



Asset Allocation & Delta-1 Strategy Investor Positioning and Flows

Date
17 May 2019
Strategy Update

Was That It?

As we had argued, an equity selloff had become overdue as (i) the rally since late December had been unusually long (91st percentile) and strong (96th percentile); (ii) equities at the recent peak had already priced in a rebound in growth; and (iii) as positioning had become extended according to a number of indicators albeit not unanimously so. In the event, the selloff so far has been smaller and the rebound quicker than typical, market pricing is again ahead of current growth and much of the cut in positioning has already reversed, in our reading leaving the market vulnerable to negative catalysts.

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Selloff so far has been smaller and the rebound quicker than usual

At the recent bottom on Monday, the market was down almost 5% from the peak, in-line with normal selloffs (3-5%) which occur every 2-3 months but somewhat less than the 5-7% selloffs which typically follow long and strong rallies. If Monday indeed marked the bottom, the selloff would also be much shorter than the usual 2-3 weeks the market takes to find a bottom.

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The market is still slightly ahead of growth

At the recent peak the market had run ahead and was already pricing in a strong rebound in macro as well as earnings growth. At the Monday bottom, the market was back in line with current growth but with the latest modest rebound it is again slightly ahead, leaving it vulnerable in the near term.

Equity fund outflows surged; positioning is down modestly amidst low liquidity

- **Largest equity outflows since December.** Equity funds again saw large outflows (-\$19.5bn) taking the total in the last two weeks to -\$40bn, the largest since December. Outflows were very broad based across regions and countries this week except for one notable outlier: China equity funds saw a large \$2.6bn inflow, similar to those seen during market selloffs in October and December last year. Excluding China, the rest of EM saw large outflows (-\$4.3bn) as did the US (-\$8.1bn), Europe (-\$4.5bn) and Japan (-\$1.8bn). As the market turned around on Tuesday, equity ETFs saw inflows return on Wednesday and Thursday.
- **Modest cuts in equity positioning.** Equity futures net long positions which were at the top of their historical range going into the selloff, have been reduced, but only modestly so and remain elevated. Vol control funds sold \$13-\$15bn in equities on the sell-off but then partially reversed that buying

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\$5-7bn back this week as VIX moderated. CTAs trimmed S&P 500 exposure but are still long, while Risk Parity bought-the-dip to add equity beta. Equity L/S trimmed gross leverage despite low net beta. Derivatives metrics like put/call ratios, S&P 500 option skew, and VIX jumped very quickly from indicating bullish equities positioning to more bearish but have now moderated. Investor sentiment surveys also swung sharply from bullish to bearish in the space of a week and it would be interesting to see if the subsequent market rebound leads to optimism again.

- **Liquidity remains very low which means outsized reactions to small changes in positioning and flows.** Despite high futures volumes relative to cash this week, on-screen liquidity in S&P 500 futures is still very low relative to history. Bid-ask quotes within 1 index point of spot have been less than 50% of their previous 5Y average since February 2018. This low liquidity means small changes in positioning can have outsized market impact, similar to the dynamics in late December 2018 when low liquidity exacerbated the volatility spike and sell-off.

Positioning details

Vol Control and CTAs sold equities on the sell-off, Risk Parity bought the dip

- **Vol Control funds bought back \$5-\$7bn in equities as VIX fell**, partially reversing the sale of \$13-\$15bn as the market sold off. VIX spiked through 20 on Monday then came in over the week to close at 15 on Friday. 1M realized vol picked up from 9 at the end of last week to 13.3 today, with time-weight metrics spiking faster. Risk from Vol Control funds remains to the downside with the complex still heavily allocated to equities.
- **CTAs trimmed equity beta but are still net long S&P 500.** With spot trading down through its 50d average on Monday, some CTAs sold S&P 500. However spot moved up through the 50d MA on Thursday and is well above its longer-term Mas. In aggregate, the complex remains net long S&P 500 but with lighter positioning relative to 2018. CTA positioning is most crowded in long USD and long Treasuries.
- **Risk Parity bought the dip increasing S&P 500 beta.** While VIX spiked significantly, equity realized volatility is still relatively benign. And negative equity-bond correlations have kept volatility in the cross asset portfolio low. Risk Parity managers are slower to respond than other systematic strategies, and equity markets stabilized relatively quickly after the sell-off.
- **Equity L/S trimmed gross leverage despite low net exposure.** This week's market moves negatively impacted returns, with PMs trimming gross leverage as the market sold off then having low net exposure to the market rebound. Popular HF longs underperformed HF shorts also contributing to negative returns. Equity L/S returns are down -1.8% in May but YTD returns are still firmly positive at +4.8%.

CFTC update:

- **US equities:** Net positioning in US equity futures continued to fall after nearing the top of its historical range. Positioning fell across all US indices (S&P 500, Russell 2000, Nasdaq 100, S&P 400, and Dow Jones) as well as EM.
- **EM:** Equity futures longs have fallen sharply this week after remaining at elevated levels all of this year. Positioning in EM FX is mixed, with MXN long

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positioning moving to more elevated levels and BRL short positioning rising.

- **Commodities:** Oil net long positioning continues to be pared back. Short positioning in copper rose further this week while gold positioning moved from mostly neutral to clearly long.
- **FX:** Long positioning in the trade-weighted dollar fell sharply this week as yen shorts were cut sharply. Shorts in the Euro and GBP fell modestly those in the Swiss Franc, AUD and CAD rose.
- **Bonds:** Positioning in Eurodollar rates has climbed further over the last four weeks after turning long for the first time since Oct 2015. Positioning remains close to neutral in the 2y contract, a little short in the 5y, 10y and 15-25y and very short in the 25y+ maturities.
- **VIX:** The record short in VIX futures at the end of April reverted in May as volatility increased and long VIX ETPs saw corresponding outflows. VIX futures positioning is now in-line with historical averages.

Fund flows details

Large equity outflows continue as trade war escalates

- **Equity fund** outflows (-\$19.5bn) in the week were driven by redemptions across all major regions, led by the US (-\$8.1b) and Europe (-\$4.5b). China (+\$2.6b) was a big outlier and in fact received strong inflows. Japan (-\$1.8b) outflows were largely driven by foreign funds (-\$1.6b) whereas domestic funds (-\$0.2b) saw muted flows. EM (-\$1.7b) overall saw outflows despite the China inflows, primarily driven by broad-based EM funds (-\$2.8b). EM Asia outside of China saw outflows of -\$1.4bn. Latam (-\$0.2b) saw outflows but EMEA (+\$0.2b) received inflows. Funds with a global mandate (-\$2.5b) saw their second successive week of outflows.
- **Across sectors**, all funds with the exception of Utilities (+\$0.5b) and Healthcare (+\$0.3b) suffered outflows. Outflows were led by Financials (-\$1.4b), Energy (-\$0.9b), Materials (-\$0.8b), Real estate (-\$0.8b), Cons goods (-\$0.7b) and Telecom (-\$0.5b). Tech (-\$0.2b) and Industrials (-\$0.1b) saw very modest redemptions. Defensive equity funds overall continued to benefit, with dividend funds (+\$0.7b) and low vol funds (+\$0.4b) leading the way.
- **Across size funds**, large caps (-\$4.9b) led outflows again but at a slower pace compared to last week. Mid caps (-\$0.1b) and small caps (-\$0.1b) saw only modest outflows, in line with their recent trend.
- **Across style funds**, growth funds (-\$0.8b) witnessed their third consecutive week of outflows, whereas outflows from value funds (-\$0.9b) continued for the ninth straight week.

Bond fund inflows slowed this week as credit funds saw outflows at the fastest pace since December, partly offsetting solid inflows into government bonds

- **Bond funds** (+\$5.1b) overall continued to see inflows but at a slower pace compared to their ytd weekly average as credit funds saw heavy outflows this week.
- **Across bond categories**, generic bonds (+\$7.9b) continued to absorb strong inflows, but credit funds suffered this week, particularly HY (-\$3.5b) and EM (-\$2.9b) while HG (-\$0.1) outflows were modest. This is the largest

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outflow from credit funds since December. Government bonds (+\$2.9) received solid inflows, their largest since mid-Jan this year. MBS (+\$0.5b) and Munis (+\$0.8b) continued to receive inflows whereas outflows from bank loans (-\$0.4b) persisted while TIPS funds (-\$0.1b) saw modest outflows

- **Across regions**, US (+\$4.4b) and Europe (+\$1.2b) continued to receive inflows, but EM bonds registered their largest outflows in 46 weeks.
- **Across maturities**, short term funds (+\$4.3b) benefitted the most, while intermediate term funds (+\$3.7b) and long term funds (+\$1.7b) too received inflows.

Money market inflows into US offset by Europe and Japan

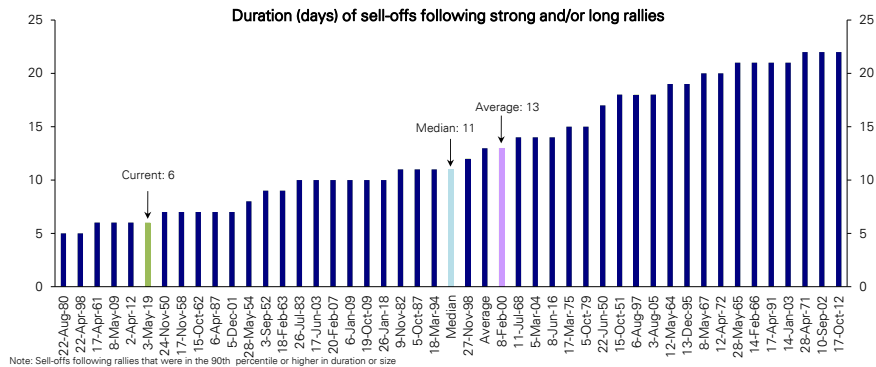
- Money market funds (+\$1.7b) received relatively modest inflows compared with their previous two weeks of strong inflows, as inflows to the US (+6.9b) were offset by outflows from Europe (-\$4.8b) and Japan (-\$2.3b).

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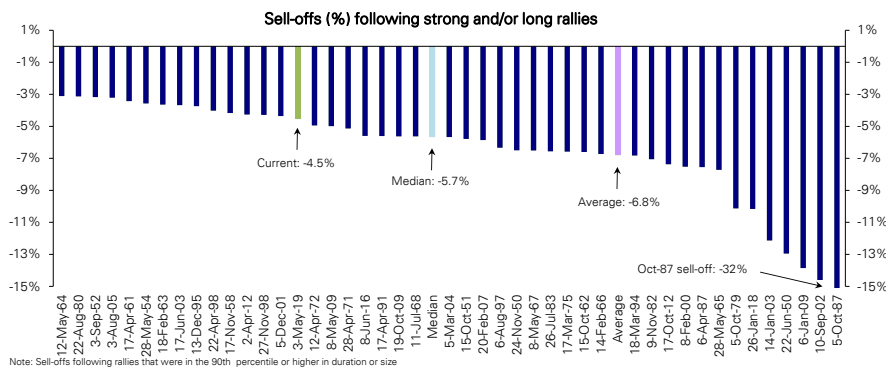


Figure 1: If the Monday bottom were to hold, the selloff which began two weeks ago would be on the shortest ones following a long rally



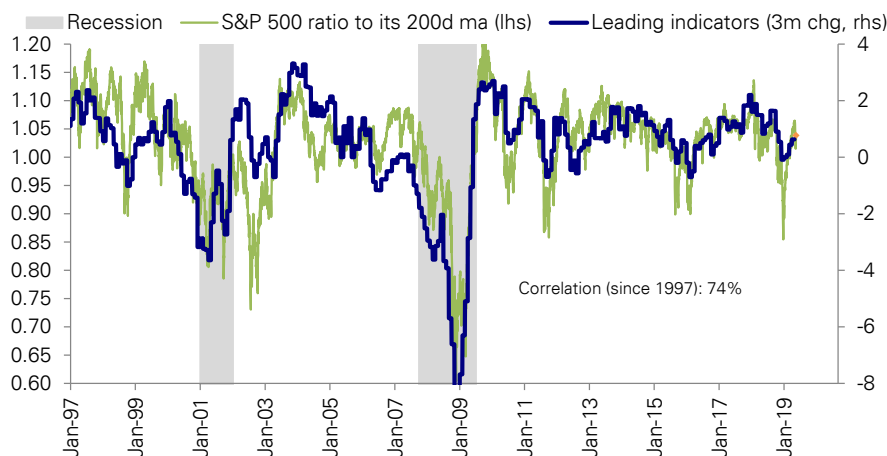
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Haver Analytics

Figure 2: The size of the selloff so far has also been a little lower than usual



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Haver Analytics

Figure 3: The market is again a little ahead of macro growth in terms of the LEI...



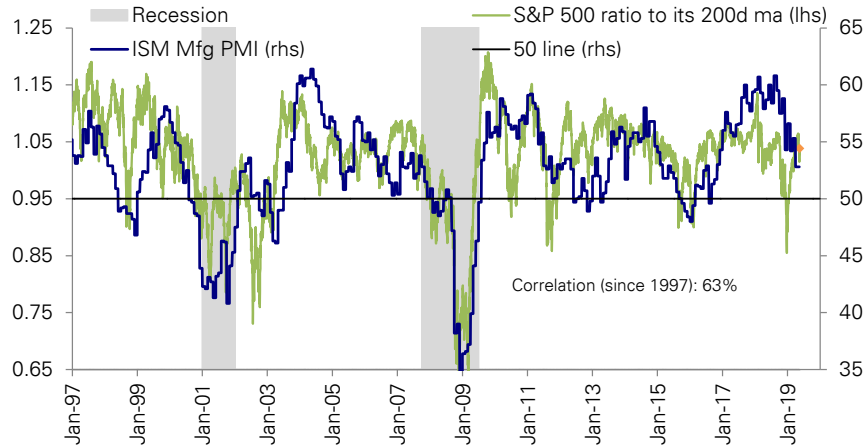
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Haver Analytics

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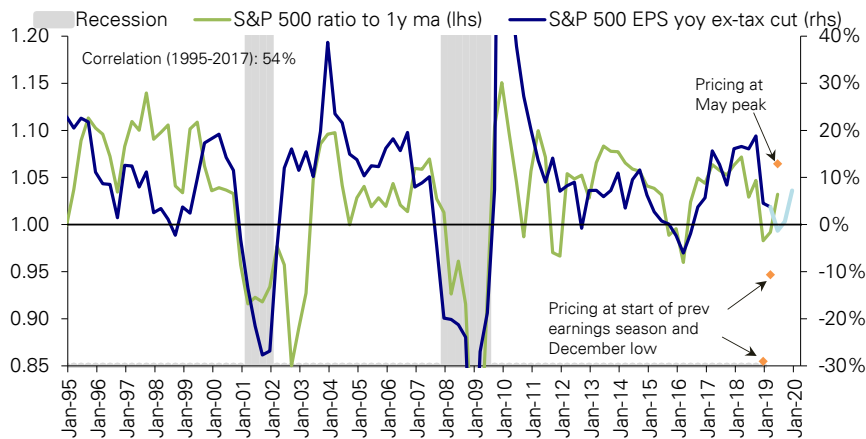
Investor Positioning and Flows

Figure 4: ...and the ISM



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Haver Analytics

Figure 5: The market is again pricing in a rebound in earnings growth



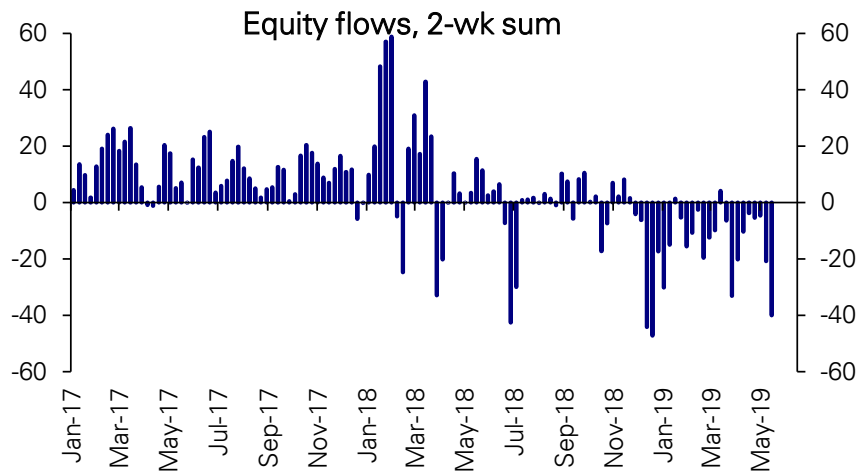
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Factset, Haver Analytics

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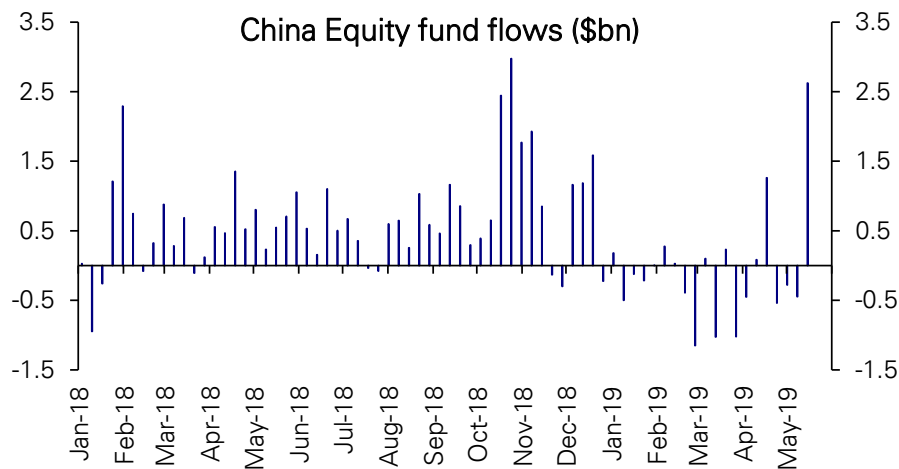


Figure 6: Largest equity outflows since December



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics

Figure 7: China funds were an outlier last week and saw large inflows in contrast to all other equities



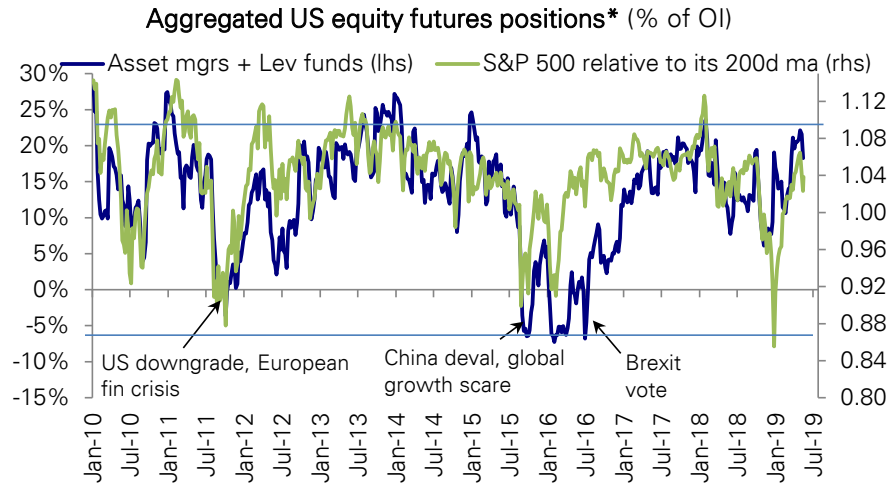
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics

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Figure 8: Equity positioning is down but only modestly so and remains elevated

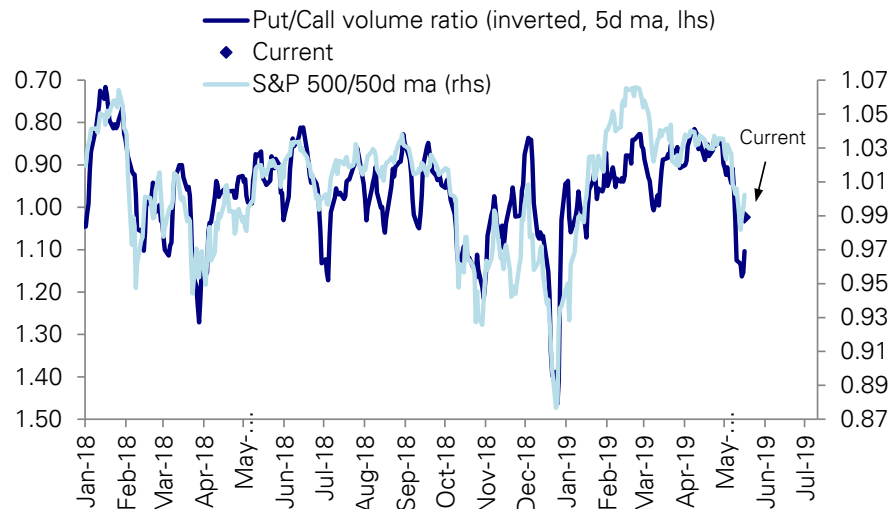


Net long futures positions in S&P 500, NASDAQ 100, DJIA, S&P 400 and R2K

Positioning data as of May 14 2019

Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 9: Put/call volume ratio (inverted) rose sharply last week but has already fallen back



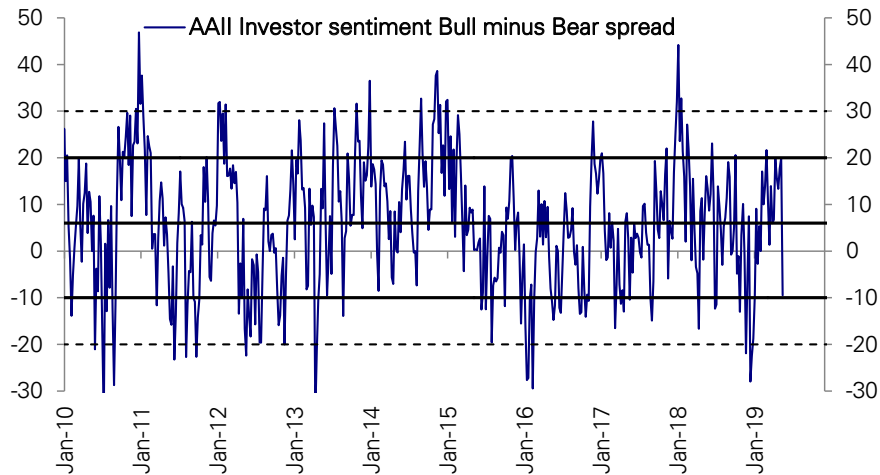
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CBOE, Haver Analytics

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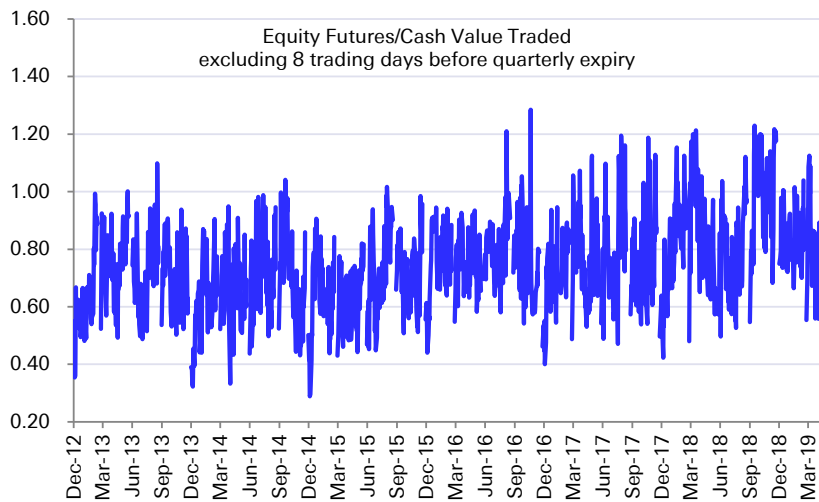


Figure 10: Retail investor sentiment flipped quickly from positive to negative in a week



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, AAI, Bloomberg Finance LP

Figure 11: Futures volumes relative to cash set a new record this week (for periods outside quarterly futures rolls)



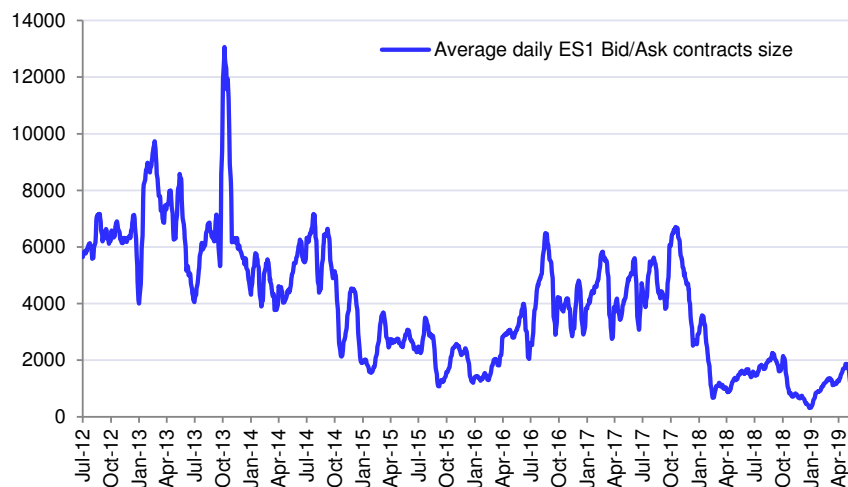
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Bloomberg Finance LP

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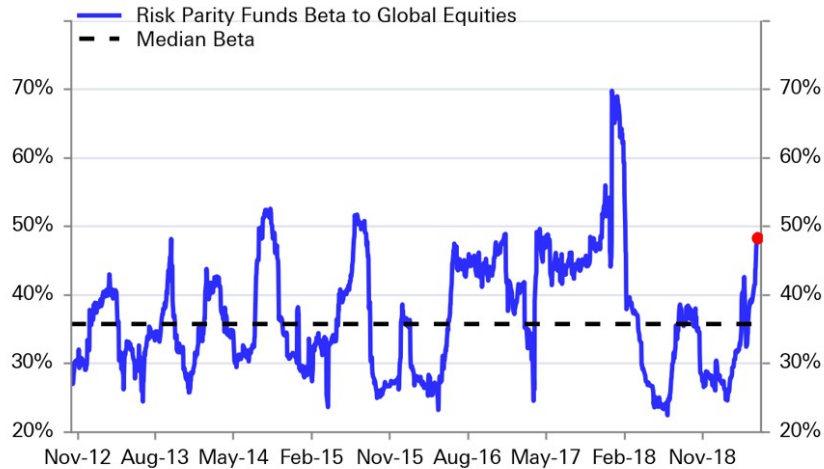
Figure 12: But liquidity in futures is still very low, suggesting relatively higher market impact



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy

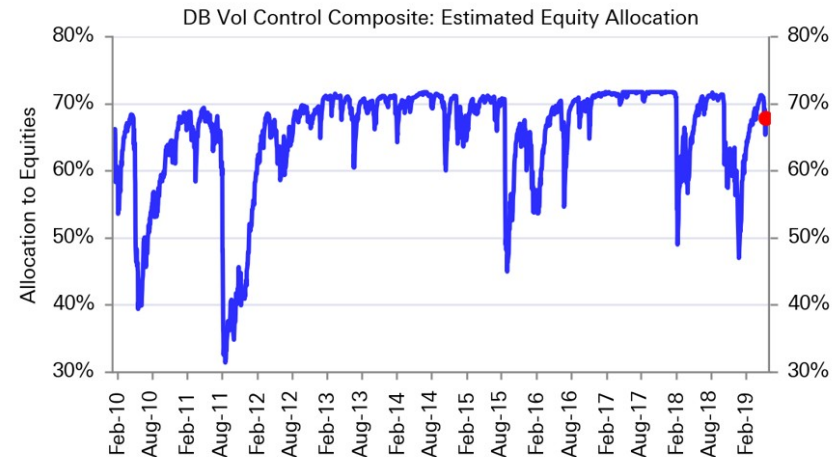
vFLARE: Volatility-Sensitive Systematic Strategies

Figure 13: Risk Parity bought-the-dip to add equity beta



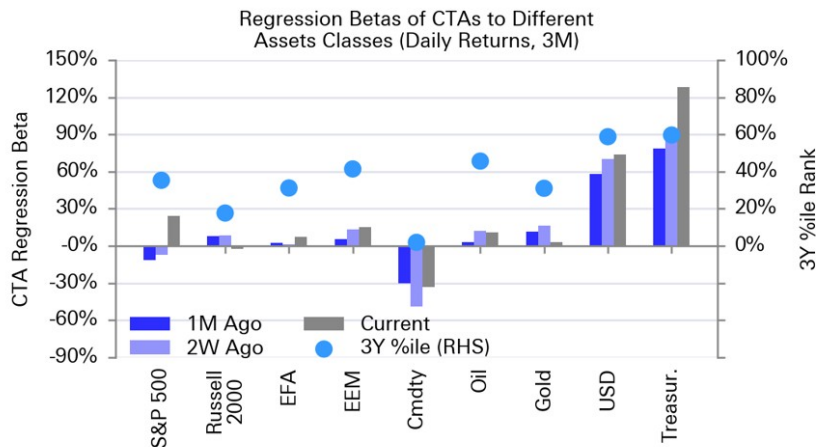
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, SEC filings, Bloomberg Finance LP, Data as of 15-May-19

Figure 14: Vol Control sold equities then bought some back



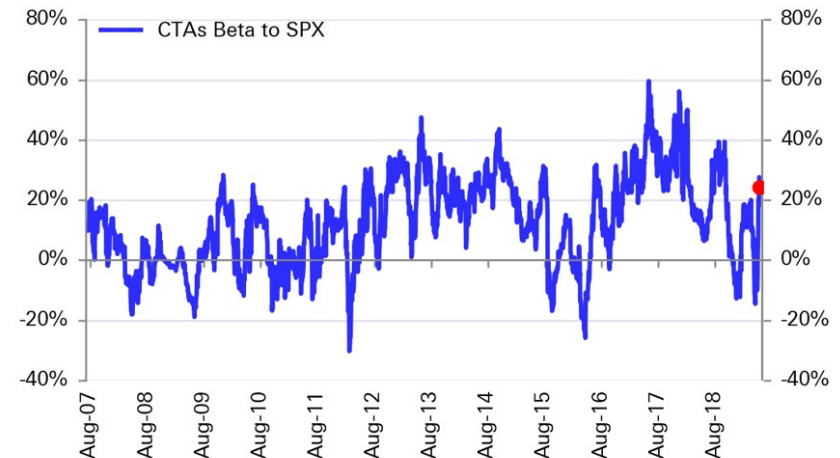
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, SEC filings, Bloomberg Finance LP, Data as of 15-May-19

Figure 15: CTAs are most crowded in long USD and Treasuries



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, SEC filings, Bloomberg Finance LP, Data as of 15-May-19

Figure 16: CTAs are long S&P 500 but not as crowded as in 2018

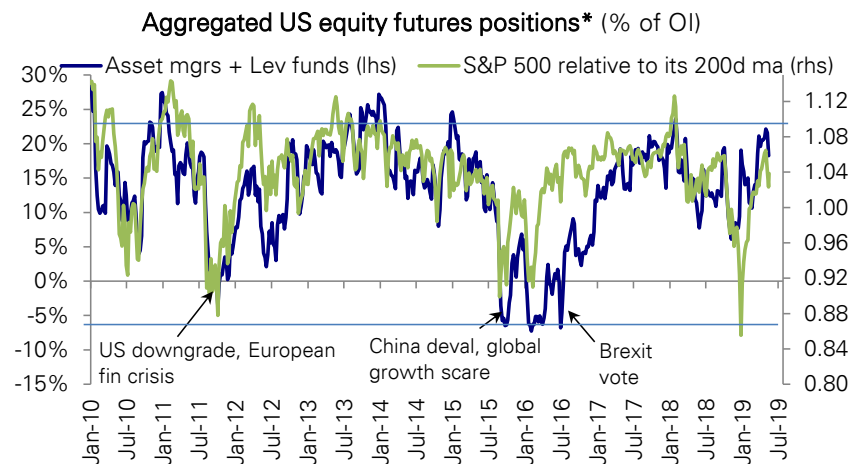


Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, SEC filings, Bloomberg Finance LP, Data as of 15-May-19



S&P 500 futures liquidity is still very low

Figure 17: Equity futures positioning and the S&P 500

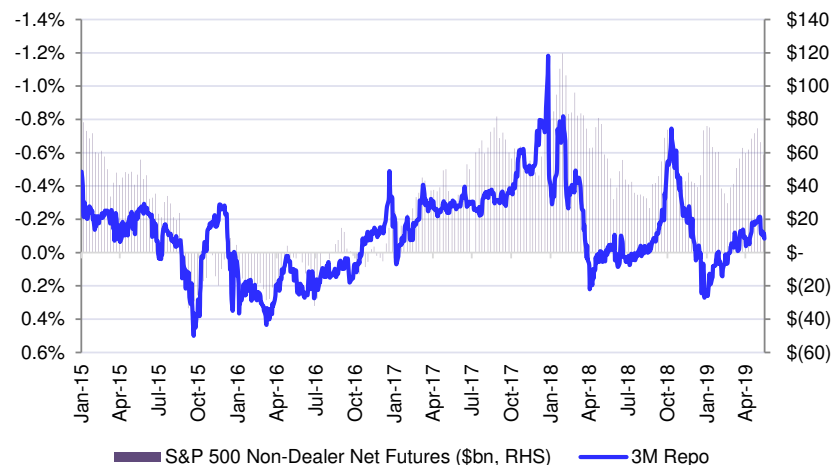


Net long futures positions in S&P 500, NASDAQ 100, DJIA, S&P 400 and R2K

Positioning data as of May 14 2019

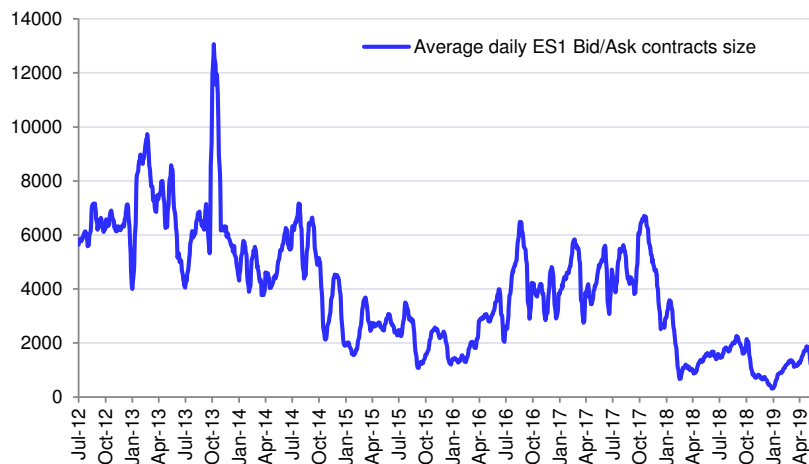
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 18: Implied financing spreads compressed slightly this week



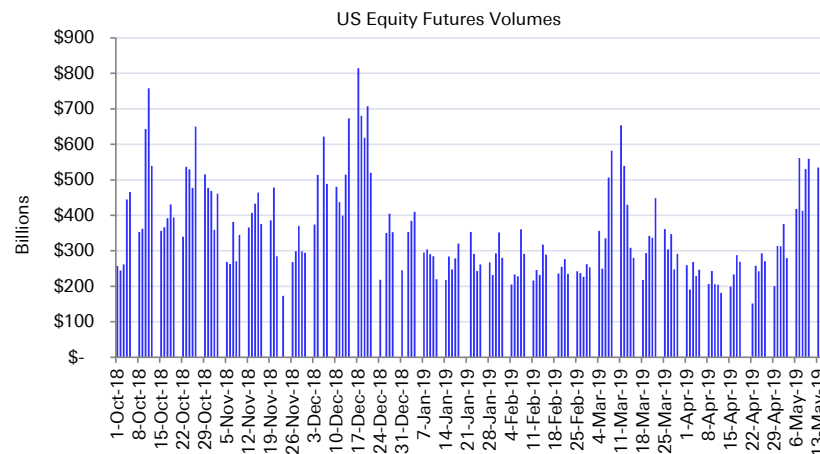
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC. Data as of 14-May-19.

Figure 19: On-screen ES1 futures liquidity is low versus historical range



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy. Data as of 16-May-19.

Figure 20: US equity futures volumes spiked this week

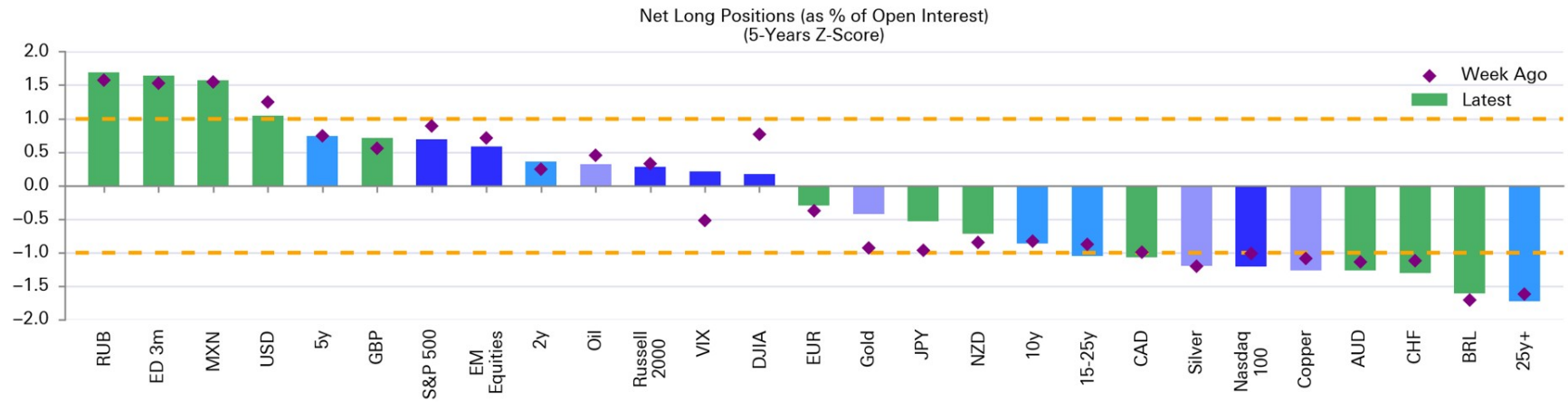


Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Bloomberg Finance LP, Data as of 16-May-19.



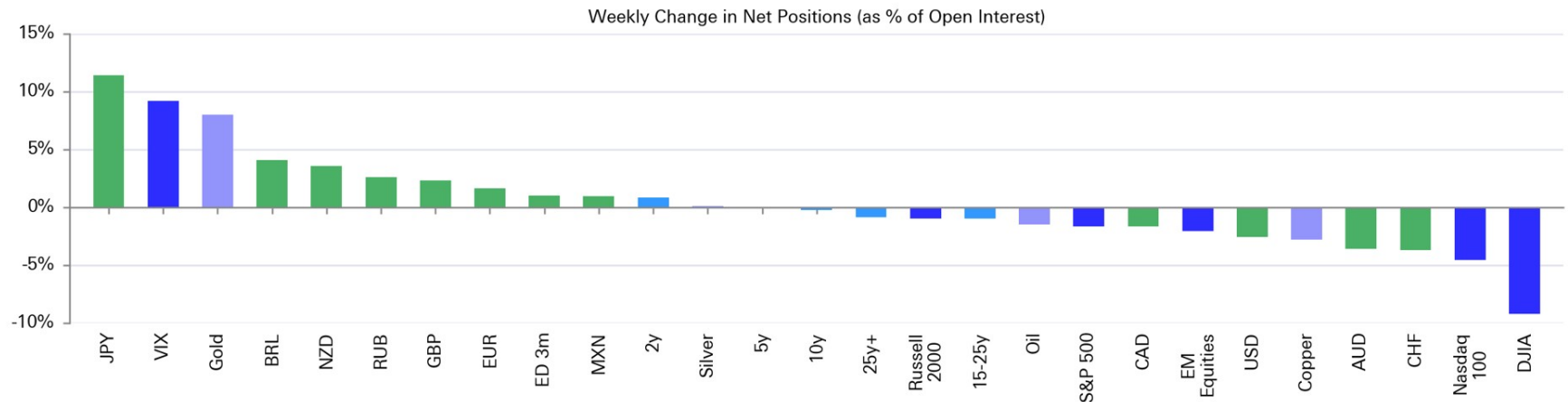
Cross-Asset Futures Positioning and Flows

Figure 21: Investor positioning in cross asset futures as of May 14th



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Bloomberg Finance LP, Data as of 14-May-19.

Figure 22: Week-over-week changes in futures positioning

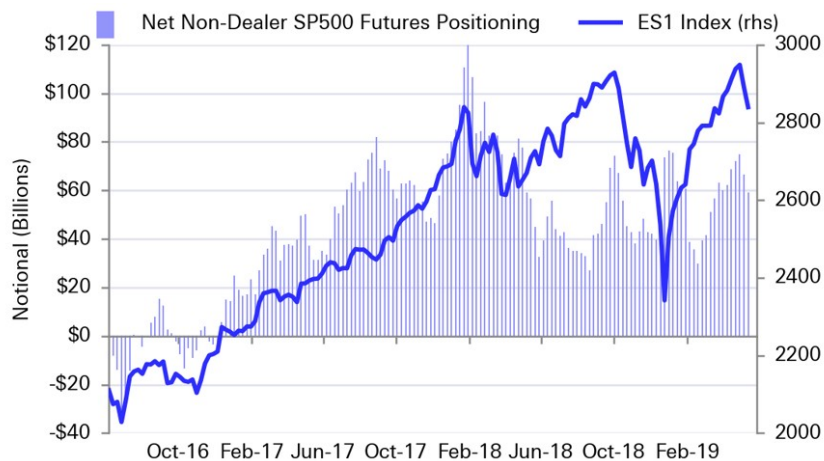


Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Bloomberg Finance LP, Data as of 14-May-19



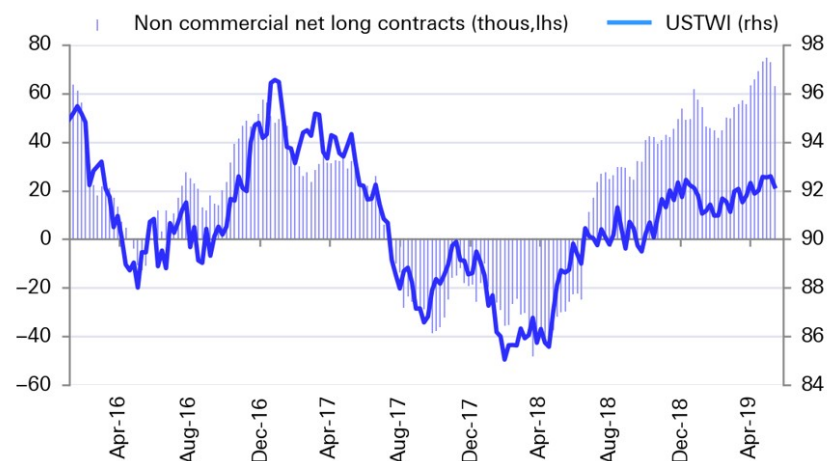
Futures Positioning: US Equities, USD, WTI Oil, & 10Y Treasuries

Figure 23: S&P 500 futures positioning



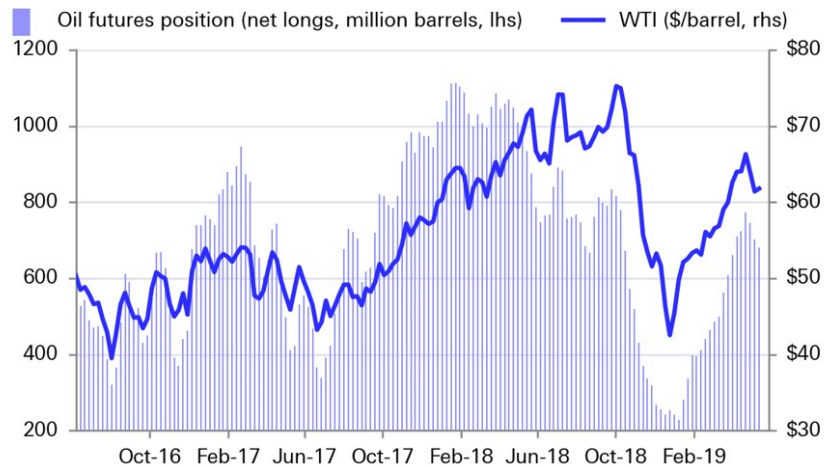
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Bloomberg Finance LP, Data as of 14-May-19

Figure 24: Dollar futures positioning



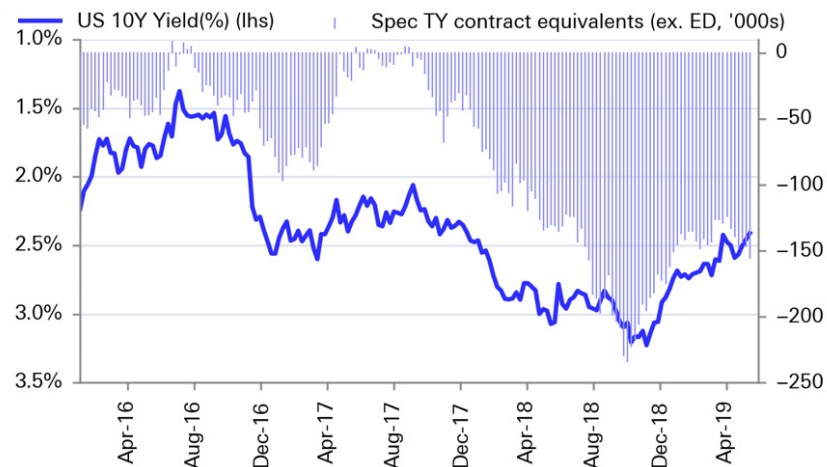
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Bloomberg Finance LP, Data as of 14-May-19

Figure 25: Oil futures positioning



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Bloomberg Finance LP, Data as of 14-May-19

Figure 26: Treasury futures positioning

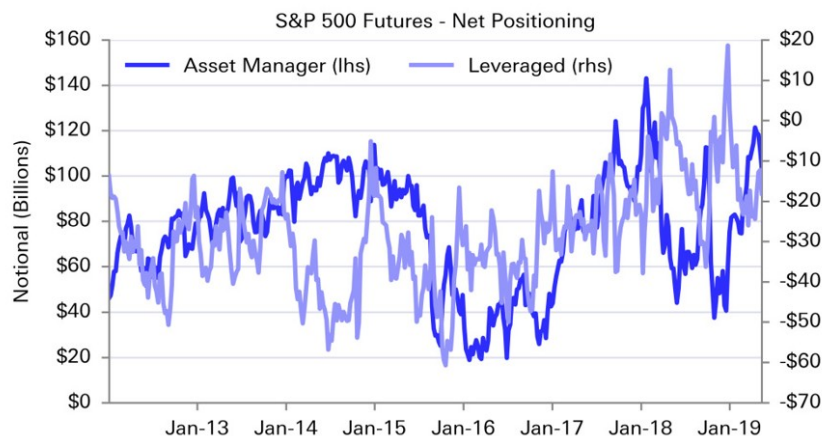


Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Bloomberg Finance LP, Data as of 14-May-19



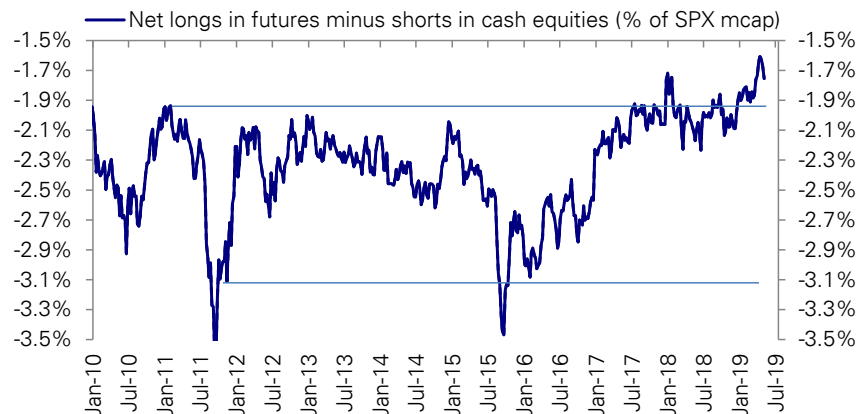
Futures Positioning: US Equities

Figure 27: Leveraged Funds and Asset Managers futures positioning



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Bloomberg Finance LP, Data as of 14-May-19.

Figure 28: Aggregate futures positions and shorts in single stocks and ETFs



Note: Futures net longs minus single stock and ETF shorts. Shorts data as of Apr 30, S&P futures May 14

Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Bloomberg Finance LP.

Figure 29: US equity futures positioning - 1Y Percentile Ranks

	SPX	RTY	NDX	DJIA	MSCI EM	MSCI EAFE
ND-LONG	45%	17%	53%	75%	68%	66%
ND-SHORT	42%	4%	58%	64%	15%	87%
ND-NET	70%	49%	51%	57%	66%	47%
AM-LONG	55%	38%	62%	91%	66%	85%
AM-SHORT	21%	66%	2%	36%	28%	96%
AM-NET	81%	42%	89%	98%	68%	53%
LM-LONG	36%	4%	45%	8%	30%	6%
LM-SHORT	45%	9%	91%	85%	42%	9%
LM-NET	36%	53%	4%	2%	53%	47%
OT-LONG	38%	30%	2%	58%	36%	98%
OT-SHORT	94%	77%	87%	45%	17%	51%
OT-NET	21%	25%	6%	62%	75%	98%

Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Bloomberg Finance LP, Data as of 14-May-19.

Figure 30: US equity futures WoW Change - 1Y Z-score

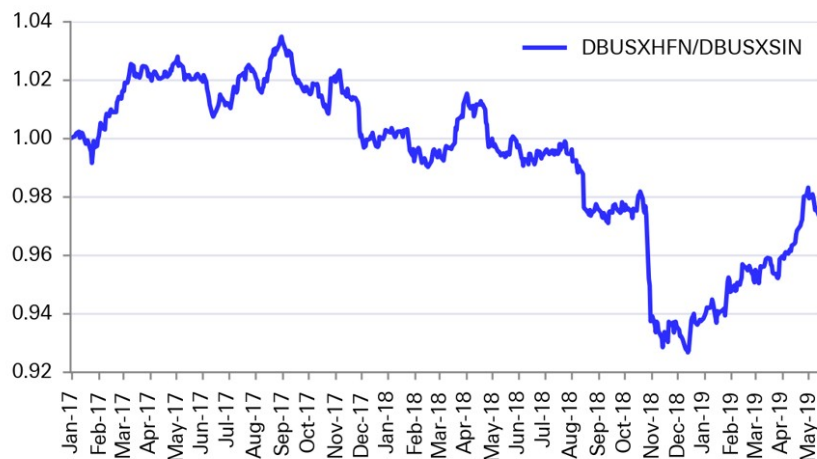
	SPX	RTY	NDX	DJIA	MSCI EM	MSCI EAFE
ND-LONG	-0.61	-0.91	-0.64	-0.27	-2.52	-0.43
ND-SHORT	0.51	-1.01	0.32	2.17	-0.51	-0.12
ND-NET	-0.92	-0.2	-0.63	-1.7	-2.45	-0.4
AM-LONG	-1.03	-1.09	-0.6	-0.12	-2.51	-0.27
AM-SHORT	0.18	-0.35	-2.8	0.18	1.05	-0.51
AM-NET	-0.97	-0.81	0.95	-0.21	-2.8	-0.09
LM-LONG	-0.02	-0.17	-0.29	-0.26	-1.01	-0.77
LM-SHORT	1.13	-0.36	2.87	3.35	-1.61	0.18
LM-NET	-0.82	0.18	-1.99	-2.18	0.57	-0.56
OT-LONG	2.81	1.78	-0.03	0.33	0.54	0.79
OT-SHORT	-1.71	-1.6	0.68	-1.16	-2.2	0.82
OT-NET	3.12	2.1	-0.48	1.25	2.27	0.52

Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Bloomberg Finance LP, Data as of 14-May-19.



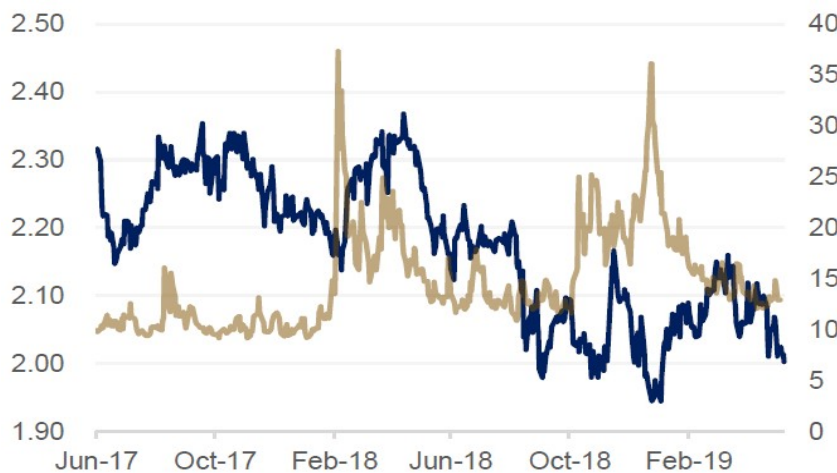
Equity L/S Hedge Funds

Figure 31: Hedge Fund's top \$-longs underperformed top \$-shorts on the sell-off



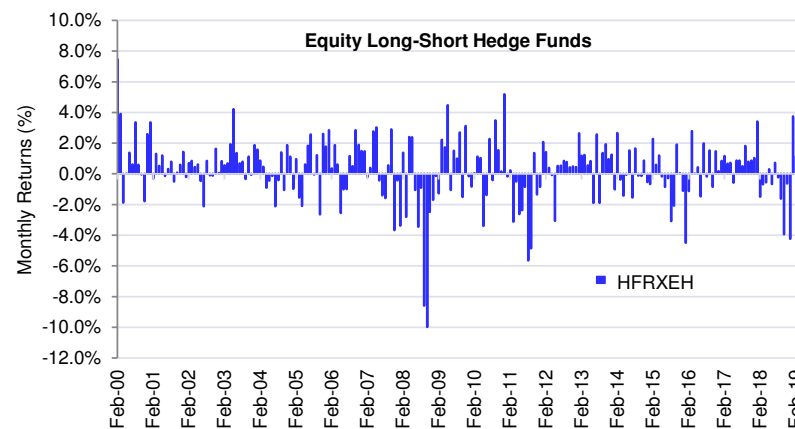
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Bloomberg Finance LP, Factset, Axima. Data as of 16-May-19.

Figure 33: L/S Equity Hedge Funds trimmed Gross Leverage on the sell-off



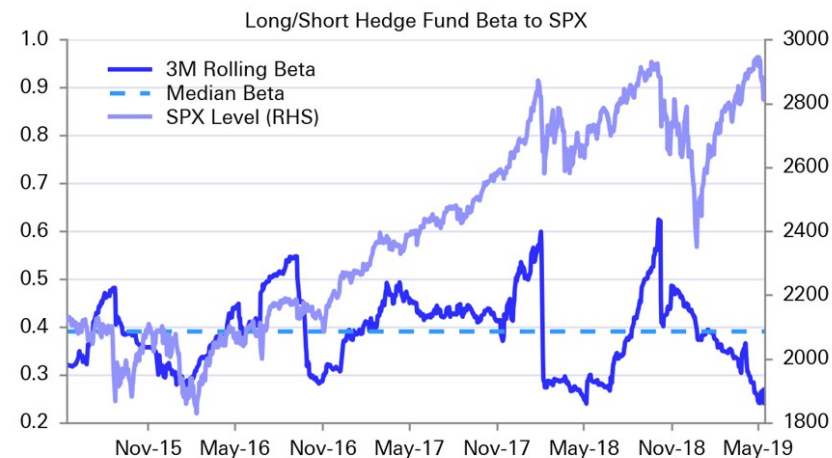
Source : Deutsche Bank Global Prime Finance, Reuters. Data as of 13-May-19.

Figure 32: Equity L/S Hedge Fund returns are down -1.8% in May but +4.8% YTD



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Bloomberg Finance LP. Data as of 15-May-19.

Figure 34: Net Beta for Equity L/S is low

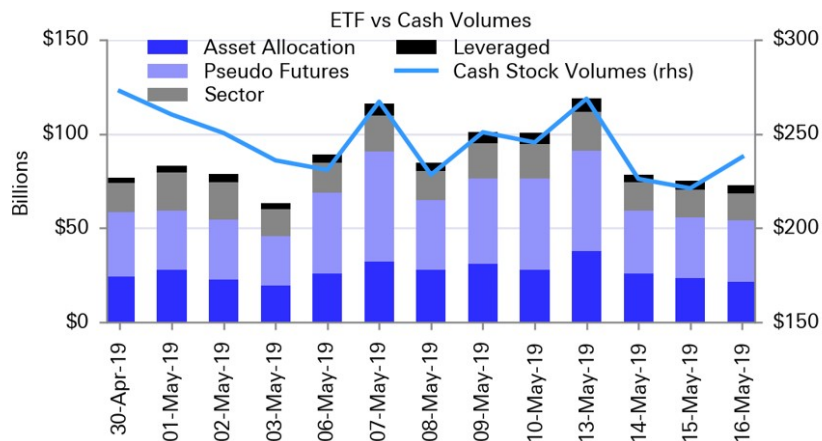


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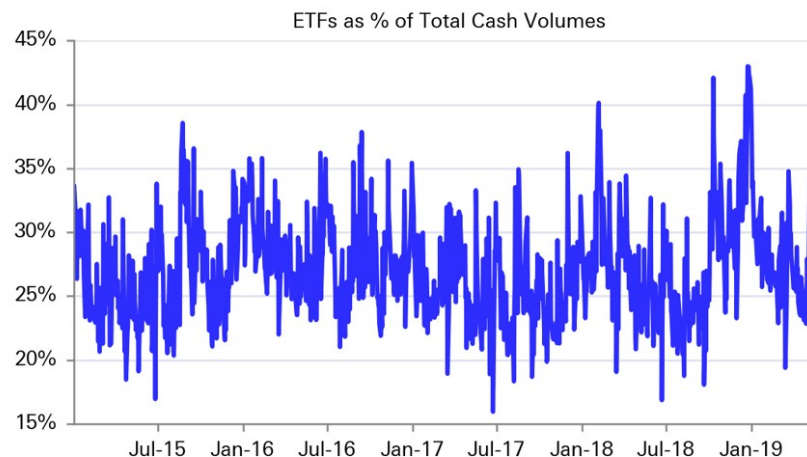
ETFs: Volumes and Flows

Figure 35: Cash and ETF volumes decreased from Monday's highs



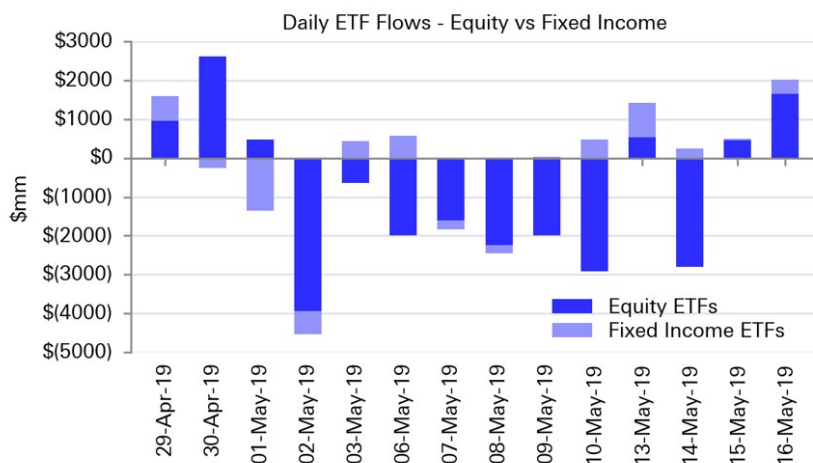
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Factset, Reuters, Bloomberg Finance LP, Data as of 16-May-19

Figure 36: ETF participation in cash trading spiked this week but then normalized



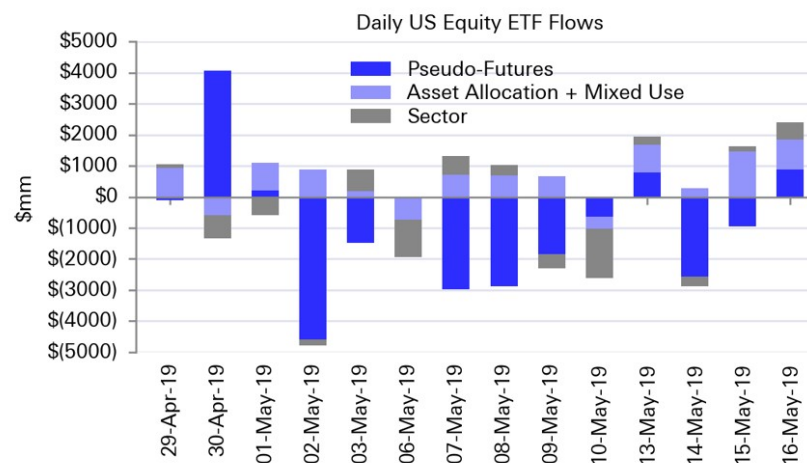
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Factset, Reuters, Bloomberg Finance LP, Data as of 16-May-19.

Figure 37: Equity ETFs flows were mixed, Fixed Income ETFs saw inflows



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Factset, Reuters, Bloomberg Finance LP, Data as of 16-May-19.

Figure 38: Asset Allocation Equity ETFs saw inflows after Monday's move down

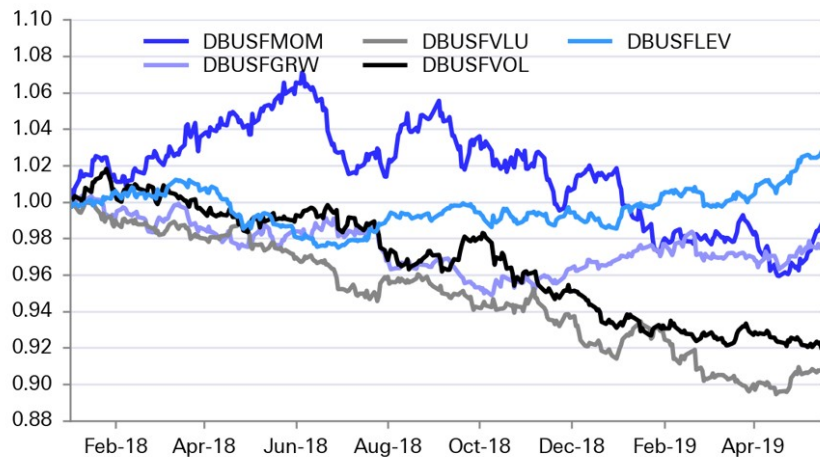


Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Factset, Reuters, Bloomberg Finance LP, Data as of 16-May-19.



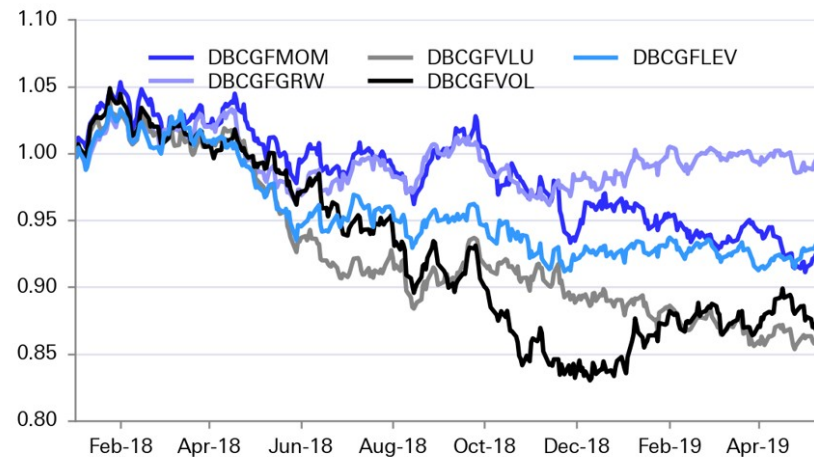
Equity Premia: Momentum rallied; China-beta themes underperformed

Figure 39: US Fast Factors: Momentum rallied strongly this week



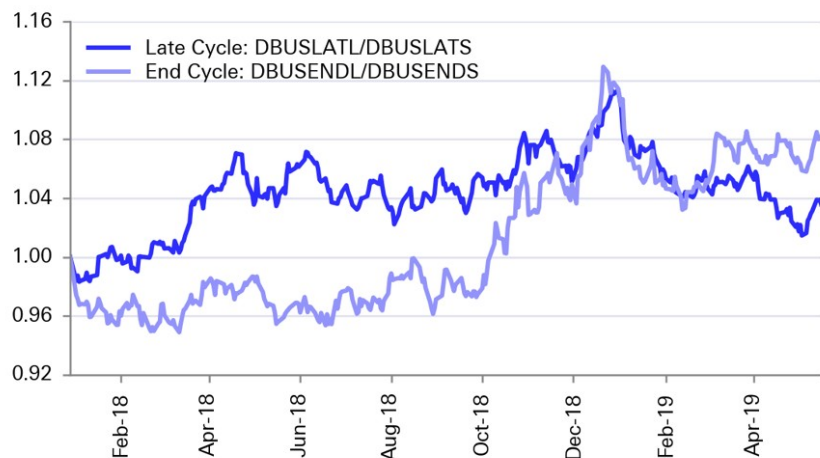
Source : Deutsche Bank Quantitative & Delta-1 Strategy, Axioma, Factset, Bloomberg Finance LP, Data as of 16-May-19

Figure 40: Europe Fast Factors: Residual Vol and Value sold off



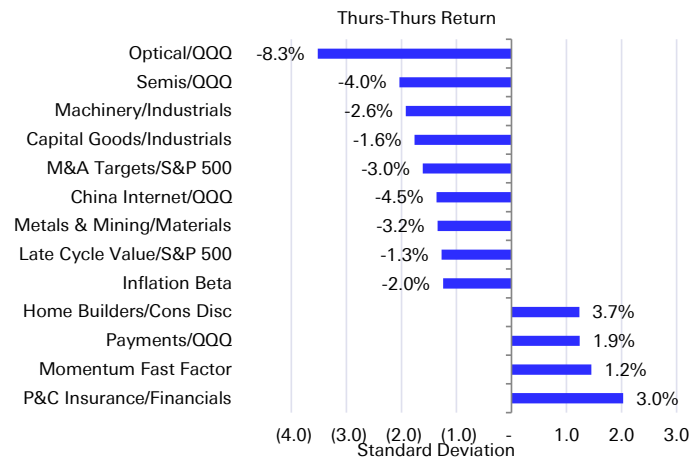
Source : Deutsche Bank Quantitative & Delta-1 Strategy, Axioma, Factset, Bloomberg Finance LP, Data as of 16-May-19

Figure 41: Late and End Macro Cycle baskets rallied



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Haver Analytics, Bloomberg Finance LP, Data as of 16-May-19.

Figure 42: Machinery, Capital Goods, Inflation, China Internet underperformed

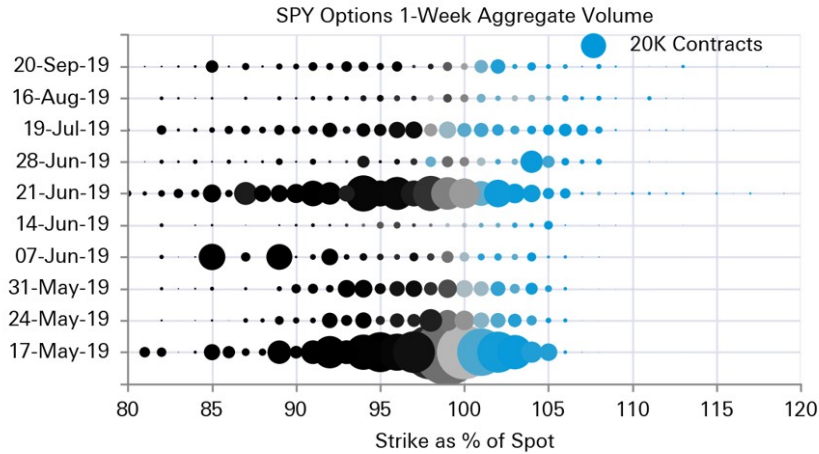


Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Axioma, Factset, Bloomberg Finance LP, Data as of 16-May-19



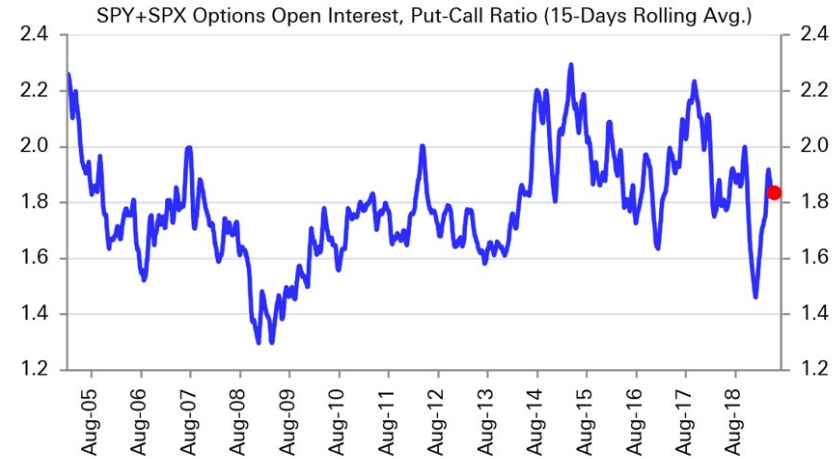
S&P 500 Options: Open Interest, Vol, Skew, Correlation

Figure 43: SPY put options were active



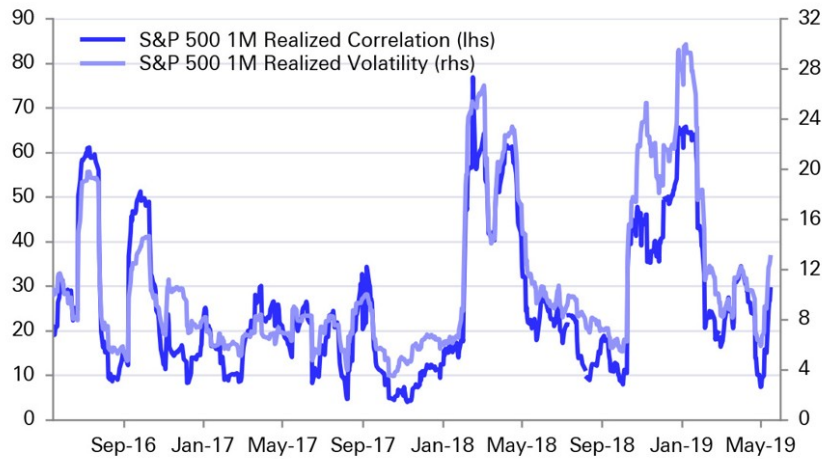
Source : Deutsche Bank Quant & Delta-1 Strategy, OptionMetrics, Bloomberg Finance LP. Data as of 16-May-19.

Figure 44: Put-call ratio for S&P 500 is near YTD high



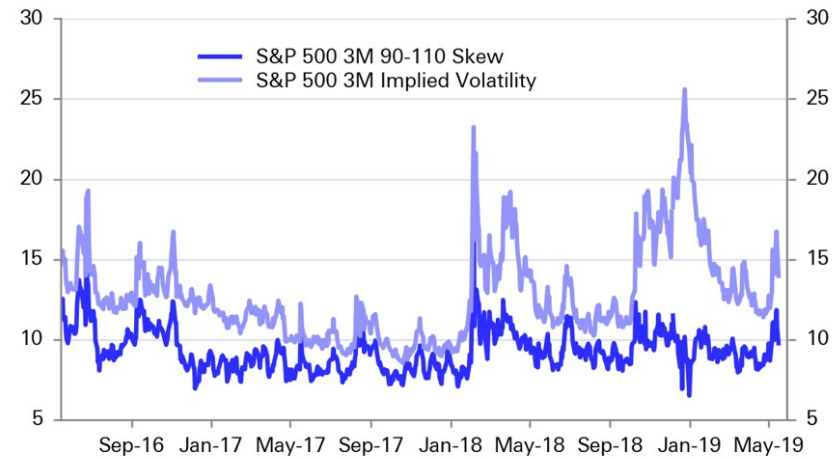
Source : Deutsche Bank Quant & Delta-1 Strategy, OptionMetrics, Bloomberg Finance LP. Data as of 16-May-19

Figure 45: 1M realized correlation and volatility increased but are still moderate



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Bloomberg Finance LP, Reuters. Data as of 16-May-19.

Figure 46: Implied volatility and skew spiked but have partially retraced

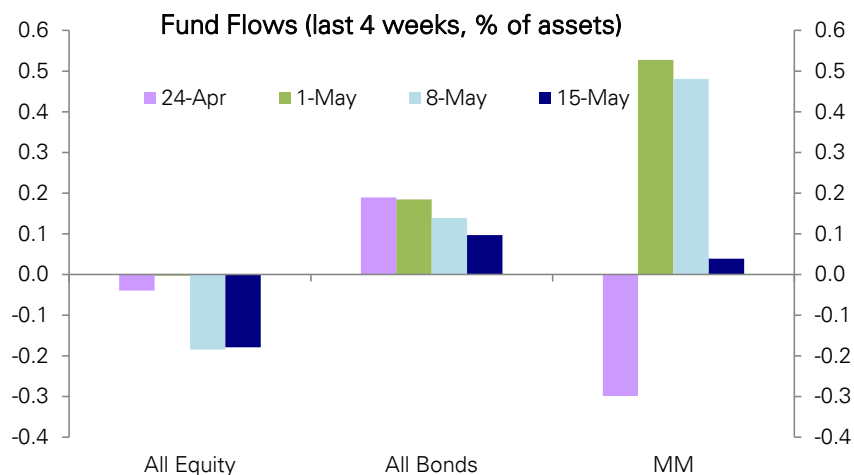


Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, Bloomberg Finance LP, Reuters. Data as of 16-May-19.



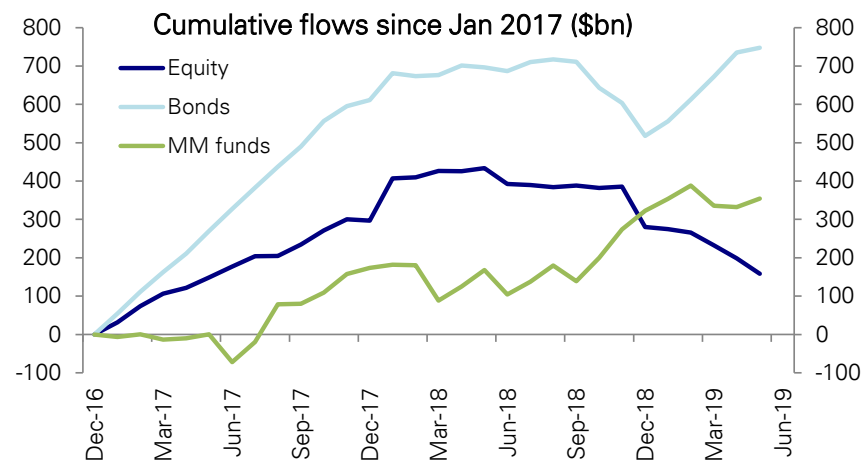
Cross-asset flows

Figure 47: Flows across asset classes last 4 weeks



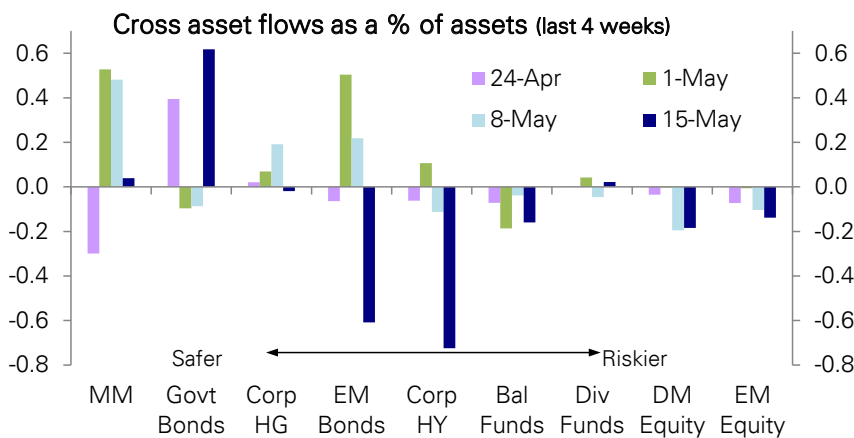
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

Figure 48: Flows across asset classes cumulative since 2017



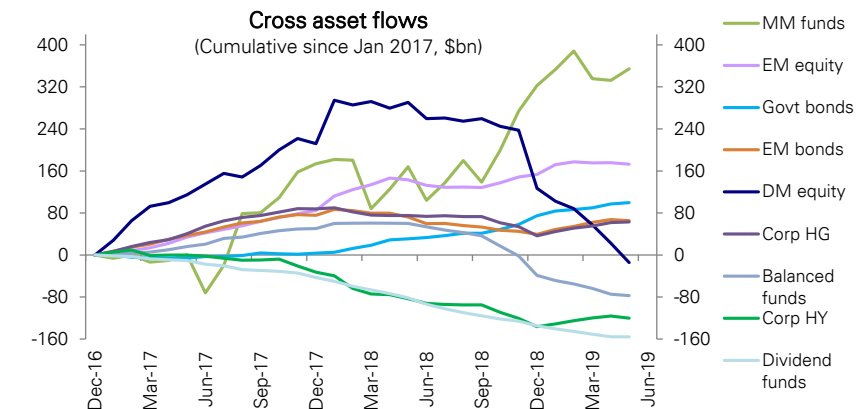
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

Figure 49: Cross asset flows last 4 weeks



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

Figure 50: Cross asset flows cumulative since 2017

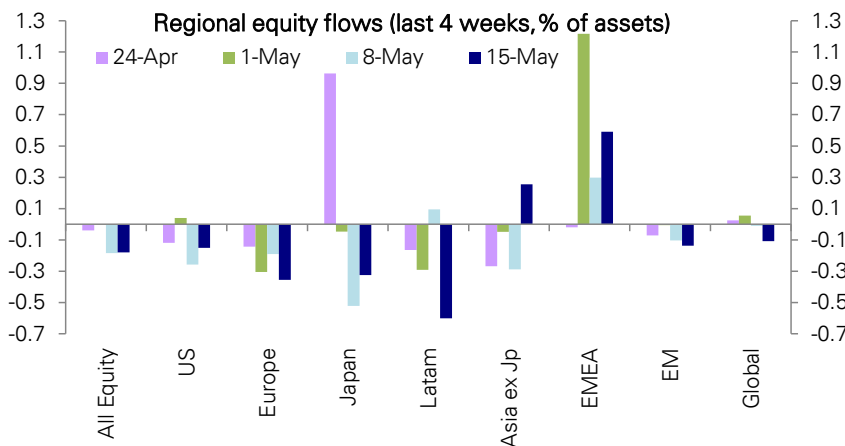


Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19



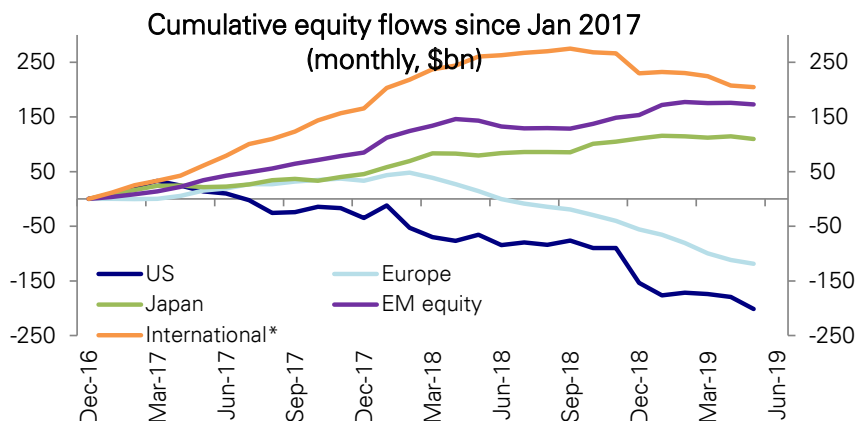
Equity Flows

Figure 51: Regional equity fund flows last 4 weeks



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

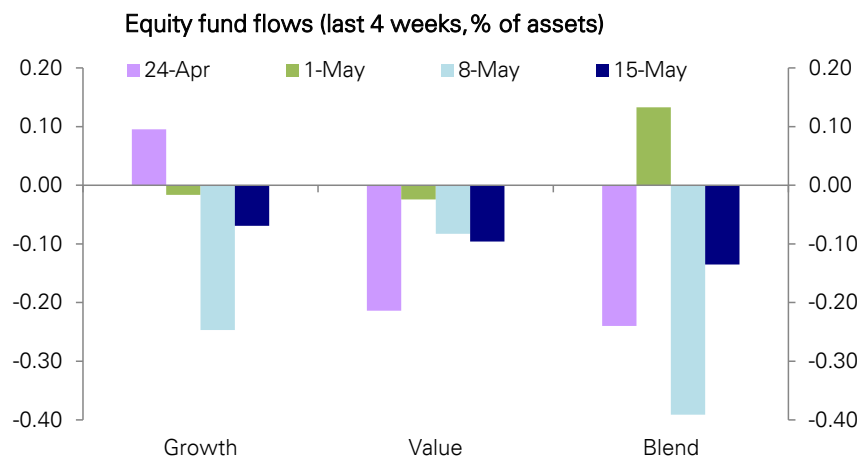
Figure 52: Equity flows across region



*Funds with a global mandate, overwhelmingly tend to be focused on DM ex-US

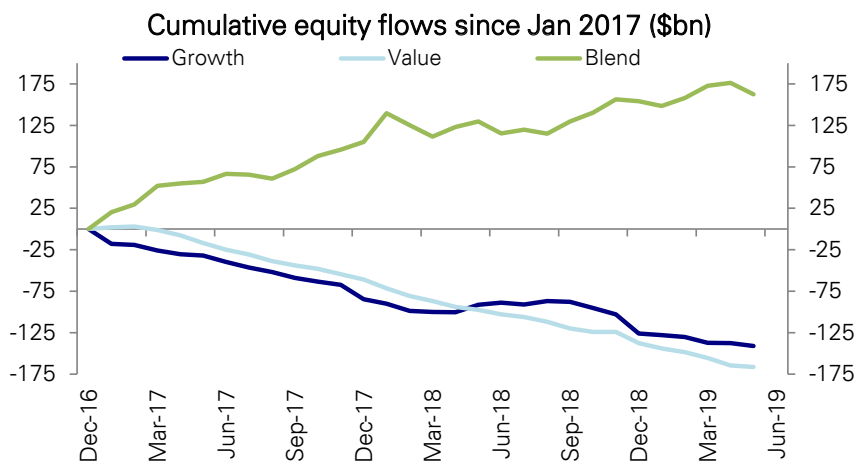
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

Figure 53: Equity flows by fund style last 4 weeks



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

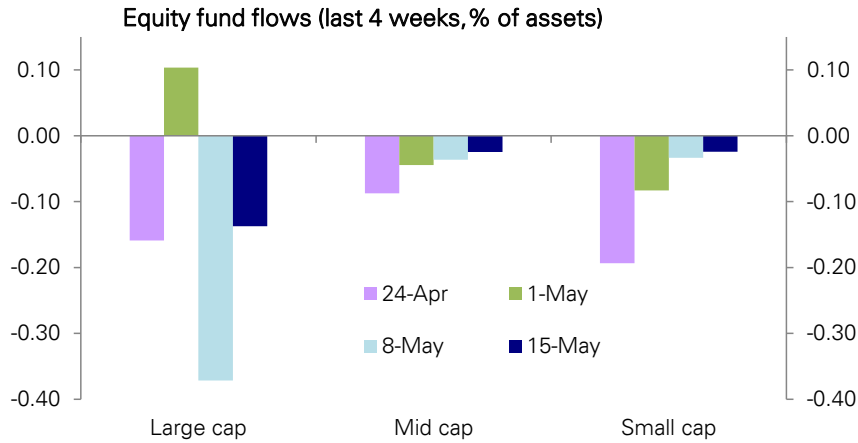
Figure 54: Equity flows by fund style



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

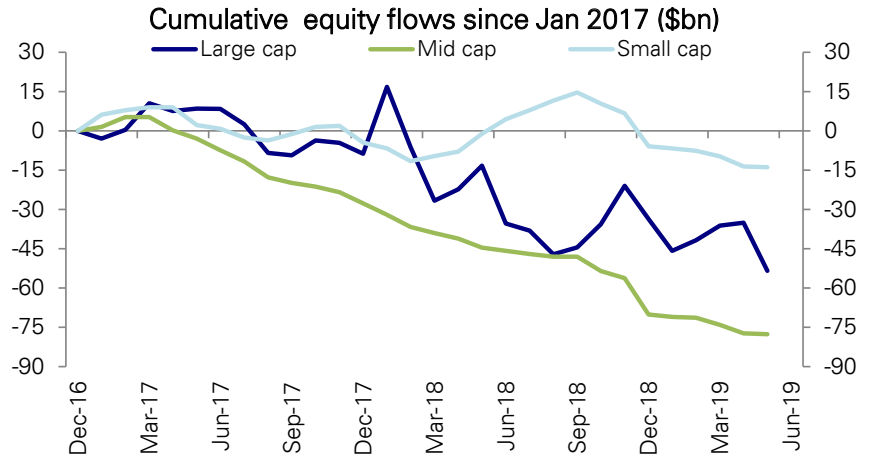


Figure 55: Equity fund flows by size last 4 weeks



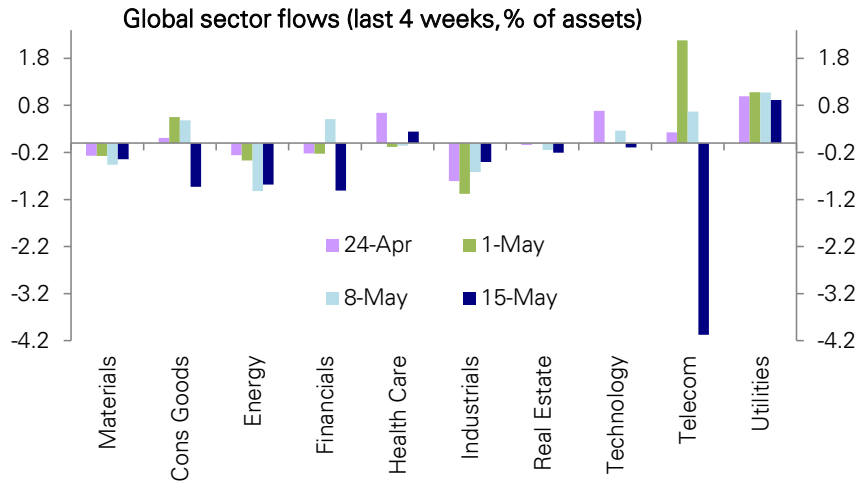
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

Figure 56: Equity fund flows by size



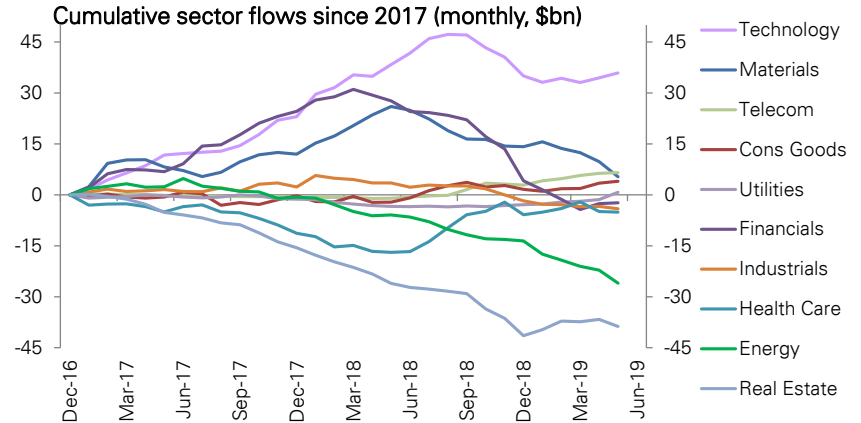
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

Figure 57: Sector fund flows last 4 weeks



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

Figure 58: Sector fund flows

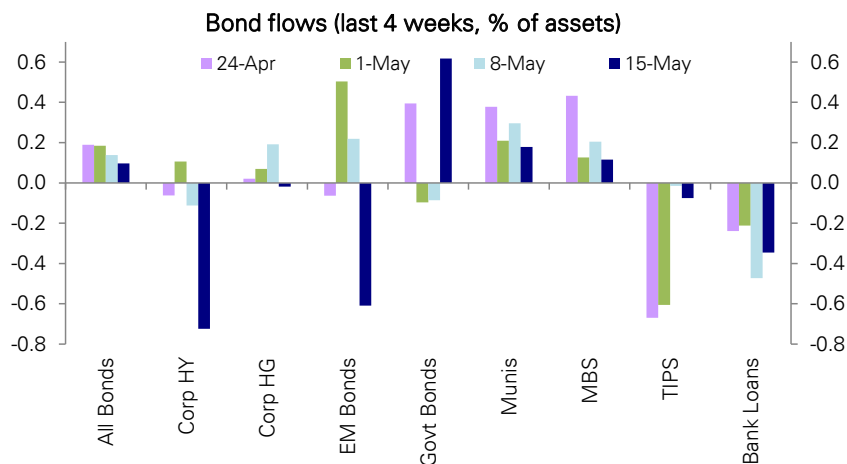


Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19



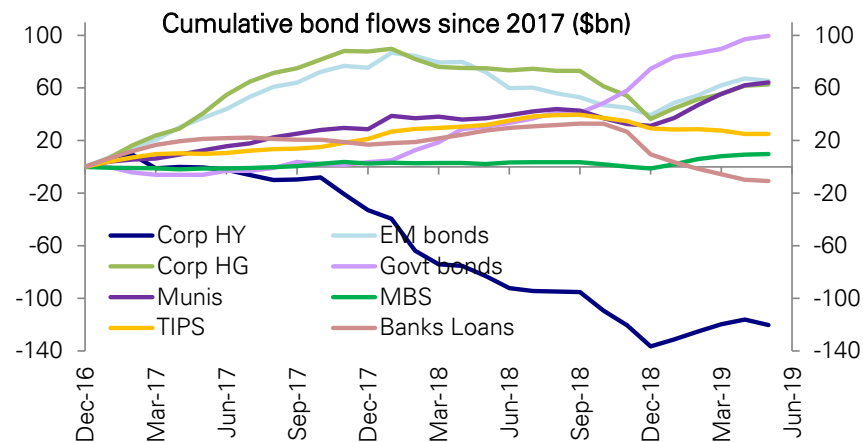
Bond fund flows

Figure 59: Bond fund flows by category last 4 weeks



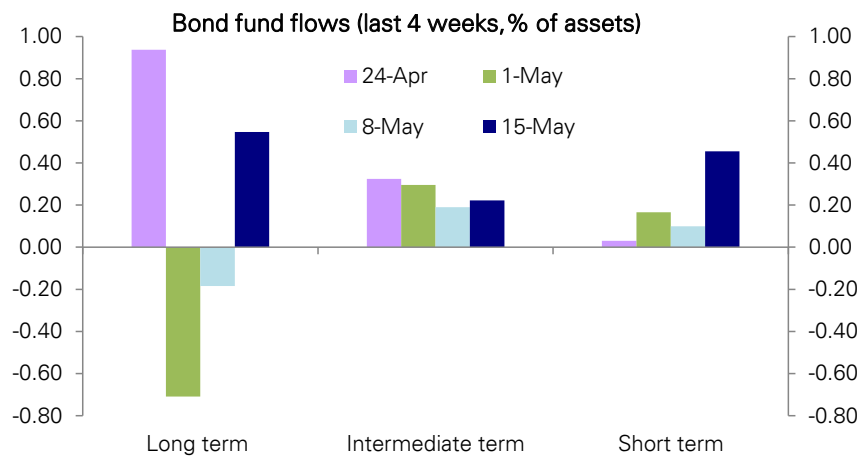
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

Figure 60: Bond flows by category



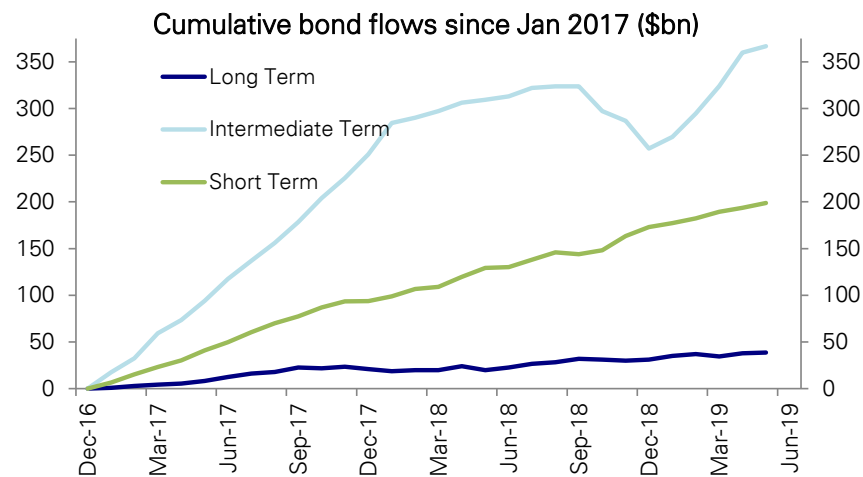
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

Figure 61: Bond fund flows by maturity last 4 weeks



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19

Figure 62: Bond fund flows by maturity

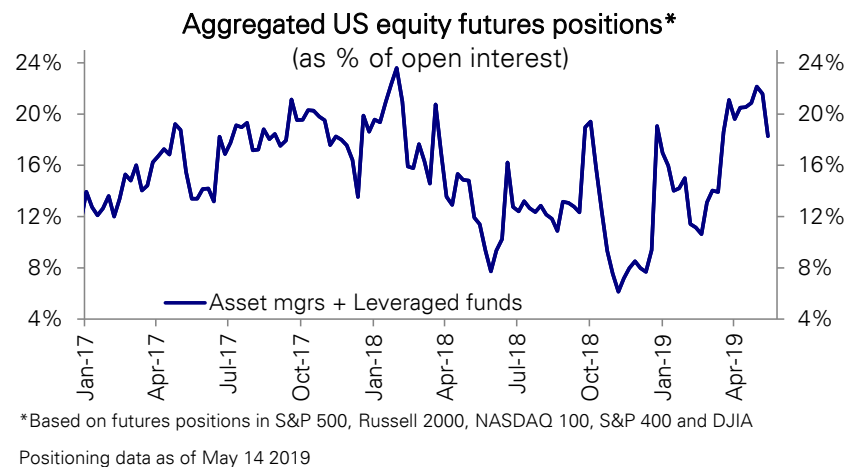


Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, EPFR, Haver Analytics, Data as of 15-May-19



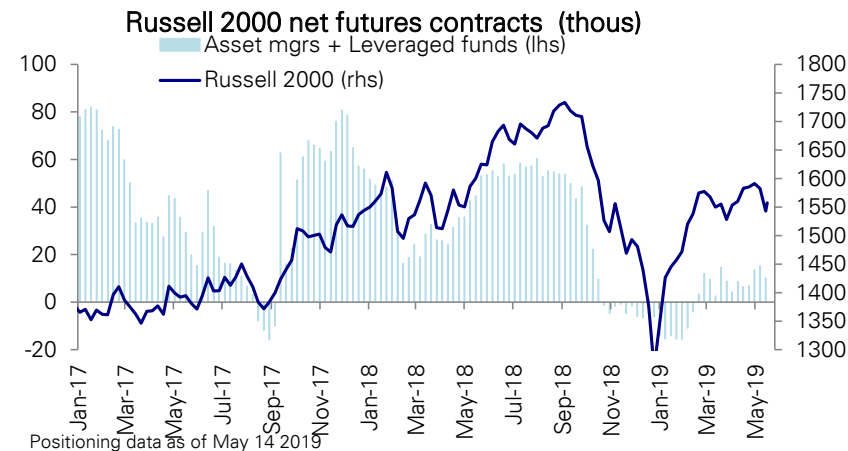
Equity futures positioning

Figure 63: Aggregate US equity futures positioning



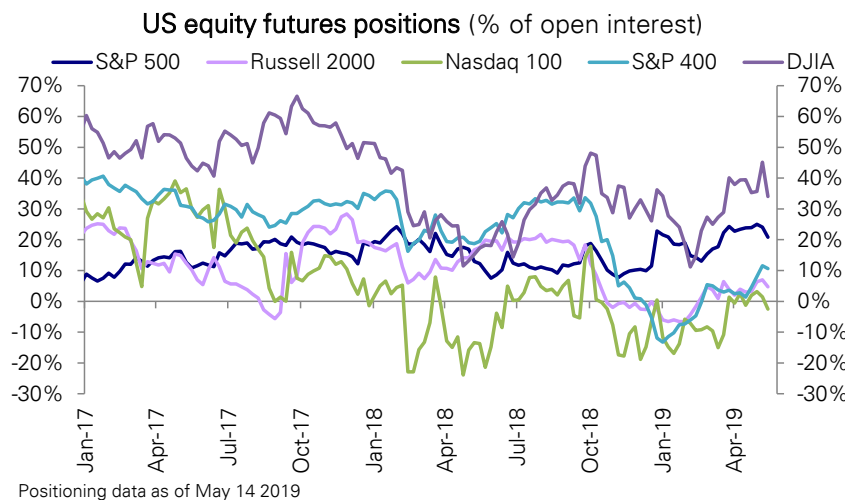
Source : DB Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 64: Russell 2000 futures positioning



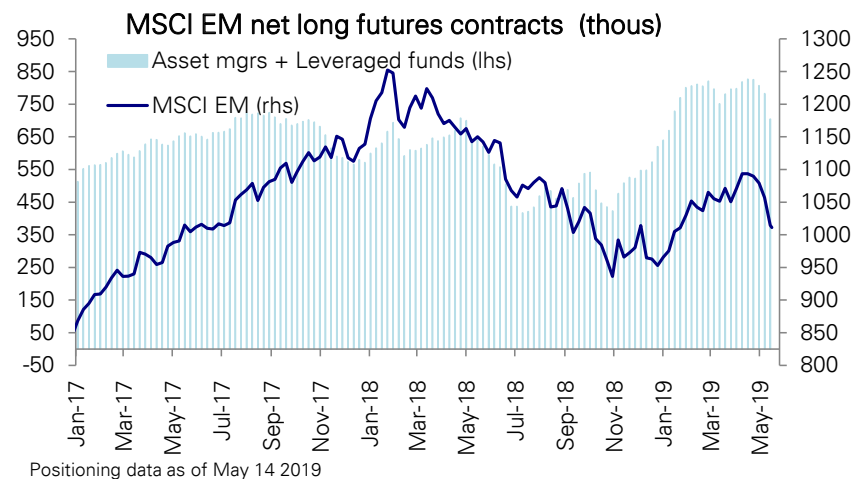
Source : DB Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 65: US equity futures positioning



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 66: EM equity futures positioning

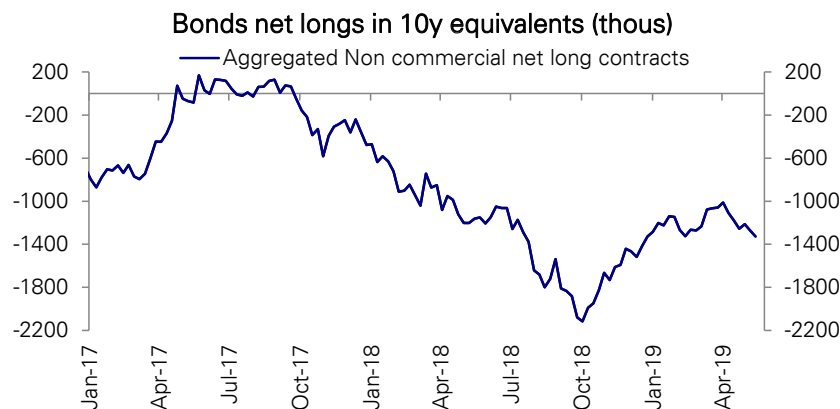


Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics



Bond futures positioning

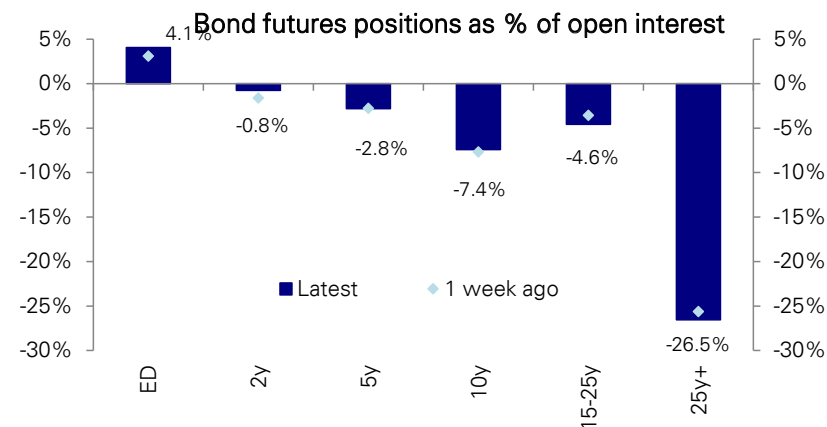
Figure 67: Aggregate bond futures positioning



Positioning data as of May 14 2019

Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

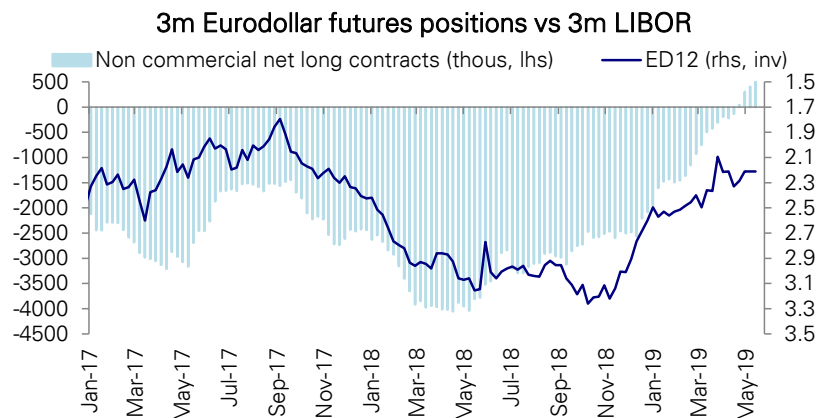
Figure 68: Bond futures positioning by maturity



Positioning data as of May 14 2019

Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

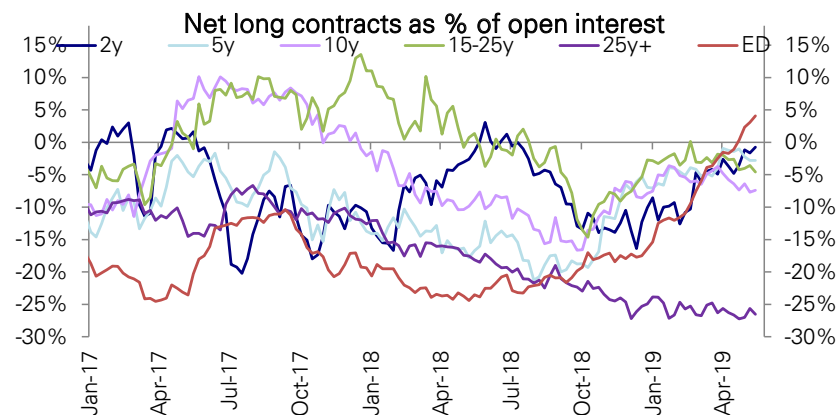
Figure 69: Eurodollar futures positioning



Positioning data as of May 14 2019

Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 70: Bond futures positioning by maturity



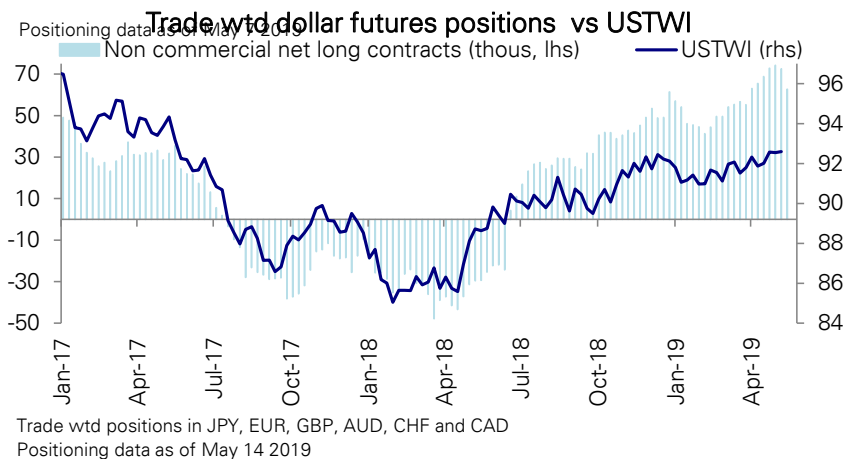
Positioning data as of May 14 2019

Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics



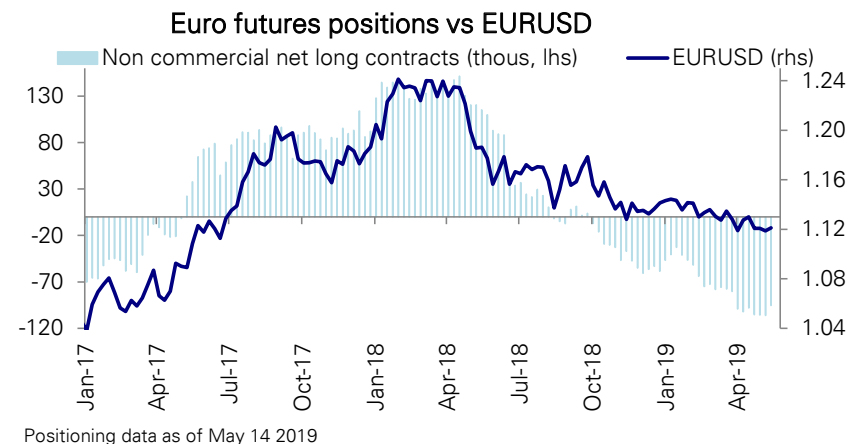
FX futures positioning

Figure 71: US trade weighted dollar positioning



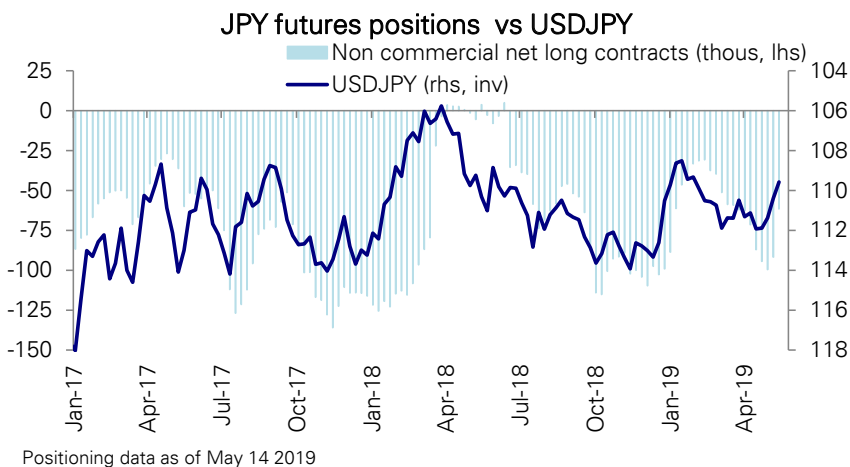
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 72: Euro future positions



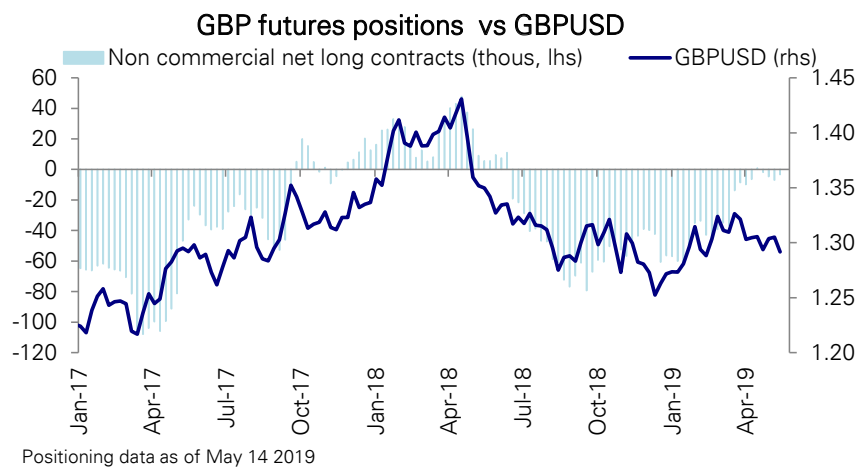
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 73: Yen futures positions



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

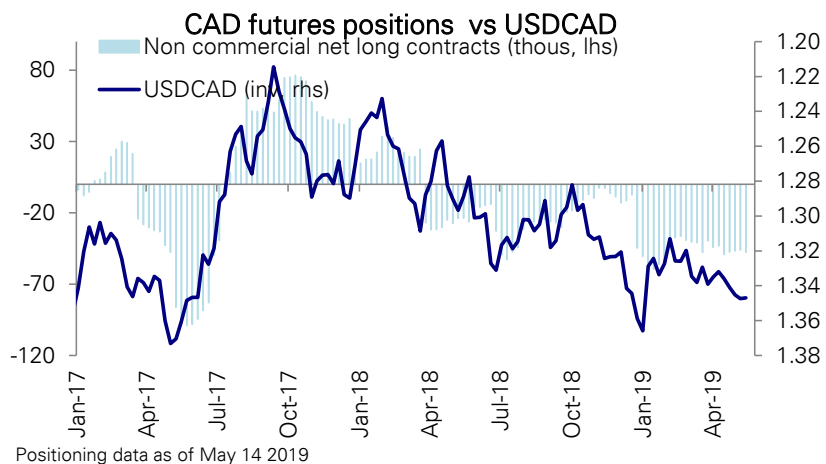
Figure 74: Sterling futures positions



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

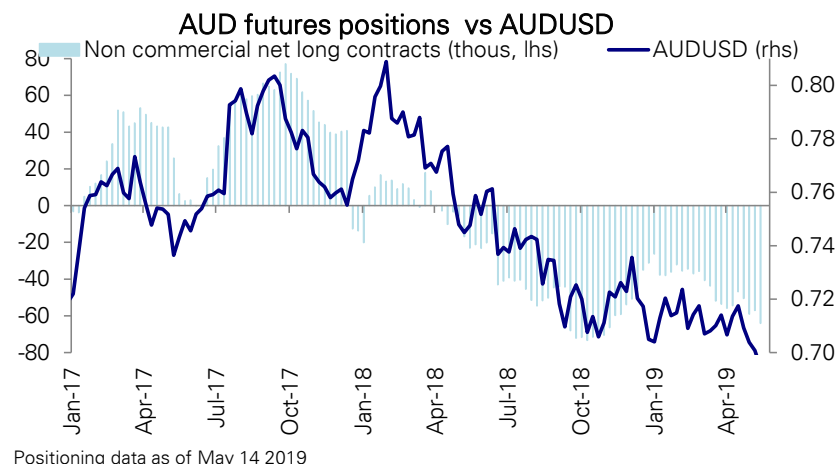


Figure 75: Canadian dollar futures positions



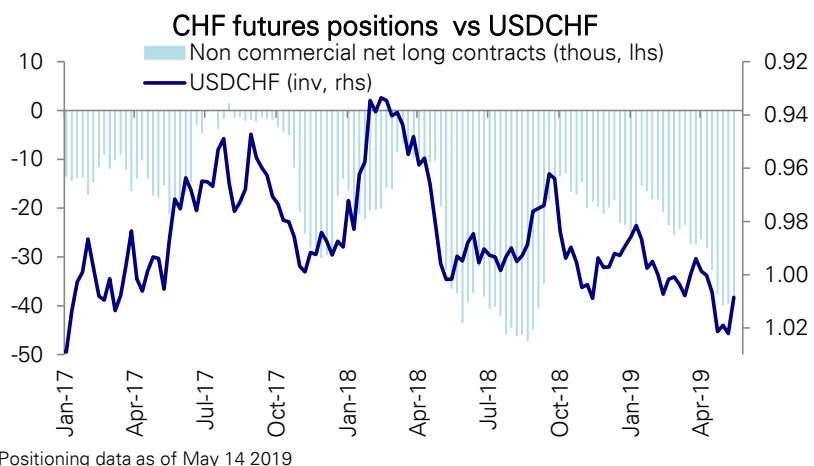
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 76: Aussie dollar futures positions



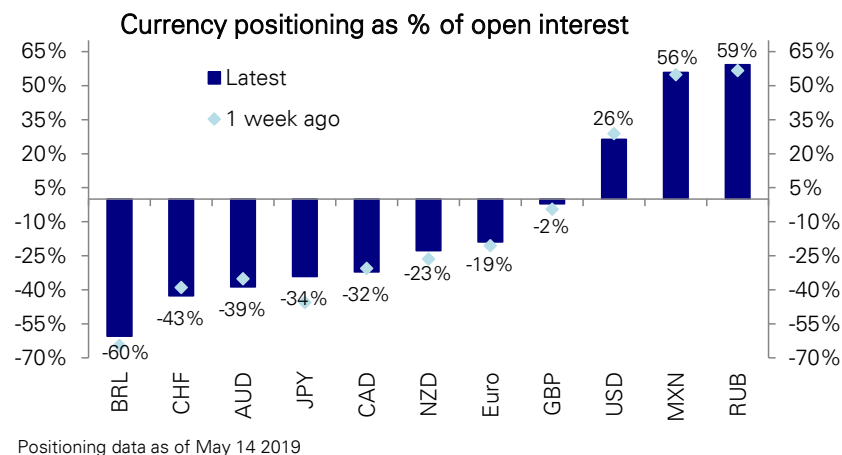
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 77: Swiss franc futures positions



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 78: Currency futures positions

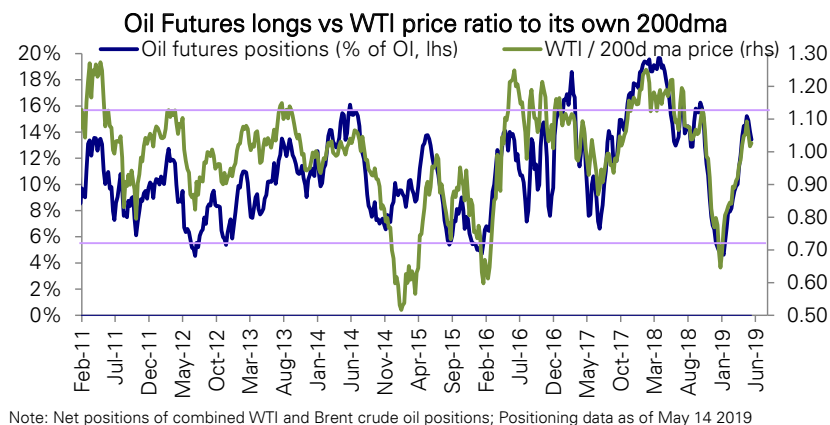


Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics



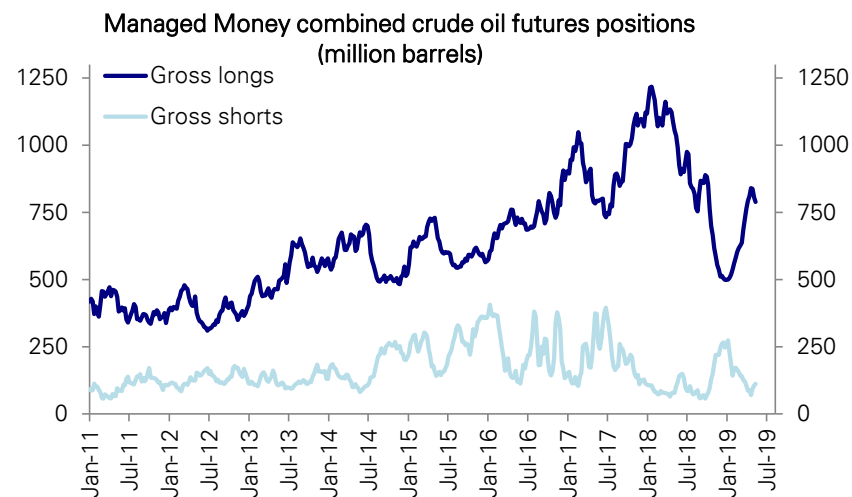
Commodity futures positioning

Figure 79: Oil futures positioning



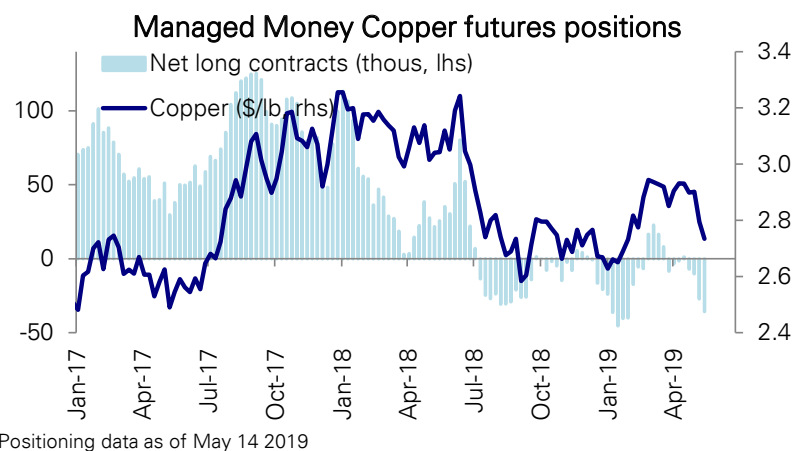
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 80: Oil futures gross longs vs shorts



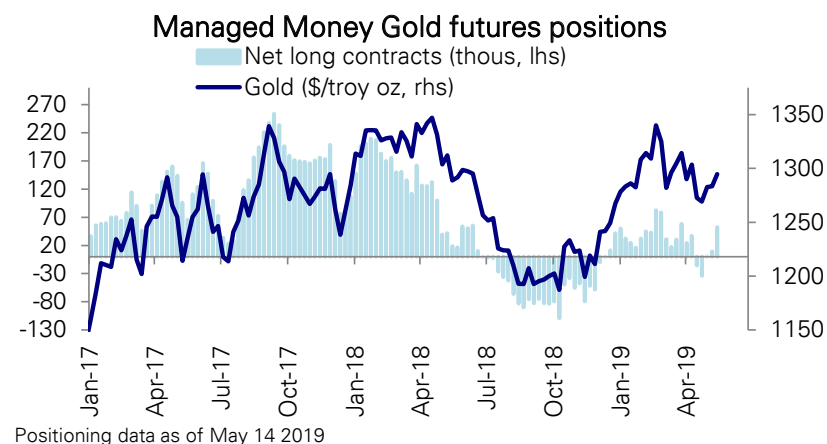
Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 81: Copper futures positioning



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics

Figure 82: Gold futures positioning



Source : Deutsche Bank Asset Allocation & Delta-1 Strategy, CFTC, Haver Analytics



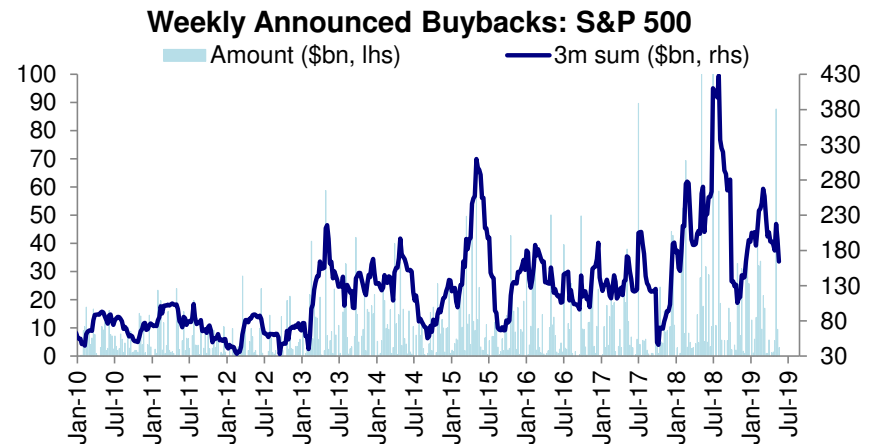
Buybacks Tracker

Figure 83: Recently announced buybacks

Date	Ticker	Company Name	Sector	Industry Group	Mkt Cap (\$ mn)	Buyback Programs		Excess Returns	
						\$mn	% mcap	(-1d to +1d)	Since Ann
5/16/19	PHM	PulteGroup Inc	Consumer Discretionary	Consumer Durables & Apr	8,960	500	5.6%	0.3%	NA
5/15/19	PGR	Progressive Corp/The	Financials	Insurance	45,260	1,938	4.3%	4.2%	-0.5%
5/14/19	RL	Ralph Lauren Corp	Consumer Discretionary	Consumer Durables & Apr	8,899	600	6.7%	-3.6%	-0.8%
5/9/19	TPR	Tapestry Inc	Consumer Discretionary	Consumer Durables & Apr	9,678	1,000	10.3%	4.7%	-6.3%
5/9/19	TSCO	Tractor Supply Co	Consumer Discretionary	Retailing	12,367	1,500	12.1%	1.1%	-1.7%
5/9/19	SYF	Synchrony Financial	Financials	Diversified Financials	23,696	4,000	16.9%	3.4%	2.1%
5/8/19	EW	Edwards Lifesciences Corp	Health Care	Health Care Equipment & I	37,047	1,000	2.7%	2.1%	-0.4%
5/7/19	FANG	Diamondback Energy Inc	Energy	Energy	16,170	2,000	12.4%	6.9%	12.8%
5/3/19	JCI	Johnson Controls International plc	Industrials	Capital Goods	35,546	4,000	11.3%	1.0%	1.2%
5/2/19	ANET	Arista Networks Inc	Information Technology	Technology Hardware & E	23,765	1,000	4.2%	-11.1%	-17.2%
4/30/19	AAPL	Apple Inc	Information Technology	Technology Hardware & E	924,544	75,000	8.1%	3.5%	-2.7%
4/29/19	HON	Honeywell International Inc	Industrials	Capital Goods	125,572	7,700	6.1%	0.6%	1.1%
4/26/19	COST	Costco Wholesale Corp	Consumer Staples	Food & Staples Retailing	107,278	4,000	3.7%	-1.1%	3.8%
4/24/19	GWV	WW Grainger Inc	Industrials	Capital Goods	16,320	1,472	9.0%	0.9%	-8.3%
4/18/19	CE	Celanese Corp	Materials	Materials	13,318	1,500	11.3%	-1.2%	-1.8%
4/9/19	CERN	Cerner Corp	Health Care	Health Care Equipment & I	20,466	1,200	5.9%	11.8%	9.3%
3/26/19	PVH	PVH Corp	Consumer Discretionary	Consumer Durables & Apr	8,302	750	9.0%	1.3%	-2.1%
3/24/19	BIIB	Biogen Inc	Health Care	Pharmaceuticals Biotechn	42,735	5,000	11.7%	1.7%	3.5%
3/22/19	PFG	Principal Financial Group Inc	Financials	Insurance	13,821	7	0.1%	-2.7%	9.3%
3/20/19	AZO	AutoZone Inc	Consumer Discretionary	Retailing	24,483	1,000	4.1%	1.5%	-2.1%
3/13/19	DG	Dollar General Corp	Consumer Discretionary	Retailing	31,318	1,000	3.2%	-7.3%	-3.2%
3/8/19	MDT	Medtronic PLC	Health Care	Health Care Equipment & I	121,350	6,000	4.9%	-0.3%	-7.4%
3/7/19	JCI	Johnson Controls International plc	Industrials	Capital Goods	32,556	8,500	26.1%	3.0%	5.6%
3/5/19	ROST	Ross Stores Inc	Consumer Discretionary	Retailing	34,677	2,550	7.4%	1.6%	-1.4%
2/28/19	WU	Western Union Co/The	Information Technology	Software & Services	7,884	1,000	12.7%	1.9%	7.2%

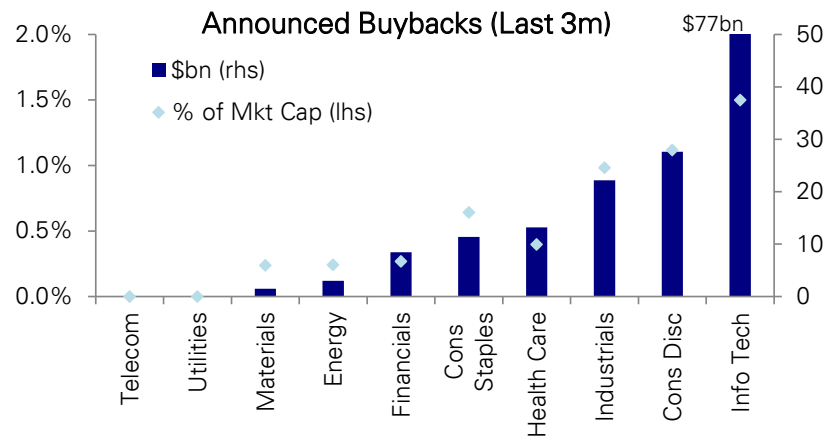
Source : Bloomberg Finance LP, Factset, DB US Equity Strategy

Figure 84: S&P 500 weekly announced buybacks



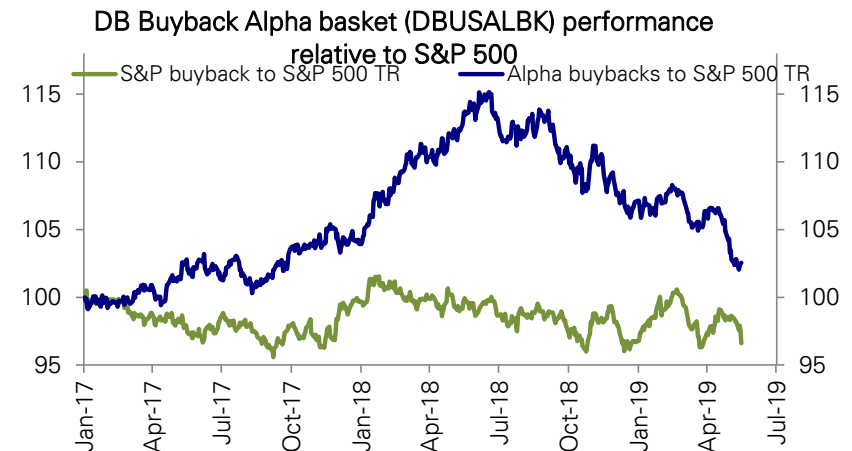
Source : Bloomberg Finance LP, DB US Equity Strategy

Figure 85: S&P 500 sectors announced buybacks



Source : Bloomberg Finance LP, DB US Equity Strategy

Figure 86: Buyback baskets performance



Source : Bloomberg Finance LP, DB US Equity Strategy



17 May 2019

Investor Positioning and Flows



Appendix 1

Important Disclosures

*Other information available upon request

*Prices are current as of the end of the previous trading session unless otherwise indicated and are sourced from local exchanges via Reuters, Bloomberg and other vendors. Other information is sourced from Deutsche Bank, subject companies, and other sources. For disclosures pertaining to recommendations or estimates made on securities other than the primary subject of this research, please see the most recently published company report or visit our global disclosure look-up page on our website at <https://research.db.com/Research/Disclosures/CompanySearch>. Aside from within this report, important risk and conflict disclosures can also be found at <https://research.db.com/Research/Topics/Equities?topicId=RB0002>. Investors are strongly encouraged to review this information before investing.

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The views expressed in this report accurately reflect the personal views of the undersigned lead analyst(s). In addition, the undersigned lead analyst(s) has not and will not receive any compensation for providing a specific recommendation or view in this report. Parag Thatte, Hallie Martin, Srineel Jalagani, Binky Chadha.

Additional ETF Information

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Equity Rating Key

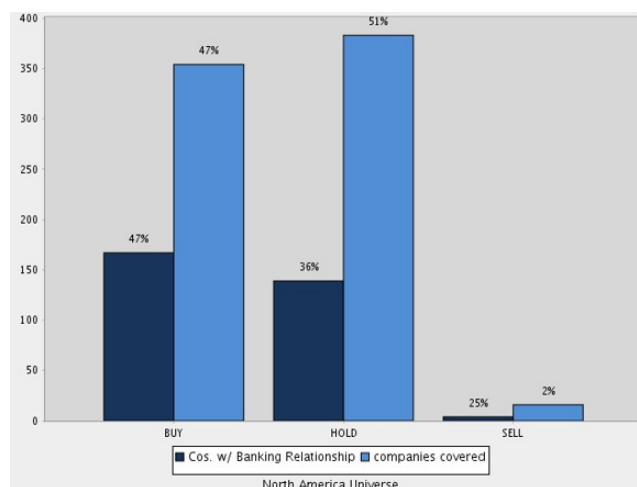
Buy: Based on a current 12- month view of total share-holder return (TSR = percentage change in share price from current price to projected target price plus projected dividend yield), we recommend that investors buy the stock.

Sell: Based on a current 12-month view of total share-holder return, we recommend that investors sell the stock.

Hold: We take a neutral view on the stock 12-months out and, based on this time horizon, do not recommend either a Buy or Sell.

Newly issued research recommendations and target prices supersede previously published research.

Equity rating dispersion and banking relationships



17 May 2019

Investor Positioning and Flows



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