

Credit Market Strategist

The 6.3% IG yield vs. returns

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Following the strong September Payrolls report (see <u>US Watch: September employment</u>) we estimate IG yield is approaching 6.3% – the highest level since October 2002 excluding the global financial crisis. That make IG attractive for two reasons. First, our rates strategists expect more limited upside risks to Treasury yields due to the negative impact on stock prices and less room to price out Fed cuts (see Global Rates Weekly: Yield or fight on). Second, higher yields mean a bigger cushion against mark-to-market losses. We estimate the current break-even yield increase of 112bps for IG total returns over the next 12M. Hence IG should deliver a positive total return if 10yr Treasury yield remain below 5.9% by Oct-2024 (assuming no change in spreads). The attractive yields support our bullish near-term view on IG spreads (see The end of the selloff).

The 129bps spread vs. excess returns

While spreads are nowhere near historically wide levels, at 129bps they offer a sizeable cushion as well, particularly given our outlook for IG spreads to remain resilient in either re-acceleration (see <u>Credit Market Strategist</u>: It's the economy, stupid) or recession (see <u>Credit Market Strategist</u>: To BBB, or not to BBB) scenarios. We estimate a 12M breakeven spread widening of 26bps. The implied break-even spread of 155bps is not far from the 171bps wides from 2022, which we think we are unlikely to reach in 2024.

The end of the selloff

IG corporate index spread is 10bps wider from the tights. We find this an attractive buying opportunity.

144As in US Agg

144A bonds could add \$1.4tr to the \$6.0tr current index, increasing the size by 24%.

September IG ratings: Positive

Net ratings upgrades for IG bonds in September were positive at +\$46bn.

Sep '23 Monthly HG Market Review: Rates shock

The ICE BofA US IG index spread widened 1bps, for an excess return of +16bps.

Higher M&A volumes in September

North American M&A announcements accelerated to \$155bn in September.

IG market technicals

Supply: \$8.9bn of issuance this week, expect \$10-15bn next week **Flows**: -\$0.13bn inflow this past week ending on October 4. **Weekly technicals**: expect \$2.6bn of coupon payments to become effective next week. Bond maturities: \$19.4bn this week, \$3.9bn next week. **Dealer inventories**: -\$3,150mn past week ended Thu. Details inside.

We published the weekly CMS data and charts in Situation Room.

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Credit Strategy United States

Data Analytics



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Recent credit strategy research

Publication	Name
Situation Room	Situation Room: Outflows stop
	for HG but not for HY
Situation Room	Situation Room: The end of the
	<u>selloff</u>
Situation Room	Situation Room: 144As in US
	Agg
Monthly HG	Situation Room: Sep '23
Market Review	Monthly HG Market Review:
	Rates shock
Credit Market	Credit Investor Survey: Living
Strategist	the rate shock
Credit Market	Summer 2023 snapshot of US
Strategist	<u>IG market</u>

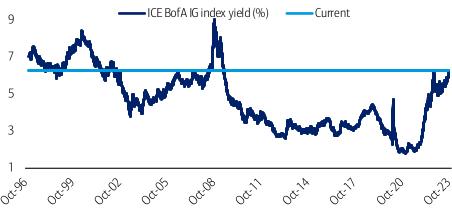
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Refer to important disclosures on page 25 to 27.

The 6.3% IG yield vs. returns

Following the strong September Payrolls report (see <u>US Watch: September employment</u>) we estimate IG yield is approaching 6.3% – the highest level since October 2002 excluding the global financial crisis. That make IG attractive for two reasons. First, our rates strategists expect more limited upside risks to Treasury yields due to the negative impact on stock prices and less room to price out Fed cuts (see Global Rates Weekly: Yield or fight on). Second, higher yields mean a bigger cushion against mark-to-market losses. We estimate the current break-even yield increase of 112bps for IG total returns over the next 12M. Hence IG should deliver a positive total return if 10yr Treasury yield remain below 5.9% by Oct-2024 (assuming no change in spreads). The attractive yields support our bullish near-term view on IG spreads (see Situation Room: The end of the selloff).

Figure 1: The current yield is the highest since October 2002, ex the GFCOutside the Global Financial Crisis (GFC) the current IG corporate index yield is the highest in 21 years.



Source: ICE Data Indices, LLC

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The 129bps spread vs. excess returns

While spreads are nowhere near historically wide levels, at 129bps they offer a sizeable cushion as well, particularly given our outlook for IG spreads to remain resilient in either re-acceleration (see Credit Market Strategist: To BBB, or not to BBB) scenarios. We estimate a 12M breakeven spread widening of 26bps. The implied break-even spread of 155bps is not far from the 171bps wides from 2022, which we think we are unlikely to reach in 2024.



Figure 2: 12M IG break-ever 10yr Treasury yield: 5.9%

The 10yr Treasury yield that would push IG corporate total returns into the negative territory in 12M, or 5.9%, would be the highest since 2000.

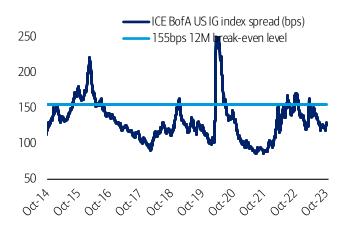


Source: BofA Global Research, ICE Data Indices, LLC

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Figure 3: 12M IG break-even spread: 155bps

The IG spread that would push the excess return into the negative territory in 12M, or 155bps, is near the wide end of the range since 2021.



Source: BofA Global Research, ICE Data Indices, LLC

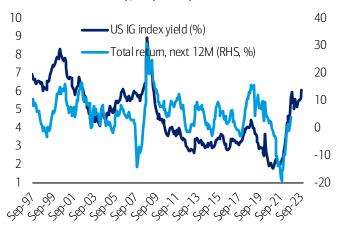
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Yields and total returns

For US IG corporates returns over the next 12M typically follow yields, but the relationship is relatively noisy. The current yield between 6 and 7% historically generated a total return of 6.5% over the next 12 months – in line with delivering the yield income and no price appreciation, on average (Figure 6).

Figure 4: IG total returns vs. yield

Returns over the next 12M typically follow yields.

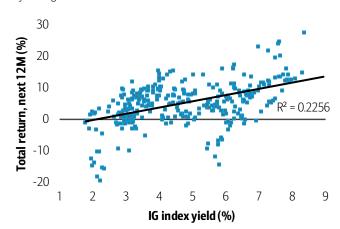


Source: BofA Global Research, ICE Data Indices, LLC

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Figure 5: The relationship between yields and returns

The relationship between yields and subsequent 12M total returns is not very strong.

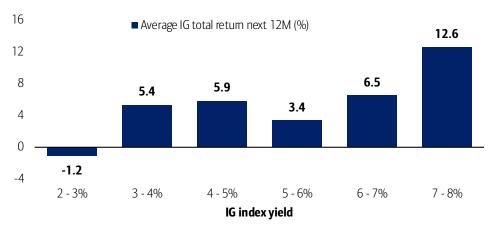


Source: BofA Global Research, ICE Data Indices, LLC



Figure 6: 6-7% IG yield typically leads to 6.5% total return over the next 12M.

Average returns over the next 12M, by starting level of IG corporate yield.



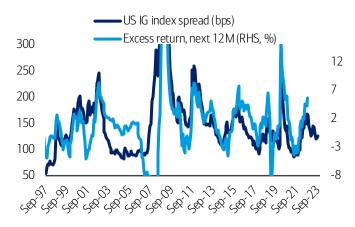
Source: BofA Global Research, ICE Data Indices, LLC

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Spreads and excess returns

The relationship between spreads and excess returns is much tighter compared to yields, suggesting spreads tend to be more mean reverting. The current spread ICE BofA IG index spread of 129bps typically leads to about flat excess return over the next 12 months. However, we think spreads are unlikely to widen more than the breakeven 155bps level in 2024.

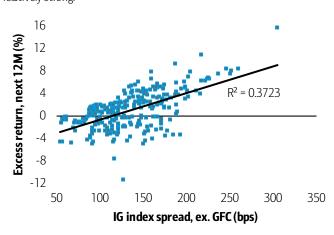
Figure 7: IG excess returns vs. spreadExcess returns over the next 12M tend to follow spreads.



Source: BofA Global Research, ICE Data Indices, LLC

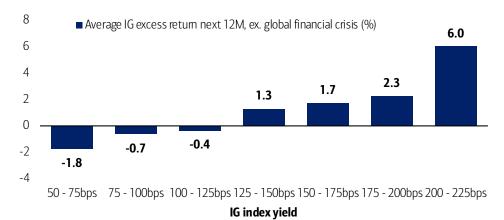
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Figure 8: The relationship between spreads and excess returnsThe relationship between spreads and subsequent 12M excess returns is relatively strong.



Source: BofA Global Research, ICE Data Indices, LLC

Figure 9: IG spreads around 120 – 130bps typically lead to flattish excess return over the next 12M. Average excess return over the next 12M, by starting level of IG corporate spread.



Source: BofA Global Research, ICE Data Indices, LLC

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Previously published here: Situation Room: The end of the selloff

The end of the selloff

Today IG bond spreads closed mixed (rather than wider) for the first time since September 22nd. By now IG corporate index spread is 10bps wider from the tights in late September. We find this an attractive buying opportunity. This is simply because the jump in interest rate vol was the key driver of the spread weakness. However, the big offset for IG spreads is that yields are now even more attractive following the tantrum in Treasury yields. In fact, spreads have already outperformed relative to the big move higher in rates vol (Figure 10). We look for that to continue.

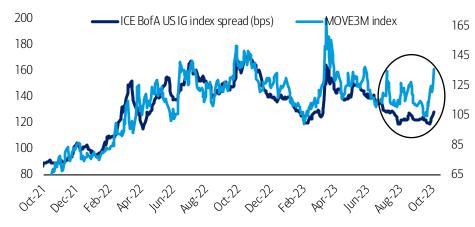
Technicals intact

Technicals for IG corporate market are supportive of spreads currently. First, despite the surge in yields we are not seeing consistent outflows from HG bond funds and ETFs. Following a big outflow last week ending on September 27, flows have been positive so far this week (Figure 11). That would be consistent with flows being resilient vs. poor bond returns so far this year (see Situation Room: Flows follow yields, Figure 12). Second, dealer inventories declined despite investor selling pressures, including in the back end (Figure 13, Figure 14). Third, IG 10s30s spread curves are re-flattening, highlighting strong back-end demand despite the big jump in rates volatility (Figure 15). Fourth, supply should remain subdued given the big jump in yields (Figure 16).



Figure 10: IG spreads have outperformed the big jump in rates vol

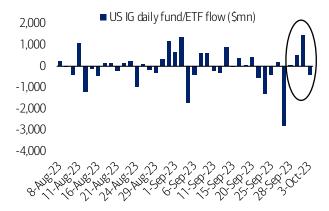
Since July of this year interest rate volatility has remained high relative to IG spreads, especially in October.



Source: Bloomberg, ICE Data Indices, LLC.

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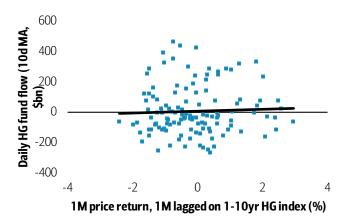
Figure 11: Flows turned positive so far this week starting on Sep 28Net inflow to HG funds / ETFs since Wed September 27 was +\$1.6bn.



Source: BofA Global Research, EPFR Global

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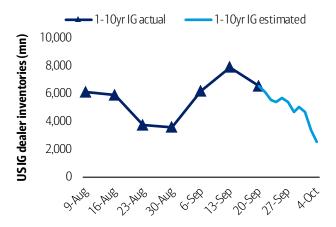
Figure 12: Flows did not follow returns: Apr-2023 to Sep-2023.During this period flows and returns show no correlation. In prior years flows typically followed returns.



Source: BofA Global Research, EPFR Global, ICE Data Indices, LLC

Figure 13: Dealer inventories: 1-10yr bonds

Dealer inventories have declined in the second half of September and into October, based on TRACE data.

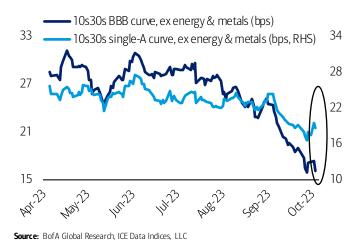


Source: BofA Global Research, NY Fed, TRACE.

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Figure 15: 10s30s IG spread curves are re-flattening

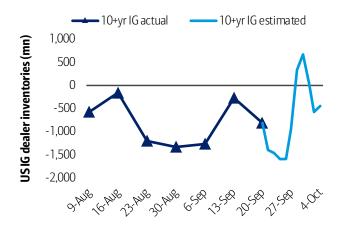
We estimate 10s30s IG spread curves flattened again over the past few days.



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Figure 14: Dealer inventories: 10+yr bonds

Dealer inventories of 10+yr bonds peaked on Sept 29 and have since declined, based on TRACE data.

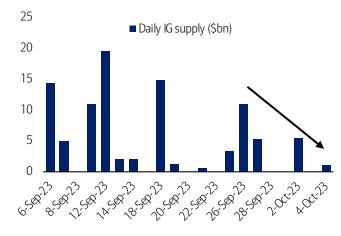


Source: BofA Global Research, NY Fed, TRACE.

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Figure 16: IG supply has been subdued this week

While supply has been modest due to market volatility this week, it should remain subdued in October on the big jump in borrowing costs.



Source: BofA Global Research

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Previously published here: Situation Room: 144As in US Agg

144As in US Agg

Bloomberg Index will be conducting annual consultations on potential rule changes in October and November. This year the list of topics includes the question on the inclusion of 144A for life IG corporate bonds in the US Aggregate index. At this point the degree of support for the proposal is not clear. However, a very large impact of this potential change is one reason why the adoption is unlikely, at least in the near term. 144A bonds could add \$1.4tr, or 24%, to the current \$6.0tr index.



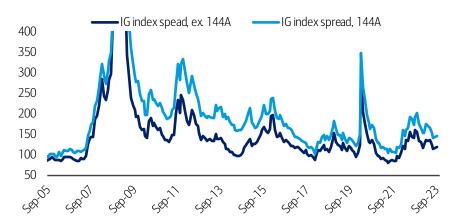
Potential impact on spreads

The average spread on 144A issuer bonds is 25bps wider relative to registered issuer bonds (Figure 17). Adjusting for rating and maturity we estimate an even larger difference of 28bps. Clearly, should the rule be adopted, 144A bond spreads could compress.

Potential on composition and liquidity

The average issuer size is smaller for 144A bonds (\$3.1bn) relative to registered (\$8.0bn, Figure 18). 144A issuers also tend be less liquid, with average daily issuer trading volume of \$8.7mn for 144A issuers vs. \$21.3mn for registered (Figure 19). Most 144A bonds are from Yankee issuers (73%), compared to just 17% for registered bonds (Figure 20, Figure 21). Finally, the share of 144A US IG bonds increased from about 15% prior to the global financial crises to about 20% currently. Their growing importance could be one reason for the US Agg index inclusion. Finally, we list the largest 144A issuers in Figure 26.

Figure 17: The average spread on 144A bonds is currently 25bps wider vs. registered bonds Adjusting the difference by rating and maturity we estimate 144A bonds are 27bps wider vs. registered.



Source: BofA Global Research, ICE Data Indices, LLC

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Figure 18: 144A issuers are smaller... The average issuer size for registered issuers (\$8.1bn) is larger than that for 144A issuers (\$3.1bn).

Average issuer size (\$bn)

8.0

Registered

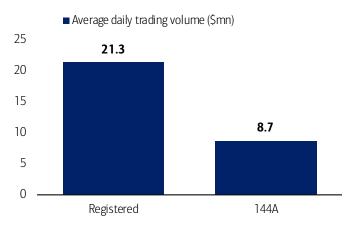
144A

Source: BofA Global Research, ICE Data Indices, LLC

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Figure 19: ... and less liquid

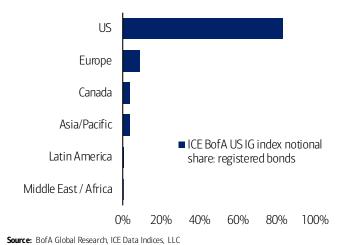
The average daily trading volume for registered issuers (\$21.3mn) is above that for 144A issuers (\$8.7mn).



Source: BofA Global Research, TRACE.

Figure 20: Registered bonds are mostly from US issuers

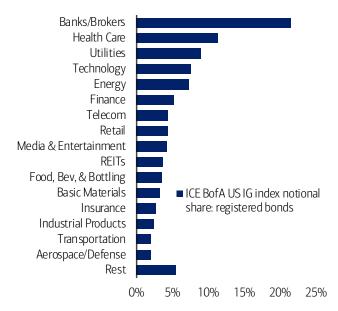
US domiciled issuers account for 83% of IG registered bonds.



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Figure 22: Registered bonds by sector

The largest sectors for registered bonds are Banks, Health Care and Utilities.

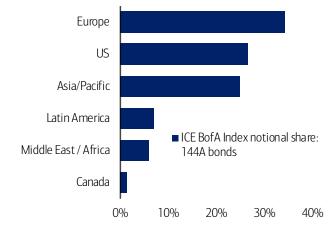


Source: BofA Global Research, ICE Data Indices, LLC

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Figure 21: 144A bonds are mostly from Yankee issuers

The largest regions for US IG 144A bonds are Europe (34%), US (27%) and Asia (25%).

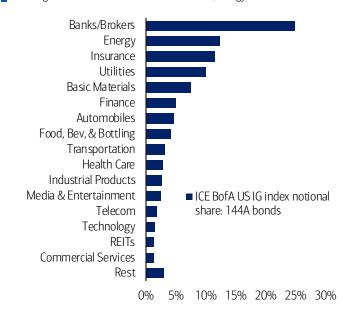


Source: BofA Global Research, ICE Data Indices, LLC

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Figure 23: 144A bonds by sector

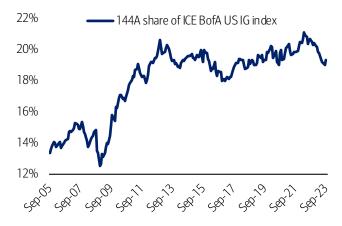
The largest sectors for 144A bonds are Banks, Energy and Insurance.



Source: BofA Global Research, ICE Data Indices, LLC

Figure 24: 144A bond share of ICE BofA US IG index

The share of 144A bonds in ICE BofA US IG index is currently 19%, up from about 15% prior to the Global Financial Crisis.



Source: BofA Global Research, ICE Data Indices, LLC

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Figure 25: 144A bonds tend to trade wider

The average spread on 144A bonds is currently 25bps wider relative to registered bonds, but was as much as 100bps wider in 2013.



Source: BofA Global Research, ICE Data Indices, LLC

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Figure 26: Largest 144A issuers in ICE BofA US IG corporate index

The top three 144A issuers are UBS, BNP and Socgen.

Ticker	lssuer	Sector	Avg spread (bps)	Index notional (\$bn)	LTM daily trading vol (\$mn)
UBS	UBS AG	Banks/Brokers	155	55.7	131.6
BNP	BNP Paribas SA	Banks/Brokers	132	33.3	90.9
SOCGEN	Societe Generale S.A.	Banks/Brokers	192	27.8	60.4
STANLN	Standard Chartered PLC	Banks/Brokers	139	26.4	44.9
ARAMCO	Saudi Arabian Oil Company	Energy	112	21.5	11.4
NESNVX	Nestle Holdings Inc.	Food, Bev, & Bottling	49	20.3	33.5
BPCEGP	BPCE SA	Banks/Brokers	152	20.2	34.6
MQGAU	Macquarie Group Ltd.	Banks/Brokers	141	20.2	24.0
SINOPE	Sinopec Group	Energy	68	18.8	4.6
TENCNT	Tencent Holdings Ltd.	Media & Entertainment	140	18.6	10.2
ENELIM	ENEL	Utilities	161	18.5	47.7

Source: BofA Global Research, ICE Data Indices, LLC

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This is an excerpt from the following report Situation Room: Sep '23 Monthly HG Market Review: Rates shock 02 October 2023

Sep '23 Monthly HG Market Review: Rates shock

The big increase in Treasury yields drove market returns in September. In the first half of the month the rise in rates was view as benign and a reflection of the strong US economy. Interest rate volatility declined, equity prices remained resilient, and IG spreads reached YtD tights. However, the FOMC on September 20th signaled the Fed viewed rates as insufficiently restrictive (see Global Rates Weekly: High & tight). Hence the further jump in Treasury yields in the second half of September led instead to higher



implied interest rate volatility, lower stock prices, and eventually wider spreads (Figure 28, Figure 29)

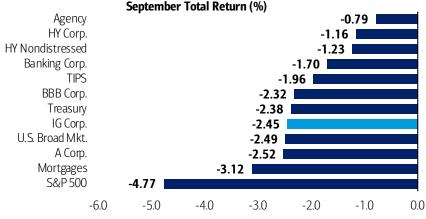
Losses across the board

Higher rates, lower stocks in September led to losses across all broad asset classes during the month. Equities (-4.77%) underperformed in terms total return, followed by IG corporates (-2.45%) and Treasuries (-2.38%). High yield (-1.16%) outperformed due to relatively shorter duration.

IG index spread 1bps wider in September

The ICE BofA US IG index spread widened 1bps in September for an excess return of +16bps. The October monthly rebalancing added 2bps to the index spread, bringing it to 125bps. September top performing sectors in terms of excess returns were the longer-duration Railroads (+58bps), Pipelines (+57bps) and Utilities (+56bps). Underperforming sectors were the shorter and more liquid Banks/Brokers (-26bps), as well as Retail-Discounters (-9bps) and Consumer Products (-7bps).

Figure 27: Broad Asset Class Total Return Performance, September 2023 Equities underperformed in September, followed by IG corporates.



Source: BofA Global Research, Bloomberg, ICE Data Indices, LLC

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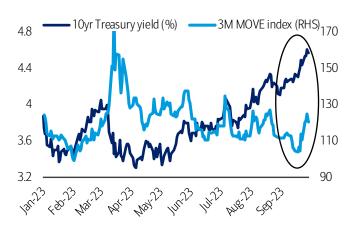
Outlook

IG spreads should remain resilient as long as the problem is higher rates (see <u>Credit Market Strategist</u>: <u>Fluid rate dynamics</u>). The big jump in interest rate volatility has clearly been negative for spreads more recently. However, lower stocks and more attractive yields should eventually slow down the selloff in interest rates and the corresponding jump in implied rates vol. Hence, we expect IG spreads to trade in a relatively tight range in October.



Figure 28: Higher rates, higher rates vol in the second half of September

Interest rates increased throughout September, interest rate implied volatility first declined, but then increased in the second half of the month.

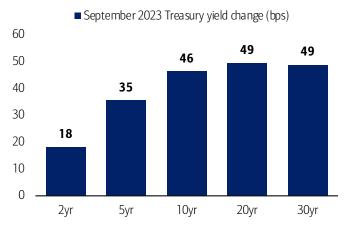


Source: Bloomberg

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Figure 30: Treasury yield curve bear steepened in September

Treasury yields jumped 18, 46 and 49bps for 2yr, 10yr and 30yr Treasuries, respectively.

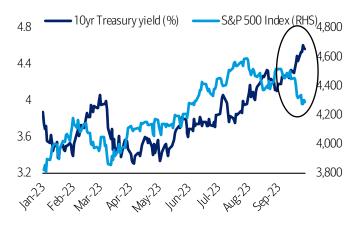


Source: BofA Global Research, Bloomberg

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Figure 29: Higher rates, weaker stocks

 $S\&\!P$ 500 index price declined in the second half of September as interest rate volatility increased.



Source: Bloomberg

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Figure 31: Fewer Fed cuts in 2024

Market pricing for Fed cuts in 2024 dropped from 119bbps on August 31st to 81bps on September 29.



Source: BofA Global Research, Bloomberg

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Figure 32: High Grade Sector Views Summary

US IG credit strategy sector views matrix

Overweight	View	Market weight	View	Underweight	View
Banks/Brokers	Over	Automobiles	Market	Aerospace/Defense	Under
Insurance	Over	Media & Entertainment	Market	Basic Materials	Under
Life Insurance	Over	Railroads	Market	Chemicals	Under
P&C & Reinsurance	Market	Tobacco	Market	Metals & Mining	Market
Energy	Over	Technology	Market	Paper and Forest Products	Under
Oil & Gas	Market			Consumer Products	Under
Pipelines	Over			Food, Bev, & Bottling	Under
Health Care	Over			Industrial Products	Under
REITs	Over			Retail	Under
Telecom	Over			Discounters	Under
Utilities	Over			Non-Discounters	Under

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Source: BofA Global Research

This is an excerpt from the following report: Situation Room: 144As in US Agg 03 October 2023

September IG ratings: Positive

Net ratings upgrades for IG bonds in September were positive at +\$46bn (upgrades less downgrades, notional * notches). That's up from -\$2bn net upgrade in August and \$46bn in July. Positive rating actions for Autos, Banks and Utilities were impacting the monthly totals the most this month.

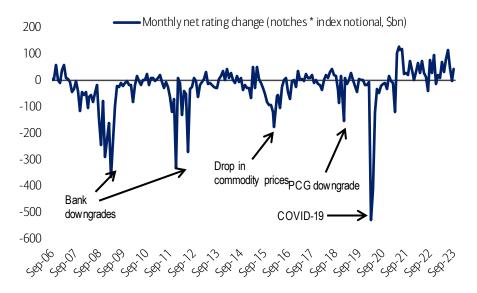
Slower rating activity

Gross rating activity (upgrades + downgrades) moderated in August to \$88bn – above the \$146bn median over the prior 12 months. However, rating upgrades made up 74% of the total, up from merely 49% in August and at the 74% median over the past 12 months.

Outlook: typical for upgrades, subdued for downgrades

The outlook continues to call for a moderating pace of rating upgrades. The share of IG index bonds on a positive outlook or watch was steady at 1.5% in September relative to August, but is down from 3.0% in March of this year. The share on a negative outlook / watch increased to 2.2% in September but remains very low relative to history.

Figure 33: The pace of net rating upgrades turned negative in SeptemberNet upgrades peaked at record \$116bn average monthly pace from Apr to Jul 2021, before slowing in 2022 and into 2023.



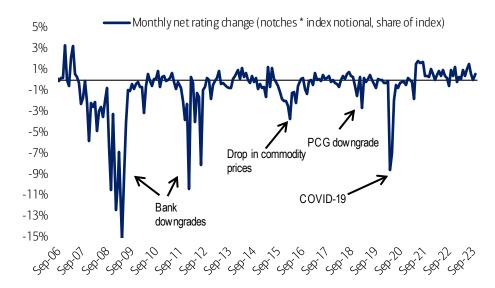
Note: net rating change equals upgrades less downgrades. Based on the average of Moody's, S&P and Fitch, if available. We also include the watch as 2/3 of a notch and the outlook as 1/3 of a notch. Restricted to DM bonds in ICE BofA IG corporate index COAO.

Source: BofA Global Research, Bloomberg.



Figure 34: Net upgrades increased slightly to 0.1% of index notional in September

Net downgrades peaked at 8.6% of index notional in March 2020 before rebounding to 1.9% peak net upgrade in May 2021.



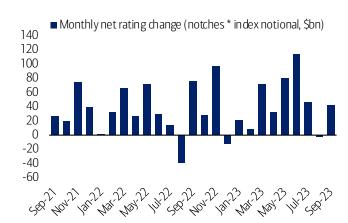
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Source: BofA Global Research, Bloomberg.

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Figure 35: The pace of net upgrades was low in September

Net upgrades increased to +\$42bn in September from -\$2bn in August, above the \$37bn monthly median over the past 12 months.

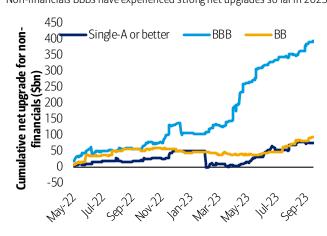


Note: based on the average of Moody's, S&P and Fitch, if available. We also include the watch as 2/3 of a notch and the outlook as 1/3 of a notch. Restricted to DM bonds in ICE BofA IG corporate index COAO

Source: BofA Global Research

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Figure 36: Cumulative net upgrade for non-financials by rating (\$bn) Non-financials BBBs have experienced strong net upgrades so far in 2023



Source: BofA Global Research, Bloomberg.



Figure 37: Gross rating actions moderated in September

Gross rating actions decreased to \$88bn in September from \$160bn in August.



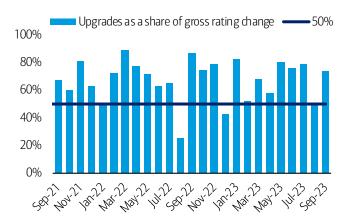
Note: based on the average of Moody's, S&P and Fitch, if available. We also include the watch as 2/3 of a notch and the outlook as 1/3 of a notch. Restricted to DM bonds in ICE BofA IG corporate index COAO

Source: BofA Global Research

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Figure 38: Upgrades outweighed downgrades in August

Upgrades accounted for 74% of total rating actions in September– the LTM median being 74%.



Note: based on the average of Moody's, S&P and Fitch, if available. We also include the watch as 2/3 of a notch and the outlook as 1/3 of a notch. Restricted to DM bonds in ICE BofA IG corporate index COAO

Source: BofA Global Research

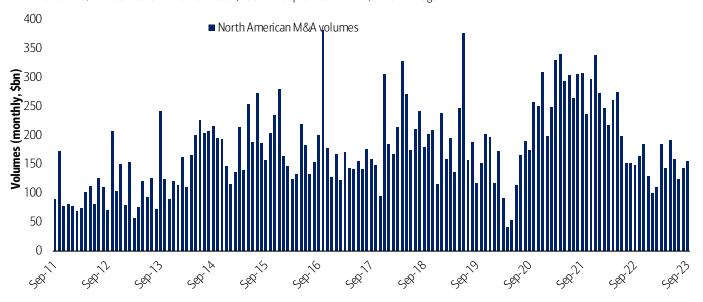
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Higher M&A volumes in September

North American M&A announcements accelerated to \$155bn in September, up from \$144bn in August (Figure 39). The pipeline of announced deals with potential IG funding implications also increased to \$385bn in September from \$329bn in August (deal NAV, Figure 40). M&A-related IG issuance increased modestly to \$11.5bn in September from \$8.0bn in August, but remained down from the very high \$40.5bn priced in May (Figure 41). See details of the current deal list in the Pipeline of M&A deals with IG issuance implications section.

Figure 39: Monthly North American M&A volumes

North American M&A announcement volume rose to \$155bn in September from to \$144bn in August.



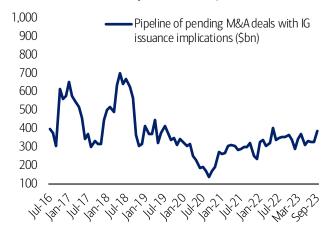
Note: limited to pending and closed deals only. Cancelled deals are excluded.

Source: Bloomberg



Figure 40: Pipeline of pending M&A deals with IG funding implications

The pipeline of pending M&A deals with US IG funding implications remained increased moderately to \$385bn in September.

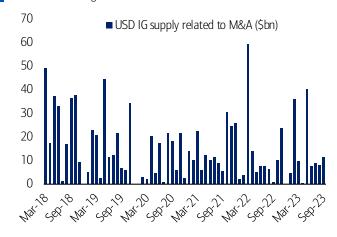


Source: BofA Global Research, Bloomberg

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Figure 41: US IG M&A related supply

US IG M&A-related supply remained modest at 11.5bn in September, up from 8.0bn in August.



Source: BofA Global Research

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Pipeline of M&A deals with IG issuance implications

Enbridge (ENBCN) announced on September 5 2023 the agreement with Dominion to acquire utility assets for \$14bn. The company expects to find a portion of the transaction with senior unsecured bonds, see: Enbridge Inc: ENBCN to acquire gas utility assets for US\$14b; leverage intact = remain OW 06 September 2023.

Microsoft (MSFT) announced the acquisition of Activision Blizzard (ATVI) on January 18 2022. Our analyst Jason Kilgariff thinks MSTF could issue \$20-30bn to fund the deal (see: <u>High Grade Telecom, Media & Technology Weekly: The TMT Weekly Rewind 18</u> January 2022)

Kroger (KR). On October 14 2022 Kroger announced it entered into a definitive agreement to acquire Albertsons Cos (ACI) in an all-cash transaction for \$34.10/share. Our analyst Brian Callen expects the deal to be funded with \$15bn of new debt, including \$10-11bn of bonds and \$4-5bn term loans (see Kroger Co.: Stocking the cart: re-leveraging for rival 17 October 2022).

Our criteria for inclusion in the list of announced deals consists of deals at least \$1bn in size (in terms of EV) announced by USD high grade issuers. We further restrict the list to deals with a cash component, suggesting to us that the company may choose to fund all or portion of that cash component in the high grade bond market. Finally, the list excludes deals that have already been funded in the corporate bond market, deals that have been rejected by regulators and those that have closed.

Figure 42: M&A deals with potential high grade bond funding needs

A list of pending M&A deals with potential IG bond funding implications

Deal	_			
announcement	•			
date	Ticker	Acquirer Name	Target Ticker	Target Name
1-Sep-21	BARC LN	Barclays PLC	n.a.	US Credit Card Portfolio
13-Jul-22	RPRX US	Royalty Pharma PLC	2105326D US	Theravance Respiratory Co LLC
28-Feb-22	WPC US	WP Carey Inc	CPYA US	Corporate Property Associates
20-Sep-22	WBA US	Walgreens Boots Alliance Inc	1717936D US	Shields Health Solutions Holdi
16-Apr-23	MRK US	Merck & Co Inc	RXDX US	Prometheus Biosciences Inc

Figure 42: M&A deals with potential high grade bond funding needs

A list of pending M&A deals with potential IG bond funding implications

Deal				
announcement	Acquirer			
date	Ticker	Acquirer Name	Target Ticker	Target Name
28-Oct-22	NEE US	NextEra Energy Inc	n.a.	Portfolio of operating landfil
6-Mar-23	O US	Realty Income Corp	n.a.	415 single tenant convenience
26-Jun-23	IBM US	International Business Machin	e APTI US	Apptio Inc
12-Jun-23	NOVN SW	Novartis AG	KDNY US	Chinook Therapeutics Inc
11-Jul-23	BRK/A US	Berkshire Hathaway Inc	118905Z US	Cove Point LNG LP
28-Jul-23	BIIB US	Biogen Inc	RETA US	Reata Pharmaceuticals Inc
27-Apr-23	SUCN	Suncor Energy Inc	2253611D CN	TotalEnergies EP Canada Ltd
18-Jan-22	MSFT US	Microsoft Corp	ATVI US	Activision Blizzard Inc
17-Jun-22	UNH US	UnitedHealth Group Inc	EMIS LN	EMIS Group PLC
26-May-22	AVGO US	Broadcom Inc	VMW US	VMware Inc
21-Oct-20	AGR US	Avangrid Inc	PNM US	PNM Resources Inc
15-Sep-22	ADBE US	Adobe Inc	1349863D US	Figma Inc
26-Apr-23	CARR US	Carrier Global Corp	2253458D GR	Viessmann Climate Solutions SE
16-Aug-23	DINO US	HF Sinclair Corp	HEP US	Holly Energy Partners LP
7-Aug-23	CPB US	Campbell Soup Co	SOVO US	Sovos Brands Inc
14-Oct-22	KR US	Kroger Co/The	ACIUS	Albertsons Cos Inc
12-Apr-23	EMR US	Emerson Electric Co	NATI US	National Instruments Corp
11-Sep-23	SJM US	J M Smucker Co/The	TWNK US	Hostess Brands Inc
26-Jun-23	UNH US	UnitedHealth Group Inc	AMED US	Amedisys Inc
13-Jun-23	BG US	Bunge Ltd	1882583D NA	Viterra Ltd
17-Aug-23	BA/LN	BAE Systems PLC	n.a.	Aerospace unit/Ball Corp
12-Sep-23	SKG LN	Smurfit Kappa Group PLC	WRK US	Westrock Co
21-Sep-23	CSCO US	Cisco Systems Inc	SPLK US	Splunk Inc
10-Aug-23	TPR US	Tapestry Inc	CPRI US	Capri Holdings Ltd
5-Sep-23	ENB CN	Enbridge Inc	508695Q US, STR1 US, 0001231D US, 6659484Z US	5 Public Service Co of North Carolina Inc, Questar Gas Co, The East Ohio Gas Co, We
15-Jan-22	4614Z US	Mars Inc	1618192D US	NomNomNow Inc
5-Aug-22	AMZN US	Amazon.com Inc	IRBT US	iRobot Corp
21-Nov-22	NSC US	Norfolk Southern Corp	2210036D US	Cincinnati Southern Railway Co
13-Mar-23	1990508D K	Y Olympus Water Holding TLP	1524092D US	Diamond BC BV
28-Aug-23	DHR US	Danaher Corp	ABCM US	Abcam PLC
13-Sep-23	TMUS US	T-Mobile US Inc	n.a.	600MHz spectrum/Comcast Corp
Course Plaambarg				

Source: Bloomberg

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Flows

Outflows stop for HG but not for HY

Outflows from US HG bond funds and ETFs almost stopped to -\$0.13bn this past week ending on October 4, from a record -\$3.70bn outflow in the prior week. This increase was mainly due to outflows from HG ETFs stopping (to +\$0.10bn from -\$2.31bn) but also to outflows moderating for HG Funds (to -\$0.23bn from -\$1.39bn). Outflows from short-term HG moderated (to -\$0.86bn from -\$1.08bn), while flows to ex. short-term turned positive (to +\$0.73bn from -\$2.62bn).

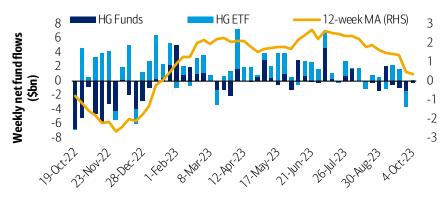
Flat for stocks

Flows to stocks were near flat this past week with a ± 1.17 bn inflow, after recording a ± 57.61 bn inflow the previous week. Outflows remained strong for high yield (to ± 52.80 bn from ± 53.21 bn) and moderated for munis (to ± 50.74 bn from ± 51.30 bn). Outflows were also at a record for global EM bonds (to ± 52.99 bn from ± 51.71 bn) and for loans this past week (to ± 50.69 bn from ± 50.20 bn). Finally, money markets reported a ± 564.62 bn inflow this past week, following a ± 51.44 bn outflow a week earlier.



Figure 43: Weekly high grade fund flows, \$bn

HG ETF +\$0.10bn, HG Funds -\$0.23

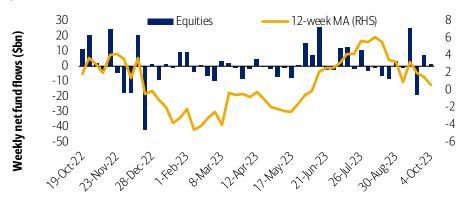


EPFR Global. Note: data are for US-domiciled funds only.

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Figure 44: Weekly equity fund flows, \$bn

Equities +\$1.17bn



EPFR Global. Note: data are for US-domiciled funds only.

Figure 45: Fund flows summary

YTD fund flows summary by asset class

Asset class	Last week (% of AUM for weekly reporting funds/ETFs)	YTD (% of AUM for all funds/ETFs)	YTD (\$bn)
High grade: total	-0.01%	4.2%	151.7
High grade: ex short-term	0.05%	8.1%	223.5
High yield: total	-1.23%	-2.1%	-6.8
High yield: ETFs only	-3.08%	-11.5%	-7.6
Loans	-0.84%	-9.9%	-11.9
EM	-0.66%	-2.5%	-15.6
Munis	-0.16%	0.9%	8.2
All fixed income	-0.04%	4.0%	242.0
Money markets	1.06%	17.4%	928.9
Equities	0.01%	-0.3%	-49.4

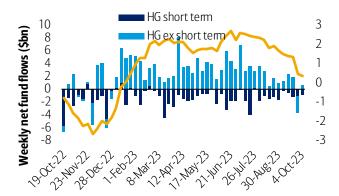
Note: Last week flow as % of AUM is based on AUM for weekly reporting funds / ETFs only. YTD flow as % of AUM is based on AUM for the full fund/ ETF universe as of December 31 2020. Global EM funds, US-domiciled funds only for other fund types.

Source: EPFR Global, BofA Global Research

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Figure 47: Weekly high grade fund flows, \$bn

HG short-term -\$0.86bn, HG ex short-term +\$0.73

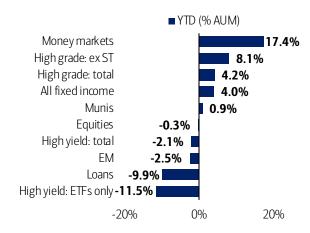


EPFR Global. Note: data are for US-domiciled funds only

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Figure 46: Year to date fund flows, % of AUM

HY ETFs have had the biggest outflows so far in 2023.



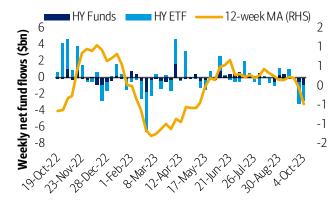
Note: Global EM funds, US-domiciled funds only for other fund types.

Source: EPFR Global, BofA Global Research

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Figure 48: Weekly high yield fund flows, \$bn

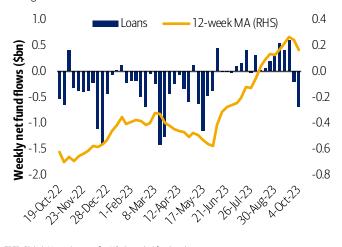
HY ETFs -\$1.87bn, HY funds -\$0.94



EPFR Global. Note: data are for US-domiciled funds only.

Figure 49: Weekly loan fund flows, \$bn

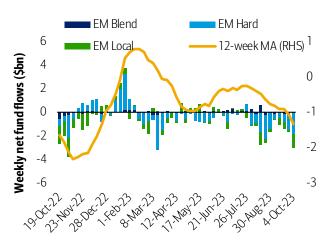
Leveraged loans -\$0.69bn



EPFR Global. Note: data are for US-domiciled funds only.

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Figure 50: Weekly EM fund flows, \$bn Global EM bonds -\$2.99bn



EPFR Global. Note: data are for US-domiciled funds only.

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Appendix: defining high grade

We define our high grade flows metric as a combination of "bond" and "corporate bond" fixed income funds and ETFs domiciled in the US (and investing in any currency, although the majority is invested in USD). We also exclude funds primarily focused on Government, HY, EM and MBS from the sample. The "bond" category refers to the broad high grade market, which includes Treasuries, mortgages and agencies in addition to corporate bonds. This category accounts for the majority of AUM and flows. On the other hand the dedicated corporate bond funds and ETFs are much smaller in terms of assets under management. We also include the "total return" bond category in our tracking of high grade flows. Finally note that "short-term" maturity refers to duration of 0 to 4 years.

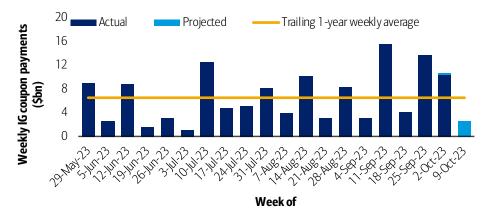
Weekly technicals

The US IG corporate bond market is expected to generate \$2.6bn in coupon payments next week, below the trailing 1-year weekly average of \$6.5bn (Figure 51). In addition, \$0.9bn of calls were settled and paid this week. Bond maturities: \$19.4bn this week, \$x3.9bn next week.



Figure 51: Weekly USIG coupon payments

Expect \$2.6bn of coupon payments next week, below the \$6.5bn trailing 1-year weekly average.



Source: ICE Data Indices, LLC, BofA Global Research

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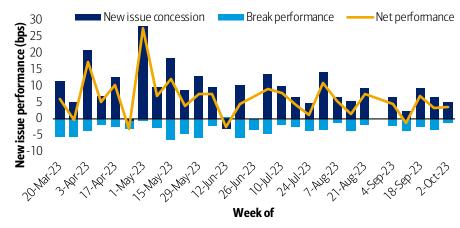
Supply

US IG gross issuance totaled \$8.9bn this week, consisted of \$1.0bn financials, \$4.9bn high-quality industrials and \$3.1bn BBB industrials. Given \$1000.9bn of gross issuance, \$581.8 bn of maturities, net issuance is tracking \$358.7 bn YTD. The further increase in interest rates following the strong Jobs report should weigh on issuance volumes next week, in addition to the short week and many companies remaining in issuance blackouts due to the 3Q earnings reporting season. Hence, we look for a moderate \$10-\$15bn IG supply next week, slightly less than typical seasonal volume of \$17bn for the second week of Octeber (Figure 53).

New issue performance weakened this week from last week. The average new issue concession decreased to 5.0bps from 6.7bps last week, while the average break performance reduced to 1.4bps tighter this week from 3.5bps tighter last week. As a result, the overall new issue performance, which we measure as new issue concession plus break performance, weakened to 3.6bps this week from 3.2bps tighter last week (Figure 52). This week's new issues are trading 2bps tighter on average from pricing.

Figure 52: Weekly new issue supply performance

For the week of Oct 2 2023: new issue concession = 5.0bps; break performance = -1.4bps; net performance = 3.6bps.

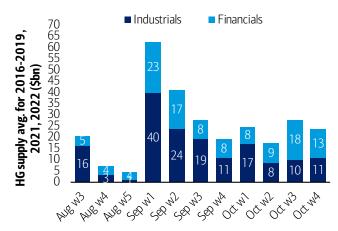


Source: BofA Global Research



Figure 53: Weekly Supply seasonality

Supply volumes pick tend to slow after the $1^{\rm st}$ week of September.

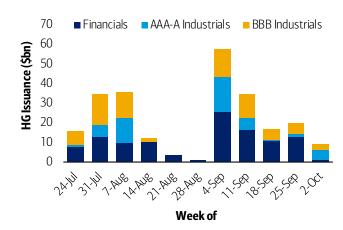


Source: Bloomberg, BofA Global Research

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Figure 54: Weekly Supply

This week's supply consisted of \$1.0bn financials, \$4.9bn high-quality industrials and \$3.1bn BBB industrials.

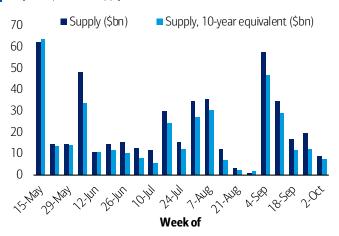


Bloomberg, BofA Global Research

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Figure 55: Weekly gross and 10-year equivalent supply volumes

10-year equivalent supply = \$7.3bn WTD

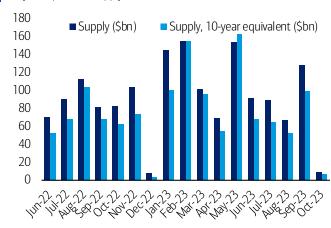


BofA Global Research, Bloomberg

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Figure 56: Monthly gross and 10-year equivalent supply volumes

10-year equivalent supply = \$7.3bn in October



New

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Figure 57: Recent new issue pricing and new issue concessions

List of new issues in the IG corporate bond market today along with performance metrics.

				Size	Moody's/S&P	Coupon	Px Spread	Issue Conc.	* Break	Current spread
Date	Ticker	Name	Tenor	(\$mm)	Rating	(%)	(bps)	(bps)	performance	(bps)
2023-10-02	ACGCAP	Aviation Capital Group LLC	5	500	Baa2/BBB-	6.75	225	-4	-6	217
2023-10-02	DGELN	Diageo Capital PLC	3	800	A3/A-	5.375	60	9	-1	57
2023-10-02	DGELN	Diageo Capital PLC	10	900	A3/A-	5.625	100	4	-5	93
2023-10-02	HNDA	American Honda Finance Corp	2	300	A3/A-	FRN	SOFR+79	n.a.	n.a.	n.a.
2023-10-02	HNDA	American Honda Finance Corp	2	950	A3/A-	5.8	75	n.a.	-7	68
2023-10-02	HNDA	American Honda Finance Corp	7	500	A3/A-	5.85	115	8	-1	112
2023-10-02	KIM	Kimco Realty OP LLC	10	500	Baa1/BBB+	6.4	178	n.a.	n.a.	n.a.
2023-10-02	PEG	Public Service Enterprise Group Inc	5	600	Baa2/BBB	5.875	120	6	0	128
2023-10-02	PEG	Public Service Enterprise Group Inc	10	400	Baa2/BBB	6.125	150	n.a.	1	154
2023-10-04	D	Dominion Energy South Carolina Inc	30	500	Baa2/BBB	6.25	140	n.a.	n.a.	135

Figure 57: Recent new issue pricing and new issue concessions

List of new issues in the IG corporate bond market today along with performance metrics.

202J-10-0 1	ΡIVI	שמועכווו/כאנגעומוונא ווונ	10	JUU	MLIM	U.J	IUJ	ıı.a.	= 1	104
2023-10-05	ATO	Atmos Energy Corp	10	400	A1/A-	5.9	120	11	12	132
2023-10-05	ATO	Atmos Energy Corp	30	500	A1/A-	6.2	133	9	-2	131
2023-10-05	FOXA	Fox Corp	10	1,250	Baa2/BBB	6.5	190	-4	-6	184
2023-10-05	ULS	UL Solutions Inc	5	300	Baa3/BBB	6.5	185	n.a.	n.a.	n.a.

Note: We calculate new issue concessions by estimating the difference between new issue bond spread and interpolated G spread from comparable liquid secondary bonds of the same issuer prior to the new issue deal announcement, adjusted for the spread impact of dollar prices deviating from par. Break performance is computed as the difference between new issue pricing and secondary dosing spread on the first day of trading.

Source: BofA Global Research, Bloomberg

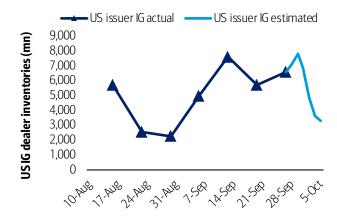
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Dealer inventories

Below we estimate dealer inventories for the IG corporate bonds based on TRACE data. The actual inventories of US issuer bonds based on NY Fed survey, as well as the estimated change since the latest Fed report are plotted in Figure 58 and Figure 59. We estimate the corresponding DV01 equivalent in Figure 59. More details by sector and maturity are available in Figure 60 and Figure 61. Finally, note that the data for the current date is through about 4:40 p.m. Eastern Standard Time.

Figure 58: Estimated dealer inventories of IG corporate bonds.

We estimate IG dealer inventories of US issuer bonds declined to \$3.3bn currently from \$6.6bn on Sep-27.



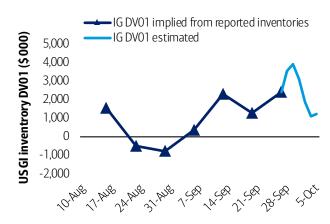
Note: data for US issuer bonds only, maturities 13M or longer. Actual dealer inventory data is from Primary Dealer Statistics survey by the NY Fed. The subsequent change in inventory is estimated based on TRACE.

Source: BofA Global Research, FINRA, TRACE, Federal Reserve

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 $\label{lem:prop:prop:prop:special} \textbf{Figure 59: Estimated dealer inventory DV01 for IG corporate bonds}.$

We estimate IG dealer inventory DV01 of US issuer bonds declined to \$1.2mn currently from \$2.4bn on Sep-27.



Note: data for US issuer bonds only, maturities 13M or longer. Actual dealer inventory data is from Primary Dealer Statistics survey by the NY Fed. The subsequent change in inventory is estimated based on TRACE.

Source: BofA Global Research, FINRA, TRACE, Federal Reserve

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Figure 60: Estimated changes in IG dealer inventories by maturity and broad sector.

We estimate IG dealer inventories declined -\$313mn today and declined -\$3,150mn over the prior week.

	Net d		Net	dealer D	V01 chang	e (\$thous	Trading volumes on 5-Oct-23 (\$mn)							
Sector	5-0ct	4-0ct	1 W	2 W	4 W	5-0ct	4-0ct	1 W	2 W	4 W	Buy	Sell	Dealer	Total
High grade (13M+)	-313	-1,448	-3,150	-2,117	-1,551	148	-756	-1,932	-270	818	10,920	11,232	7,771	29,923
<3yr	-114	-242	-6	-835	-2,611	-24	-42	-46	-221	-514	1,639	1,753	1,437	4,829
3-5yr	-387	-554	-1,290	-1,143	-434	-151	-182	-421	-375	-112	1,522	1,909	1,381	4,812
5-11yr	-215	-506	-1,221	-1,602	264	-34	-281	-553	-858	227	3,649	3,863	2,472	9,984
11+yr	403	-145	-633	1,463	1,230	356	-250	-913	1,185	1,216	4,110	3,706	2,481	10,298
Fin	-189	-865	-852	-102	-231	-48	-453	-495	-123	80	4,256	4,445	2,463	11,163
Non-Fin	-124	-583	-2,299	-2,015	-1,321	195	-303	-1,437	-147	738	6,664	6,788	5,308	18,760
Fixed	-305	-1,482	-3,123	-2,347	-1,859	141	-769	-1,942	-314	740	10,836	11,141	7,734	29,710
Floating	-7	34	-28	230	308	7	13	10	44	77	84	91	37	213

Figure 60: Estimated changes in IG dealer inventories by maturity and broad sector.

We estimate IG dealer inventories declined -\$313mn today and declined -\$3,150mn over the prior week.

		Net d	ealer buy	(\$mn)		Net	dealer D\	/01 chang	e (\$thous	Trading volumes on 5-Oct-23 (\$mn)				
Sector	5-0ct	4-0ct	1 W	2 W	4 W	5-0ct	4-0ct	1 W	2 W	4 W	Buy	Sell	Dealer	Total
US issuers	-327	-1,302	-3,839	-3,549	-2,768	146	-766	-2,281	-1,024	-252	8,563	8,890	6,450	23,902
DM Yankees	27	-212	517	1,019	618	-8	-28	230	559	763	2,067	2,039	1,234	5,340
EM Yankees	-13	67	172	414	599	10	38	119	195	307	290	303	87	681

Note: data for maturities 13M or longer. Changes in inventories are estimated based on TRACE.

Source: BofA Global Research, FINRA, TRACE.

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Figure 61: Estimated changes in IG dealer inventories by sector.

We estimate today IG dealer inventories declined -\$125mn for Banks/Brokers and declined -\$111mn for Energy.

Net dealer buy (\$mn)							dealer DV	01 chang	e (\$thou	Trading volumes on 5-Oct-23 (\$mn)				
Sector	5-0ct	4-0ct	1 W	2 W	4 W	5-0ct	4-0ct	1 W	2 W	4 W	Buy	Sell	Dealer	Total
Aerospace/Defense	33	-59	-154	9	-56	74	-48	-77	176	203	318	285	235	838
Automobiles	63	-12	19	-164	68	15	13	2	-65	38	203	140	152	495
Banks/Brokers	-125	-666	-606	97	-441	-9	-334	-322	-63	-23	3,029	3,155	1,728	7,912
Basic Materials	-11	-105	-174	-213	-106	-18	-62	-134	-178	-83	349	360	284	994
Commercial Services	15	36	141	268	307	12	23	101	185	232	125	109	42	276
Energy	-111	-222	-387	-459	-554	-16	-163	-155	-296	-253	866	978	639	2,483
Finance	-79	-218	-245	-221	-141	-42	-109	-134	-12	133	553	632	395	1,580
Food, Bev, & Bottling	-16	87	-112	-177	-144	-37	89	-118	-71	-24	305	321	226	852
Health Care	-181	-15	-647	-840	-1,013	-21	43	-422	-390	-409	1,076	1,257	894	3,227
Industrial Products	43	-39	0	-150	-103	22	-15	41	-12	41	219	176	162	557
Insurance	60	-5	-24	-186	6	37	0	-18	-134	-105	355	296	156	807
Media & Entertainment	85	-45	-227	-13	22	100	-32	-157	79	124	561	476	406	1,442
REITs	-44	23	24	208	345	-34	-11	-21	86	74	318	362	184	865
Retail	-13	-45	-306	-64	175	-18	-38	-147	170	273	386	399	344	1,129
Technology	-68	-133	-246	-611	-470	-41	-137	-238	-317	-248	566	634	550	1,750
Telecom	-33	-2	-120	122	61	-17	24	-52	153	31	430	463	359	1,252
Tobacco	49	-27	-28	-19	-146	47	-18	6	88	-16	108	59	193	359
Transportation	-43	19	-68	39	-15	-16	0	-61	8	96	177	221	168	566
Utilities	109	34	95	413	540	123	34	12	351	630	877	768	551	2,196
Other	-45	-53	-85	-155	113	-12	-15	-37	-28	102	97	142	103	343

Note: data for maturities 13M or longer. Changes in inventories are estimated based on TRACE.

Source: BofA Global Research, FINRA, TRACE.

BofA GLOBAL RESEARCH

Common abbreviations:

IG: Investment Grade

HG: High Grade

LQD: iShares iBoxx \$ Investment Grade Corporate Bond ETF

DV01: Dollar value of a basis point

CDX IG: The Markit CDX North America Investment Grade Index

CDX HY: Markit CDX North America High Yield Index

ECB: European Central Bank

QE: Quantitative Easing

CSPP: corporate sector purchase programme

CPI: Consumer Price Index

FOMC: The Federal Open Market Committee



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