1.2%	△	5%	●	12.9%	+2%
	Europe	3.9%	●	3%	●	12.0%	+1%
	Japan	7.6%	●	5%	●	10.7%	+2%
	EM	5.7%	●	-4%	△	5.4%	+0%
Bonds	Treasuries	0.7%	◆	0%	△	1.1%	+0%
	Bunds	-0.8%	◆	-1%	◆	-3.3%	-3%
	JGBs	0.5%	△	0%	◆	-0.6%	-2%
Credit	US IG	0.4%	△	-1%	△	-0.5%	-2%
	US HY	1.2%	△	-5%	△	-2.6%	
	EUR IG	0.7%	△	0%	◆	0.2%	-1%
	EUR HY	0.9%	△	-4%	◆	0.2%	
	EM $	3.0%	●	-4%	◆	1.7%	+2%

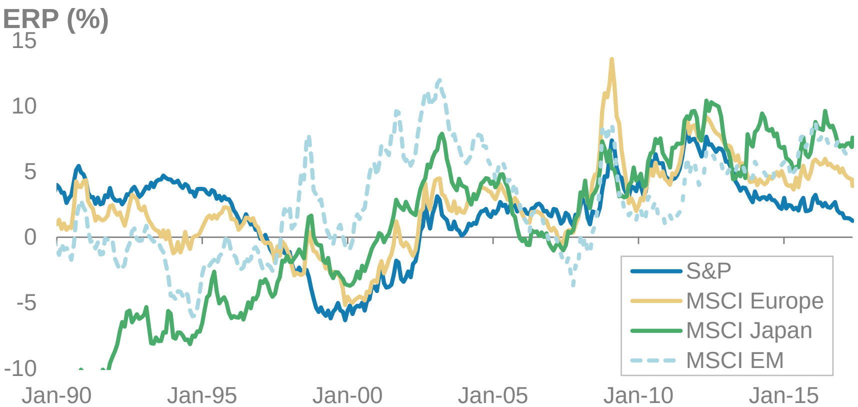
Source: Morgan Stanley Research forecasts; Note: 'Risk premium' for bonds represents real yields. 'Cycle Rtns Boost/Drag' shows historical forward 12-month returns relative to average when US cycle is in current phase (expansion). All returns for credit are excess returns.

Asset Class Views



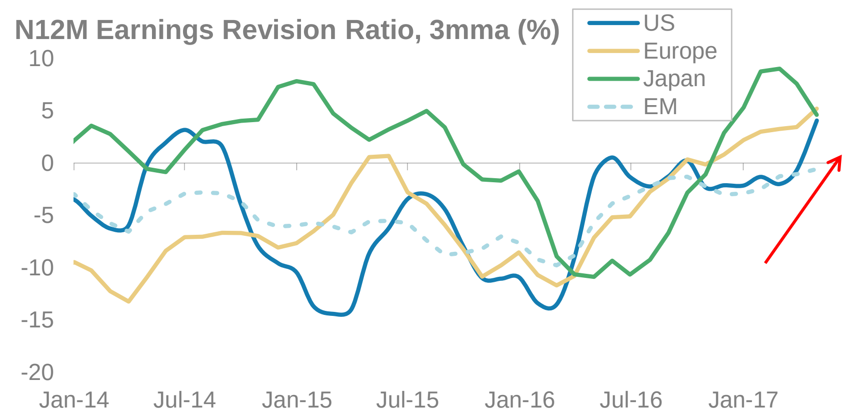
Global Equities | Equities Is Our Preferred Asset Class; US and Japan > Europe and EM

Equity Risk Premiums Remain Average



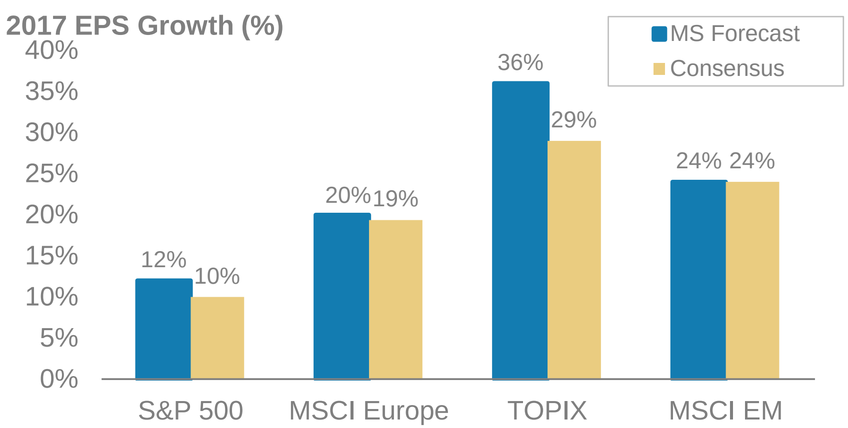
Source: Morgan Stanley Research

Earnings Revisions Ratios Are High Globally



Source: Morgan Stanley Research, IBES

Japan, US and Europe Have Above-Consensus EPS Growth



Source: Morgan Stanley Research forecasts, MSCI, RIMES, IBES

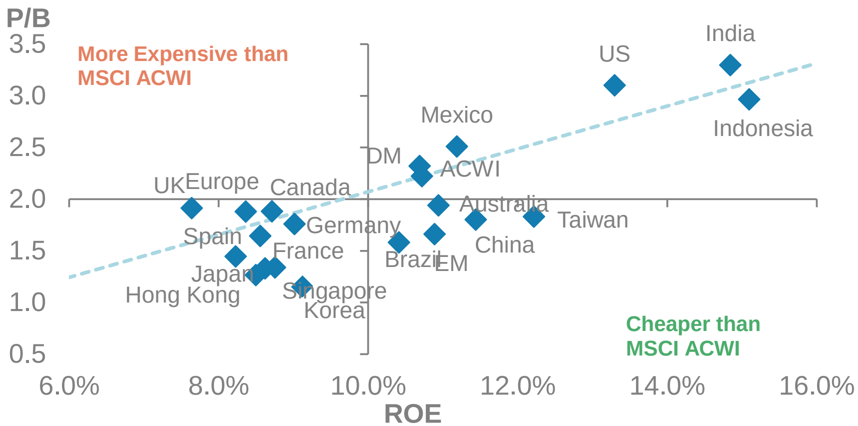
Morgan Stanley Sector/Style Preferences Across Regions

Sector and Style Preferences	S&P 500	MSCI Europe	Topix	MSCI EM
Sector Preferences	**OW:** Financials, Industrials, Energy, IT **UW:** Real Estate, Telecom, Staples	**OW:** Financials, Telecom, Real Estate **UW:** Industrials, Consumer Discretionary, IT	**OW:** IT, Financials, Real Estate **UW:** Utilities, Telecom and Staples	**OW:** IT and Financials **UW:** Utilties, Telecom, Energy, and Autos
Style Preferences	**1)** Cyclically-oriented; **2)** Preference for small/mid caps	**1)** OW Value **2)** UW weaker GBP and EUR beneficiaries **3)** OW Domestic Eurozone exposure	**1)** Corporate Restructuring; **2)** Governance & Shareholder Rewards; **3)** Domestic reflation beneficiaries; **4)** Exporters leveraged to weaker Yen vs Euro	**1)** OW Quality & UW High Dividend Yield **2)** Neutral Growth vs Value

Source: Morgan Stanley Research

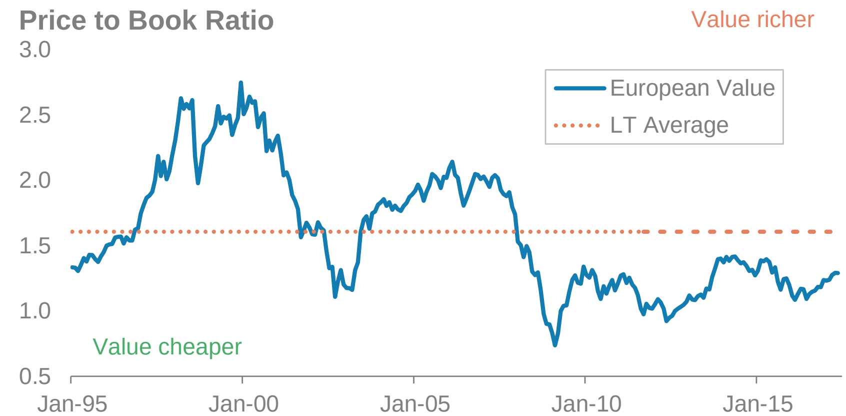
Global Equities | Global Equities Sectors/Style: Four Observations

P/B vs. ROE Scatter



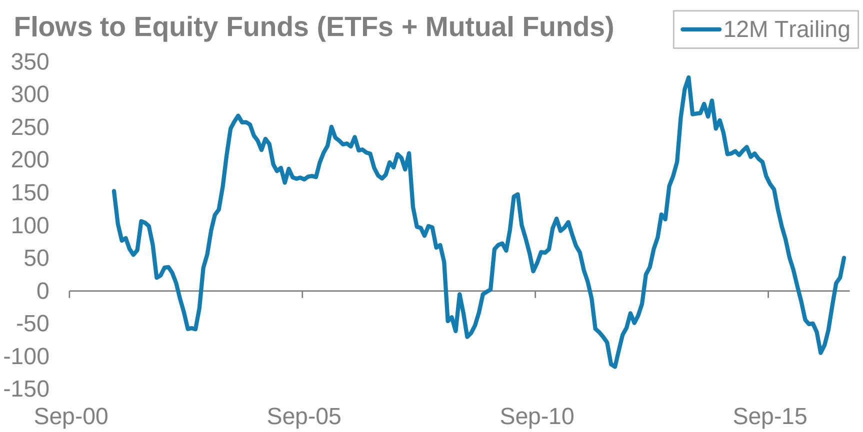
Source: Morgan Stanley Research, MSCI, RIMES

We Like European Value > Growth



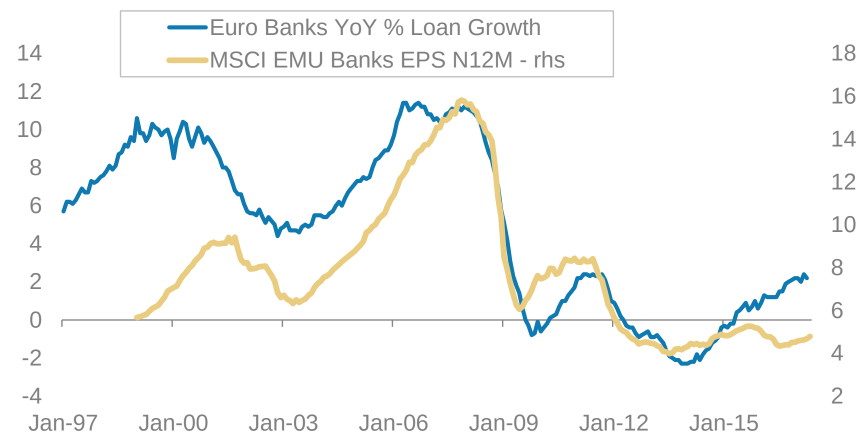
Source: Morgan Stanley Research, MSCI, RIMES

How Extended Are Equity Fund Flows vs. History?



Source: Morgan Stanley Research, Haver Analytics

Rising Loan Growth Is Supportive for Europe Financials



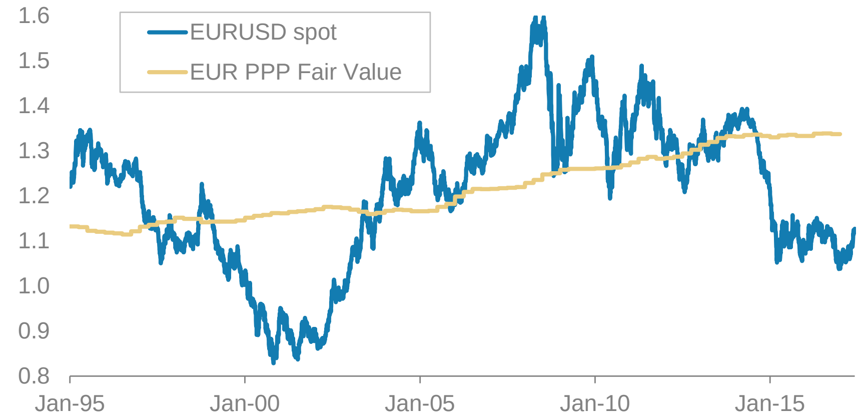
Source: Morgan Stanley Research, MSCI, IBES, Haver Analytics, ECB

Global FX | Mixed USD; Bullish EUR and EM and Bearish AUD, JPY

We Expect the DXY to Fall Through 1Q18

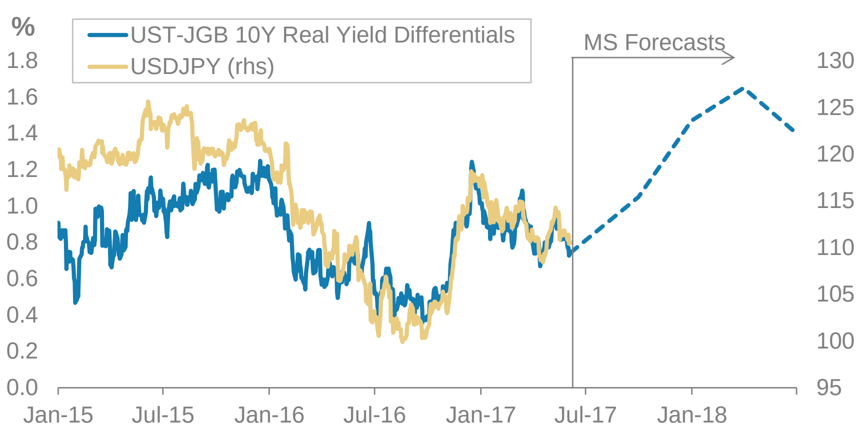
Source: Morgan Stanley Research forecasts, Bloomberg

EUR Is Weak on a Historical Basis; We Expect it to Strengthen



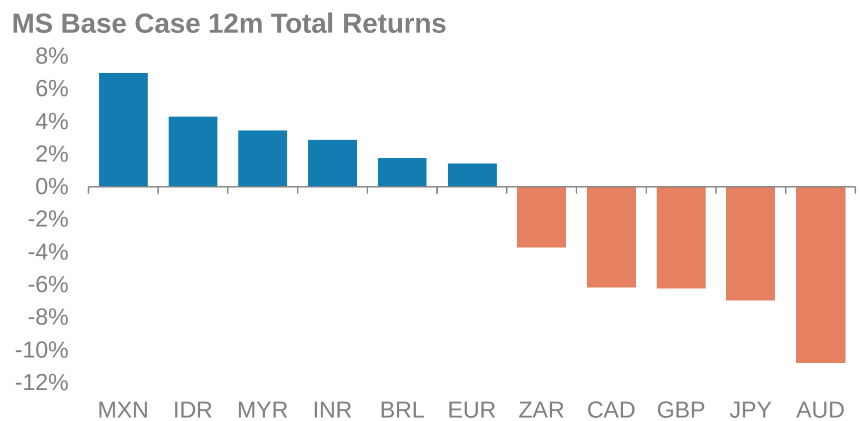
Source: Morgan Stanley Research, Bloomberg

Wider Real Yield Differentials Should Drive USDJPY Up



Source: Morgan Stanley Research forecasts, Bloomberg

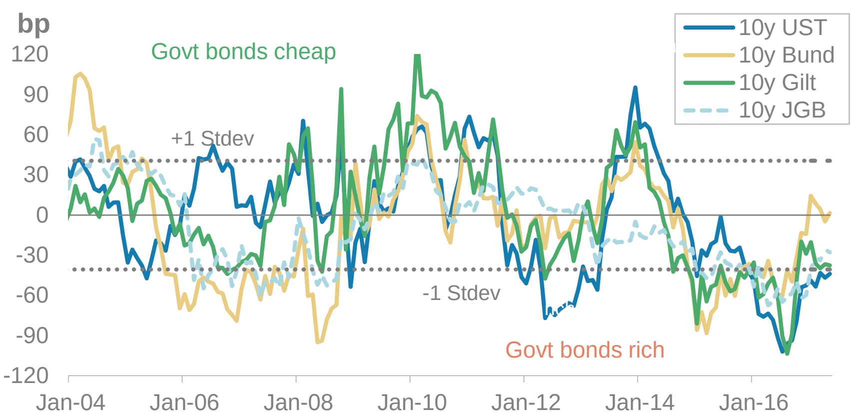
We See Gains in MXN and Weakness in AUD, CAD and JPY



Source: Morgan Stanley Research forecasts, Bloomberg

Global Rates | We Prefer the US and UK Over Japan, Bearish on Europe

Four-Factor Model Points to Rich Bond Valuations

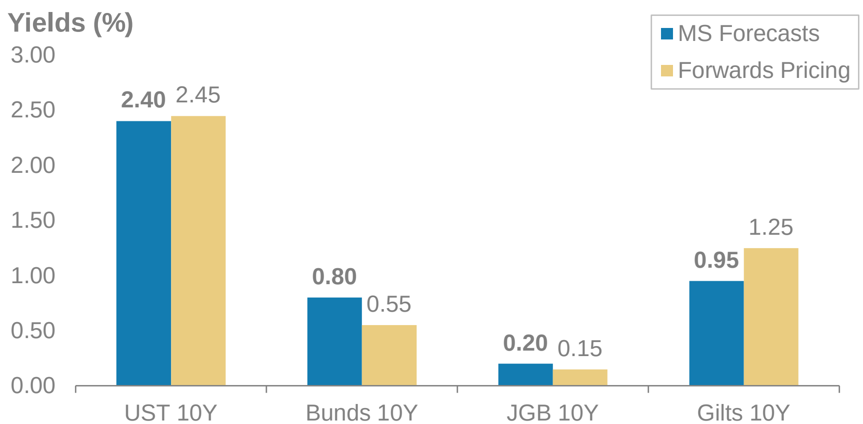


Source: Morgan Stanley Research, Bloomberg; Note: Chart shows the residual from a 4-factor regression model for rates valuation.

We Expect Euro Area Core Inflation to Rise Further

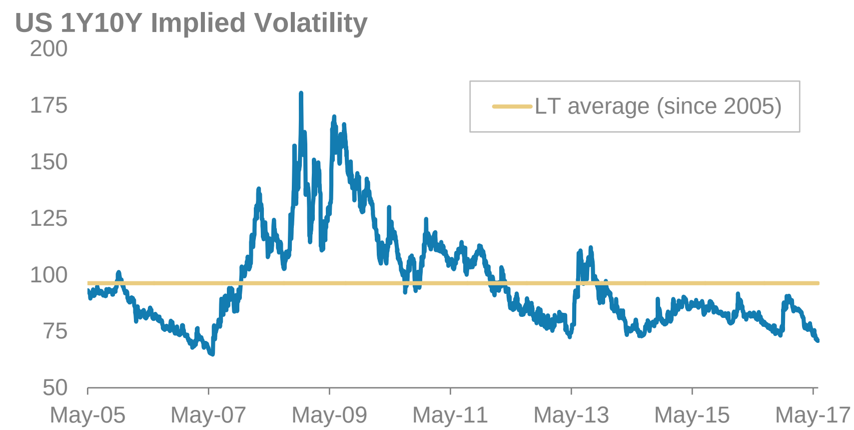
Source: Morgan Stanley Research forecasts, Bloomberg

Morgan Stanley Rates Forecasts versus Forwards



Source: Morgan Stanley Research forecasts, Bloomberg

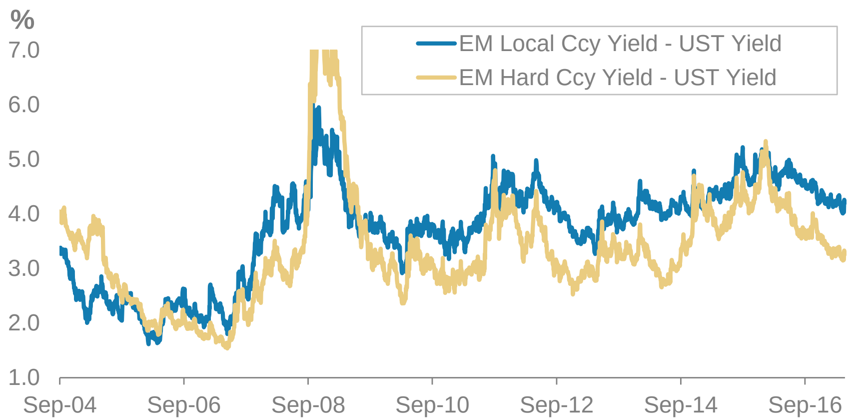
Rates Vol Suggests Complacency in Rates Trajectory



Source: Morgan Stanley Research, Bloomberg

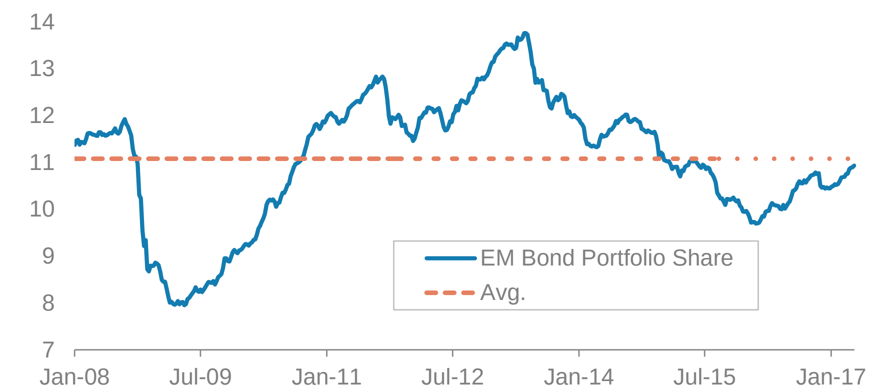
EM Fixed Income | **Bullish on EM Local Rates, FX and Credit**

EM Yield Differentials vs. US Still Attractive



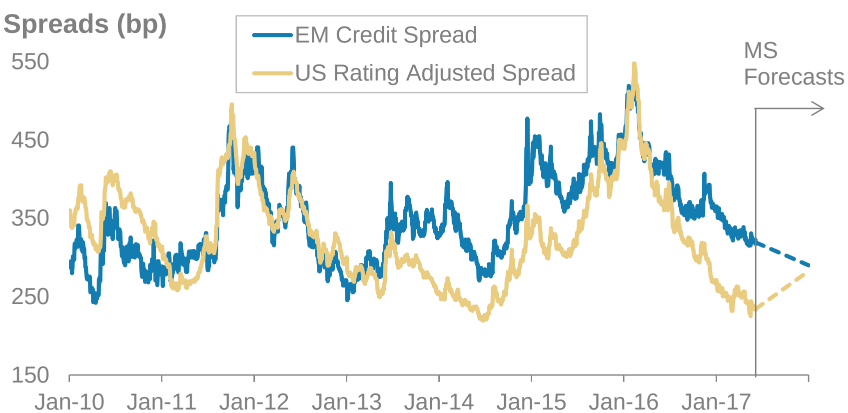
Source: Morgan Stanley Research, Datastream, Bloomberg; Note: We use the difference between JPM GBI-EM local index yields and UST 10y yields.

Despite Strong Inflows, Positioning in EM Not Crowded



Source: IIF, Morgan Stanley Research

We Expect EM Sovereigns to Outperform US Credit



Source: Morgan Stanley Research, Bloomberg; Note: US rating-adjusted spread takes a weighted average of the US HY and IG indices to equate the ratings of the US and EM indices.

Our Top Picks in EM Fixed Income

	Rates	Credit
Likes	India	Argentina
	Indonesia	Indonesia
	Mexico	Mexico
	Poland	Russia
	Russia	Turkey
	South Korea	Ukraine
	Turkey	
Dislikes	Chile	Chile
	China	Peru
	South Africa	South Africa

Source: Morgan Stanley Research; For valuation methodology and risks see slide 55.

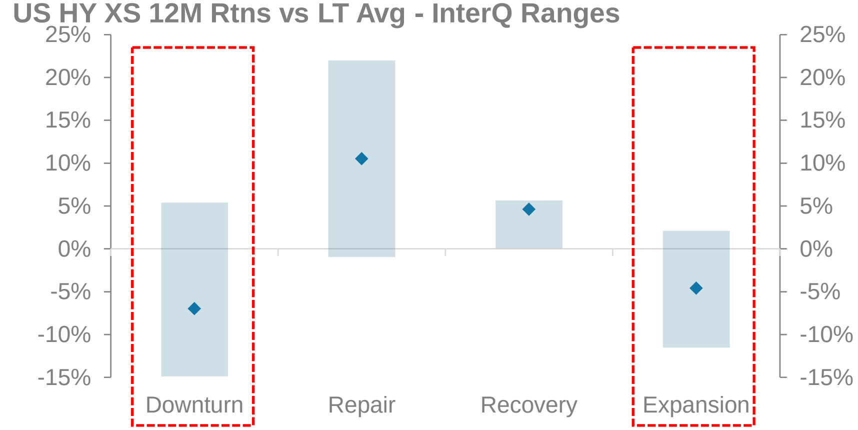
Global Credit | Late-Cycle Risks Lead to Up-in-Quality Bias; We Are Cautious

Loss-Adjusted Credit Spreads

	Current	20Y Pctile
US IG	97	31%
US HY	105	24%
EU IG	93	49%
EU HY	128	14%

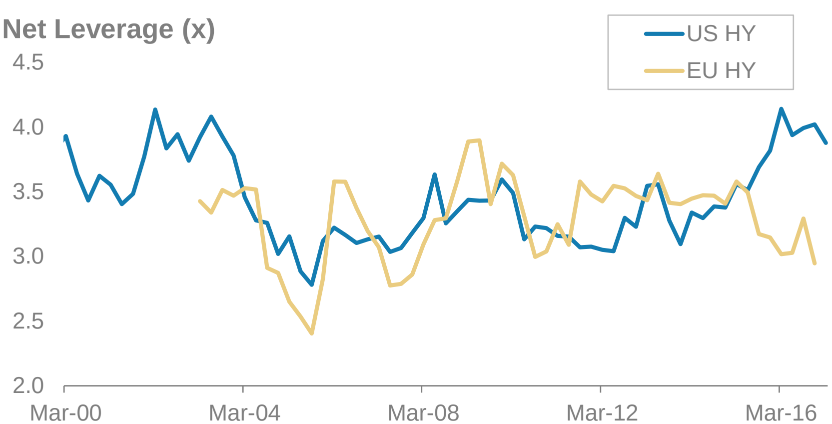
Source: Morgan Stanley Research, Bloomberg, Moody's

HY Underperforms in Expansions and Downturns



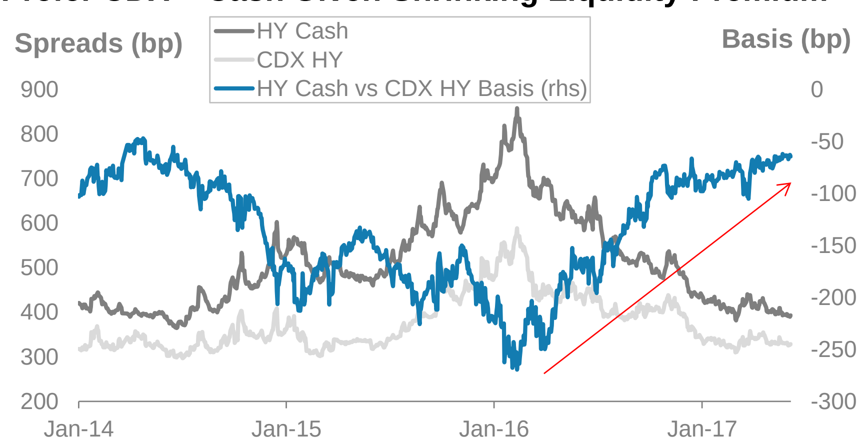
Source: Morgan Stanley Research, Bloomberg, Haver Analytics; Note: Data from 1985/when data start. See Our Cycle Models: The Late Cycle Playbook (30 May 2017) for more.

High Yield Leverage: US > Europe



Source: Morgan Stanley Research, Bloomberg Finance LP, Citigroup Index LLC, Thomson Financial, company data

Prefer CDX > Cash Given Shrinking Liquidity Premium



Source: Morgan Stanley Research, Citigroup Index LLC

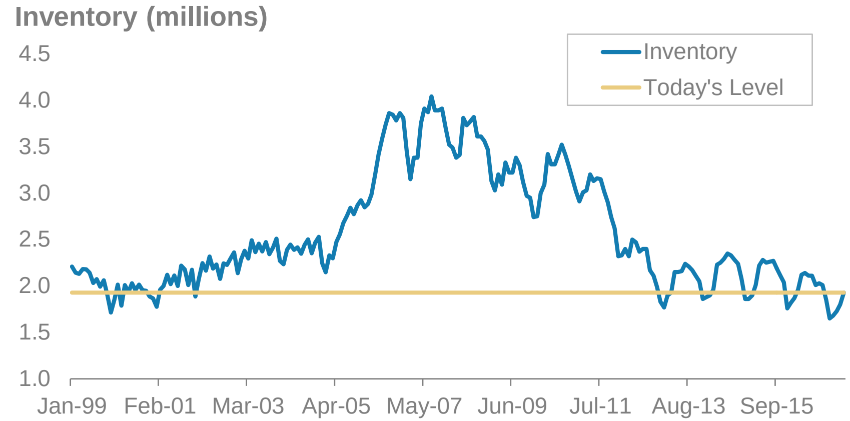
Global Securitized | Residential > Commercial Real Estate

SPG Current Level and Spread Forecasts

	Current Level (bp)	2Q18 Base Case Spreads Forecasts (bp)
US Non-Agency Legacy (Alt-A)	150	150
EU CLO 2.0 Seniors	89	90
CRT M1	100	110
US CLO AAA	122	130
Agency CMBS (10yr)	60	60
US CMBS AAA	95	100
CRT M2/M3	300	350
US Agency MBS TOAS	17	18
US CMBS BBB-	375	425
US CLO BBB	365	425

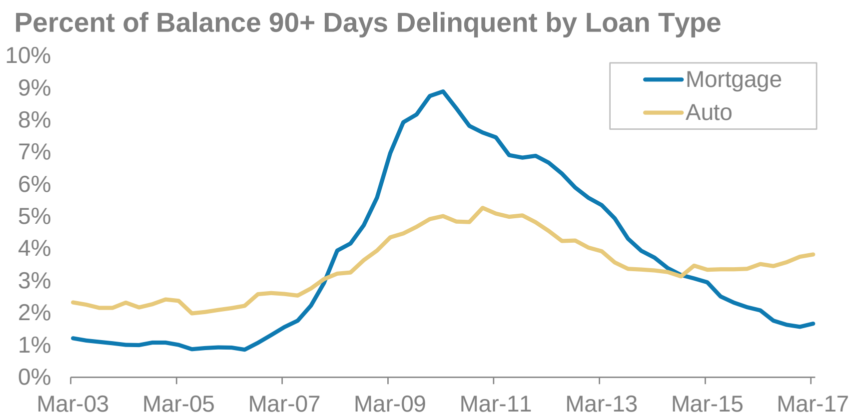
Source: Morgan Stanley Research forecasts

Existing Home Inventories Are Historically Low



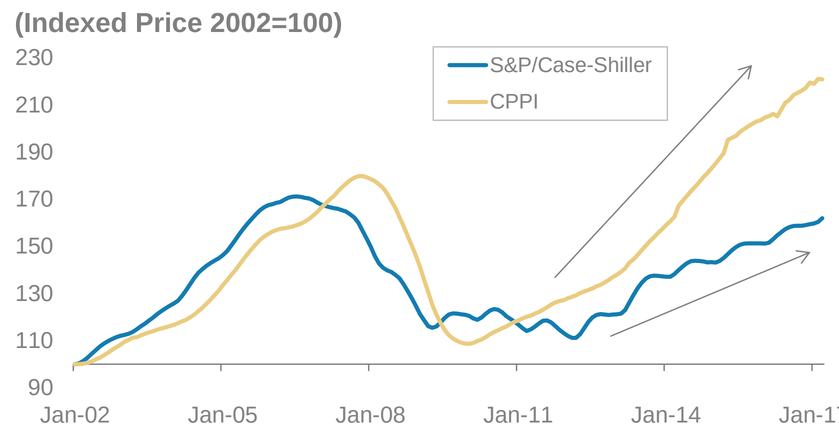
Source: Morgan Stanley Research, NAR, Bloomberg

Autos Delinquencies Are Picking Up



Source: Morgan Stanley Research, New York Fed

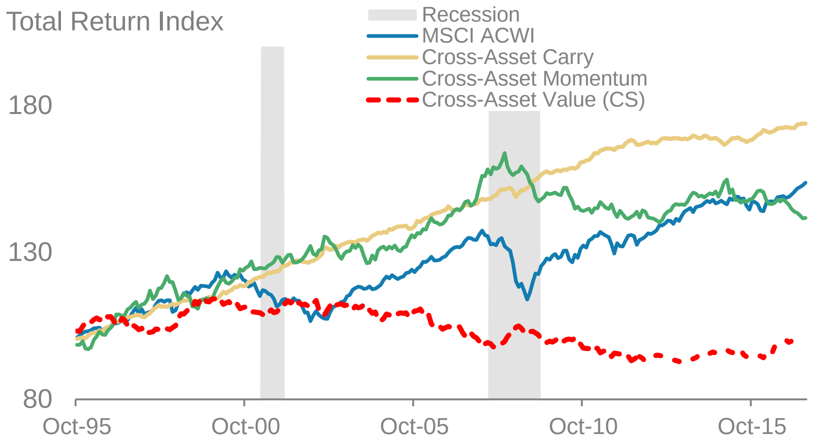
End of CRE Bull Cycle; Resi Home Prices Have Room to Rise



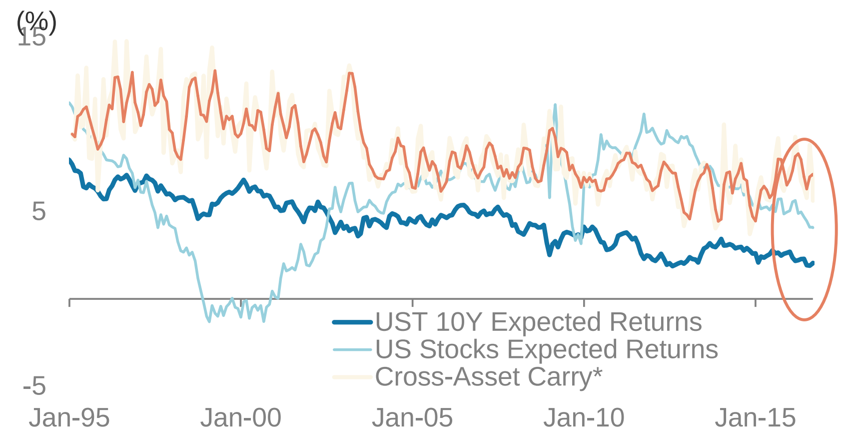
Source: Morgan Stanley Research, Moody's/RCA, Case-Shiller

Cross-Asset Quant | Carry Isn't Overextended. Value Gets Momentum

Value Has Underperformed Carry and Momentum

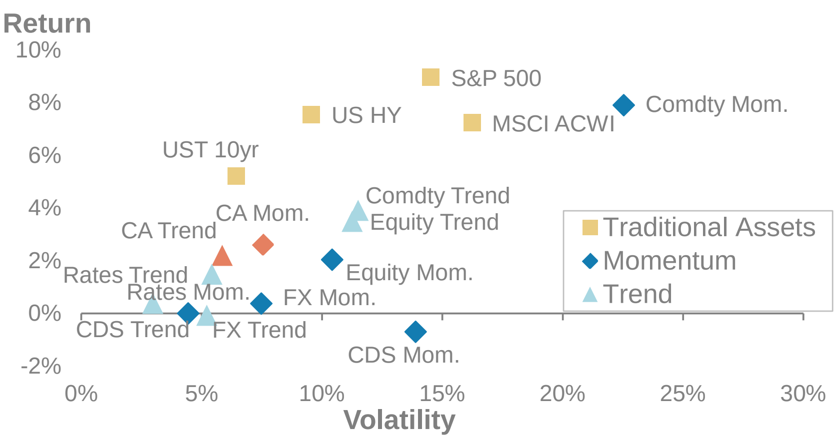


Carry Performance Is Not Overextended Recently

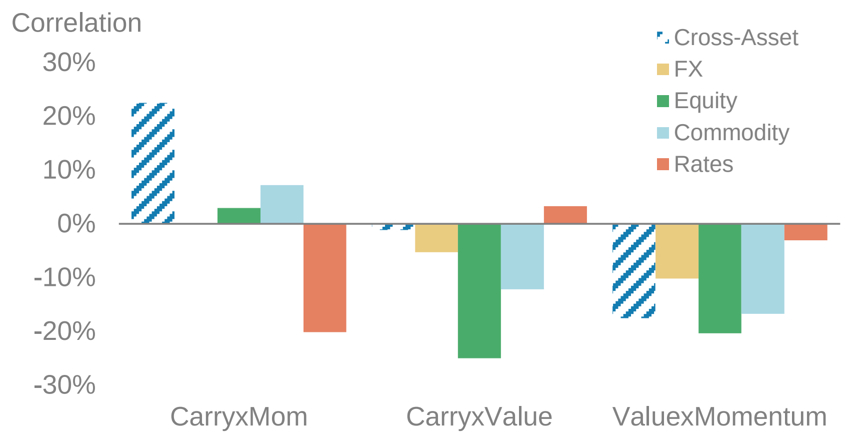


Source: Morgan Stanley Research, Bloomberg. (see Cross-Asset Quant: Why We Like Carry, Cross-Asset Quant: Momentum for Diversification, Cross-Asset Quant: Value Isn't Easy)

Momentum/Trend: Diversification with Modest Returns



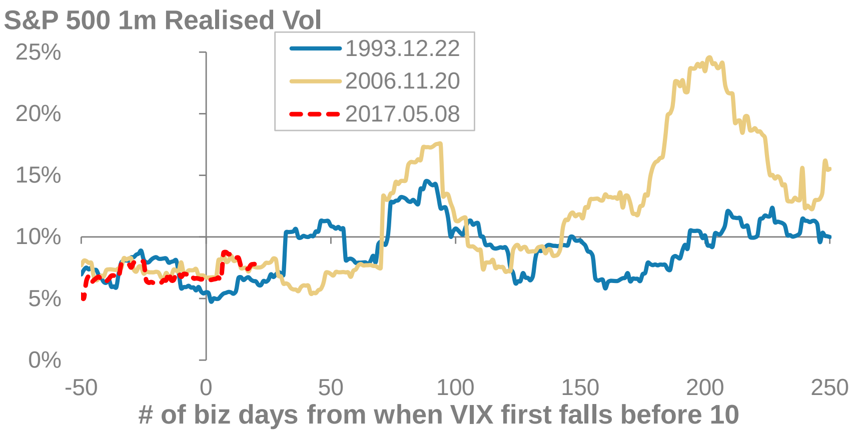
Value-Momentum Correlations Are Negative



Source: Morgan Stanley Research, Bloomberg. (see Cross-Asset Quant: Why We Like Carry, Cross-Asset Quant: Momentum for Diversification, Cross-Asset Quant: Value Isn't Easy)

Volatility | Credit and Equity Are Most Extreme on 10-Year Range

Low Equity Volatility Can Persist for Several Months



Source: Morgan Stanley Research, Bloomberg

Our Bull-Bear Forecasts Wider than What Options Imply

	Downside/Bear Case*		Upside/Bull Case*		MS Fcast /Option Imp	
	Options	MS	Options	MS	Bear	Bull
S&P 500	-11%	-14%	10%	23%	1.3	2.3
MSCI Europe	-17%	-20%	10%	31%	1.2	3.2
Topix	-16%	-31%	12%	30%	2.0	2.6
MSCI EM	-15%	-35%	13%	28%	2.3	2.2
EURUSD	-5%	-1%	8%	15%	0.3	1.8
GBPUSD	-6%	-14%	7%	0%	2.4	0.0
USDJPY	-10%	1%	5%	11%	-0.1	2.2
UST 10yr	-40	-40	86	80	1.0	0.9
DBR10yr	-17	-55	78	125	3.3	1.6
UKT 10yr	-32	-48	79	102	1.5	1.3

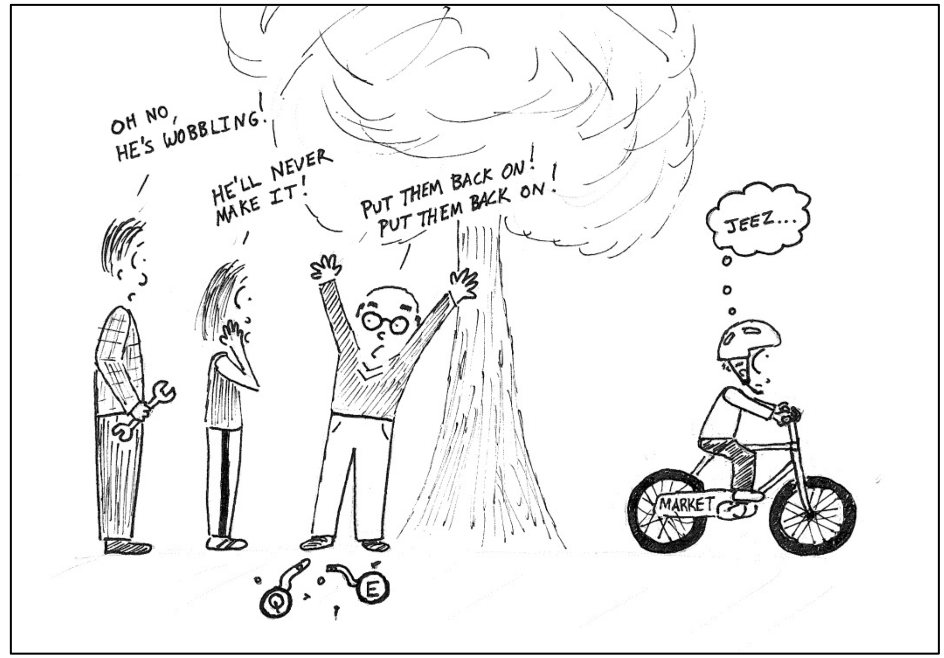
Source: Morgan Stanley Research forecasts, Bloomberg. Note: We use option-implied yield or forecast yield versus spot for rates.

Volatility Particularly Low in Equity and Credit

	Implied Vol 3m		Vol Skew 3m	
Index	Now	Δ1y on 10y Range	Now	Δ1y on 10y Range
Equities				
S&P 500	10.0%		5.6%	
Russell 2000	15.6%		4.3%	
Eurostoxx 50	13.6%		4.1%	
Nikkei	14.0%		2.9%	
MSCI EM	15.4%		3.6%	
FX				
JPYUSD	8.7%		-1.4%	
GBPUSD	8.0%		1.1%	
EURUSD	6.7%		0.2%	
AUDUSD	7.7%		1.0%	
BRLUSD	15.1%		3.3%	
KRWUSD	8.6%		2.1%	
Rates				
US10y	64		-4	
EU10y	44		8	
Credit				
CDX IG	19		12.4%	
iTraxx Main	20		14.0%	
CDX HY	3.5%		2.1%	
iTraxx Xover	3.5%		12.7%	
Commodities				
BrentCrude	28.7%		3.0%	
Gold	12.1%		-1.0%	
Copper	16.6%		1.6%	

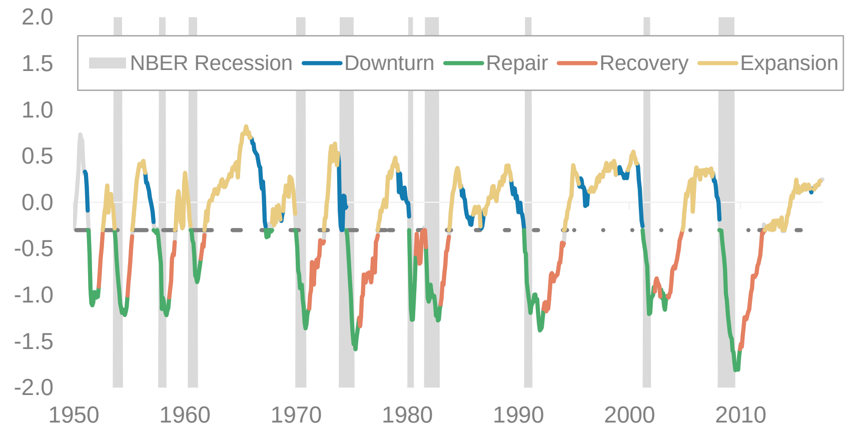
Source: Morgan Stanley Research

Key Debates


OH NO, HE'S WOBBLING!
HE'LL NEVER MAKE IT!
PUT THEM BACK ON! PUT THEM BACK ON!
JEEZ...
MARKET
Q
E

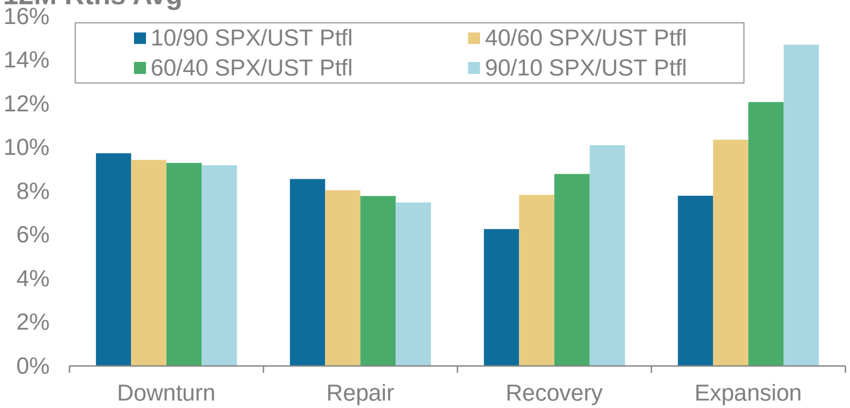
Cycle | Positioning for a Late-Cycle Expansion

Our US Cycle Indicator Still Says 'Late Cycle'



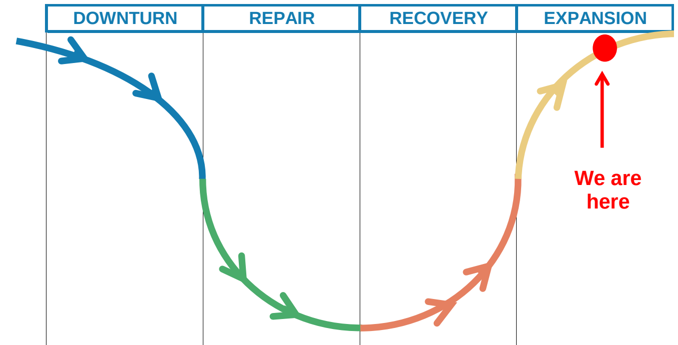
Source: Bloomberg, Haver Analytics, NBER, Morgan Stanley Research

The Cycle Matters For Allocation and Returns



Source: Morgan Stanley Research, Bloomberg

Our Stylized Cycle Allocation Suggest O/W in Equities



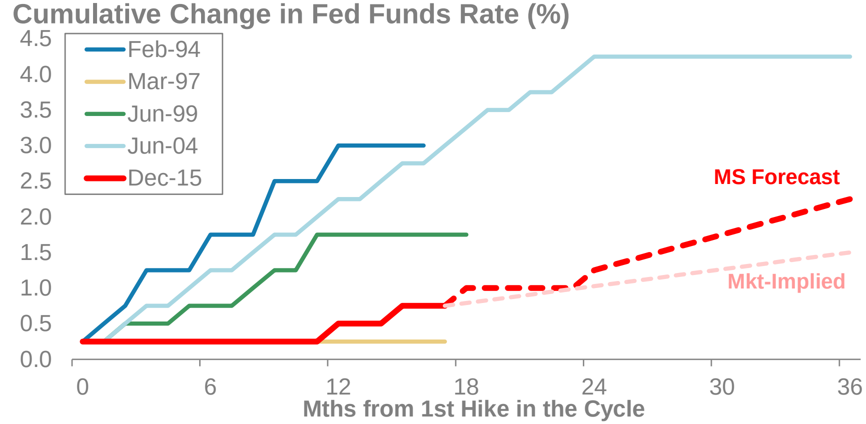
CROSS-ASSET ALLOCATION		DOWNTURN	REPAIR	RECOVERY	EXPANSION
	Broad Allocation	Bonds > Credit > Equities	Credit > Bonds > Equities	Equities > Credit > Bonds	Equities > Bonds > Credit
EQUITIES	*Equity Regional Allocation*	DM > EM	EM > DM	EM > DM	DM > EM
EQUITIES	*Equity Mkt Cap*	Large > Small	Small > Large	Small > Large	Large > Small
EQUITIES	*Equity Style*	Growth > Value	Growth > Value	Value > Growth	Value > Growth
BONDS	*Rates Regional Allocation*	DM > EM	EM > DM	EM > DM	DM > EM
BONDS	*Rates DM Allocation*	US > EU & JP	EU & JP > US	EU & JP > US	US > EU & JP
BONDS	*Rates Curve Sweetspot*	Front-End	Belly	Long-End	n/a
CREDIT	*Credit Regional Allocation*	EM > DM	EM ~ DM	EM ~ DM	DM > EM
CREDIT	*Credit Quality*	IG > HY	HY > IG	HY > IG	IG > HY
FX	*FX*	USD > G4 (ex US) & EMFX	G4 (ex US) & EMFX > USD	G4 (ex US) & EMFX > USD	USD > G4 (ex US) & EMFX

Source: Morgan Stanley Research; Note: represents allocation across the US cycle. See Our Cycle Models: The Late Cycle Playbook (30 May 2017) for more.

Monetary Policy | G3 to Lift Accommodation Gradually

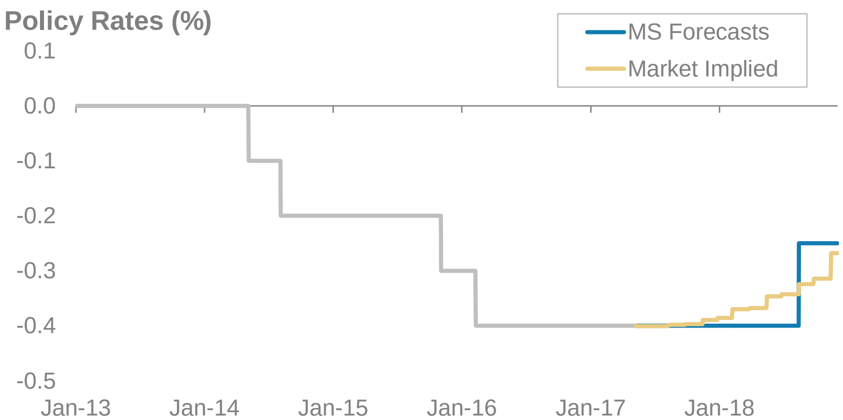
- **The US is the only region out of G3 where the market is more dovish vs. our forecasts:** We expect two hikes this year (June and Dec) and four next year. Furthermore, our economists expect the Fed to start normalising its balance sheet in October 2017, with the announcement made in September 2017.
- **ECB:** QE tapering will likely be announced in September and start next January. We see the first depo rate hike only in Sept 2018.
- **BoJ:** We forecast a maximum of two 25bp hikes in the 10-year yield target during 2018. We also expect BoJ to maintain its current stance on asset purchases until at least 1Q18.
- **<u>Investment advice:</u>** Fed fund futures (Jan 2019) are under-priced for the number of hikes; long Japanese breakevens.

This Is Not Your Average US Hiking Cycle



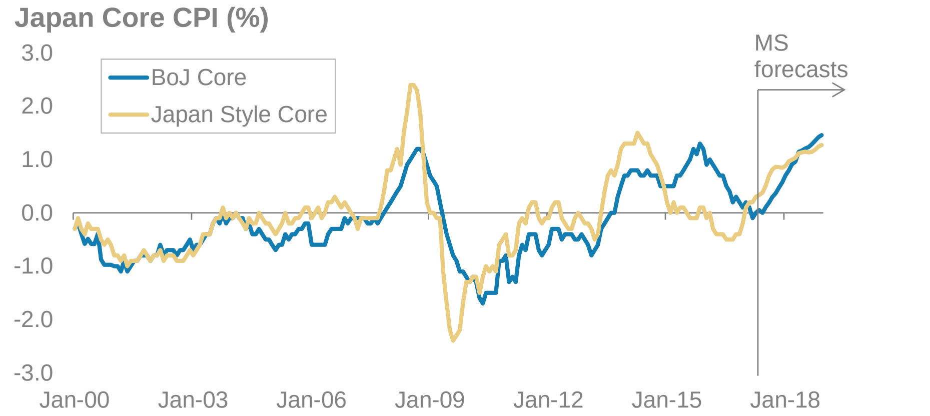
Source: Morgan Stanley Research forecasts, Federal Reserve, Haver Analytics

In the Euro Area, the Market Is More Hawkish vs. MS Forecasts



Source: Morgan Stanley Research forecasts, Bloomberg

Still Easy Monetary Policy Supports Higher Japanese Inflation



Source: Morgan Stanley Research forecasts, Ministry of Internal Affairs and Communications

See Global Macro Mid-Year Outlook: Transitioning to Self-Sustaining Growth for our latest macro outlook and US Economics & Strategy: Balance Sheet Reduction: Set It and Forget It for more on Fed balance sheet.

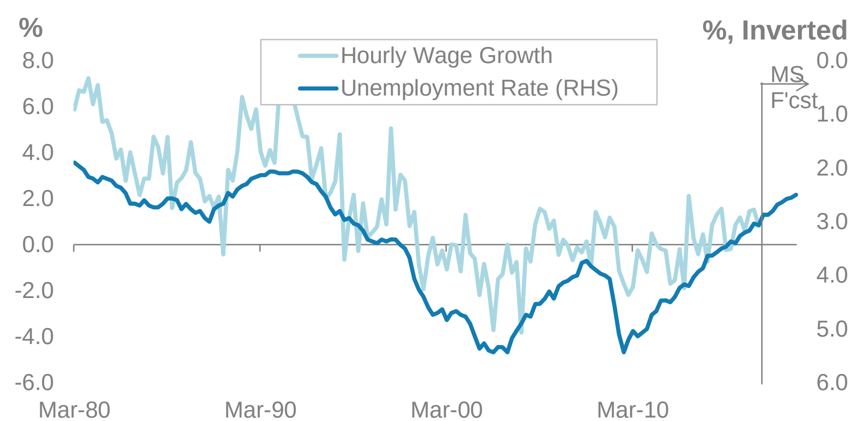
Japan | Above-Consensus Growth and in-Line Inflation

- **Higher growth estimates for 2017 (1.6%Y vs. consensus of 1.3%Y):** This is due to solid growth in exports and signs of recovery in domestic demand. Improvement in employment should be a major factor in consumer sentiment rising and we expect normalising savings rates from an elevated level. We see support from public spending, which had been delayed till now.
- **Tempered inflation expectations, but keep bullish trajectory:** Falling prices for mobile products as well as our FX team's call for a not-as-weak yen lowers our forecasts, but with the economy growing above potential, and a tight labour market, inflation should go higher through 2018.
- **Investment advice:** Long Japanese equities on better EPS, long JP breakevens, long USDJPY on falling real yields.

Weaker Yen into 2018 Should Help Exports

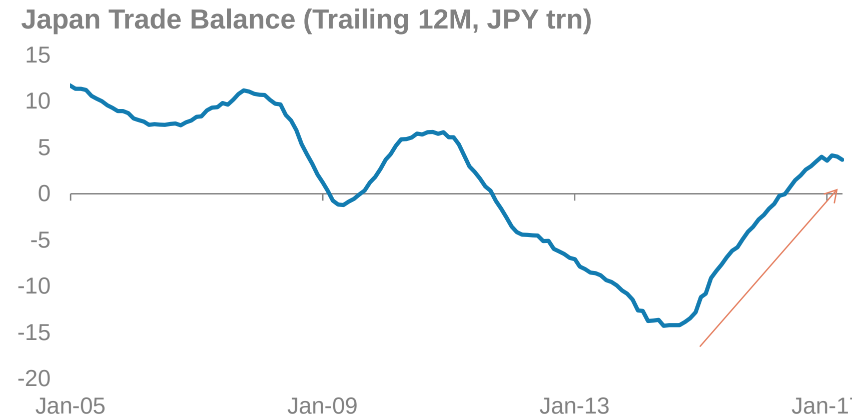
Source: Morgan Stanley Research forecasts, Bloomberg

We Expect Lower Unemployment, Higher Wage Growth



Source: Morgan Stanley Research forecasts, MIC, MHLW

Sharp Increase in Japan's Trade Surplus



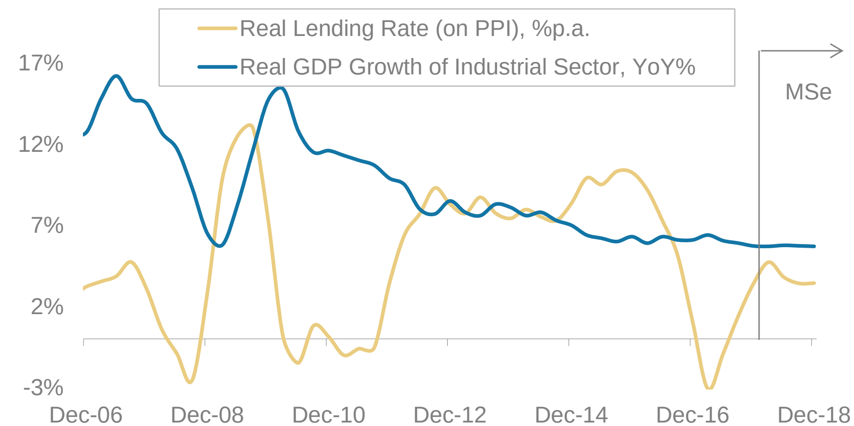
Source: Morgan Stanley Research, Bloomberg

See Japan Economic Mid-Year Outlook: Solid Economic Expansion To Continue (05 Jun 2017) for more on our Japan view.

China | Stable Growth and Gradual Hiking Temper Fear of 'Over-Tightening'

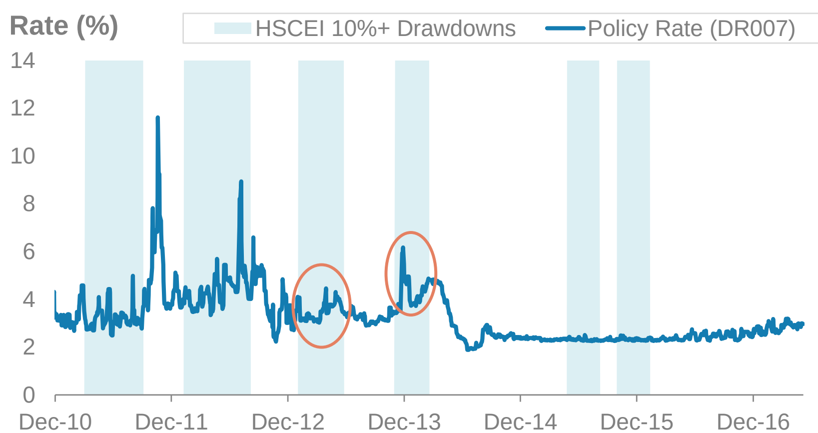
- **Despite growth peaking, a slump is unlikely:** Economists revised up their estimate of 2017 GDP growth (to 6.6%Y). However, growth has already peaked as slower housing/auto activity and reduced policy support will likely be a drag going forward. Stronger private capex and exports should help to offset a decline in credit-intensive investment growth.
- **Modest countercyclical tightening:** We expect another 40-50bp hike in interbank rates as the authorities try to rein in credit growth in a gradual/coordinated way to avoid a liquidity crunch and disruption to banks.
- **<u>Investment advice:</u>** OW Chinese equities with hedges in short AUD.

Borrowing Rates Are Still Below GDP Growth



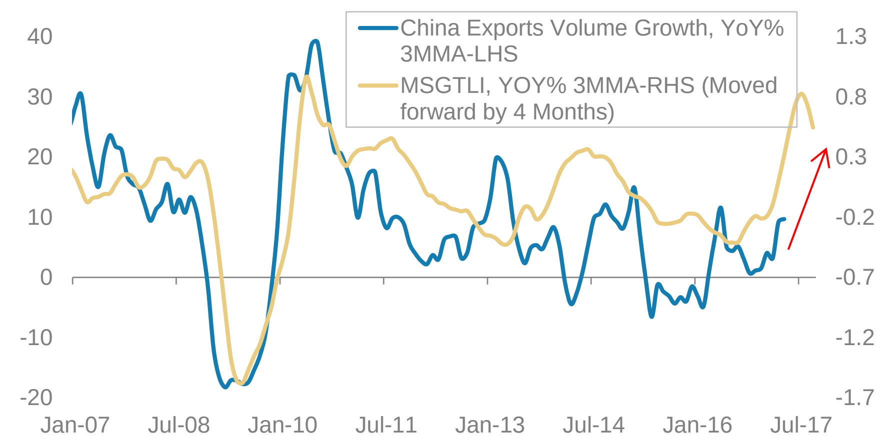
Source: CEIC, Morgan Stanley Research forecasts

Interbank Rate Increases to Remain Gradual; Less Chance of Negative Market Reaction



Source: Bloomberg, Morgan Stanley Research

Chinese Exports to Help Maintain Growth



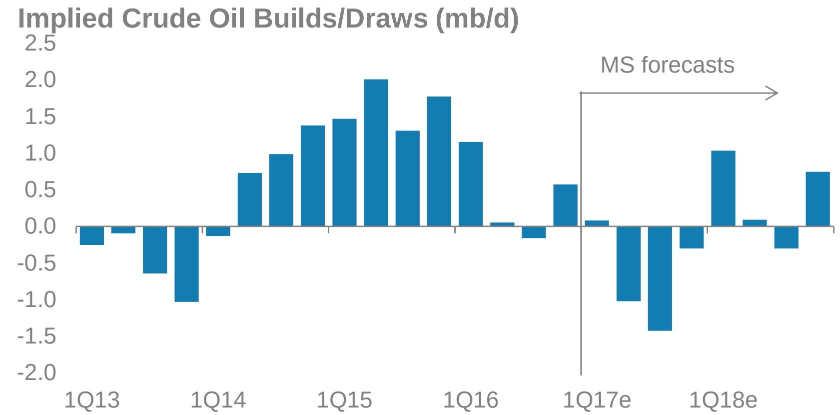
Source: Morgan Stanley Research, CEIC

See China Economic Mid-Year Outlook: Growth Moderation Amid More Prudent Debt Management (04 Jun 2017) and Cross-Asset Dispatches: China Tightening FAQ (23 May 2017) for more on our China view.

Oil | Near-Term Tightness Spells Trouble for 2018

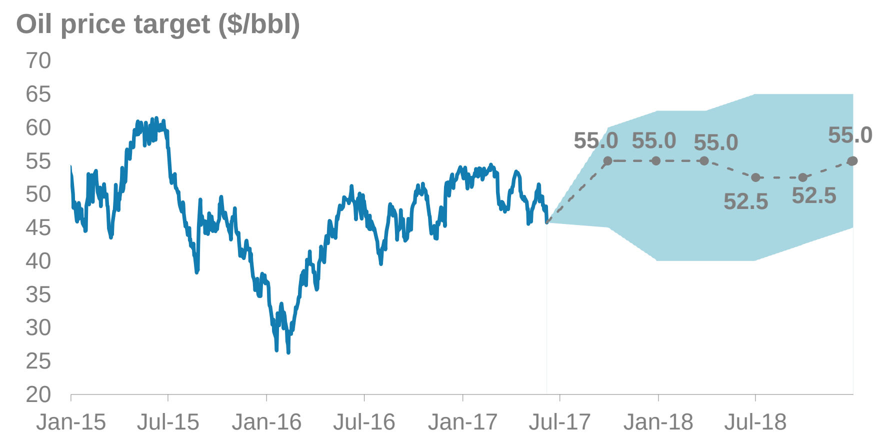
- **Expect stock draws in mid-2017:** With demand getting a seasonal tailwind, and OPEC extending its cuts, we expect inventory draws to accelerate in 3Q. Although these draws are smaller and are coming later than we once expected, this should nevertheless provide some price support in the coming months.
- **In 2018, the end of the OPEC agreement and strong shale growth leads to a looser market:** We do not expect that OPEC will extend its output cuts much beyond 1Q. OPEC's production cuts seem to be coming at the expense of market share, especially Saudi Arabia's. Non-OPEC production has already returned to year-on-year growth and is set to accelerate in 2018, driven by shale. When the end of the OPEC production cuts meets strong shale growth, the market is almost certainly oversupplied again, putting further pressure on prices into next year.
- **This even has bearish implications for longer-term prices:** With stronger shale growth, slightly weaker demand and some cost deflation, longer term breakevens are likely in the range of US$55-65/bbl (as opposed to ~US$70 previously).

We See Inventory Draws from 2Q17 Onwards



Source: Morgan Stanley Research forecasts, IEA

Downside to Price Forecasts Concentrated in mid-2018



Source: Morgan Stanley Research forecasts, Bloomberg

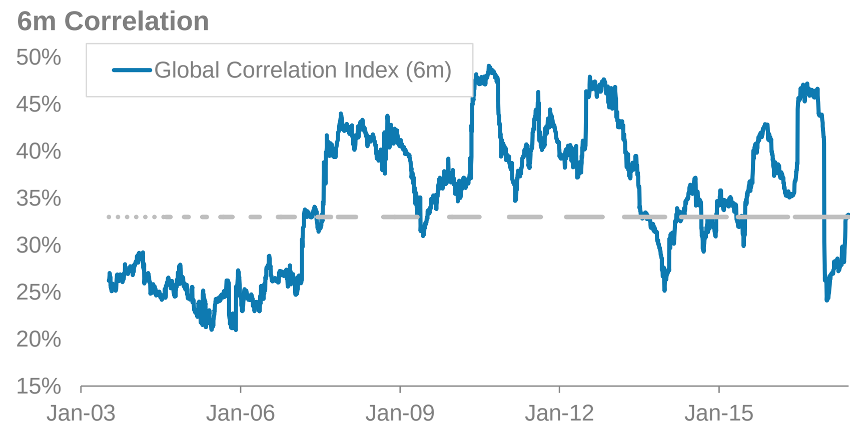
See The Oil Manual: OPEC's Extended Cut – Between a Rock and a Hard Place (25 May 2017) for more on oil.

Correlations | Low Correlation an Opportunity to Cheapen Hedges, Generate Alpha

Low level creates more 'fade' hedging opportunities

- **Global correlations remain low:** This is largely driven by still low regional correlations. Intra-market correlations (stocks within S&P 500) are still low as well.
- **A boon or drag?** Lower correlations can increase opportunities to generate alpha. However, historically, correlated assets have been used as hedges; lower correlations limit hedging efficacy.
- **Buy contingent options to lower hedging costs:** Contingent hedges benefit from rise in volatility AND correlation. Assets with low correlation to the S&P include AUD, gold and EUR.

Global Correlations Remain Low



Source: Morgan Stanley Research, Bloomberg

Where Are Low Correlations Most Extreme?

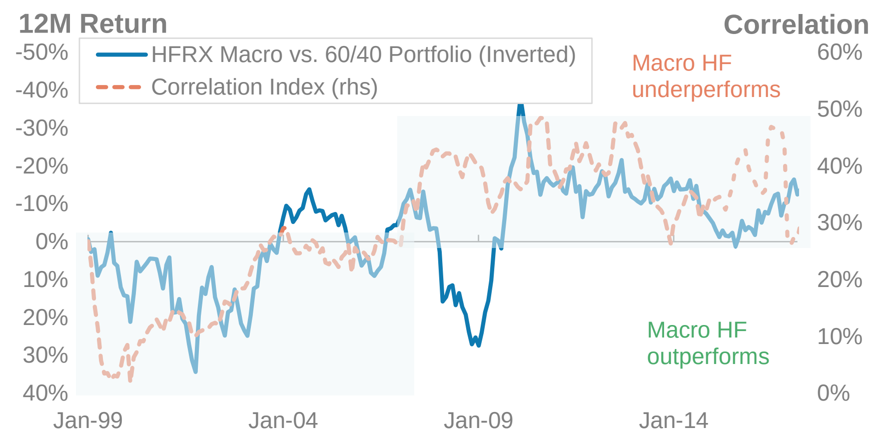
	6m Correlation			Correlation on	Long-Term		Deviation
	Current	3m ago	Δ	LT range	Min	Max	from LT Avg
Global Correlation	33%	28%	5%		11%	49%	-0%
Regional Correlations	33%	35%	-2%		19%	53%	-5%
Equity	40%	37%	3%		31%	63%	-8%
Rates	31%	42%	-11%		10%	46%	+3%
Credit	42%	42%	0%		-5%	72%	-3%
DM FX	18%	19%	-1%		8%	59%	-12%
EM FX	33%	32%	1%		0%	58%	+1%
Cross-Asset Correlations	33%	20%	13%		1%	48%	+4%
Equity-Credit	42%	33%	9%		-6%	58%	+9%
Equity-FX	9%	4%	6%		-10%	30%	-1%
Rates-Equity*	32%	16%	16%		-8%	69%	-3%
Rates-Credit*	49%	28%	21%		-11%	63%	+12%
FX-Rates	-8%	2%	-10%		-15%	22%	-12%

Source: Morgan Stanley Research, Bloomberg

Note: * Sign inverted and rates correlations in yield terms here. Grey line represents 0%.

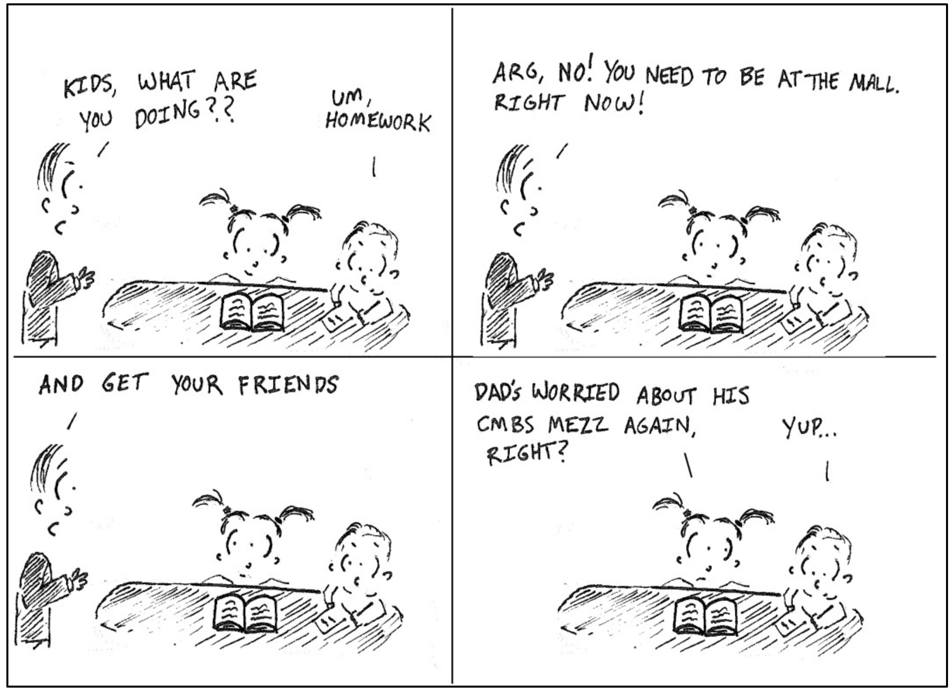
See Cross-Asset Dispatches: The Correlation Crash (20 Jan 2017) for more on the fall in correlations.

Lower Correlations Provide Better Backdrop for Macro Trading



Source: Morgan Stanley Research, Bloomberg

Recommended Trades



Strategy Type

Alpha	Beta	Hedge

Trade #1 | Buy S&P 500 6m Calls (103 Strike)

Cost

1.5%

6m 103 strike calls

Reassess/Target

8%

Based on B/B/B scenario forecasts.

Rationale

- We stay bullish on equities and like owning S&P calls as a defensive way to position for the bull case scenario.
- We think late-cycle environments can be profitable for stocks and expect double-digit returns from S&P.
- S&P 500 implied vol remains lows and skew, while off the highs, is still steep (i.e., calls are cheap on a relative basis).

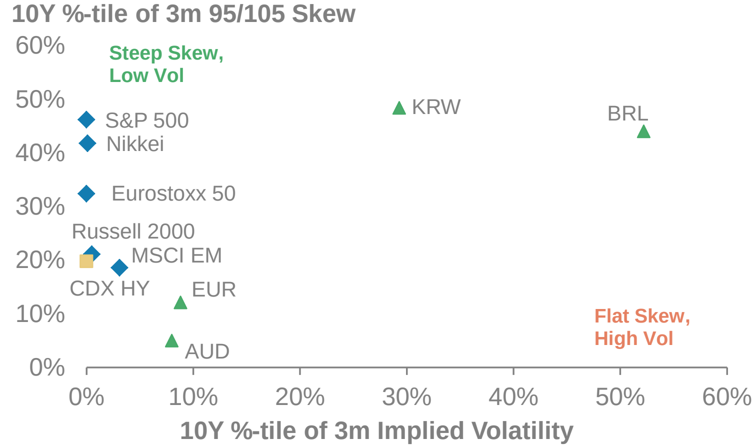
Risk(s)

- Heightened political uncertainty and fears of aggressive Fed tightening reduce upside.

Related Reports

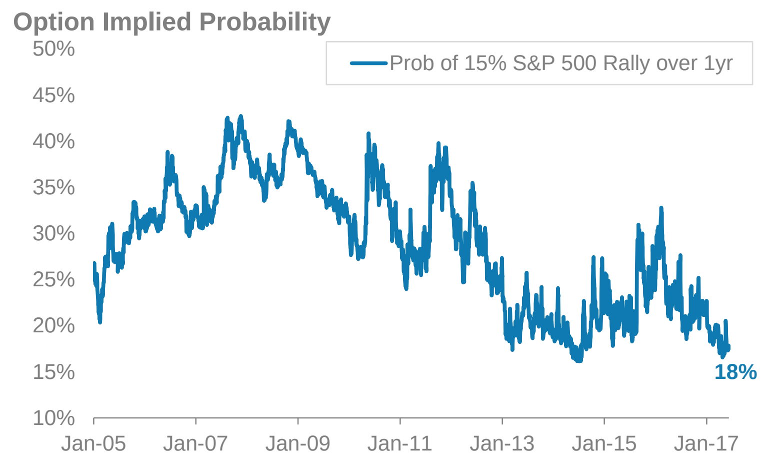
Global Strategy Mid-Year Outlook: Climbing the Last Wall of Worry, Jun 4, 2017

S&P 500 (Still) an Outlier in Terms of Skew/Vol



Source: Morgan Stanley Research, Bloomberg

Implied Probability of 15% Rally Remains Low



Source: Morgan Stanley Research, Bloomberg

Potential Upside

12M Rtn: 8%

Based on B/B/B scenario forecasts.

Volatility

Ann. Vol: 7%

Based on the option delta x 10yr realized vol for S&P 500

Risk-Adjusted Rtns

Rtn/Vol: 1.0x

Base case MS forecast return as % of 10yr vol

Valuation

Cheap

Based on vol percentile vs. history

Correlation to ACWI

Medium

High upside correlation but muted downside correlation

Trade #2 | Long Japanese Equities (FX-Hedged)

Strategy Type
Alpha | **Beta** | Hedge

Entry Level/Current
1588
Current TOPIX level

Reassess/Target
1730
MS base case target

Rationale

- A weaker yen, fiscal stimulus and better global growth should boost earnings. Valuations are attractive.
- Wage gain-driven domestic reflation, improvements in corporate governance, BoJ ETF buying and the prospect for foreign investors to revisit the market all remain key positives.
- Japan equity risk premium is highest across regions.

Risk(s)

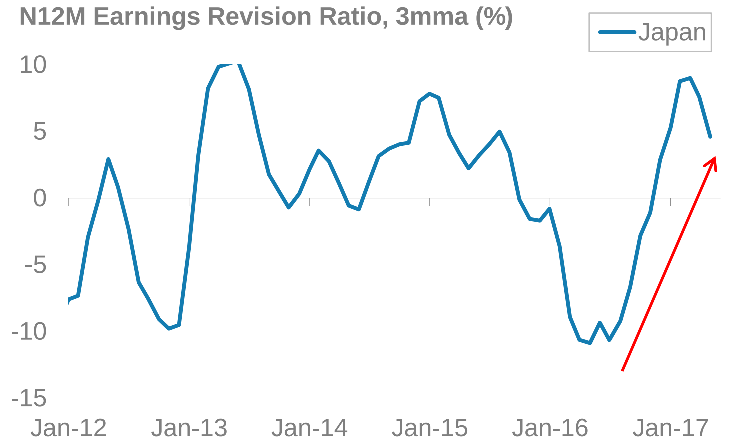
- JPY appreciates contrary to our expectations.

Related Reports

[Japan Economic Mid-Year Outlook: Solid Economic Expansion To Continue](), Jun 4, 2017

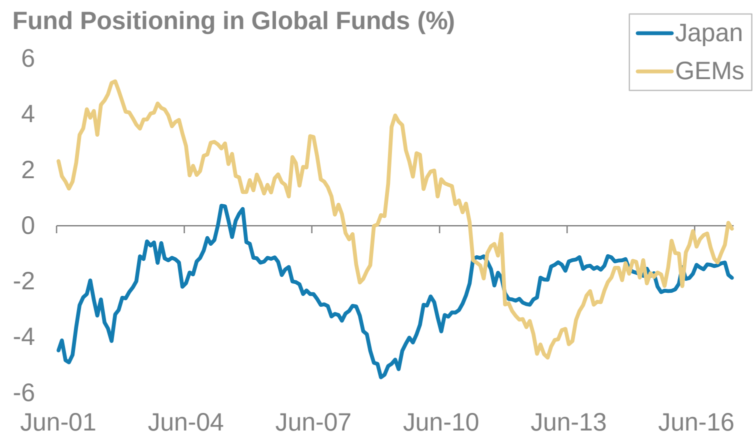
[Asia/EM Equities Mid-year Outlook: Still Prefer Japan to EM; OW IT and Financials](), Jun 4, 2017

Japan Earnings Revision Remains Very Elevated



Source: Morgan Stanley Research, IBES, Datastream

Global Funds Positioning in Japan Equities Is Low



Source: EPFR Global, Morgan Stanley Research. Fund weights as of April 2017. Global long only funds sample benchmarked to MSCI ACWI.

Potential Upside
12M Rtn: 9%
Base case 12m return implied by MS Forecasts

Volatility
Ann. Vol: 24%
Assumes vol equals average experience of last 10 years.

Risk-Adjusted Rtns
Rtn/Vol: 0.4x
Base case MS forecast return as % of 10yr vol

Valuation
Fair
Based on long-run trend in Fwd P/E.

Correlation to ACWI
Medium
Based on 10Y correlation

Strategy Type

Alpha	Beta	Hedge

Trade #3 | Long European Value vs. Growth

Potential Upside	Reassess/Target
11%	27%
We expect value to outperform Europe equities	Average size of Value vs. Growth Rally

Rationale

- Value tends to outperform growth in reflationary environments and is only just recovering after a decade of underperformance vs. growth.
- European value earnings declines in previous quarters make for easier comps now.
- Historically, the average value rally lasts 27 months and sees 27% price outperformance; so far we've only seen 7% outperformance over 11 months.
- Value still looks cheap on relative P/BV.

Risk(s)

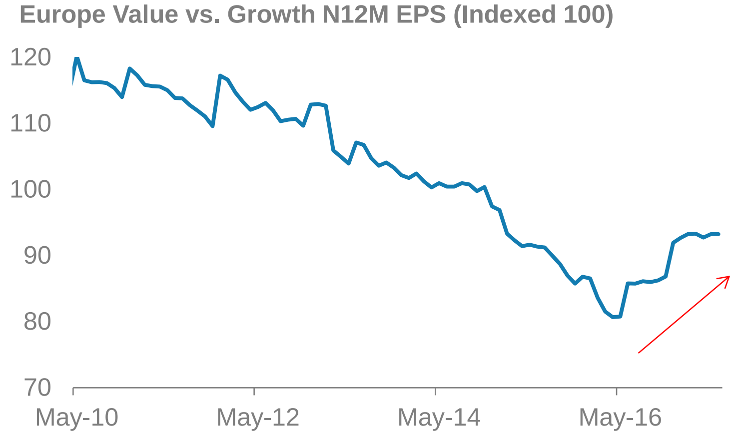
- European political risks overshadow reflation and growth.

Related Reports

[Global Strategy Mid-Year Outlook: Climbing the Last Wall of Worry](), Jun 4, 2017

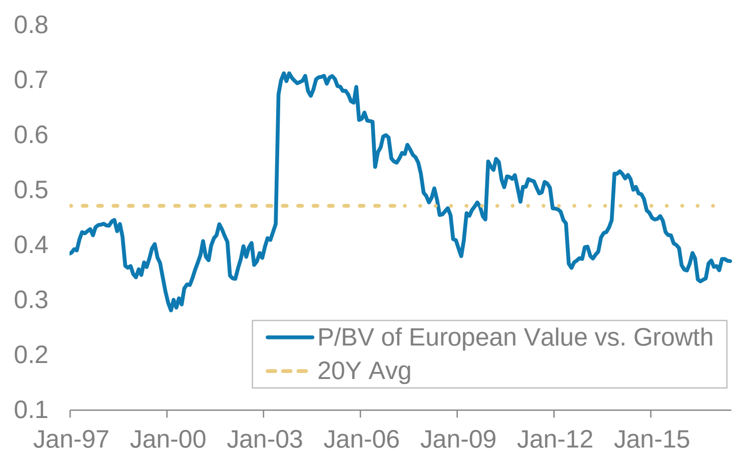
[European Equity Strategy: The Return of PBV](), Jan 10, 2017

Value vs. Growth Earnings Have Room to Run



Source: Morgan Stanley Research, IBES, Datastream

Value Looks Inexpensive on P/BV



Source: Morgan Stanley Research, MSCI, RIMES

Potential Upside

12M Rtn: 11%

Base case return for MSCI Europe on MS Forecasts

Volatility

Ann. Vol: 9%

Assumes vol equals average experience of last 10 years.

Risk-Adjusted Rtns

Rtn/Vol: 1.3x

Base case MS forecast return as % of 10yr vol

Valuation

Cheap

Based on long-run trend in Relative P/E.

Correlation to ACWI

Medium

Based on 10Y correlation

NEW

Trade #4 | Long MSCI China and India vs. EM

Strategy Type: **Alpha** | Beta | Hedge

Potential upside

14%

Based on MS equity base case

Reassess/Target

China tightening

China at risk of more severe policy tightening

Rationale

- China's gradual and calibrated tightening should be manageable. China is seeing stronger earnings revisions than EM.
- The changing sector composition of MSCI China towards IT (in particular), consumer, healthcare and private sector firms remains a key positive.
- For India, we expect GDP growth to accelerate meaningfully from 2Q17 onwards and private capex to recover by 1Q18. Earnings revisions will likely turn positive in the coming six months after six years in negative territory. Valuations are not yet stretched.

Risk(s)

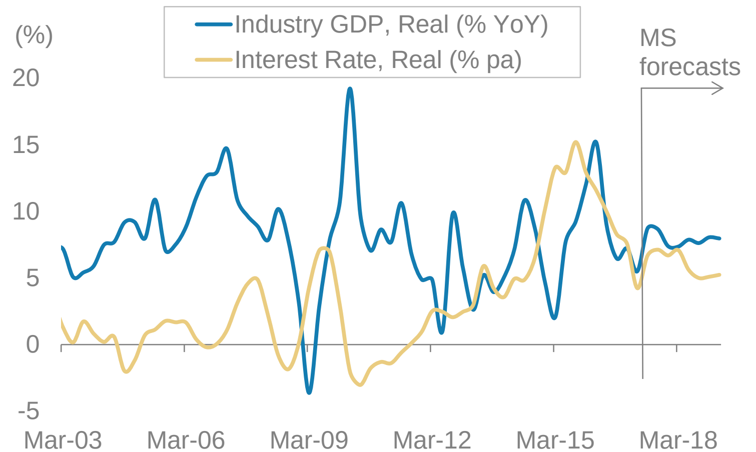
- China tightens policy further or protectionist rhetoric escalates.

Related Reports

India Equity Strategy Playbook: Easy Money for 2017 Likely Behind, Jun 5, 2017

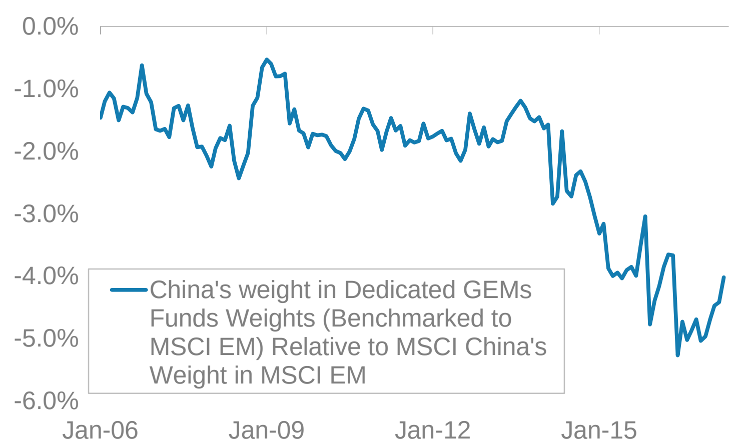
Asia/EM Equities Mid-year Outlook: Still Prefer Japan to EM; OW IT and Financials, Jun 4, 2017

Low Lending Rates vs GDP Facilitate India Growth



Source: Morgan Stanley Research, RBI, SBI, CEIC

Positioning in China Equities Remains UW



Source: Morgan Stanley Research, FactSet, EPFR country allocation. Data as of April 2017.

Potential Upside

12M Rtn: 14%

Based on MS Equity Base case returns

Volatility

Ann. Vol: 13%

Assumes vol equals average experience of last 10 yrs.

Risk-Adjusted Rtns

Rtn/Vol: 1.1x

Assumes returns realized with vol typical of last 10yrs.

Valuation

Rich

Based on price/book ratio percentile vs. history

Correlation to ACWI

Low

Based on 10Y correlation

NEW

Trade #5 | Long 30y US Treasuries vs. 30y Bunds

Strategy Type
Alpha | Beta | Hedge

Entry Level/Current

174

Current level

Reassess/Target

120

Based on MS 2Q18 base case forecasts

Rationale

- We think EUR rates are more vulnerable to reflation than US rates.
- We also see risks of market expectations and chatter about ECB tapering rising over the course of the year.
- Longer term, we expect the US curve to flatten as the Fed hikes rates, with limited upside for the long end.
- A positive carry trade with negative correlation to ACWI.

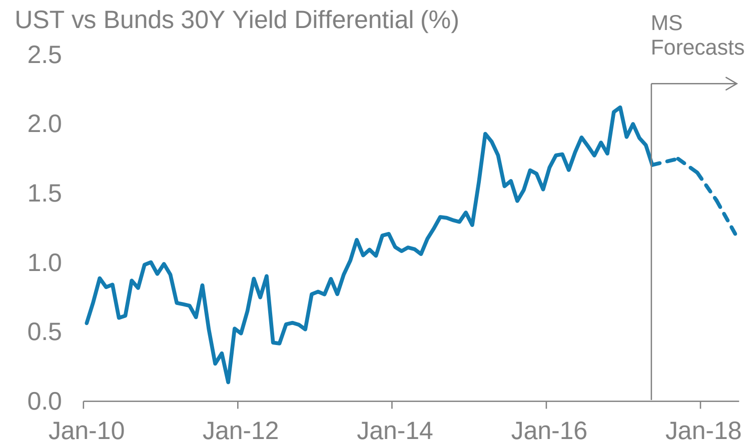
Risk(s)

- The ECB turns more aggressive on QE due to political risks.

Related Reports

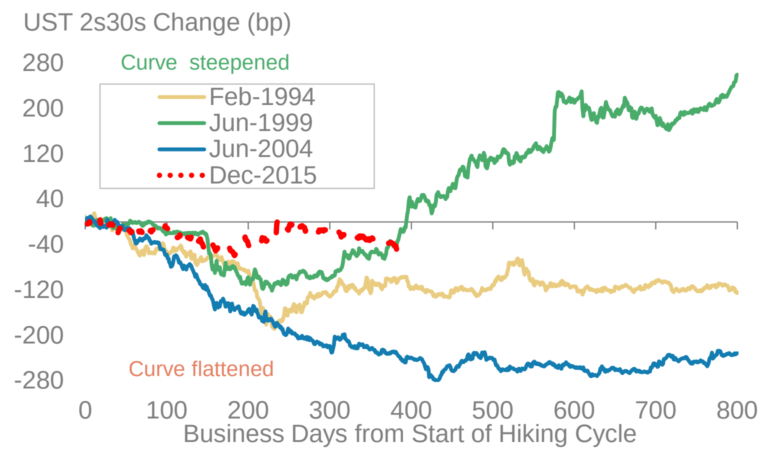
Global Strategy Mid-Year Outlook: Climbing the Last Wall of Worry, Jun 4, 2017

UST/DBR Spread to Narrow in the Next Year



Source: Morgan Stanley Research forecasts, Bloomberg

US Curve Flattened in 2 of 3 Last Hiking Cycles



Source: Morgan Stanley Research, Bloomberg

Potential Upside

12M Rtn: 10%

Based on MS 12m base case forecasts

Volatility

Ann. Vol: 17%

Assumes average 10yr price vol.

Risk-Adjusted Rtns

Rtn/Vol: 0.6x

Base case MS forecast return as % of 10yr vol

Valuation

Cheap

Based on 10yr percentile.

Correlation to ACWI

Low

Based on 10Y correlation

NEW

Trade #6 | Short GBP 10yr Breakevens

Strategy Type

Alpha	Beta	Hedge

Entry Level/Current

3.0%

Current Level

Reassess/Target

2.8%

Assuming levels move to 1yr lows.

Rationale

- Recent inflation figures were boosted by temporary Easter timing effects and further evidence of FX-pass through. However, there is no convincing sign of a rise in underlying domestic inflationary pressure.
- On the other hand, inflation markets are pricing for inflation to never come back down again even after the FX depreciation effects fall off.
- Brexit uncertainty weighs on the medium-term growth prospects.

Risk(s)

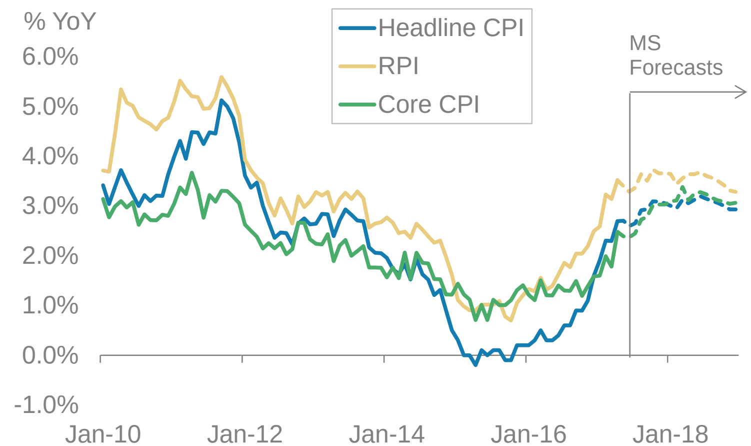
- GBP weakens further, pushing up inflation more than we expect.

Related Reports

Global Strategy Mid-Year Outlook: Climbing the Last Wall of Worry, Jun 4, 2017

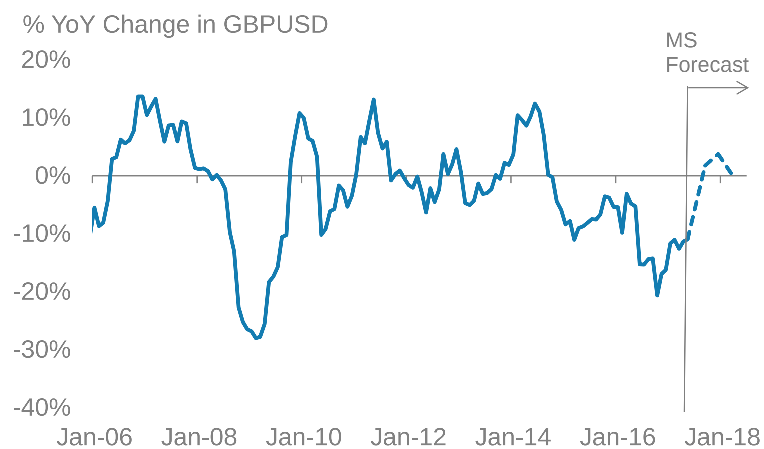
UK Economics & Strategy | UK Election: May's Majority, Jun 1, 2017

We Expect Inflation to Slow from Jan 2018



Source: Morgan Stanley Research forecasts, ONS, Haver Analytics

Helpful GBP Comps Expected to Fade in Early 2018



Source: Morgan Stanley Research forecasts, Bloomberg

Potential Upside

12M Rtn: 2%

Based on fall in rates to 1yr lows

Volatility

Ann. Vol: 5%

Assumes average 10yr price vol

Risk-Adjusted Rtns

Rtn/Vol: 0.4x

Forecast return vs long-term volatility.

Valuation

Cheap

Based on 10yr percentile of breakeven levels

Correlation to ACWI

Low

Based on 10Y correlation

Strategy Type

Alpha	**Beta**	Hedge

Trade #7 | Buy Japan 10y Breakevens (JGBei)

Entry Level/Current

47bp

Current spread

Reassess/Target

90bp

MS 12m base case target

Rationale

- Japan core CPI picks up dramatically in 2017 as the negative contribution from energy price and JPY appreciation dissipates.
- Japan's unemployment rate is the lowest in over 20 years and we are at an inflection point for wage inflation. The fiscal policy impact and structural reform are further supportive factors.
- Yield curve targeting means US rate hikes widen differentials and weaken JPY, leading to higher inflation via imports. Currency YoY effects are likely to be supportive even without further JPY weakness.

Risk(s)

- Weaker USD and CNY relative to JPY dampen the inflation pick-up.

Related Reports

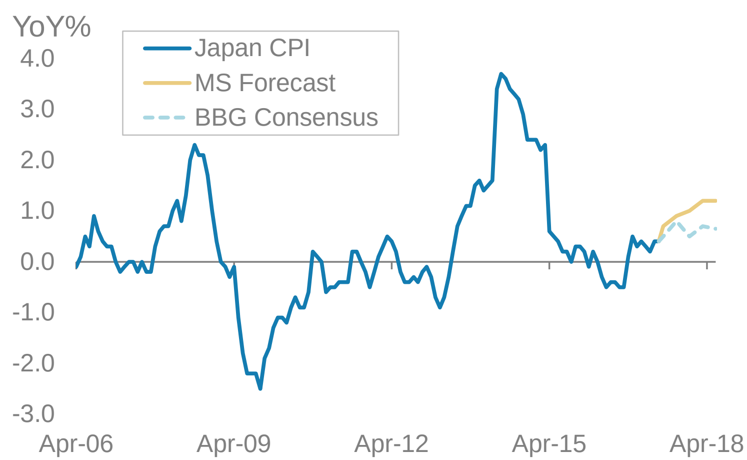
[Japan Economic Mid-Year Outlook: Solid Economic Expansion To Continue](#), Jun 4, 2017

[Global Strategy Mid-Year Outlook: Climbing the Last Wall of Worry](#),, Jun 4, 2017

JGBei Breakevens Still Below 1yr Highs

Source: Bloomberg, Morgan Stanley Research

MS Forecasts a Sharp Recovery in CPI



Source: Bloomberg, Morgan Stanley Research forecasts

Potential Upside

12M Rtn: 4%

MS Base case target

Volatility

Ann. Vol: 4%

Assumes average 10yr price vol.

Risk-Adjusted Rtns

Rtn/Vol: 1.0x

MS Base case target vs Ann. volatility.

Valuation

Fair

Based on Breakeven percentile over 2yrs.

Correlation to ACWI

Low

Based on 1Y correlation

NEW

Trade #8 | Pay ZAR 10y Swap

Strategy Type: **Alpha** | Beta | Hedge

Entry Level/Current

7.8%

Current levels

Reassess/Target

8.4%

MS 12m base case target

Rationale

- We believe the market is overpricing the probability of a more market-friendly administration and pricing in rate cuts too early, compared to our economist's forecasts.
- We expect both fiscal and growth to disappoint expectations. Weakening growth could increase the risks of further downgrades.
- Valuations are stretched as investors remain too optimistic about South Africa's fundamentals and politics. Foreign investors' bond positioning remains high.

Risk(s)

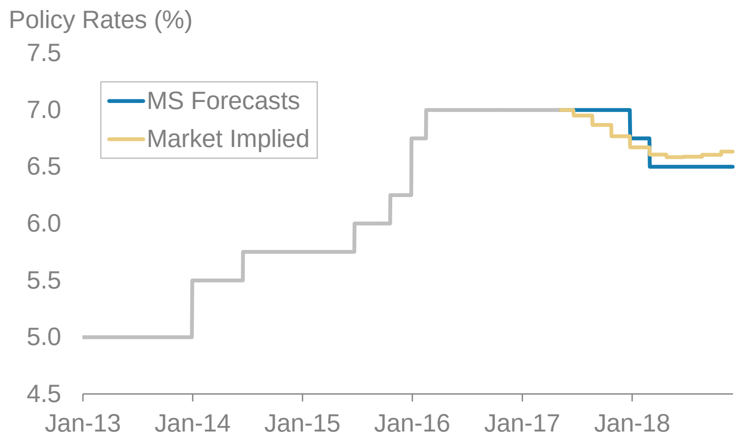
- A more benign outlook on politics or if commodity prices rise significantly.

Related Reports

CEEMEA Economics Mid-Year Outlook: Up, Up and Away, Jun 4, 2017

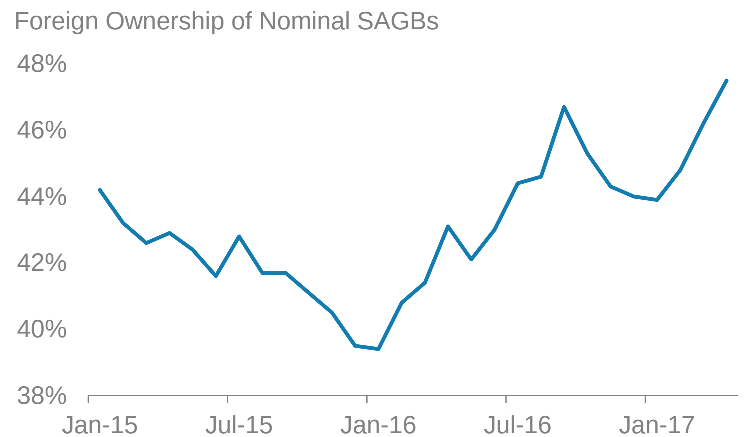
South Africa Economics and Strategy: When the Dust Settles, May 4, 2017

Market is Pricing Rate Cuts Too Early



Source: Bloomberg, Morgan Stanley Research forecasts

Investor Optimism: Foreign Holdings of SAGB High



Source: Morgan Stanley Research, Treasury

Potential Upside

12M Rtn: 3%

MS Base case target

Volatility

Ann. Vol: 8%

Assumes average 10yr price vol.

Risk-Adjusted Rtns

Rtn/Vol: 0.3x

MS Base case target vs Ann. volatility.

Valuation

Cheap

Based on swap rate percentile over 10 years

Correlation to ACWI

Low

Based on 10Y correlation

NEW

Strategy Type

Alpha | **Beta** | Hedge

Trade #9 | Buy Mbono Jun '22s, FX-Unhedged

Entry Level/Current

7.1%

Current level

Reassess/Target

6.5%

MS 12m base case target

Rationale

- We see a positive growth story in Mexico. Our economists have upgraded Mexico's GDP growth in 2017 to an above-consensus 2.1%Y from 1.5%Y previously.
- We see stable monetary policy, as result of lower inflation, while the market is pricing hikes.
- Trade negotiations should be benign and a positive outcome for trade negotiations remains most likely.
- Valuations for Mexico local rates are attractive and carry is high.

Risk(s)

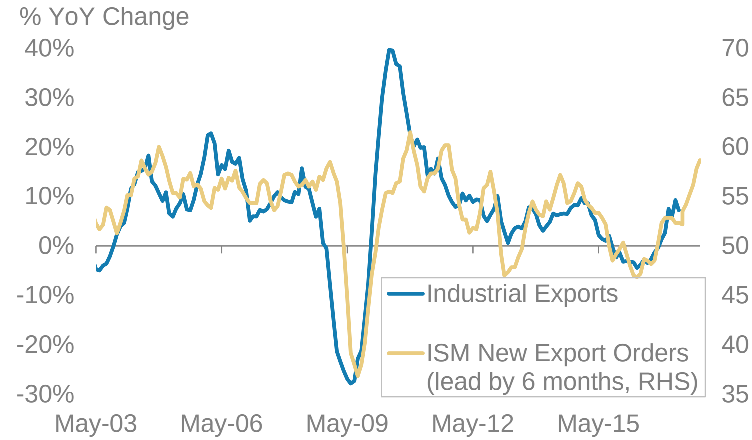
- Inflation fails to consolidate as we expect and/or external risks increase further.

Related Reports

Latin America Macro Mid-Year Outlook: On Starting Points and Policy Choices, Jun 4, 2017

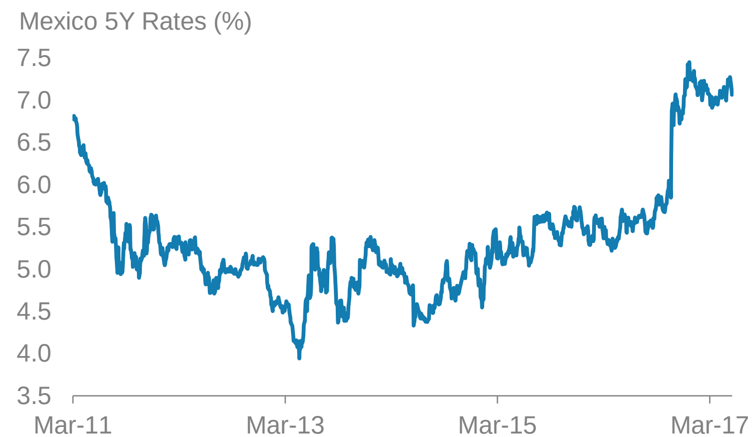
Global EM Fixed Income Mid-Year Outlook: Shift EM into High Gear, Jun 7, 2017

Mexico's Industrial Exports Rose to Record Levels



Source: INEGI, ISM, Morgan Stanley Research

Mexico 5Y Rates Are Still Near All-Time Highs



Source: Bloomberg, Morgan Stanley Research

Potential Upside

12M Rtn: 10%

MS Base case yield change plus carry

Volatility

Ann. Vol: 4%

Assumes average 1yr vol.

Risk-Adjusted Rtns

Rtn/Vol: 2.7x

MS Base case target vs Ann. volatility.

Valuation

Cheap

Based on yield percentile over 10yrs.

Correlation to ACWI

Medium

Based on 10Y correlation

Strategy Type: Alpha | **Beta** | Hedge

Trade #10 | Long USDJPY

Entry Level/Current

110.0

Current USDJPY level

Reassess/Target

116

MS 12m base case target

Rationale

- We expect rates in the US to continue to rise (our economists expect six more hikes by end-2018), while yield curves in Japan should remain well-anchored, widening yield differentials.
- Yield differential should cause a steady outflow of JPY-denominated funds overseas and push JPY lower.
- Japan will likely expand fiscal spending in 2017, lifting inflation expectations and lowering real yields through the managed curve – weakening JPY.

Risk(s)

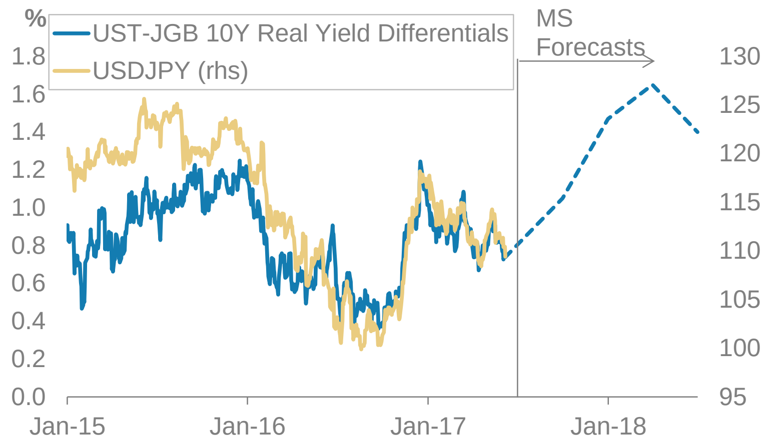
- Weakening US growth delays Fed hikes and weakens USD.

Related Reports

Global FX Mid-Year Outlook: Pivot to Europe, Jun 4, 2017

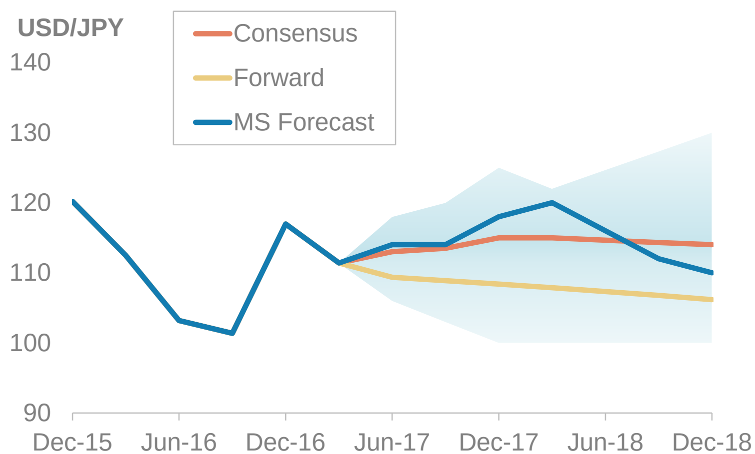
Japan Economics Mid-Year Outlook: Solid Economic Expansion To Continue, Jun 4, 2017

JPY to Follow Real Yield Differentials



Source: Morgan Stanley Research forecasts, Bloomberg

Our USDJPY Forecast versus Consensus



Source: Morgan Stanley Research forecasts, Bloomberg

Potential Upside

12M Chg: 7%

Base case 12m MS forecast return

Volatility

Ann. Vol: 11%

Assumes average 10yr vol.

Risk-Adjusted Rtns

Rtn/Vol: 0.6x

MS Base case forecast return vs long-term volatility.

Valuation

Rich

Based on 10yr REER percentile.

Correlation to ACWI

Medium

Based on 10Y correlation

NEW

Trade #11 | Long EURAUD

Strategy Type: Alpha | Beta | **Hedge**

Entry Level/Current

1.49

Current EURAUD level

Reassess/Target

1.73

MS 12m base case target

Rationale

- This trade pairs a China/cyclical hedge (AUD) with an undervalued asset (EUR).
- Political stability and growth-related equity market inflows should boost EUR, which should rise at the same time as global growth recovers.
- Looming domestic growth disappointments, a weak labour market and highly geared household balance sheets underpin our cautious view on AUD. Tightening front-end rate differentials should also put downward pressure on AUD.

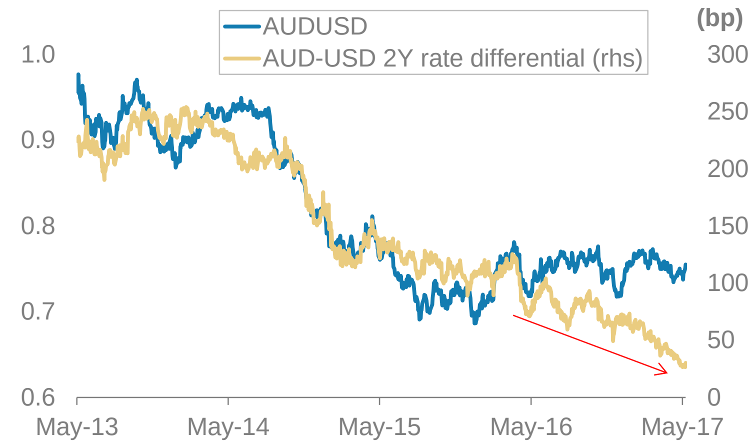
Risk(s)

- A flare-up of European political risks.
- Continued cyclical strength in China, supporting Australia terms of trade.

Related Reports

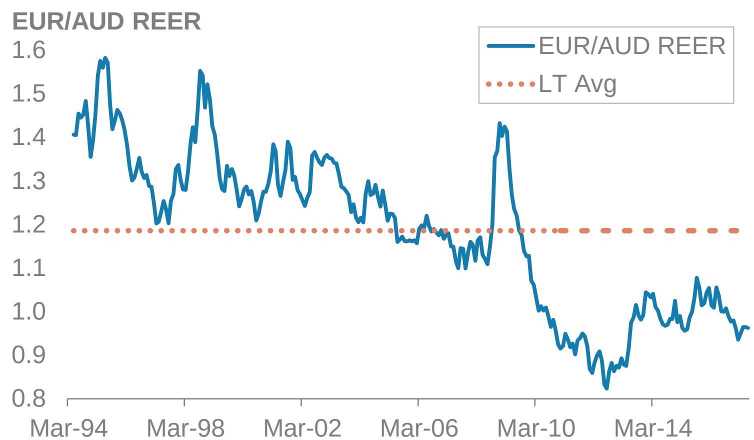
Global FX Mid-Year Outlook: Pivot to Europe, Jun 4, 2017
Australia Macro+: RBA's Rock and a Harder Place, Jun 6, 2017

Tightening Rate Differentials Support Lower AUD



Source: Morgan Stanley Research, Bloomberg

EUR Is Cheap Relative to AUD



Source: Morgan Stanley Research, Bloomberg

Potential Upside

12m Rtn: 14%

Base case 12m MS forecast return

Volatility

Ann. Vol: 12%

Assumes average 10yr vol.

Risk-Adjusted Rtns

Rtn/Vol: 1.1x

MS Base case forecast return vs long-term volatility.

Valuation

Cheap

Based on net REER valuation vs. 20y history.

Correlation to ACWI

Low

Based on 10Y correlation

NEW

Strategy Type: Alpha | **Beta** | Hedge

Trade #12 | Short USDMYR

Entry Level/Current

4.3

Current USDMYR level

Reassess/Target

4.2

MS 12m base case target

Rationale

- We expect a cyclical growth recovery in Malaysia, supported by export recovery and pre-election spending. Healthy domestic demand momentum is likely to be sustained in the near term.
- MYR benefits from cheap valuation and has lagged the broader EM rally. With low relative positioning compared to other EM currencies, there is a strong valuation case for additional currency appreciation.
- FDI into Malaysia has also turned net positive this year. We think MYR has lagged its terms of trade improvement.

Risk(s)

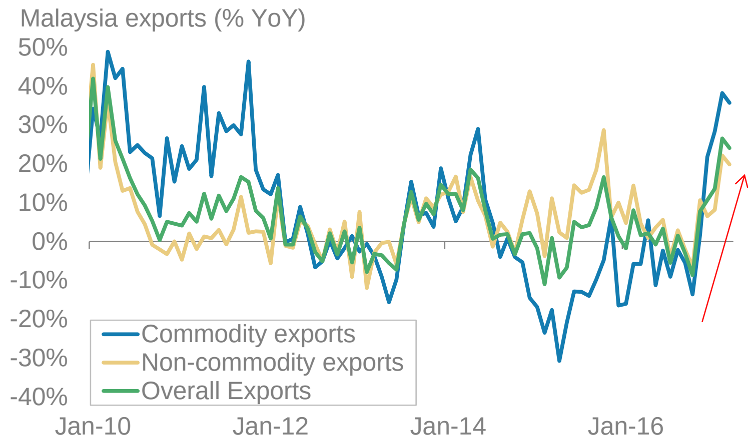
- A large drop in commodity prices or a China growth scare.

Related Reports

Global FX Mid-Year Outlook: Pivot to Europe, Jun 4, 2017

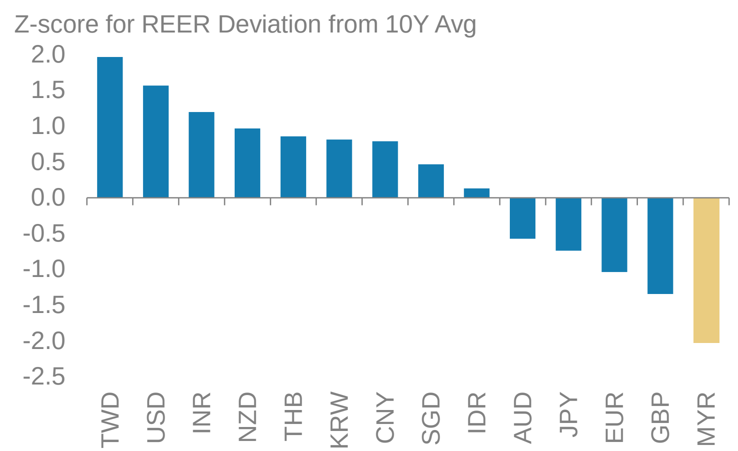
ASEAN, Korea & Taiwan Economic Mid-Year Outlook: The Export Recovery Is For Real, Jun 4, 2017

A Cyclical Recovery Driven by Exports Pick-Up



Source: Morgan Stanley Research, CEIC

Valuation Support for MYR



Source: Morgan Stanley Research, BIS, Haver Analytics

Potential Upside

12M Chg: 3%

Base case 12m MS forecast return

Volatility

Ann. Vol: 8%

Assumes average 10yr vol.

Risk-Adjusted Rtns

Rtn/Vol: 0.4x

MS Base case forecast return vs long-term volatility.

Valuation

Cheap

Based on net REER valuation vs. 10y history

Correlation to ACWI

Medium

Based on 10Y correlation

NEW

Trade #13 | Long Credit in Argentina, Indonesia, Russia (1:1:1)

Strategy Type: Alpha | **Beta** | Hedge

Entry Level/Current

243bp

Current spreads

Reassess/Target

220bp

12M target based on MS base forecast

Rationale

We combine our likes in EM credit in a single trade:

- Argentina: A constructive outlook with re-rating potential, ongoing gradual economic recovery and still high yield keeps us overweight.
- Indonesia: Supportive domestic story, with narrowing C/A deficit, moderating inflation and structural reforms, keeps us constructive.
- Russia: Recovery is gaining momentum, driven by investment and household consumption. Improving growth and fiscals should drive the rally in spreads.

Risk(s)

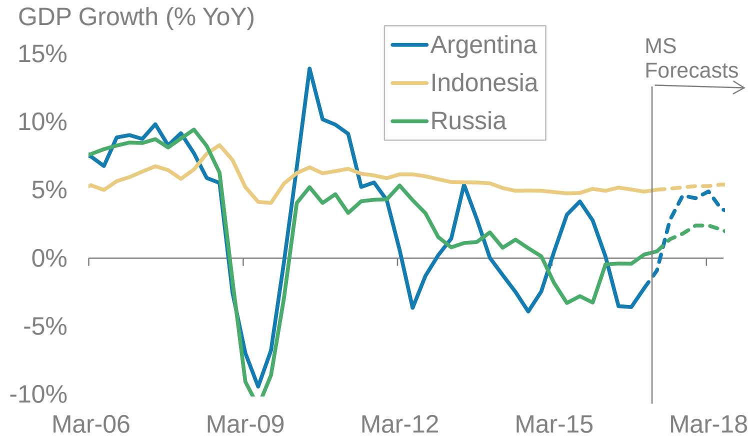
- Fed hikes much faster than we expect.
- Idiosyncratic policy and political risks.

Related Reports

CEEMEA Economics Mid-Year Outlook: Up, Up and Away, Jun 4, 2017

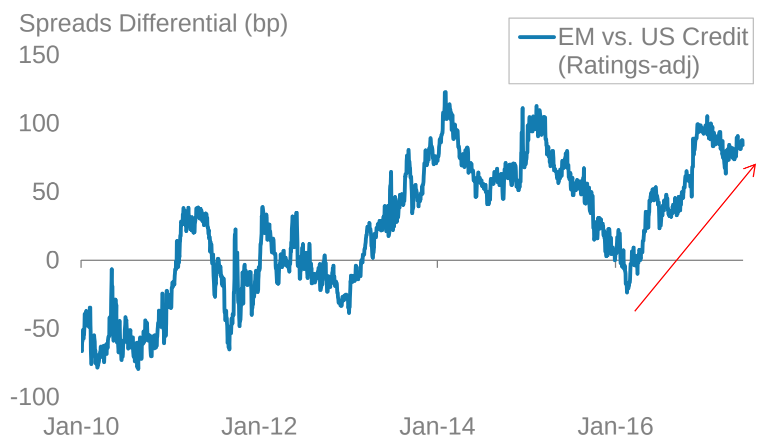
Global EM Fixed Income Mid-Year Outlook: Shift EM into High Gear, Jun 7, 2017

We Expect Gradual Growth Recovery



Source: Morgan Stanley Research forecasts, Haver Analytics

EM Credit Spreads Wide versus US Corp. Credit



Source: Morgan Stanley Research, Bloomberg. Note: US rating-adjusted spread takes a weighted average of the US HY and IG indices to equate the ratings of the US and EM indices.

Potential Upside

12M Rtn: 4%

Assumes MS Base case 12m target + carry

Volatility

Ann. Vol: 10%

Assumes average 3yr vol

Risk-Adjusted Rtns

Rtn/Vol: 0.4x

MS Base case forecast return vs ann. volatility.

Valuation

Rich

Based on Indonesia spread percentile as a proxy

Correlation to ACWI

High

10Y correlation to ACWI

Strategy Type

Alpha	Beta	Hedge

Trade #14 | Buy CDX HY Sep-17 Risk Reversal (108/105)

Cost

0.5%

Current cost

Wtd. Payout

2.0%

Probability-wtd. payout across B/B/B scenarios

Rationale

- We remain cautious on credit, as it has little upside in a late-cycle boom and faces asymmetric downside as the cycle speeds up and potentially ends faster. Credit leverage is high and rising into a hiking cycle.
- CDX HY spreads at current levels are pricing in cumulative defaults below our expectations for this cycle, suggesting a very low risk premium above expected losses.
- Credit implied volatility is low, making hedges cheap. 108/105 Sep-17 HY risk reversal provides a net payout of 2.0% on our B/B/B forecasts.

Risk(s)

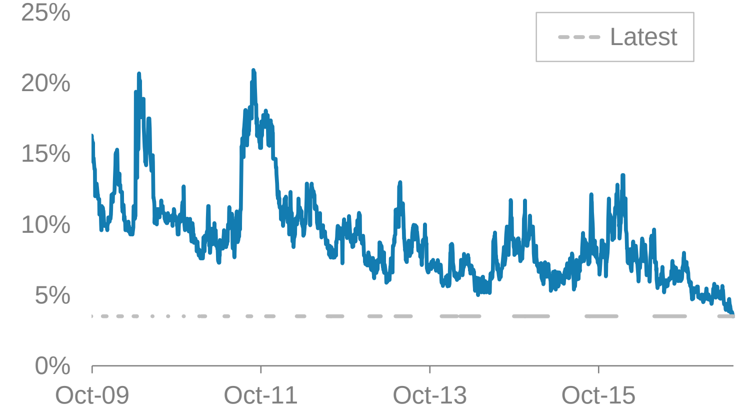
- Credit rallies materially, as earnings growth helps corporates deleverage.

Related Reports

Global Strategy Mid-Year Outlook: Climbing the Last Wall of Worry, Jun 4, 2017

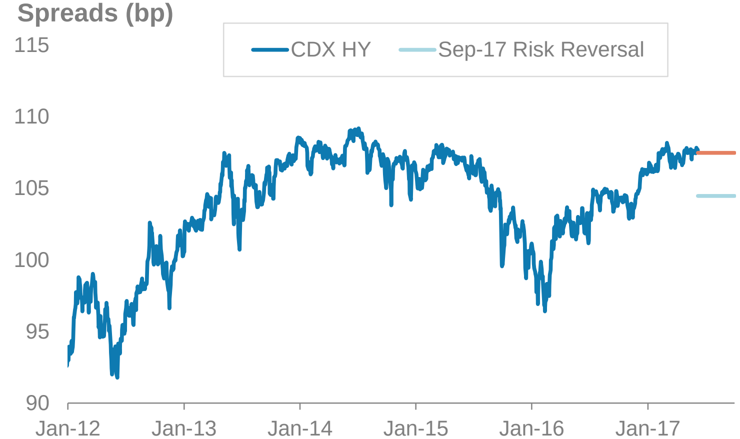
Leverage Under the Magnifying Glass, Apr 21, 2017

Implied Credit Volatility at Post-Crisis Lows



Source: Morgan Stanley Research

Risk Reversal Offers Good Downside Protection



Source: Morgan Stanley Research, Bloomberg

Potential Upside

Wtd. Payout: 2.0%

Probability-wtd. payout across B/B/B scenarios

Volatility

Ann. Vol: 2.0%

Assumes vol equals average experience of last10years.

Risk-Adjusted Rtns

Rtn/Vol: 0.9x

MS probability-wtd payout vs long-term volatility.

Valuation

Cheap

Based on 10Y history of Vol.

Correlation to ACWI

Low

Based on 10Y correlation

NEW

Trade #15 | Short CMBX.BBB- S8

Strategy Type: Alpha | Beta | **Hedge**

Entry Level/Current

86

Current price for CMBS A

Reassess/Target

3%

12M MS base returns for Broader CMBS BBB

Rationale

- We continue to believe that 2017 will mark the end of the bull cycle for US CRE. We also note that the challenges in US CRE are broader and not isolated to the retail sub-sector.
- We see CMBX.BBB.8 as a good beta short to express the view on weakening CRE fundamentals, given the low credit quality of the vintage and little upside from appreciation in CRE valuations.
- With one of the most negatively skewed returns within our coverage, CMBS BBB- bear case involves large downside (-30%).

Risk(s)

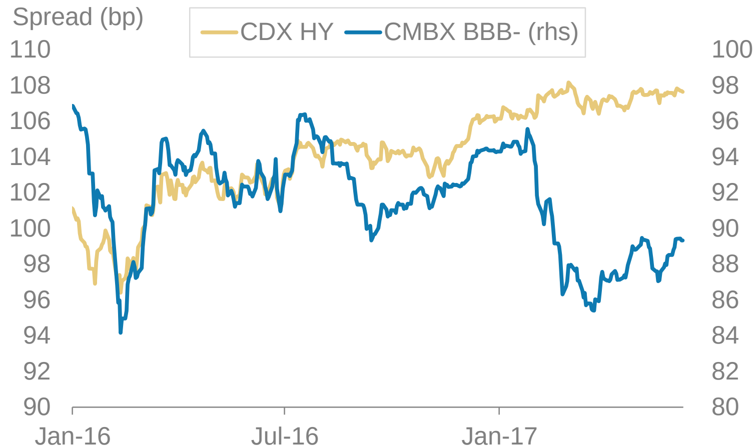
- Fed hikes slower than we expect and growth surprises to the upside with knock-on effects in CRE.

Related Reports

Global Strategy Mid-Year Outlook: Climbing the Last Wall of Worry, Jun 4, 2017

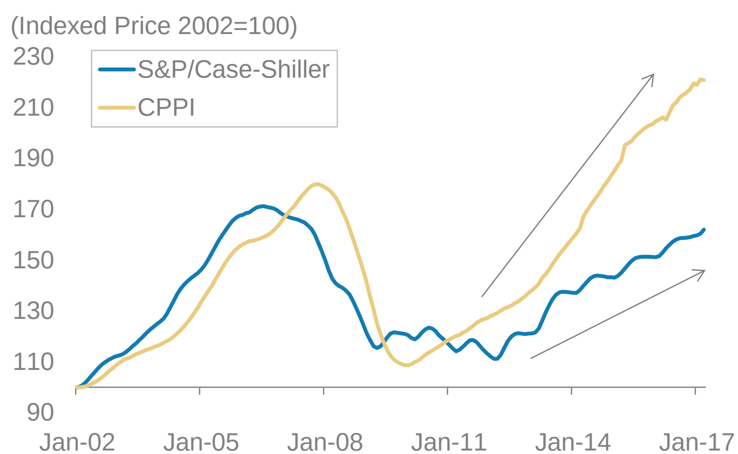
REITs / Housing / Banks / Hardline/Broadline Retail: Bringing it Back Home: 15 Plays on the Housing / CRE Divergence , Mar 29, 2017

CMBX Has Diverged from Broader Risk



Source: Morgan Stanley Research, Bloomberg

CRE Prices Have Much Less Upside vs. Resi



Source: Morgan Stanley Research, Moody's/RCA, Case-Shiller

Potential Upside

12M Rtn: 3%

Base case 12m MS forecast return

Volatility

Ann. Vol: 10%

Assumes vol equals average experience of last 10 years.

Risk-Adjusted Rtns

Rtn/Vol: 0.3x

Base case return vs long-term volatility.

Valuation

Cheap

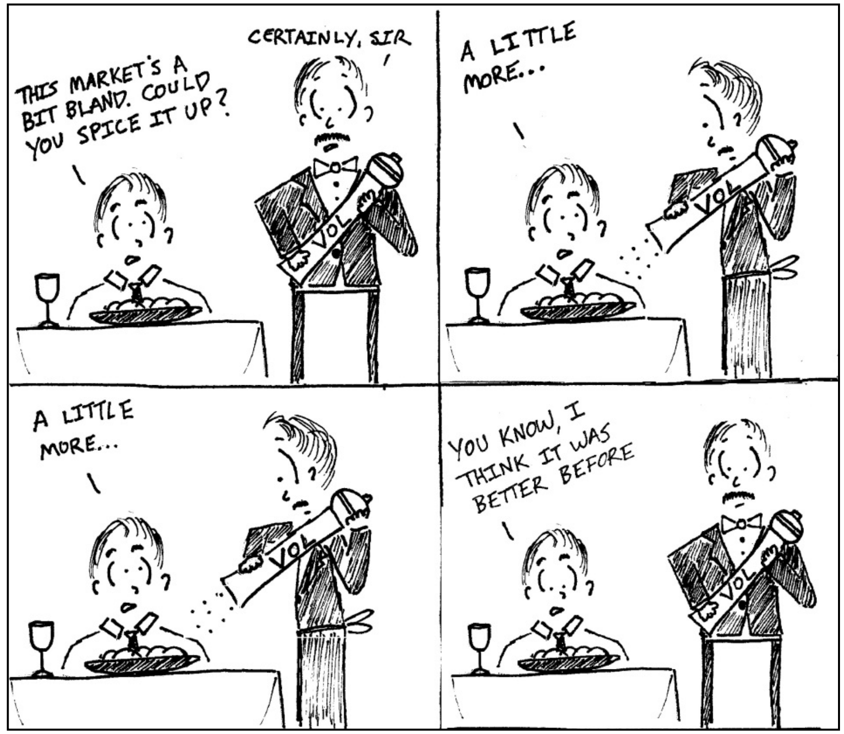
Based on 2yr price history.

Correlation to ACWI

Low

Based on 10Y correlation

Risk/Reward Snapshot



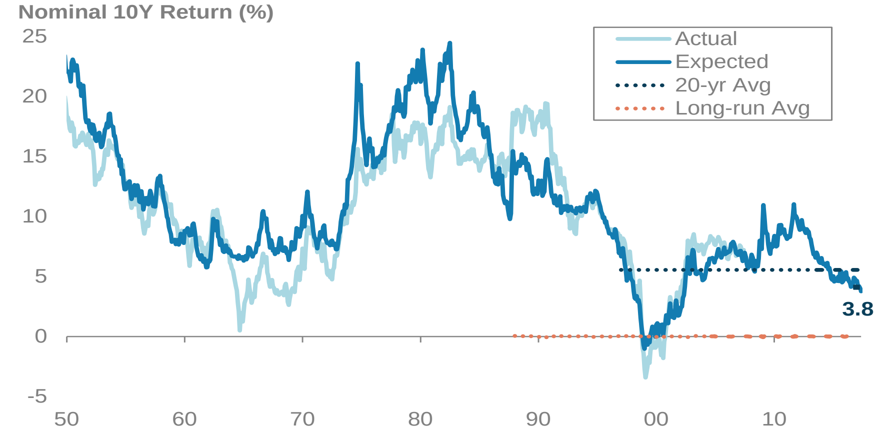
Forecasts | Morgan Stanley 10-Year Expected Returns Forecasts, Across Major Assets

	(A) Rtn from Income	(B) Rtn from Earnings	(C) Rtn from Repricing	MS Modelled Long-Run rtns = (A) + (B) + (C) Nominal	%-ile	Real	%-ile	Risk Premium	%-ile
EQUITIES									
S&P 500	2.3	4.4	-2.9	3.8	21%	1.9	24%	1.2	35%
MSCI Europe	2.2	7.0	-4.3	4.9	26%	3.2	48%	3.9	58%
MSCI UK	2.0	10.7	-5.7	6.8	41%	3.7	40%	5.5	76%
MSCI Japan	3.5	1.9	2.2	7.7	69%	7.2	61%	7.6	84%
MSCI EM	3.2	5.7	-0.9	8.3	56%	6.4	59%	5.7	67%

	(A) Starting Yld	(B) Rtn from Avg Roll	(C) Credit Loss	MS Modelled Long-Run rtns = (A) + (B) - (C) Nominal	%-ile	Real	%-ile	Risk Premium	%-ile
AGGREGATES									
USD Agg	2.6	0.0	0.1	2.5	29%	0.7	30%	0.0	16%
EUR Agg	0.5	1.0	0.1	1.4	4%	0.1	3%	0.7	69%
GOV'T BONDS									
UST10Y	2.2	0.3	0.0	2.5	16%	0.7	20%	n/a	n/a
DBR10Y	0.3	0.6	0.0	0.9	4%	-0.1	7%	n/a	n/a
UKT10Y	1.0	0.2	0.0	1.2	2%	-1.7	2%	n/a	n/a
JGB10Y	0.1	0.0	0.0	0.1	5%	-0.4	19%	n/a	n/a
CORPORATE CREDIT									
USD IG Corp	3.2	0.0	0.3	2.9	15%	1.1	21%	0.4	37%
USD HY Corp	5.4	0.0	2.8	2.6	3%	0.8	7%	0.3	17%
BBB	3.4	0.0	0.3	3.1	9%	1.3	14%	0.7	24%
BB	4.2	0.0	1.0	3.1	1%	1.3	5%	0.8	16%
EUR IG Corp	0.8	0.0	0.2	0.6	2%	-0.5	4%	0.2	51%
EUR HY Corp	3.5	0.0	2.8	0.7	0%	-0.3	0%	0.4	11%
BBB	1.0	1.1	0.2	1.8	4%	0.8	5%	1.5	47%
BB	2.2	0.0	1.0	1.2	0%	0.1	0%	0.9	20%
EM $ CREDIT									
EM $ Credit	5.5	0.8	1.0	5.3	11%	3.4	15%	3.0	20%
EM $ Asia	3.8	0.8	1.0	3.7	5%	1.8	8%	1.4	9%
EM $ Europe	4.7	1.0	1.0	4.7	7%	2.8	12%	2.5	18%
EM $ Latam	6.6	0.9	1.0	6.5	15%	4.6	31%	4.3	37%

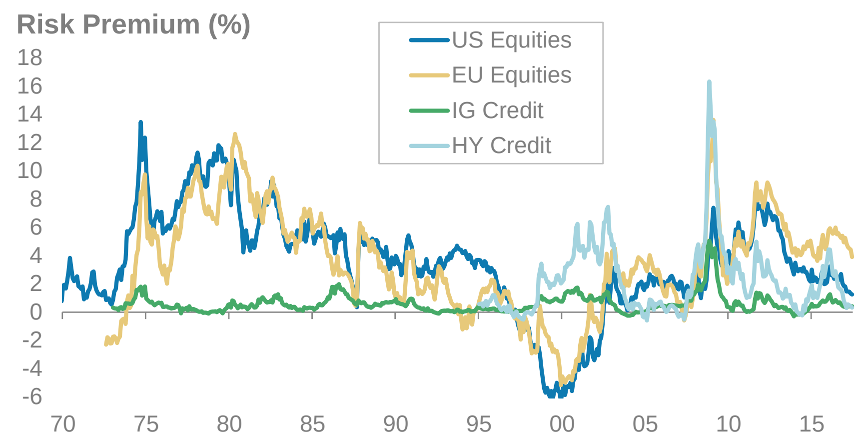
Note: See What Will Markets Return? October 23,2015, for methodology.
Source: Morgan Stanley Research estimates, Bloomberg

S&P 500 Returns: Expected vs. Actual



Source: Morgan Stanley Research estimates, Bloomberg

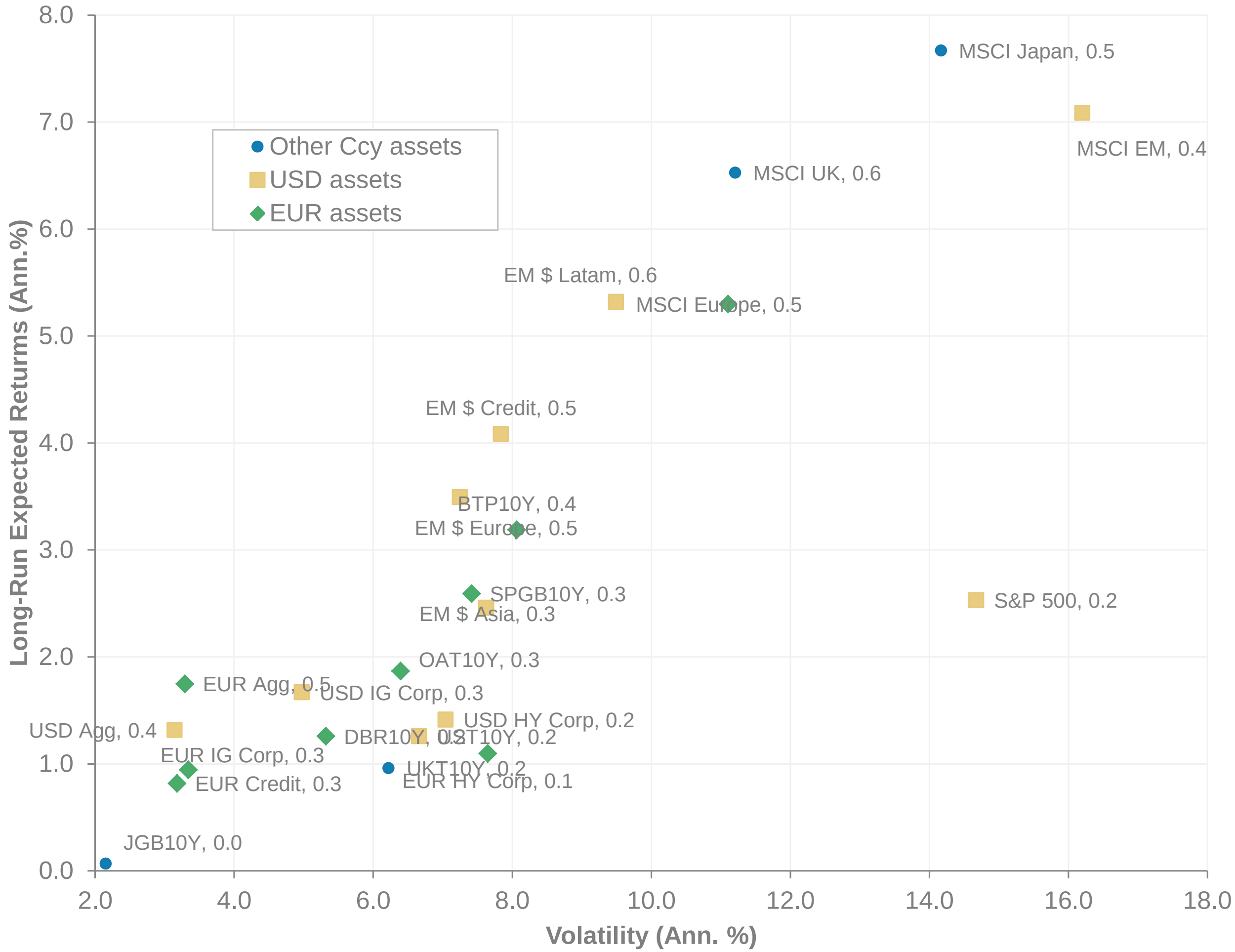
Risk Premiums Since 1970



Source: Morgan Stanley Research estimates, Bloomberg

Forecasts | Morgan Stanley Long-Run Expected Risk/Reward

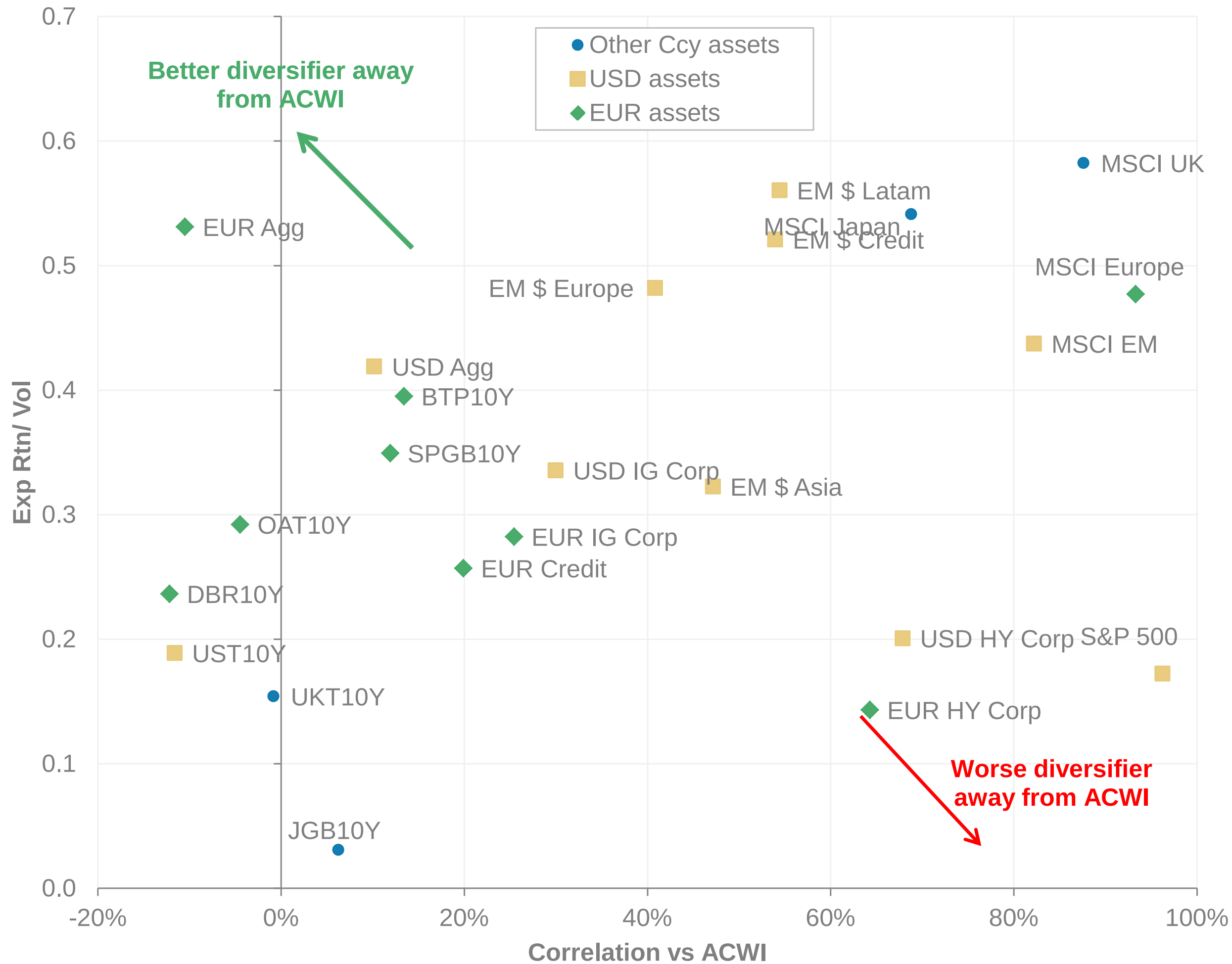
	Exp Rtn/Vol	Exp Rtn*	Vol**
MSCI UK	0.6	6.5	11.2
EM $ Latam	0.6	5.3	9.5
MSCI Japan	0.5	7.7	14.2
EUR Agg	0.5	1.7	3.3
EM $ Credit	0.5	4.1	7.8
EM $ Europe	0.5	3.5	7.2
MSCI Europe	0.5	5.3	11.1
MSCI EM	0.4	7.1	16.2
USD Agg	0.4	1.3	3.1
BTP10Y	0.4	3.2	8.1
SPGB10Y	0.3	2.6	7.4
USD IG Corp	0.3	1.7	5.0
EM $ Asia	0.3	2.5	7.6
OAT10Y	0.3	1.9	6.4
EUR IG Corp	0.3	0.9	3.3
EUR Credit	0.3	0.8	3.2
DBR10Y	0.2	1.3	5.3
USD HY Corp	0.2	1.4	7.0
UST10Y	0.2	1.3	6.7
S&P 500	0.2	2.5	14.7
UKT10Y	0.2	1.0	6.2
EUR HY Corp	0.1	1.1	7.6
JGB10Y	0.0	0.1	2.2



Note: See What Will Markets Return? October 23,2015, for methodology. "Expected Return" = LT expected returns less local currency cash. "Vol" = average of 1Y implied vol (where available, 1Y trailing if not) and 10Y realized vol. Number next to asset label in scatter is expected returns/vol.
Source: Morgan Stanley Research estimates, Bloomberg

Forecasts | Morgan Stanley Expected Risk/Reward versus Correlation

	Corr to ACWI	Exp Rtn*	Exp Rtn/Vol
S&P 500	96%	2.5	0.2
MSCI Europe	93%	5.3	0.5
MSCI UK	88%	6.5	0.6
MSCI EM	82%	7.1	0.4
MSCI Japan	69%	7.7	0.5
USD HY Corp	68%	1.4	0.2
EUR HY Corp	64%	1.1	0.1
EM $ Latam	54%	5.3	0.6
EM $ Credit	54%	4.1	0.5
EM $ Asia	47%	2.5	0.3
EM $ Europe	41%	3.5	0.5
USD IG Corp	30%	1.7	0.3
EUR IG Corp	25%	0.9	0.3
EUR Credit	20%	0.8	0.3
BTP10Y	13%	3.2	0.4
SPGB10Y	12%	2.6	0.3
USD Agg	10%	1.3	0.4
JGB10Y	6%	0.1	0.0
UKT10Y	-1%	1.0	0.2
OAT10Y	-4%	1.9	0.3
EUR Agg	-10%	1.7	0.5
UST10Y	-12%	1.3	0.2
DBR10Y	-12%	1.3	0.2



Note: See What Will Markets Return? October 23,2015, for methodology. "Expected Return" = LT expected returns less local currency cash. "Vol" = average of 1Y implied vol (where available, 1Y trailing if not) and 10Y realized vol. Source: Morgan Stanley Research estimates, Bloomberg

Asset Allocation | Portfolio Allocation – Overweight in Equities, Underweight in Govt. Bonds

Translating Our Cross-Asset Views into Portfolio Allocations over a 6- to 12-Month Investment Horizon

A two-step process:

1) A strategic view (Red dot) allocating across different asset classes without regard to region; and

2) An asset-specific view (Blue dot), making additional adjustments based on our relative preferences within the asset class.

Our view

We remain constructively positioned for now, with a modest overweight in equities, equal-weight in credit and cash and a modest underweight in government bonds.

We prefer Japan and the US over Europe and EM in equities.

In rates, we are most bearish on EU relative to US rates.

We like EM exposure across local rates, FX and credit.

In credit, we are long EM credit and securitised credit over DM corporates, with a preference for EU over US credit.

Current Cross-Asset Strategy Allocations

MS Asset Allocation Views (- / +)	Top-Down Allocation		Relative Allocation		O/W vs. Benchmark
Equities	+4%		+1% +1%		+5% +1%
US	+1%		+1% +1%		+2% +1%
Europe	+1%	+	0%	=	+1%
Japan	+1%		+1% -1%		+2% -1%
EM	+1%		-1% +1%		0% +1%
Govt. Bonds	-4%		0%		-4%
Treasuries	-1%		+1%		0%
Bunds	-1%		-2% -1%		-3% -1%
JGBs	-1%	+	-1%	=	-2%
EM Local	-1%		+2% +1%		+1% +1%
Credit	0%		-1% -1%		-1% -1%
US Corp.	0%		-2%		-2%
EU Corp.	0%		-1% -1%		-1% -1%
EM Sov.	0%	+	+2% +1%	=	+2% +1%
Securitised	0%		0% -1%		0% -1%
Other					0%
Cash					0%

Current
Previous

Source: Morgan Stanley Research, Bloomberg . Note: For a 6-12m view. Changes made as of Jun 4, 2017 in Global Strategy Mid-Year Outlook: Climbing the Last Wall of Worry .

Forecasts | Morgan Stanley One-Year Forecasts, Across Assets

Morgan Stanley Key Market Forecasts

	As of Jun 08, 2017	Q2 2018 Forecast		
		Bear	Base	Bull
Equities				
S&P 500	2,434	2,100	2,700	3,000
MSCI Europe	1,588	1,268	1,725	2,083
Topix	1,590	1,100	1,730	2,080
MSCI EM	1,019	660	1,050	1,300
FX				
USD/JPY	110.0	110.2	116.0	121.8
EUR/USD	1.12	1.10	1.16	1.28
GBP/USD	1.30	1.11	1.23	1.29
AUD/USD	0.75	0.60	0.67	0.70
USD/INR	64.2	62.0	65.0	70.0
USD/ZAR	12.9	12.9	14.3	15.0
USD/BRL	3.28	3.15	3.45	3.80
Rates (% percent)				
UST 10yr	2.19	2.95	2.40	1.75
DBR 10yr	0.26	1.50	0.80	-0.30
UKT 10yr	1.03	2.00	0.95	0.50
JGB 10yr	0.07	0.30	0.20	0.03
Credit (bps)				
US IG	114	206	137	97
US HY	396	804	518	324
EUR IG	49	90	55	40
EUR HY	260	400	290	250
Italy 10yr	192	290	215	180
EM Sovs	319	520	340	260
US CMBS	86	155	100	85
Agency MBS	16	30	18	5
Commodities				
Brent	48	43	55.0	68

Source: Markit iBoxx, MSCI, Bloomberg, The Yield Book, Morgan Stanley Research forecasts
Note: Brent returns are vs. the forward.

Morgan Stanley 1yr Return/Risk Forecasts

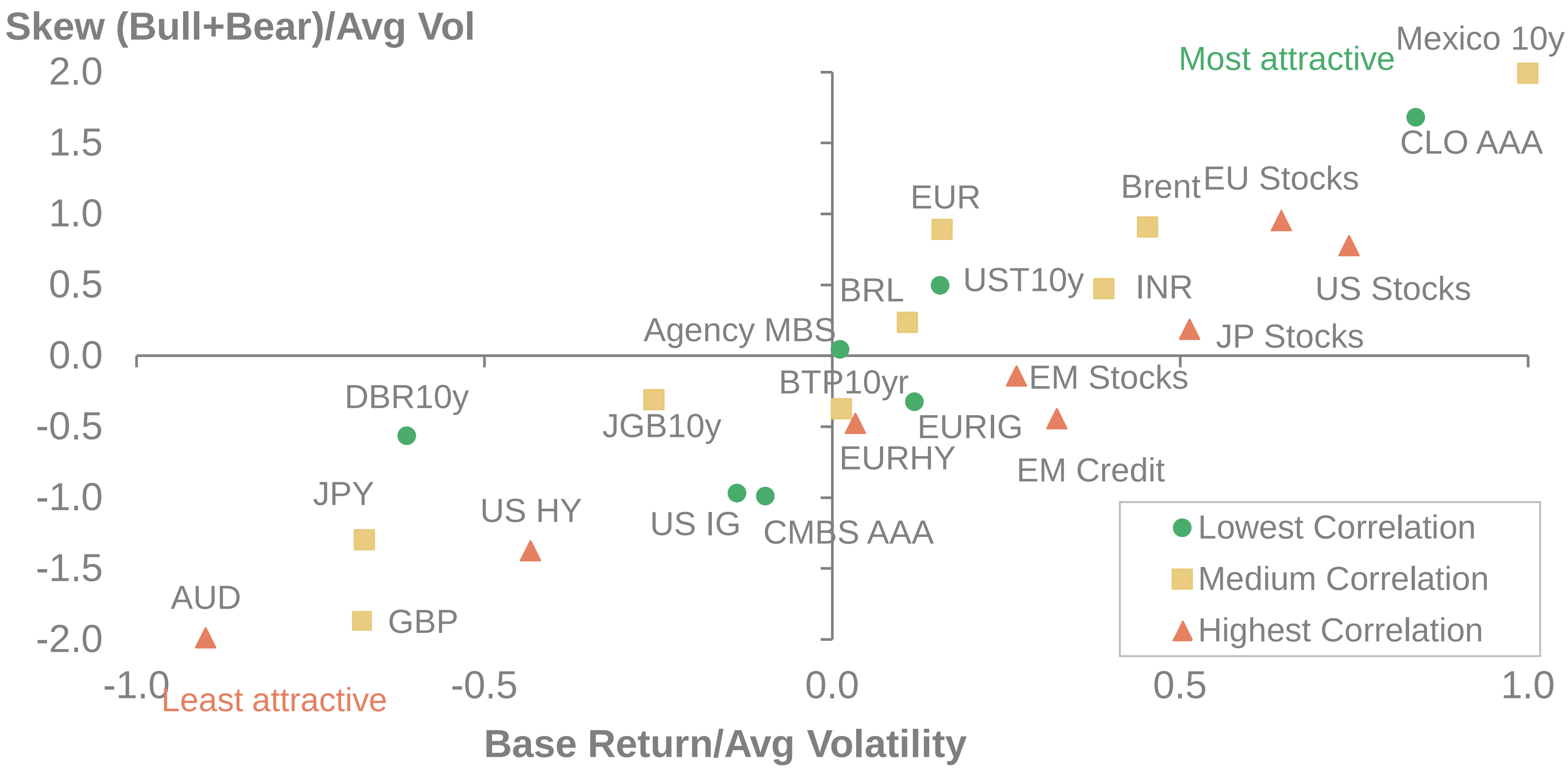
	12m Return			Volatility		Return/Risk
Asset	Bear Case	Base Case	Bull Case	Option Implied	LT Average	Base case Return/Vol
Equities						
S&P 500	-12%	12.9%	25%	14%	21%	0.74
MSCI Europe	-17%	12.0%	35%	17%	20%	0.65
Topix	-29%	10.7%	33%	18%	24%	0.51
MSCI EM	-33%	5.4%	30%	19%	22%	0.27
FX						
JPY/USD	-11%	-7.0%	-2%	9.6%	11.1%	-0.67
EUR/USD	-4%	1.4%	12%	7.7%	10.3%	0.16
GBP/USD	-16%	-6.2%	-1%	8.3%	10.1%	-0.68
AUD/USD	-20%	-10.8%	-6%	9.2%	14.7%	-0.90
INR/USD	-4%	2.9%	8%	6.9%	7.9%	0.39
ZAR/USD	-8%	-3.7%	6%	16.2%	18.3%	-0.22
BRL/USD	-7%	1.8%	11%	15.0%	17.7%	0.11
Rates						
UST 10yr	-3.3%	1.1%	6.7%	6.3%	7.2%	0.16
DBR 10yr	-9.1%	-3.3%	6.0%	5.5%	5.5%	-0.61
UKT 10yr	-5.6%	2.8%	6.3%	6.4%	6.1%	0.45
JGB 10yr	-1.5%	-0.6%	0.7%	2.0%	3.0%	-0.26
Credit (Excess Return)						
US IG	-5.1%	-0.4%	2.3%	3.0%	2.7%	-0.14
US HY	-11.8%	-2.6%	3.6%	4.5%	7.2%	-0.43
EUR IG	-1.5%	0.2%	1.0%	0.9%	2.6%	0.12
EUR HY	-3.9%	0.2%	1.6%	3.9%	5.9%	0.03
Italy 10yr	-5.6%	0.1%	2.9%	5.3%	9.2%	0.01
EM Sovs	-9.7%	1.7%	7.4%	3.8%	6.7%	0.32
US CMBS	-5.2%	-0.4%	1.0%	2.1%	6.6%	-0.10
Agency MBS	-0.7%	0.0%	0.8%	2.4%	3.3%	0.01
Commodities						
Brent	-11%	14.9%	41%	31%	35%	0.45

Source: Markit iBoxx, MSCI, Bloomberg, The Yield Book, Morgan Stanley Research forecasts

Asset Allocation | **Broad Asset Classes – Framing Risk and Reward**

Global Asset Classes – Expected Returns versus Risk

Move ‘up and right’ – assets to the top and right have higher expected returns and lower forecasted risk over the next 6-12 months



Source: Bloomberg, Yield Book, Morgan Stanley Research
Note: ‘Expected returns’ based on MS Strategy 12m forecasts

Forecasts | Morgan Stanley Economic Forecasts

	Quarterly												Annual		
	2016				2017				2018				2016	2017E	2018E
Real GDP (%Q, SAAR)	1Q	2Q	3Q	4Q	1QE	2QE	3QE	4QE	1QE	2QE	3QE	4QE			
Global*	**3.7**	**2.9**	**3.6**	**3.3**	**3.7**	**4.1**	**3.6**	**3.5**	**3.8**	**3.8**	**3.5**	**3.4**	**3.1**	**3.6**	**3.7**
G10	**1.6**	**1.4**	**2.4**	**2.1**	**1.5**	**2.3**	**1.9**	**1.9**	**1.8**	**1.7**	**1.6**	**1.6**	**1.6**	**2.0**	**1.8**
US	0.8	1.4	3.5	2.1	1.2	3.0	2.1	2.4	2.2	1.9	1.9	1.8	1.6	2.2	2.2
Euro Area	2.2	1.3	1.7	1.9	2.0	2.1	1.7	1.6	1.6	1.7	1.4	1.6	1.7	1.9	1.6
Japan	2.6	1.7	1.0	1.4	2.2	1.6	1.3	1.3	0.8	0.7	1.1	1.2	1.0	1.6	1.1
UK	0.6	2.4	2.0	2.7	0.7	1.7	1.4	1.2	1.2	1.2	0.8	0.0	1.8	1.7	1.1
EM (%Y)	**4.3**	**4.2**	**3.9**	**4.2**	**4.4**	**4.7**	**4.8**	**4.9**	**5.0**	**5.0**	**5.0**	**5.0**	**4.2**	**4.7**	**5.0**
China	6.7	6.7	6.7	6.8	6.9	6.7	6.6	6.4	6.4	6.4	6.4	6.4	6.7	6.6	6.4
India	9.2	7.9	7.5	7.0	6.1	7.7	8.2	8.2	8.5	7.8	7.8	8.0	7.9	7.6	8.0
Brazil	-5.4	-3.6	-2.9	-2.5	-1.1	-0.4	0.9	2.2	2.5	2.3	2.7	2.5	-3.6	0.5	2.5
Russia	-0.4	-0.5	-0.4	0.3	0.5	1.4	1.8	2.4	2.4	2.1	1.7	1.2	-0.2	1.5	1.8
Consumer price inflation (%Y)															
Global*	**2.6**	**2.4**	**2.4**	**2.5**	**2.7**	**2.7**	**2.8**	**2.8**	**2.7**	**2.8**	**2.7**	**2.7**	**2.6**	**2.8**	**2.8**
G10	**0.6**	**0.5**	**0.7**	**1.2**	**2.0**	**1.7**	**1.8**	**1.7**	**1.5**	**1.8**	**1.8**	**1.8**	**0.8**	**1.8**	**1.7**
US	1.1	1.1	1.1	1.8	2.6	2.1	2.1	1.8	1.6	2.0	2.1	2.0	1.3	2.1	1.9
Euro Area	0.0	-0.1	0.3	0.7	1.8	1.5	1.5	1.4	1.0	1.4	1.4	1.5	0.2	1.6	1.3
Japan	0.0	-0.3	-0.5	0.3	0.3	0.4	0.7	0.9	1.0	1.2	1.2	1.3	-0.1	0.6	1.2
UK	0.3	0.4	0.7	1.2	2.1	2.7	2.8	3.1	3.0	3.1	3.1	3.0	0.7	2.7	3.1
EM*	**4.1**	**3.8**	**3.6**	**3.5**	**3.2**	**3.4**	**3.6**	**3.7**	**3.6**	**3.5**	**3.3**	**3.3**	**3.9**	**3.5**	**3.5**
China	2.1	2.1	1.7	2.2	1.4	2.2	2.7	2.6	2.5	2.4	2.0	2.0	2.0	2.3	2.2
India	5.3	5.7	5.2	3.7	3.6	2.9	3.8	4.9	4.9	5.0	4.5	4.1	5.0	3.8	4.6
Brazil	10.1	9.1	8.7	7.0	4.9	3.7	2.9	3.4	4.0	4.5	4.5	4.5	8.8	3.7	4.4
Russia	8.4	7.3	6.8	5.7	4.6	4.1	3.8	3.9	4.4	4.5	4.4	4.1	7.1	4.1	4.3
Monetary policy rate (% p.a.)															
Global	**3.2**	**3.2**	**3.2**	**3.2**	**3.2**	**3.2**	**3.1**	**3.1**	**3.2**	**3.3**	**3.3**	**3.4**	**3.2**	**3.1**	**3.4**
G10	**0.1**	**0.1**	**0.1**	**0.2**	**0.3**	**0.4**	**0.4**	**0.5**	**0.6**	**0.8**	**0.9**	**1.0**	**0.2**	**0.5**	**1.0**
US	0.375	0.375	0.375	0.625	0.875	1.125	1.125	1.375	1.625	1.875	2.125	2.375	0.625	1.375	2.375
Euro Area	-0.40	-0.40	-0.40	-0.40	-0.40	-0.40	-0.40	-0.40	-0.40	-0.40	-0.25	-0.25	-0.40	-0.40	-0.25
Japan	-0.10	-0.10	-0.10	-0.10	-0.10	-0.10	-0.10	-0.10	-0.10	-0.10	-0.10	-0.10	-0.10	-0.10	-0.10
UK	0.50	0.50	0.25	0.25	0.25	0.25	0.25	0.25	0.25	0.25	0.25	0.25	0.25	0.25	0.25
EM	**5.6**	**5.5**	**5.5**	**5.5**	**5.4**	**5.2**	**5.1**	**5.1**	**5.1**	**5.1**	**5.1**	**5.2**	**5.50**	**5.10**	**5.20**
China	4.35	4.35	4.35	4.35	4.35	4.35	4.35	4.35	4.35	4.35	4.35	4.35	4.35	4.35	4.35
India	6.75	6.50	6.50	6.25	6.25	6.25	6.25	6.25	6.25	6.25	6.25	6.50	6.25	6.25	6.50
Brazil	14.25	14.25	14.25	13.75	12.25	10.25	9.00	8.75	8.75	8.75	8.75	9.75	13.75	8.75	9.75
Russia	11.00	10.50	10.00	10.00	9.75	8.75	8.25	8.00	8.00	7.75	7.50	7.00	10.00	8.00	7.00

Source: IMF, Morgan Stanley Research forecasts

Note: Global and regional aggregates for GDP growth are GDP-weighted averages, using PPPs; Japan CPI includes VAT; Japan policy rate is the interest rate on excess reserves; CPI numbers are period average. Global* and EM* Consumer Price Inflation Aggregates exclude Venezuela and Argentina. The global core inflation aggregate consist of G4+BRICS. ^The US core inflation number is core PCE

Global Mid-Year Outlooks

Economics

Global Macro Mid-Year Outlook: Transitioning to Self-Sustaining Growth

The global economy has shifted away from the below-trend growth and lowflation environment. Both DMs and EMs are transitioning to more self-sustaining growth, led by private sector demand, particularly capex. Global growth will be on a surer footing and the expansion will last for longer.

US Economics Mid-Year Outlook: Aging Gracefully

European Economics Mid-Year Outlook: Quality Shift, Not Quantum Leap

Japan Economics Mid-Year Outlook: Solid Economic Expansion To Continue

China Economics Mid-Year Outlook: Growth Moderation Amid More Prudent Debt Management

ASEAN, Korea & Taiwan Economic Mid-Year Outlook: The Export Recovery Is For Real

Asia Ex-Japan Economics Mid-Year Outlook: Stable but Better

CEEMEA Economics Mid-Year Outlook: Up, Up and Away

Latin America Economic Mid-Year Outlook: On Starting Points and Policy Choices

Hong Kong Economic Mid-Year Outlook: Benefitting From External Tailwinds

India Economic Mid-Year Outlook: Acceleration Ahead

Global Cross-Asset

Global Strategy Mid-Year Outlook: Climbing the Last Wall of Worry

We expect broad-based growth and contained inflation to drive more animal spirits. OW equities vs. credit and rates, buy EUR and EM FX vs. JPY and AUD, buy EM fixed income and avoid corporate credit.

Equities

2016 US Equity Outlook:The Tension Between Higher Earnings and Lower Multiples – Will You Know When to Get Out?

European Equity Mid-Year Outlook: Curbing Our Enthusiasm

Asia/EM Equities Mid-Year Outlook: Still Prefer Japan to EM; OW IT and Financials

Latam Equity Strategy Mid-Year Outlook: An Unattractive Risk-Reward

ASEAN Equity Strategy Mid-Year Outlook: Correction: Prefer Indonesia...

FX

Global FX Mid-Year Outlook: Pivot to Europe

EM

Global EM Fixed Income Mid-Year Outlook: Shift EM into High Gear

Credit

Europe Credit Mid-Year Outlook: Less To Play For

In Case You Missed It…

Cross-Asset Strategy Reports Published Recently

6 Jun	**Global Strategy Mid-Year Outlook: Climbing the Last Wall of Worry** We expect broad-based growth and contained inflation to drive more animal spirits. OW equities vs. credit and rates, buy EUR and EM FX vs. JPY and AUD, buy EM fixed income and avoid corporate credit.
1 Jun	**Cross-Asset Strategy: Global In the Flow - June 2017** Our monthly data pack with market performance review, valuations, technicals and economic indicators we are watching.
1 Jun	**UK Economics & Strategy | UK Election: May's Majority** We expect a larger Conservative majority, pointing to a smooth-but-hard Brexit, supporting near-term growth, but weighing on prospects. Alternative scenarios look worse short term, but better further out.
30 May	**Cross-Asset Dispatches: Our Cycle Models: The Late Cycle Playbook** Our updated suite of business cycle indicators points to a continued 'expansion' across DM markets. We look at what this means for returns and asset allocation, and what would cause the cycle to shift.
23 May	**Cross-Asset Dispatches: China Tightening FAQ** A manageable, calibrated tightening continues to be our base case in China. But a low-vol environment offers an opportunity to hedge the bear case risk of a moderate market correction.
14 May	**Cross-Asset Quant: Volatility: The Factor of the Decade** Capturing the volatility risk premium has been one of the most effective strategies post-crisis, at a time when other cross-asset factors have struggled.
9 May	**Cross-Asset Brief: VIX Under 10** Volatility has collapsed across asset classes, with VIX printing sub 10 in recent days. We explore what this has meant for markets historically.

Valuation Methodology and Risks

Trade	Entry Date	Rationale	Risk
Like Mexico Local Bonds	02-May-17	We believe valuations for Mexico local rates are some of the most attractive in EM. With a lot of near-term uncertainty, we recommend only medium-term uncertainty trades that could also benefit from a potential inversion of the curve if disinflation gives way to market-implied rate cuts towards the end of the year	Inflation fails to consolidate as we expect and/or external risks increase further, leading Banxico to hike rates much more than we expect and risk premium to build.
Like Poland Local Bonds	02-May-17	A combination of strong growth, stable inflation and a not-yet-hawkish central bank creates a Goldilocks scenario for the fixed income market. POLGBs valuation is attractive. Foreign investors, the marginal investors in POLGBs, are returning to the market.	Significant sell-off in core rates.
Like Russia Local Bonds	14-Jul-16	Russia still has a positive story for local bonds: below-potential growth, fast-dropping inflation, better fiscal discipline and a gradually easing CBR. The market pricing of easing is more or less in line with our economist's forecast. Russia's real yield is the second-highest in EM, making its carry attractive. Local demand for OFZs due to the regulatory requirement remains strong.	Decline in oil prices or persistent upside surprise in Russia CPI.
Like Indonesia Local Bonds	06-Mar-17	We see a window for positive sentiment on Indonesia bonds, given the relatively high real yield in the region, while the supply picture for 2017 looks benign.	Despite an improvement in Indonesia's fundamentals, we remain cautious on rising market uncertainties out of China and the US, as IndoGBs and IDR tend to underperform in periods of increasing volatility.
Like Turkey Local Bonds	04-Jun-17	The CBT continues to keep the funding rate at a historical high after surprising the market by being hawkish four times in a row since last November. The last time the CBT vowed to keep tight monetary policy until inflation declined was in January 2014 when it enacted emergency rate hikes, and such a tightening stance was kept for more than six months, which helped the local market rally in 2014.	Sell-off in core rates or a cabinet reshuffle that removes market-friendly ministers.
Like India Local bonds	06-Mar-17	While the RBI has switched from an accommodative to a neutral stance, we think low inflation until August gives scope to pick up carry in the front end. We expect the RBI to stay on hold for an extended period before hiking in 2H18, and forecast stable long-end rates in this period.	Spike in global volatility, leading to a sell-off in EM FX and rates.
Like South Korea local bonds	20-Oct-16	Our economists expect the BoK to keep rates unchanged over 2017-18, while the market is pricing in ~16bp of hikes over 1y. The 3m CD rate has normalized, but markets are pricing in higher fixing seasonality in 4Q17 and 1Q18. We recommend receiving the front end in Korea and stay long short-dated bonds, asset-swapped into USD, as slow-burning carry trades with a positive asymmetry to China tail risks.	Stronger growth momentum in the region, boosting China's growth outlook, trade and domestic demand.
Dislike South African Local Bonds	31-Mar-17	We continue to believe that investors are too optimistic about the fundamentals and a resolution to the political uncertainty. Lower headline inflation points to a lower policy rate but the SARB will likely stay cautious. Foreign positions in SAGBs remain heavy. We are bearish on South Africa.	The risk to our view is reduced political risk or a dovish Fed which causes risk to rally.
Dislike Chile Local Bonds	27-Jan-17	We are bearish on local rates in Chile, given unappealing valuations, an end of the easing cycle and recovering expectations for both growth and inflation. While we do not anticipate a sharp sell-off in local yields, we believe being paid in rates offers an attractive hedge for our otherwise bullish EM portfolio, especially given Chile's high exposure to China and copper. Although Chile's increasing weight in the GBI-EM could attract additional inflows, we believe most of the surprise factor is behind us and investors will likely favor an UW position there.	Chilean local rates continue to rally past historical lows.
Dislike China Local Bonds	27-Jan-17	Our economists expect the PBOC to maintain a tightening bias in interbank rates and see upside risks to the policy rate in order to curb rising leverage in the property and bond markets. Tighter repo and interbank rates have led to deleveraging in bonds. In addition, with the recent upside in PPI, higher commodity prices, and given spillovers from global yield curve steepening, we think risks are skewed for higher yields on onshore rates.	The PBOC is less hawkish than expected. Commodity prices and curve-steepening revert. Capital outflows concerns diminish for China over the medium term.
Like Mexico Hard Currency Bonds	04-Jun-17	We envisage a bull case scenario of NAFTA concerns being resolved relatively swiftly. Political risks are mitigated by increased co-ordination from mainstream political parties. We expect another 10-15bp tightening for 10y bonds	An unfavorable election outcomes with the risk of populism rising. More protectionist policies from US would mean a more adverse outcome in NAFTA renegotiations.
Like Turkey Hard Currency Bonds	04-Jun-17	Turkey is up against low expectations, in our view. So, as growth picks up to 3%Y in 2017 and the CBT keeps monetary policy tight, according to our economist, we think Turkey can close the 30bp gap to an average of BB credits. The fiscal measures announced, such as the credit guarantee fund, are clearly counter-cyclical yet public debt is also currently low enough that this is possible.	Adverse geopolitics, cabinet reshuffle with less market-friendly ministers.
Like Russia Hard Currency Bonds	04-Jun-17	Russia is not the highest-yielding credit but we think spreads have potential to rally on the back of improving growth and fiscals. Positioning by foreigners is fairly light, with very high domestic ownership.	Oil prices fall significantly.
Like Argentina Hard Currency Bonds	14-Jul-16	We envisage macro normalization and transformation in Argentina. A positive election result can push the current spread of 40bp tighter vs. single B credits to at least 80bp. And we expect 10y spreads vs. benchmark to be at 350bp by the end of the year. The much steeper 10s30s curve favours the long end of the USD curve.	Fiscal consolidation efforts falter or confidence in the economy does not pick up as expected, leading to another growth slump.
Like Ukraine Hard Currency Bonds	14-Jul-16	Our outlook on Ukraine is positive as we expect further headway in reforms and macro normalization even though the 6m returns are likely to be carry-driven.	Re-escalation of conflict in Eastern Ukraine or reform momentum fading.
Like Indonesia Hard Currency Bonds	14-Jun-16	Growth remains on a gradual recovery path, with both the fiscal and C/A deficit looking better. Though structural reforms are slow, they should develop the manufacturing base further. We see 10y spreads trading in line with Mexico and Colombia and expect more upside in the longer end due to steep 10s30s curves.	Disappointing fiscal results and a slowdown in reforms.
Dislike Chile Hard Currency Bonds	07-Mar-17	We see Chile among the least attractive credits in LatAm. This is not only as a result of its tight spreads but also because it runs a high exposure to China, commodity and global trade, which would all be impacted in our bear case of increased protectionism coming out of the US.	Growth surprises to the upside, positive surprises in politics.
Dislike Peru Hard Currency Bonds	01-Feb-17	Peru trades 83bp inside BBB credits, standing among the richer credits. With downside risks to growth due to political noise, near-term upside is limited. Peru also has high exposure to China, commodity and global trade, which would all be impacted in our bear case of increased protectionism from the US.	Growth surprises to the upside, political noise reduces.
Dislike South Africa Hard Currency Bonds	02-May-17	We believe the market is overpricing the probability of a more market-friendly administration and expect both fiscal and growth to disappoint expectations. We see growth of only 0.8-1%Y until 2018 and the fiscal deficit to remain wide. We thus expect spreads to widen beyond the BB average due to the pressure on the debt trajectory and ratings.	The risks to the trade include a more benign outlook on politics or if commodity prices rise significantly.

History of Recommendations

History of recommendations for Dislike South Africa Local Bonds

Instrument	Trade	Entry Date	Exit Date
South Africa Local Bonds	Dislike South Africa Local Bonds	31-Aug-16	01-Feb-17

History of recommendations for Like Turkey Local Bonds

Instrument	Trade	Entry Date	Exit Date
Turkey Local Bonds	Dislike Turkey Local Bonds	17-Jul-16	27-Nov-16

History of recommendations for Dislike South Africa Hard Currency Bonds

Instrument	Trade	Entry Date	Exit Date
South Africa Hard Currency Bonds	Dislike South Africa Hard Currency Bonds	17-Jul-16	01-Feb-17

History of recommendations for Like Peru Hard Currency Bonds

Instrument	Trade	Entry Date	Exit Date
Peru Hard Currency Bonds	Like Peru Hard Currency Bonds	17-Jul-16	18-Sep-16

History of recommendations for Like Russia Hard Currency Bonds

Instrument	Trade	Entry Date	Exit Date
Russia Hard Currency Bonds	Dislike Russia Hard Currency Bonds	01-Feb-17	07-Mar-17

History of recommendations for Like Mexico Hard Currency Bonds

Instrument	Trade	Entry Date	Exit Date
Mexico Hard Currency bonds	Like Mexico Hard Currency bonds	21-Oct-16	16-Nov-16
Mexico Hard Currency bonds	Dislike Mexico Hard Currency bonds	27-Nov-16	31-Jan-17

History of recommendations for Like Turkey Hard Currency Bonds

Instrument	Trade	Entry Date	Exit Date
Turkey Hard Currency bonds	Dislike Turkey Hard Currency Bonds	17-Jul-16	27-Nov-16

Source: Morgan Stanley Research

Strategy Risk Factors

Buying calls or call spreads: Investors who buy call options risk loss of the entire premium paid if the underlying security finishes below the strike price at expiration. Investors who buy call spreads (buy a call and sell a further OTM call) also have a maximum loss of the entire up-front premium paid. The maximum gain from buying call spreads is the difference between the strike prices, less the upfront premium paid.

Buying puts or put spreads: Investors who buy put options risk loss of the entire premium paid if the underlying security finishes above the strike price at expiration. Investors who buy put spreads (buy a put and sell a further OTM put) also have a maximum loss of the upfront premium paid. The maximum gain from buying put spreads is the difference between the strike prices, less the upfront premium paid.

Selling calls: Investors who sell covered calls (own the underlying security and sell a call) risk limiting their upside to the strike price plus the upfront premium received and may have their security called away if the security price exceeds the strike price of the short call. Additionally, the investor has full downside exposure that is only partially offset by the upfront premium taken in. Investors short naked calls (i.e. sold calls but don’t hold underlying security) risk unlimited losses of security price less strike price. Investors who sell naked call spreads (i.e. sell a call and buy a farther out-of-the-money call with no underlying security position) have a maximum loss of the difference between the long call strike and the short call strike, less the upfront premium taken in, if the underlying security finishes above the long call strike at expiration. The maximum gain is the upfront premium taken in, if the security finishes below the short call strike at expiration.

Selling puts: Put sellers commit to buying the underlying security at the strike price in the event the security falls below the strike price. The maximum loss is the full strike price less the premium received for selling the put. Put sellers who are also long a lower dollar-strike put face a maximum loss of the difference between the long and short put strikes less the options premium received.

Buying strangles: The maximum loss is the entire premium paid (put + call), if the security finishes between the put strike and the call strike at expiration.

Selling strangles or straddles: Investors who are long a security and short a strangle or straddle risk capping their upside in the security to the strike price of the call that is sold plus the upfront premium received. Additionally, if the security trades below the strike price of the short put, the investor risks losing the difference between the strike price and the security price (less the value of the premium received) on the short put and will also experience losses in the security position if he owns shares. The maximum potential loss is the full value of the strike price (less the value of the premium received) plus losses on the long security position. Investors who are short naked strangles or straddles have unlimited potential loss since if the security trades above the call strike price, the investor risks losing the difference between the strike price and the security price (less the value of the premium received) on the short call. Additionally, they are obligated to buy the security at the put strike price (less upfront premium received) if the security finishes below the put strike price at expiration. Strangle/straddle sellers risk assignment on short put positions that become in the money. Additionally, they risk having stock called away from short call positions that become in the money.

Options Disclaimer

Options are not for everyone. Before engaging in the purchasing or writing of options, investors should understand the nature and extent of their rights and obligations and be aware of the risks involved, including the risks pertaining to the business and financial condition of the issuer and the underlying stock. A secondary market may not exist for these securities. For customers of Morgan Stanley & Co. LLC who are purchasing or writing exchange-traded options, your attention is called to the publication “Characteristics and Risks of Standardized Options;” in particular, the statement entitled “Risks of Option Writers.” That publication, which you should have read and understood prior to investing in options, can be viewed on the Web at the following address: http://www.optionsclearing.com/about/publications/character-risks.jsp. Spreading may also entail substantial commissions, because it involves at least twice the number of contracts as a long or short position and because spreads are almost invariably closed out prior to expiration. Potential investors should be advised that the tax treatment applicable to spread transactions should be carefully reviewed prior to entering into any transaction. Also, it should be pointed out that while the investor who engages in spread transactions may be reducing risk, he is also reducing his profit potential. The risk/ reward ratio, hence, is an important consideration.

The risk of exercise in a spread position is the same as that in a short position. Certain investors may be able to anticipate exercise and execute a "rollover" transaction. However, should exercise occur, it would clearly mark the end of the spread position and thereby change the risk/reward ratio. Due to early assignments of the short side of the spread, what appears to be a limited risk spread may have more risk than initially perceived. An investor with a spread position in index options that is assigned an exercise is at risk for any adverse movement in the current level between the time the settlement value is determined on the date when the exercise notice is filed with OCC and the time when such investor sells or exercises the long leg of the spread. Other multiple-option strategies involving cash settled options, including combinations and straddles, present similar risk.

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- Examples within are indicative only, please call your local Morgan Stanley Sales representative for current levels.
- By selling an option, the seller receives a premium from the option purchaser, and the purchase receives the right to exercise the option at the strike price. If the option purchaser elects to exercise the option, the option seller is obligated to deliver/purchase the underlying shares to/from the option buyer at the strike price. If the option seller does not own the underlying security while maintaining the short option position (naked), the option seller is exposed to unlimited market risk.
- Spreading may entail substantial commissions, because it involves at least twice the number of contracts as a long or short position and because spreads are almost invariably closed out prior to expiration. Potential investors should carefully review tax treatment applicable to spread transactions prior to entering into any transactions.
- Multi-legged strategies are only effective if all components of a suggested trade are implemented.
- Investors in long option strategies are at risk of losing all of their option premiums. Investors in short option strategies are at risk of unlimited losses.
- There are special risks associated with uncovered option writing which expose the investor to potentially significant loss. Therefore, this type of strategy may not be suitable for all customers approved for options transactions. The potential loss of uncovered call writing is unlimited. The writer of an uncovered call is in an extremely risky position, and may incur large losses if the value of the underlying instrument increases above the exercise price.
- As with writing uncovered calls, the risk of writing uncovered put options is substantial. The writer of an uncovered put option bears a risk of loss if the value of the underlying instrument declines below the exercise price. Such loss could be substantial if there is a significant decline in the value of the underlying instrument.
- Uncovered option writing is thus suitable only for the knowledgeable investor who understands the risks, has the financial capacity and willingness to incur potentially substantial losses, and has sufficient liquid assets to meet applicable margin requirements. In this regard, if the value of the underlying instrument moves against an uncovered writer’s options position, the investor’s broker may request significant additional margin payments. If an investor does not make such margin payments, the broker may liquidate stock or options positions in the investor’s account, with little or no prior notice in accordance with the investor’s margin agreement.
- For combination writing, where the investor writes both a put and a call on the same underlying instrument, the potential risk is unlimited.
- If a secondary market in options were to become unavailable, investors could not engage in closing transactions, and an option writer would remain obligated until expiration or assignment.
- The writer of an American-style option is subject to being assigned an exercise at any time after he has written the option until the option expires. By contrast, the writer of a European-style option is subject to exercise assignment only during the exercise period.

Definitions

Buy/Long: The analyst expects the total or excess return (depending on the nature of the recommendation) of the instrument or issuer that is the subject of the investment recommendation to be positive over the relevant time period.

Sell/Short: The analyst expects the total or excess return (depending on the nature of the recommendation) of the instrument or issuer that is the subject of the investment recommendation to be negative over the relevant time period.

Selling protection or Buying Risk: The analyst expects that the price of protection against the event occurring will decrease over the relevant time period.

Buying protection or Selling Risk: The analyst expects the price of protection against the event occurring will increase over the relevant time period.

Pay: The analyst expects that over the specified time period the variable rate underlying the swap agreement that is the subject of the investment recommendation will increase.

Receive: The analyst expects that over the specified time period the variable rate underlying the swap agreement that is the subject of the investment recommendation will decrease.

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When more than one issuer or instrument is included in a recommendation, analyst expects one part of the trade to outperform the other trade or combination of other trades included in the recommendation on a relative basis.

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Mortgage Backed Securities (MBS) and Collateralized Mortgage Obligations (CMO)

Principal is returned on a monthly basis over the life of the security. Principal prepayment can significantly affect the monthly income stream and the maturity of any type of MBS, including standard MBS, CMOs and Lottery Bonds. Yields and average lives are estimated based on prepayment assumptions and are subject to change based on actual prepayment of the mortgages in the underlying pools. The level of predictability of an MBS/CMO's average life, and its market price, depends on the type of MBS/CMO class purchased and interest rate movements. In general, as interest rates fall, prepayment speeds are likely to increase, thus shortening the MBS/CMO's average life and likely causing its market price to rise. Conversely, as interest rates rise, prepayment speeds are likely to decrease, thus lengthening average life and likely causing the MBS/CMO's market price to fall. Some MBS/CMOs may have "original issue discount" (OID). OID occurs if the MBS/CMO's original issue price is below its stated redemption price at maturity, and results in "imputed interest" that must be reported annually for tax purposes, resulting in a tax liability even though interest was not received. Investors are urged to consult their tax advisors for more information. Government agency backing applies only to the face value of the CMO and not to any premium paid.

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The following analysts hereby certify that their views about the companies and their securities discussed in this report are accurately expressed and that they have not received and will not receive direct or indirect compensation in exchange for expressing specific recommendations or views in this report: Andrew Sheets.

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Global Stock Ratings Distribution

(as of May 31, 2017)

The Stock Ratings described below apply to Morgan Stanley's Fundamental Equity Research and do not apply to Debt Research produced by the Firm.

For disclosure purposes only (in accordance with NASD and NYSE requirements), we include the category headings of Buy, Hold, and Sell alongside our ratings of Overweight, Equal-weight, Not-Rated and Underweight. Morgan Stanley does not assign ratings of Buy, Hold or Sell to the stocks we cover. Overweight, Equal-weight, Not-Rated and Underweight are not the equivalent of buy, hold, and sell but represent recommended relative weightings (see definitions below). To satisfy regulatory requirements, we correspond Overweight, our most positive stock rating, with a buy recommendation; we correspond Equal-weight and Not-Rated to hold and Underweight to sell recommendations, respectively.

	Coverage Universe		Investment Banking Clients (IBC)			Other Material Investment Services Clients (MISC)	
Stock Rating Category	Count	% of Total	Count	% of Total IBC	% of Rating Category	Count	% of Total Other MISC
Overweight/Buy	**1146**	**35%**	**298**	**41%**	**26%**	**560**	**37%**
Equal-weight/Hold	**1411**	**44%**	**333**	**46%**	**24%**	**679**	**45%**
Not-Rated/Hold	**59**	**2%**	**8**	**1%**	**14%**	**8**	**1%**
Underweight/Sell	**616**	**19%**	**87**	**12%**	**14%**	**262**	**17%**
Total	**3,232**		**726**			**1509**	

Data include common stock and ADRs currently assigned ratings. Investment Banking Clients are companies from whom Morgan Stanley received investment banking compensation in the last 12 months.

Analyst Stock Ratings

Overweight (O or Over) - The stock's total return is expected to exceed the total return of the relevant country MSCI Index or the average total return of the analyst's industry (or industry team's) coverage universe, on a risk-adjusted basis over the next 12-18 months.

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Equal-weight (E or Equal) - The stock's total return is expected to be in line with the total return of the relevant country MSCI Index or the average total return of the analyst's industry (or industry team's) coverage universe, on a risk-adjusted basis over the next 12-18 months.
Not-Rated (NR) - Currently the analyst does not have adequate conviction about the stock's total return relative to the relevant country MSCI Index or the average total return of the analyst's industry (or industry team's) coverage universe, on a risk-adjusted basis, over the next 12-18 months.

Underweight (U or Under) - The stock's total return is expected to be below the total return of the relevant country MSCI Index or the average total return of the analyst's industry (or industry team's) coverage universe, on a risk-adjusted basis, over the next 12-18 months.

Unless otherwise specified, the time frame for price targets included in Morgan Stanley Research is 12 to 18 months.

Analyst Industry Views

Attractive (A): The analyst expects the performance of his or her industry coverage universe over the next 12-18 months to be attractive vs. the relevant broad market benchmark, as indicated below.
In-Line (I): The analyst expects the performance of his or her industry coverage universe over the next 12-18 months to be in line with the relevant broad market benchmark, as indicated below.
Cautious (C): The analyst views the performance of his or her industry coverage universe over the next 12-18 months with caution vs. the relevant broad market benchmark, as indicated below.
Benchmarks for each region are as follows: North America - S&P 500; Latin America - relevant MSCI country index or MSCI Latin America Index; Europe - MSCI Europe; Japan - TOPIX; Asia - relevant MSCI country index or MSCI sub-regional index or MSCI AC Asia Pacific ex Japan Index.

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