

Liquid Cross Border Flows

USD vs. complacency

Key takeaways

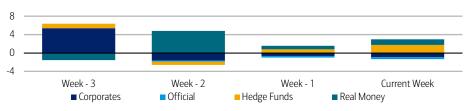
- BofA investors continued supporting USD last week, largely across the board. USD buying was led - by the already long - HF
- Into the BoJ investors continued reducing their JPY longs. JPY under most pressure in past month. GBP flows mixed despite CPI
- EM FX: Main highlights in past month are 1) the BofA investor 'split' over LatAm FX and 2) the Real Money Asia EM FX selling

USD buying strengthens

Investors continued supporting USD last week—largely across the board—according to our flows (Exhibit 8). The slightly stronger Hedge Fund buying from a long position stood out while Real Money continued paring back their USD shorts (Exhibit 1, Exhibit 2). We find the recent USD correction sensible, but our bias remains to sell rallies (FX weekly).

Exhibit 1: BofA weekly indexed USD flow

The slightly stronger HF demand from a long position stood out while RM paring back further their shorts

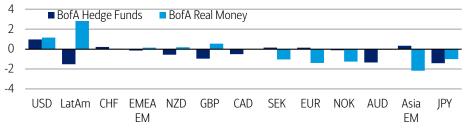


Source: BofA Securities

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Exhibit 2: BofA investor FX flows in past 4 weeks (2-year z-score)

BofA investors supported the USD largely across the board in the past month



Source: BofA Securities

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22 January 2024

Currency Strategy Global

Data Analytics



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See Team Page for List of Analysts

BoJ: Bank of Japan

HF: Hedge Fund

RM: Real Money

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Refer to important disclosures on page 6 to 8.

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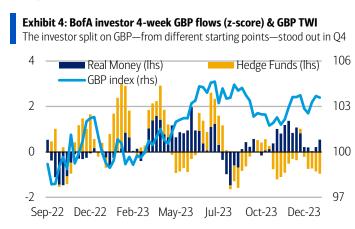
Timestamp: 22 January 2024 11:52AM EST

More JPY selling into BoJ. Mixed GBP flows despite CPI

Into the BoJ, both Hedge Funds and Real Money reduced further their JPY longs (Exhibit 3). JPY has seen the greatest pressure in the past month (Exhibit 2). We expect a non-event this week and remain more bearish than consensus on JPY (see <u>BoJ Jan preview</u>).

Meanwhile, Hedge Funds likely saw the hawkish UK CPI as an opportunity to reduce their GBP longs further, but Real Money continued buying (Exhibit 4). The investor split on GBP—but from different starting points—also stood out in Q4 (see <u>FX flows & positioning in 2023 19 Jan 24</u>). We expect carry to help GBP (see <u>GBP in '24 15 Jan 24</u>).

Exhibit 3: BofA investor 4-week JPY flows (z-score) & JPY TWI Into the BoJ both Hedge Funds & Real Money reduced further their JPY longs 4 Real Money (lhs) Hedge Funds (lhs) 87 2 Hedge Funds (lhs) 82 77 -4 Sep-22 Nov-22 Jan-23 Mar-23 May-23 Jul-23 Sep-23 Dec-23 Source: BofA Securities. Bloomberg



Source: BofA Securities, Bloomberg

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EM FX: investors divided over LatAm FX

In the past month, the BofA investor split on LatAm FX—Hedge Funds selling vs Real Money buying—and the Real Money Asia EM selling stood out in EM FX (Exhibit 2).

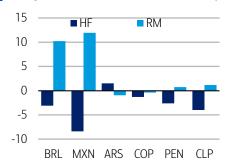
• In LatAm (Exhibit 5), Real Money (RM) supported both MXN and BRL in the past four weeks, while Hedge Funds (HF) sold both.

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- In Asia (Exhibit 6), both HF and RM bought INR and sold MYR and IDR.
- In EMEA (Exhibit 7), both HF and RM supported HUF, while TRY and ILS came under pressure by HF in the case of the former and by RM in that of the latter.

Exhibit 5: LatAm change in BofA investor FX positioning in past 4 weeks

Divergent HF and RM LatAm FX flows recently

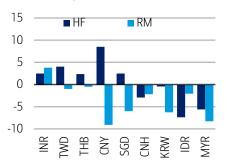


Source: BofA Securities. Currencies ranked by their equallyweighted change in positioning in the past four weeks.

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Exhibit 6: Asia EM change in BofA investor FX positioning in past 4 weeks

HF and RM bought INR but sold IDR and MYR



Source: BofA Securities. Currencies ranked by their equallyweighted change in positioning in the past four weeks.

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Exhibit 7: Asia EM change in BofA investor FX positioning in past 4 weeks

HUF supported but ILS and TRY under pressure



Source: BofA Securities. Currencies ranked by their equallyweighted change in positioning in the past four weeks.

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For more information and data files on flows and positioning, please see

Liquid Cross Border Flows: Flows data 22 January 2024

Liquid Cross Border Flows: Positioning data 22 January 2024

Liquid Cross Border Flows: Charts and Tables 22 January 2024

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Snapshot of flows

Exhibit 8: Snapshot G10 FX flows (z-score)

BofA proprietary FX flows in the past four weeks

	Total					Corporate				Official				Hedge funds				Real money			
	t-3	t-2	t-1	t	t-3	t-2	t-1	t	t-3	t-2	t-1	t	t-3	t-2	t-1	t	t-3	t-2	t-1	t	
USD	1.17	0.46	0.02	0.30	1.35	-0.70	-0.41	-0.48	0.16	-0.02	-0.12	-0.19	0.60	-0.39	0.50	1.06	-0.74	2.43	0.38	0.59	
EUR	-1.75	0.20	0.34	-0.59	-2.1	0.99	0.39	-0.11	0.25	0.23	0.48	-0.34	-1.42	1.07	1.25	-0.63	0.65	-1.99	-0.81	-0.57	
JPY	-0.15	-0.84	-0.93	-0.73	-0.1	0.76	0.15	0.67	-0.14	-0.70	-0.37	0.07	0.05	-0.60	-1.30	-1.04	-0.08	-0.91	-0.46	-0.70	
GBP	-0.11	-0.10	0.69	0.38	0.12	-0.26	-0.04	0.37	0.11	0.43	0.24	0.65	-1.25	0.13	0.38	-1.28	0.25	-0.13	0.79	0.35	
CAD	-0.42	-0.39	0.50	-0.72	-1.13	-0.12	0.49	-0.65	-0.33	-0.44	1.08	-0.32	0.17	-0.01	-0.90	-0.31	0.43	-0.10	-0.12	-0.17	
AUD	-0.94	-0.14	-0.11	0.55	-0.0	0.01	-0.10	0.41	-0.17	-0.02	1.25	0.50	-0.29	-0.41	-1.79	0.05	-0.86	0.00	0.46	0.27	
NZD	-0.59	0.74	-0.51	-0.25	0.2	0.16	-1.38	-0.01	-0.16	0.83	-0.37	-0.69	-0.33	0.10	-0.31	-0.61	-0.48	0.62	-0.03	0.29	
CHF	0.73	0.40	-0.40	0.01	0.3	0.06	0.00	-0.17	-0.26	-0.24	-0.44	3.42	-1.72	1.30	0.99	-0.24	1.65	-0.23	-1.07	-0.28	
NOK	-0.85	-0.26	0.40	-0.57	-0.5	0.75	1.33	0.09	0.17	0.24	0.20	0.25	-0.88	-0.33	0.14	0.76	-0.03	-0.44	-0.30	-1.51	
SEK	-0.87	-0.54	-2.14	-1.13	-0.8	-0.25	-1.87	-0.86	-0.02	0.03	0.02	0.81	-0.19	-0.40	0.07	0.89	-0.04	-0.22	-0.70	-1.10	
G10-xUSD	-1.80	-0.23	0.06	-0.75	-1.7	0.80	0.24	0.01	-0.05	-0.04	0.94	0.19	-1.66	0.47	-0.18	-1.19	0.47	-1.84	-0.60	-0.77	
Asia	0.45	-0.65	-1.09	0.72	0.59	0.33	0.17	1.03	-0.36	-0.08	-1.18	0.07	0.58	0.25	-0.33	0.06	-0.32	-2.60	-1.56	-0.02	
EMEA	-0.21	0.14	0.54	-0.13	-1.5	0.06	1.82	1.56	-0.09	-0.10	-0.28	0.04	0.34	0.42	-0.24	-0.88	-0.02	-0.04	0.49	-0.13	
LatAm	1.11	-0.07	1.63	0.11	0.09	-0.48	0.92	0.95	0.97	1.14	0.59	0.36	-0.19	-0.53	-1.34	-1.36	1.79	0.49	3.11	0.50	

Source: BofA Securities

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Exhibit 9: Snapshot of EM Flows (Z-score)

BofA proprietary FX flows in the past four weeks

Bon proprietary (Artions in the pastroal weeks																				
	Total			Corporate			Official					Hedge funds				Real money				
	t-3	t-2	t-1	t	t-3	t-2	t-1	t	t-3	t-2	t-1	t	t-3	t-2	t-1	t	t-3	t-2	t-1	t
LatAm	1.11	-0.07	1.63	0.11	0.09	-0.48	0.92	0.95	0.97	1.14	0.59	0.36	-0.19	-0.53	-1.34	-1.36	1.79	0.49	3.11	0.50
BRL	1.42	-0.18	1.06	0.78	0.39	-0.06	-0.01	0.56	-	0.28	-	-	-0.36	-0.91	-0.27	-0.03	2.61	0.46	2.27	0.82
MXN	0.01	-0.11	2.66	-0.64	-0.36	-1.16	1.92	0.55	1.42	0.33	0.44	0.27	-0.08	0.64	-0.96	-2.02	-0.01	0.06	2.85	0.21
CLP	-0.17	-0.26	-0.65	0.07	-0.95	0.13	0.66	0.70	0.01	-0.21	0.14	0.01	-0.16	-0.19	-1.27	-0.67	0.29	-0.22	-0.02	0.42
COP	0.24	0.32	0.24	-0.55	0.42	0.45	-0.35	0.63	-	0.82	0.38	-	-0.06	-0.27	0.12	-0.54	0.10	0.04	0.16	-0.65
PEN	0.59	0.70	-0.62	-0.43	0.35	-0.21	0.44	0.46	0.16	3.96	-	-	0.79	-0.65	-1.51	-0.06	0.11	0.81	0.08	-0.51
ARS	0.00	0.00	0.01	0.01	0.29	0.30	0.27	0.27	-	-	-	-	0.24	0.24	0.24	0.24	-0.23	-0.23	-0.21	-0.21
Asia	0.45	-0.65	-1.09	0.72	0.59	0.33	0.17	1.03	-0.36	-0.08	-1.18	0.07	0.58	0.25	-0.33	0.06	-0.32	-2.60	-1.56	-0.02
CNY	-0.31	-0.61	0.33	-2.28	-0.56	0.28	0.44	0.52	0.04	-	-1.03	-4.00	-0.29	2.56	1.76	3.15	0.37	-3.98	1.40	-2.76
CNH	0.14	-0.33	-1.49	0.64	0.04	-0.48	-1.17	-0.03	-0.01	1.07	1.06	3.88	0.24	-0.11	-0.77	-0.36	-0.21	-0.57	-1.13	0.02
INR	0.14	-0.15	0.47	0.52	1.26	-0.15	-0.09	0.82	-0.52	-0.51	-0.51	-0.51	-0.13	0.78	1.00	0.20	-0.19	0.02	1.43	1.07
KRW	0.32	-0.71	-0.59	0.76	0.31	0.54	0.84	0.64	0.28	0.57	-4.00	-	-0.04	-0.79	0.04	0.38	0.19	-3.05	-2.31	0.36
IDR	0.15	-0.94	-0.56	-0.54	0.78	0.14	0.04	-0.13	-	-	0.12	0.12	0.01	-0.56	-0.75	-1.64	-0.20	-0.82	-0.27	0.36
MYR	-0.77	-2.85	-0.75	0.69	-0.62	-0.08	0.14	1.38	0.28	2.49	-	-	0.09	-0.04	-0.06	-1.14	-0.38	-3.78	-1.12	-0.38
SGD	0.00	-0.01	-0.32	0.49	-0.51	0.17	-1.01	0.78	0.66	0.05	0.06	3.68	0.59	0.28	-0.03	0.18	-0.86	-0.49	-0.04	-1.78
TWD	0.74	1.33	-1.27	0.94	0.12	0.82	0.25	0.25	0.15	-0.12	-	0.11	1.28	0.58	-0.16	0.68	-0.14	0.79	-1.80	0.57
THB	1.27	0.26	-0.09	0.44	1.26	0.97	1.75	1.43	-0.22	-0.06	-0.33	-0.55	0.38	0.62	-0.40	0.38	0.99	-0.67	-0.57	-0.14
EMEA	-0.21	0.14	0.54	-0.13	-1.56	0.06	1.82	1.56	-0.09	-0.10	-0.28	0.04	0.34	0.42	-0.24	-0.88	-0.02	-0.04	0.49	-0.13
TRY	-0.25	0.15	-0.98	0.57	0.12	0.24	0.31	0.73	-0.28	-0.27	-0.29	-0.30	-0.75	-0.58	-2.24	-0.82	-0.05	0.42	-0.31	0.88
HUF	-0.53	0.30	1.65	1.18	-1.54	0.13	0.17	0.72	0.19	0.19	-0.76	0.20	0.30	0.94	2.36	-1.11	-0.23	-0.15	0.83	1.64
PLN	0.26	0.00	0.77	-0.16	-0.34	0.64	0.37	-0.33	0.25	0.26	-0.48	0.25	0.44	-0.17	-0.02	0.43	0.19	-0.16	0.90	-0.33
ILS	-0.01	-0.65	0.10	-0.01	-0.65	-0.09	3.58	1.84	-0.16	-0.17	-0.17	-0.17	0.71	-0.28	-0.31	-0.41	-0.04	-0.83	-1.63	-0.66
CZK	-0.78	0.46	-0.46	-0.80	-0.96	-0.73	-0.69	0.22	0.16	0.16	0.16	0.16	-0.05	1.00	-0.30	0.15	-0.72	0.07	-0.08	-1.65
ZAR	0.20	0.13	-0.21	-0.68	-0.06	-0.36	0.36	0.54	-0.11	-0.10	-0.11	1.15	-0.11	-0.17	-0.67	-1.39	0.38	0.40	0.13	-0.14
KEY:																				
	Z>2				2 > Z > 1.5 1.5 > Z > 1			1 > Z > -1				-1 > 2	-1 > Z > -1.5 -1.5 > Z > -2				Z < -2			

Source: BofA Securities; Note: The z-score is calculated as the weekly flow minus the 2-year average flow, divided by the 2-year standard deviation of flows. A positive (negative) number does not necessarily suggest buying (selling), as it is expressed relative to the 2-year average flow and depends on whether the latter is a positive or a negative number. In this context, the arrows indicate whether our flow, and not the z-score, is positive or negative, suggesting buying or selling. Weeks with no flow are marked with '-'.

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Positioning Scorecard

Exhibit 10: G10 FX Positioning Scorecard

50 (-50) represents a max long (short) positioning relative to history

Currency	BofA HF	BofA RM	FXRS	сот	TFF LF	TFF AM	EPFR	Aggregate Positioning Signal	Change in positioning	MAA I	Breadth
NOK	33	7	24	-	-	-	41	21	\downarrow	7	↑ ↑
EUR	-11	6	-8	13	2	46	26	7	\downarrow	-1	\leftrightarrow
GBP	18	24	-13	20	14	-21	44	4	↑	5	↑
JPY	9	14	14	-22	-19	-3	48	3	\downarrow	-9	$\downarrow\downarrow$
AUD	-8	28	18	-28	4	-43	47	0	\downarrow	-5	\downarrow
USD	20	-3	-4	-6	1	-33	50	-4	↑	-3	\leftrightarrow
CAD	14	-11	-14	-8	-19	0	49	-6	\downarrow	0	\leftrightarrow
SEK	10	-24	-7	-	-	-	36	-7	\downarrow	0	\leftrightarrow
CHF	-12	-25	=	-7	0	-3	41	-10	\downarrow	7	↑ ↑
NZD	-23	-31	9	-6	2	-11	47	-11	\downarrow	-1	\leftrightarrow

Source: BofA Global Research, Bloomberg, EPFR Global; See appendix for details; HF: Hedge Fund, RM Real Money, FXRS: FX and Rates Sentiment Survey Note: Aggregate positioning is the unweighted average of BofA HF, BofA RM, FXRS, TFF LF and TFF AM

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Exhibit 11: EM FX Positioning Scorecard

50 (-50) represents a max long (short) positioning relative to history

Currency	BofA HF	BofA RM	FXRS	СОТ	TFF LF	TFF AM	EPFR	Aggregate Positioning Signal	Change in positioning	MAA trend
INR	31	21	=	=	-	-	48	26	<u> </u>	
HUF	27	24	-	-	-	-	22	26	į	\leftrightarrow
CZK	18	19	-	-	-	-	43	18	\downarrow	↑
CLP	29	0	-	-	-	-	46	15	\downarrow	↑
PLN	3	25	=	=	=	=	-15	14	↑	\leftrightarrow
MYR	17	7	=	=	=	=	39	12	\downarrow	↑
CNH	-7	27	=	=	=	=	0	10	\downarrow	0
BRL	-45	27	=	25	6	32	44	5	↑	\leftrightarrow
THB	-7	15	=	=	=	=	30	4	↑	↑
ILS	-5	12	=	=	=	=	49	3	\downarrow	\leftrightarrow
MXN	-50	6	-	18	12	42	47	2	\downarrow	↓
COP	36	-34	-	-	-	-	47	1	\downarrow	↓
IDR	21	-34	-	=	-	=	7	-7	\downarrow	\
PEN	-42	28	-	-	-	-	36	-7	\downarrow	\leftrightarrow
ARS	-39	12	-	-	-	-	49	-14	↑	↑
TWD	-19	-15	-	-	-	-	32	-17	↑	\leftrightarrow
TRY	-40	7	-	-	-	-	10	-17	↑	↑
CNY	-2	-49	-	-	-	-	44	-25	\downarrow	↑
KRW	-16	-34	=	=	-	-	44	-25	↑	↑
ZAR	-31	-22	-	-	-	-	47	-26	↓	↑
SGD	-35	-34	-	-	-	-	45	-34	\downarrow	\leftrightarrow

Source: BofA Global Research, Bloomberg, EPFR Global; See appendix for details; HF: Hedge Fund, RM Real Money, FXRS: FX and Rates Sentiment Survey

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Data appendix

BofA Securities Proprietary FX Flows represent the aggregated net base notional of spot and forward trades for sales-only data on a firm-wide basis for the 31 major currencies we track. We filter the data by customer type, which we categorize as Hedge Funds, Corporates, Real Money and Official Institutions. For the purposes of this report we exclude interbank flows, which would include commercial banks, proprietary trading, broker/dealer and affiliates. Indexed data is available upon request.

The currencies used in building this report are defined as:

- **G10:** USD, EUR, JPY, AUD, NZD, CAD, GBP, CHF, NOK, SEK
- LatAm: BRL, MXN, CLP, COP, PEN, ARS
- ASIA: CNH, CNY, INR, KRW, IDR, MYR, SGD, TWD, THB
- EMEA: TRY, HUF, PLN, ILS, CZK, ZAR, RUB

Emerging Markets is defined as the sum of LatAm, Asia and EMEA.

Public/Official: Central Banks, Government – including federal, state and local municipality clients – and Sovereign Wealth Funds.

Real Money: Pension Funds, REITs, Small Institutions/Trusts, Insurance, Asset Management and Finance Companies. RM clients will often trade FX to facilitate transactions in Fixed Income or Equities rather than to take a view on FX itself.

Hedge Funds: Usually limited-partnership funds with diverse, often leveraged strategies designed to maximize returns. HF flow is speculative in nature, and many HF trade FX as an asset class

Corporates: Businesses across all industries whose investment efforts focus mostly on operative activities, such as hedging and M&A. Corporate FX flow is not speculative in nature but arises as a 'by-product' of normal business operations.

EPFR GLOBAL data on country flows combine the respective fund flow and country weightings data to track the flow of money into world stock and bond markets. Fund flow reports track the amount of cash flowing into and out of the investment funds monitored world-wide. Country weightings reports track fund manager allocations at month-end across the various markets they invest in. By combining these two data sets we are able to estimate the flow of cash into and out of various stock and bond markets.

Note on Aggregate Positioning

We calculate aggregate positioning using a number of different inputs:

- (i) Proprietary BofA Securities FX flows data for hedge funds and real money
- (ii) Futures data, using the TFF (Traders in Financial Futures) data for leveraged funds and asset managers separately.
- (iii) BofA Global Research FXRS: FX and Rates Sentiment Survey data

The signals are all considered relative to the start of 2012 (i.e. an expanding window) and each signal is scaled to be between +50 and -50. The aggregate signal is the simple average of all the inputs.

+50 (-50) represents a max long (short) positioning relative to history.

For more detail on the construction and use of this report, please see our <u>LCBF Primer</u>



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