

How are the unsecured markets affected by declining excess liquidity?



Eurosystem Balance Sheet Composition (2025: Week 1, 38, 47)

ssets	2025-W47	2025-W38	2025-W01	▼ Liab	pilities	2025-W47	2025-W38	2025-W01
Total Assets	6.152.427	6.070.545	6,412,636		Total Liabilities	6,152,427	6,070,545	6,412,636
					Banknotes in circulation	1,591,449	1,589,073	1,585,418
Gold and gold receivables	1,128,571	972,470	872,158	>	Liabilities to euro area credit	2,666,478	2,782,269	3,073,914
Claims on non-Euro area residents in foreign currency	497,365	492,965	522,598		institutions related to monetary policy operations denominated in euro			
Claims on Euro area residents in	21,039	20,140	15,103		Other liabilities to Euro area credit institutions in euro	10,581	8,452	20,65
foreign currency					Debt certificates issued	0	0	
Claims on non-Euro area residents in euro	29,870	29,496	20,303		Liabilities to other Euro area residents in euro	213,889	182,015	179,86
Lending to euro area credit	22,052	20,389	34,173		Liabilities to non-Euro area residents in euro	143,258	141,465	187,82
institutions denominated in euro					Liabilities to Euro area residents in	17,498	14,844	11,20
Other claims on euro area credit	20,071	27,545	29,216		foreign currency			
institutions denominated in euro					Liabilities to non-Euro area residents in foreign currency	2,656	2,451	60
Securities of euro area residents denominated in euro	4,100,716	4,180,949	4,533,034		Counterpart of special drawing rights allocated to IMF	170,145	170,816	182,81
General government debt	20,171	20,199	20,394		Other liabilities	199,567	194,657	206,03
denominated in euro					Revaluation accounts	1,099,971	947,542	872,32
Other Assets	312,573	306,391	365,658		Capital and reserves	36,934	36,961	91,97

Eurosystem balance sheet reduction continues and has progressed fairly smoothly, e.g. by

- repaying TLTROs coupled with prudent liquidity and balance sheet management by banks
- phasing out reinvestments of bonds maturing (QT) (€~40bn per month)
- Gradual reduction since beginning of 2025:
 from €6.41trn (week 1 2025) to €6.15trn (week 47 2025)
 whereby there are increases and decreases across the
 different assets and liabilities
- Excess liquidity further reduced to €~2.5bn on Nov 25, 2025 from €~2.6bn on Sep 17, 2025

EUR Excess Cash vs ECB DFR/€STR spread (Jan 1, 2025 to Nov 25, 2025)



ESTR Volume (Jan 1, 2025 to Nov 25, 2025)



Short-term unsecured EUR funding markets continue to be trading in a relatively tight spread range between DFR

Sep 17, 2025 to Nov 25, 2025

and €STR

Source: ECB

Source: Bloomberg LLP

- Spreads: avg 7.3bps, min 6.8bps, max 8.4bps (QE Sep 2025)
- €STR Volumes: avg €63.5bn, min €48.7bn, max €70.5bn
- Still broadly well anchored at 'close to DFR' reflecting excess liquidity conditions
- Term funding spreads have started to rise but funding / liquidity does not seem to be tight and not to be stressed
- Improved economical market financing conditions and continued limited usage of ECB facilities (e.g. MRO @spread of +15bps) indicate a fairly stable funding environment at the moment
- Transmission in the Euro area for which the banking system is key seems to be working

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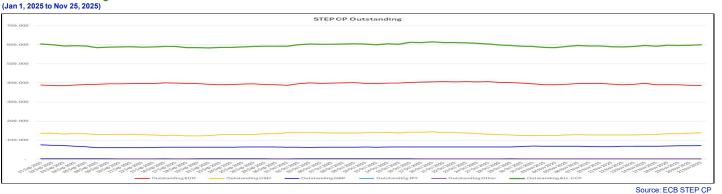
STEP CP Outstandings (Sep 1, 2025 to Nov 21, 2025)

Date	Outstanding	Outstanding	Outstanding	Outstanding	Outstanding	Outstanding
Date	EUR	USD	GBP	JPY	Other	ALL CCY
01 Sep 2025	388.690	135.770	76.226	19,4319	3.063	603.768
15 Sep 2025	397.217	126.922	62.025	36,0053	2.937	589.137
30 Sep 2025	390.194	134.444	64.538	36,0053	2.908	592.121
01 Oct 2025	388.015	138.401	63.390	35,5462	2.932	592.774
15 Oct 2025	399.055	137.170	63.927	35,5478	3.028	603.216
31 Oct 2025	396.084	123.863	68.927	27,0836	2.931	591.831
03 Nov 2025	390.968	124.736	67.539	27,0699	2.885	586.155
17 Nov 2025	391.069	130.403	68.011	32,2366	2.741	592.257
21 Nov 2025	387.013	138.340	71.920	23,3546	2.828	600.125

Source: ECB STEP CP

- STEP CP total outstandings have remained within a relatively tight range over the last 3 months as well as throughout 2025
 - o EUR CP fairly unchanged
 - USD and JPY CP slightly increased
 - o GBP CP decreased
- Weekly CP funding levels up to 6 months issued by MFIs have traded within a range whereby there are some outliers that can be observed
- Overall, financing conditions in the STEP CP market have remained stable since Sep 2025

STEP CP Outstandings

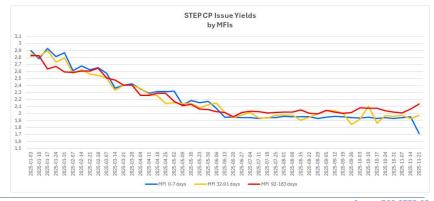


STEP CP --- Yields issued by MFIs, weekly (Sep 12, 2025 to Nov 21, 2025)

DATE	MFI 0-7 days	MFI 32-91 days	MFI 92-183 days
2025-09-12	1,9586	2,0430	2,0204
2025-09-19	1,9561	2,0043	2,0028
2025-09-26	1,9436	1,8475	2,0151
2025-10-03	1,9364	1,9167	2,0832
2025-10-10	1,9519	2,1092	2,0750
2025-10-17	1,9289	1,8615	2,0743
2025-10-24	1,9425	1,9733	2,0379
2025-10-31	1,9325	1,9594	2,0239
2025-11-07	1,9439	1,9740	2,0119
2025-11-14	1,9524	1,9312	2,0680
2025-11-21	1,7165	1,9738	2,1355

DATE	MFI 32-91 days	ESTR Swap 3M	Spread in bps
2025-09-12	2,0430	1,9237	11,9
2025-09-19	2,0043	1,9290	7,5
2025-09-26	1,8475	1,9273	- 8,0
2025-10-03	1,9167	1,9281	- 1,1
2025-10-10	2,1092	1,9218	18,7
2025-10-17	1,8615	1,9165	- 5,5
2025-10-24	1,9733	1,9250	4,8
2025-10-31	1,9594	1,9275	3,2
2025-11-07	1,9740	1,9280	4,6
2025-11-14	1,9312	1,9320	- 0,1
2025-11-21	1,9738	1,9280	4,6

STEP CP --- Yields issued by MFIs. weekly (Jan 3, 2025 to Nov 21, 2025)



Source: ECB STEP CP Source: ECB STEP CP Source: ECB STEP CP Deutsche Bank

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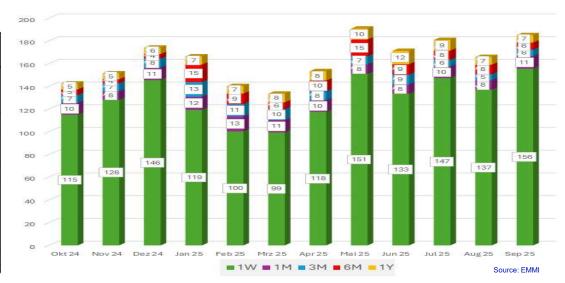
Euribor Volumes (October 2024 to September 2025)

Euribor Volumes (Level 1 and 2.2)

in€bn

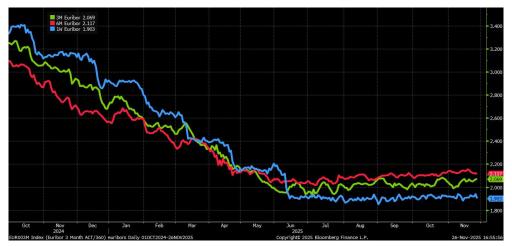
Manuth						
Month	1W	1M	3M	6M	1Y	Sum
Oct-24	115	10	7	5	5	142
Nov-24	128	8	7	4	5	151
Dec-24	146	11	8	4	6	174
Jan-25	119	12	13	15	7	166
Feb-25	100	13	11	9	7	140
Mar-25	99	11	10	6	8	134
Apr-25	118	10	8	10	8	153
May-25	151	8	7	15	10	191
Jun-25	133	8	9	9	12	171
Jul-25	147	10	6	8	9	181
Aug-25	137	8	5	8	7	166
Sep-25	156	11	6	6	7	185

Aggregate notional volumes of transactions used in the determination of Euribor® (Level 1 and Level 2.2)



Euribor Rates (1W, 3M, 6M) (October 2024 to September 2025)





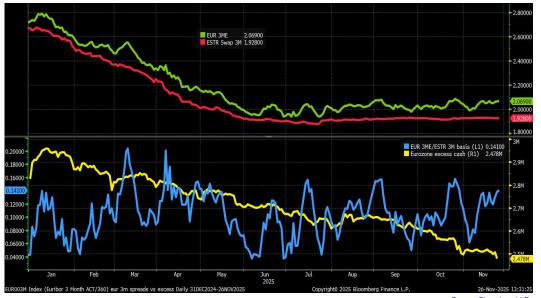
- Euribor-related total aggregated notional volumes (between Oct-24 and Sep-25) reported have increased over time whereby
 - > 1W is the key contributor
 - ➤ Term volumes have somewhat decreased from higher levels seen earlier in 2025 (e.g. 6M: to €6bn in Sep-25 from €15bn in May-25)
- Latest trend indicates that € liquidity is kept in the shorter tenors to review and assess the developments and outlook around the € interest rates going forward

Source: Bloomberg LLP

How are the unsecured markets affected by declining excess liquidity?



€ Spot 3ME / €STR 3M basis (Jan 1, 2025 to Nov 26, 2025)



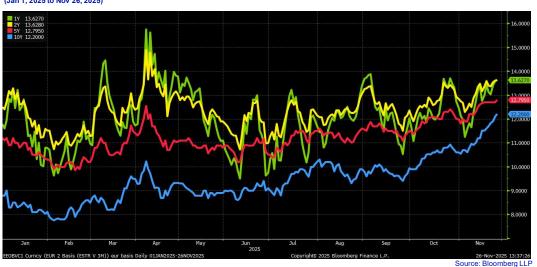
Source: Bloomberg LLP

- ➤ **€ 3ME / €STR 3M basis spreads** have been fairly volatile and trading in a range between
 - ➤ +4bps and +20bps since Jan 1, 2025
 - > +5bps and 16bps since Sep 17, 2025

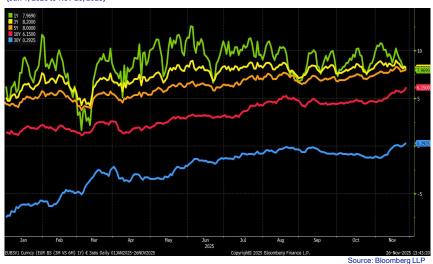
whereby the 3M €STR swap levels have been fairly stable indicating investors are looking for comparatively higher yields and spreads when lending unsecured funding

- Spot term € 3ME / €STR basis spreads have also been volatile and trended wider since Sep 17, 2025 resulting in further flattening of the basis spread curve up to 10Y and indicating to not only higher but also more sustainable term funding costs (forward term €3ME/€STR basis spreads have also widened over the same period)
- ► **6s3s basis spreads** especially up to 10Y have also flattened

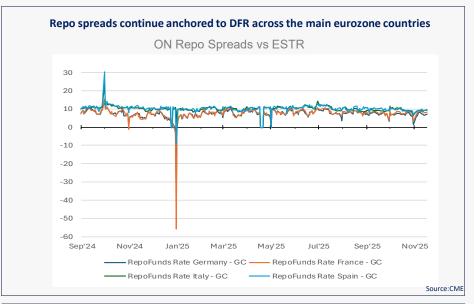
€ Spot 3ME / €STR basis --- 1Y to 10Y (Jan 1, 2025 to Nov 26, 2025)

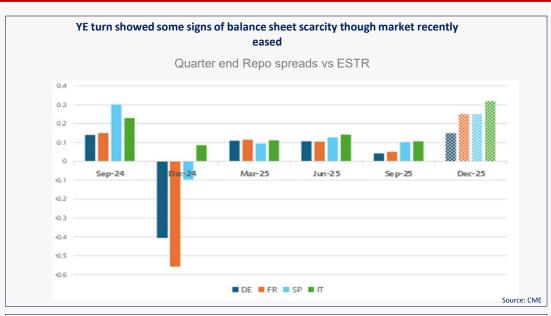


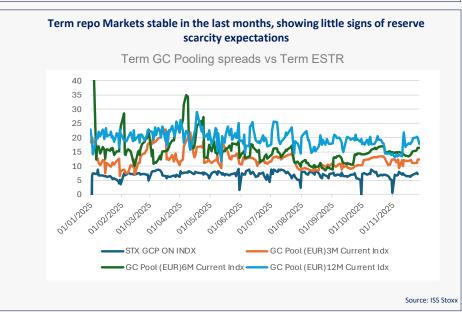
€ Spot 6s3s basis --- 1Y to 30Y (Jan 1, 2025 to Nov 26, 2025)

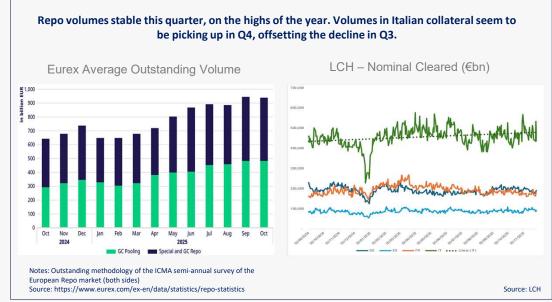


Repo market trends







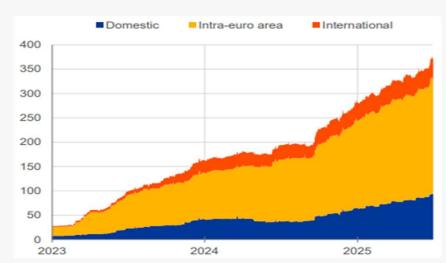




Non-HQLA Repo Market

HQLA redistribution in euro area repo markets using non-HQLA collateral

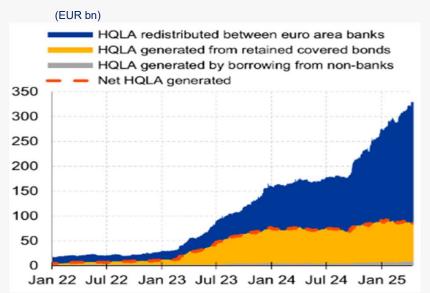




Sources: SFTD, ECB (MOPDB) and ECB calculations ECB Money Market Conference – 6th Nov 2025 Towards a new Eurosystem balance sheet

Notes: Outstanding volumes of HQLA redistribution to banks borrowing in repo against non-HQLA collateral, residual maturities above 30days and accounting for the LCR haircuts of the underlying collateral and counterparty. Domestic cover within EA country repos, intra-euro area borrowing repos of a bank from a counterparty that are both located in the euro area and international is repo borrowing between EA banks and counterparties located outside the euro area. Open-lerm repo or evergreen transactions are excluded.

Redistribution and generation of HQLA via the term repo market



Sources: SFTD, ECB (MOPDB) and ECB calculations The ECB Blog – 25th Apr 2025 The first year of the Eurosystem's new operational framework

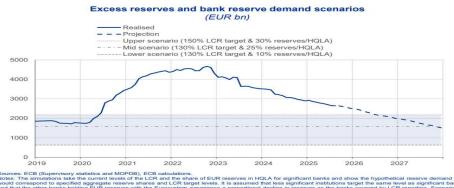
Notes: Outstanding volumes of HQLA generated for the borrower, accounting for HQLA-status of the underlying collateral. Open-term repo or evergreen transactions are excluded.

- Non HQLA repo market has massively grown in the last 2-3 years, emerging as a relevant factor in reserves / HQLA redistribution.
- Volume growth in 2023 skewed towards Retained Covered financing in long term to replace TLTRO maturities, specially H1.
- Increased demand for leverage contributing to pick up in volumes in the last year.
- Activity more balanced between long and short term in the last months, as opposed to 2023.



Reserve Demand: EUR





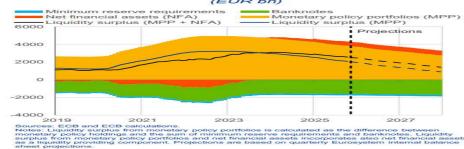
surces: ECB (Supervisory statistics and MOPDB), ECB calculations.

The surface of the surface of the LCR and the share of EUR reserves in HOLA for significant banks and show the hypothetical reserve demand that undecorrespond to specified aggregate reserve shares and LCR target levels. It is assumed that less significant institutions target the same level as significant banks and the surface of the surface of the total control of the surface of the sur

Source: ECB Conference on Money Markets FFM, 6 Nov 2025 --- Isabel Schnabel

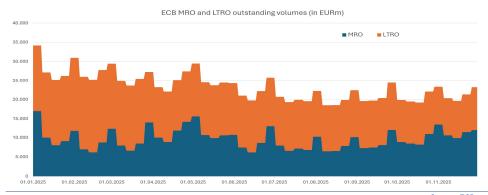
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Liquidity surplus from monetary policy portfolios and net financial assets (EUR bn)



Source: ECB Conference on Money Markets FFM, 6 Nov 2025 --- Isabel Schnabel

ECB MRO and LTRO outstandings 2025



- Path to lower excess liquidity in the Eurozone is largely anticipated
- The 'minimum' level is likely to be dynamic and state dependent
- Historical data and approaches are unlikely to provide reliable guidance on appropriate level of excess cash
- Market signals are key to closely monitor in order to properly and timely assess any stress in the EUR funding markets (e.g. unsecured vs secured markets, volatility in short-term interest rates)
- Excess liquidity distribution across countries could contribute to deviations in domestic funding conditions between countries and endanger redistribution of liquidity (increased fragmentation)
- MRO and 3M LTRO usage (including backstop usage) has been largely stable and relatively low in recent months, e.g. low percentage of excess liquidity in the Eurozone suggesting liquidity has remained sufficient or ample and market pricing seems competitive
- Change in the operational framework from a supply driven to a demand driven floor could be viewed as beneficial during the ongoing transition to lower excess liquidity levels
- What is driving the demands for liquidity reserves?
 Potential drivers:
 - o Regulators & internal requirements
 - o LCR, NSFR
 - other prudential regulations
 - intra-day requirements
 - liquidity preferences
 - Increased fragmentation within Eurozone
 - Increased scarcity in collateral
 - Investors
 - Rating agencies
 - Reputation & Stigma

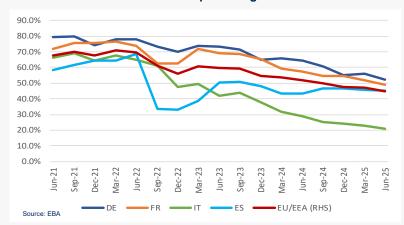
Deutsche Bank

Source: ECB

Reserve Demand in Europe

- Excess liquidity continues to decline in absolute terms and as multiple of MRR, albeit at a lower pace in certain countries
- Cash as % of HQLA keeps reducing as reserves fall across all countries
- LCR remained stable though could potentially fall as funding cost raise on a lower reserve environment
- UK market ahead of Europe as decline in reserves already triggering wider repo spreads and growing STR usage.

Reserves as a percentage of HQLA

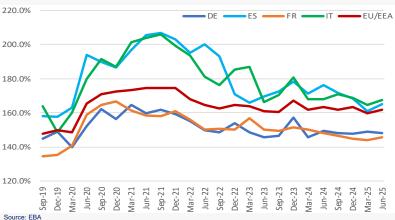


Reserve demand scenarios

Scenarios	LCR Target	Reserves/ HQLA
Upper	150%	30%
Mid	130%	25%
Lower	130%	10%

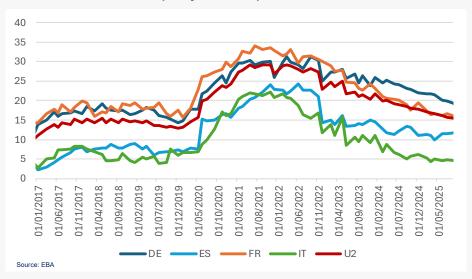
Source: Towards a new Eurosystem balance sheet ECB Money Market Conference – 6th Nov 2025

Euro Zone Banks LCR Evolution

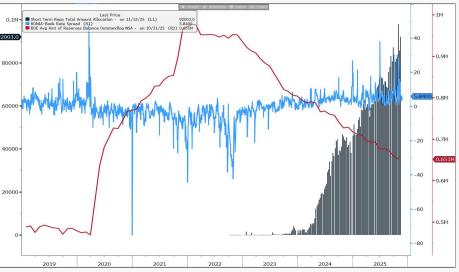


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Excess liquidity as a multiple of MRR



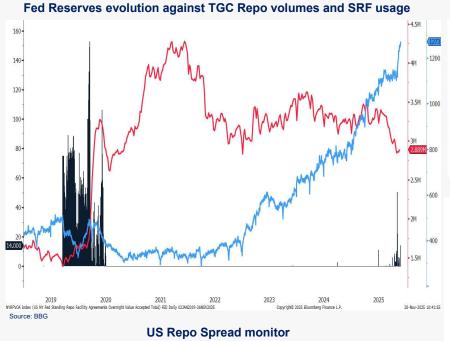
GBP Repo spreads vs BoE Rate against BoE Reserves and STR usage

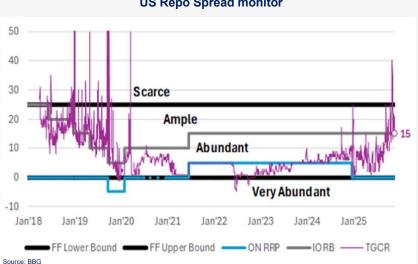


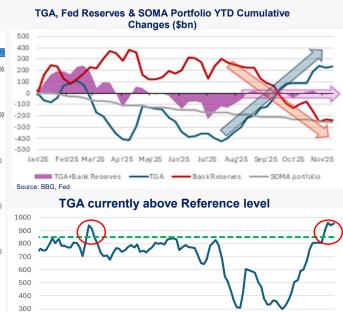
Source: BBG

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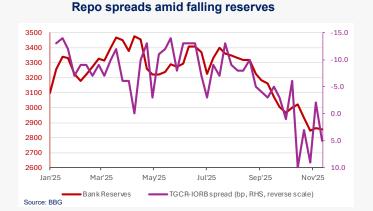
Reserves and repo trends in US







100



\$850bn reference level

- Repo market recently started to become elastic to changes in supply and demand of reserves at a level of \$2.9trn, significantly above levels seen in 2019 (even adjusted by GDP growth).
- SRF usage currently limited compared to usage seen in 2019, as repo traded above Upper Bound just a few days.
- Significant pick up in GC Repo volumes (>50% YTD).
- Repo spreads have widened as reserves have declined though trading between IORB and Upper Bound, suggesting reserves still not scarce in US.
- Reduction in reserves in the last quarter triggered by sharp increase in TGA, partially driven by US shutdown.
- YTD reduction in SOMA portfolio largely offset by decrease in usage of ON RRP facility



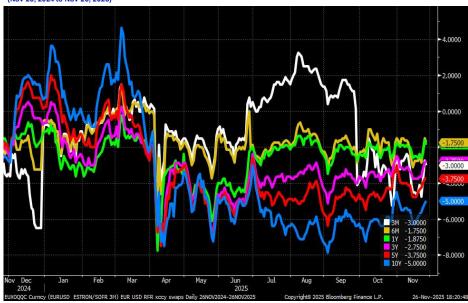
Reserve Demand: USD





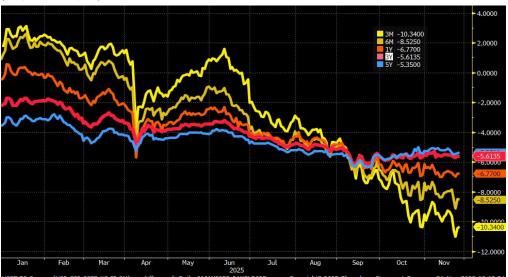


€/\$ XCCY spot basis spreads (Nov 26, 2024 to Nov 26, 2025)



Source: Bloomberg LLP

(Jan 1, 2025 to Nov 26, 2025)



- USD funding markets have signaled that bank reserves are no longer "abundant", with repo rates (GC) traded above the rate paid by the Fed on Bank reserves
- This has had the additive effect of pulling up the Fed Effective Rate, drawing it towards IORB
- In direct response, the Fed has signaled an end to QT effective Dec 1, 2025 and have messaged that they will be active in US Treasury bill purchases by re-investing maturing MBS proceeds
- €/\$ XCCY spot basis swap spreads do trade in a relatively tight range, affected by Issuance flow activities, no material outbreaks and outliers so far going into year end 2025 (spot spreads currently lead and affect forward spreads)
- \$ term FF/SOFR basis spreads especially in the short end have widened quite a bit since Sep 2025
- EUR funding markets do not yet seem to be affected by any spillover from the USD markets → close monitoring is recommended

Source: Bloomberg LLF

2025 Year-End Funding

Any tensions?



- Liquidity conditions in the EUR funding markets despite ongoing QT by the ECB do currently indicate limited to no stress going into year-end 2025
- EUR Repo markets over year-end do show signs of potentially lower availability of balance sheet
- Volatility in €STR fixings at QE has reduced over the last few QEs
- ➤ USD ME and YE effects in \$ repo markets possible
- ➤ €/\$ FX and XCCY markets going into year-end are relatively stable but market participants should continue to be vigilant and monitor any signs of spikes
- Meeting regulatory and internal requirements around financial resources could result in increased volatility and spikes in FX and IR markets on short notice



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