



How to optimize your credit budget

Gareth Isaac, Head of Multi Sector Portfolio Management at Invesco Fixed income

19 November 2020

How to optimise your fixed income risk budget

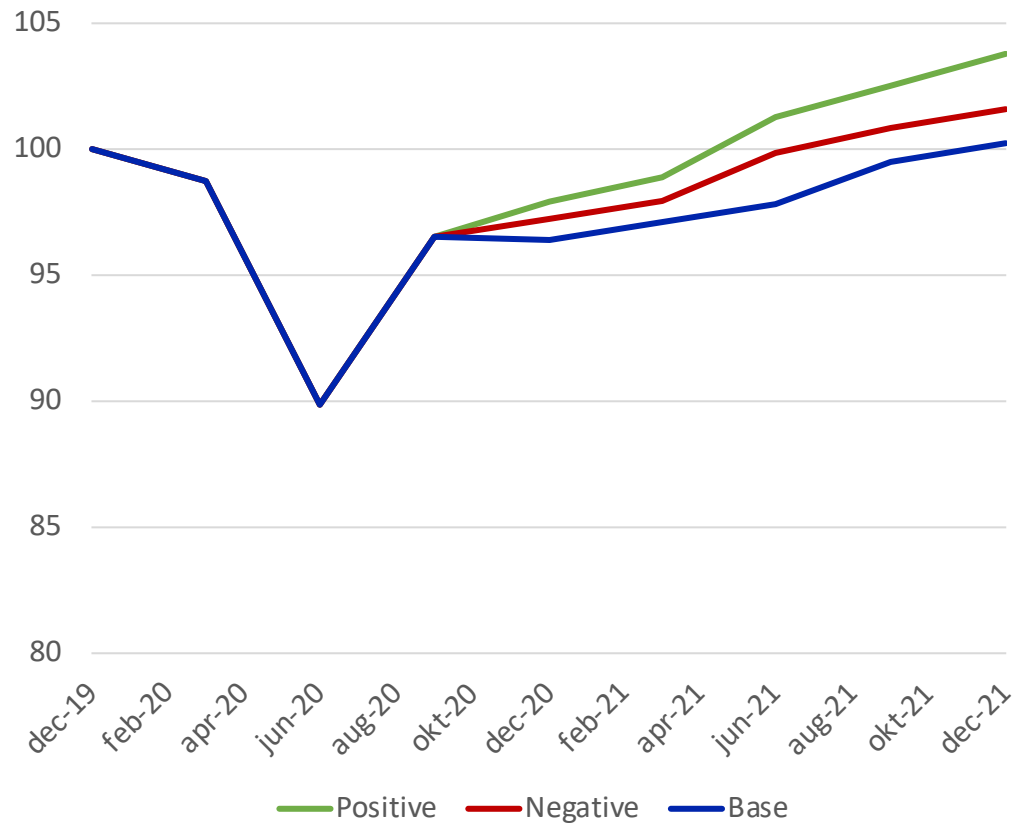
1. How we allocate risk – from an unconstrained investor perspective
2. Where are the opportunities in Fixed Income in 2021 and beyond
3. Risk for the markets

1. Macro Top Down view drives portfolio risk profile
 - Growth
 - Inflation
 - Financial Conditions
2. Assessing the attractiveness of each asset class
 - Fundamentals
 - Valuation
 - Technical
3. Assessing Sector attractiveness
4. Risk managing Portfolios

Macroeconomic Growth Projections

USA scenario projections

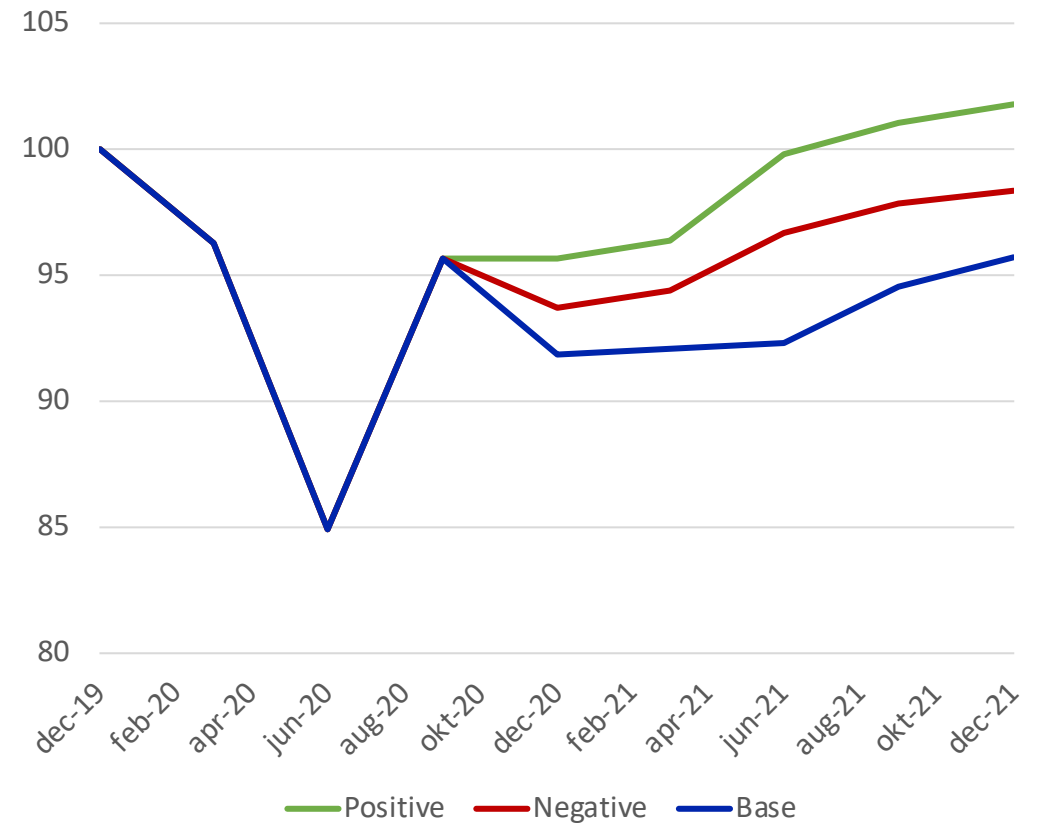
Growth Rates



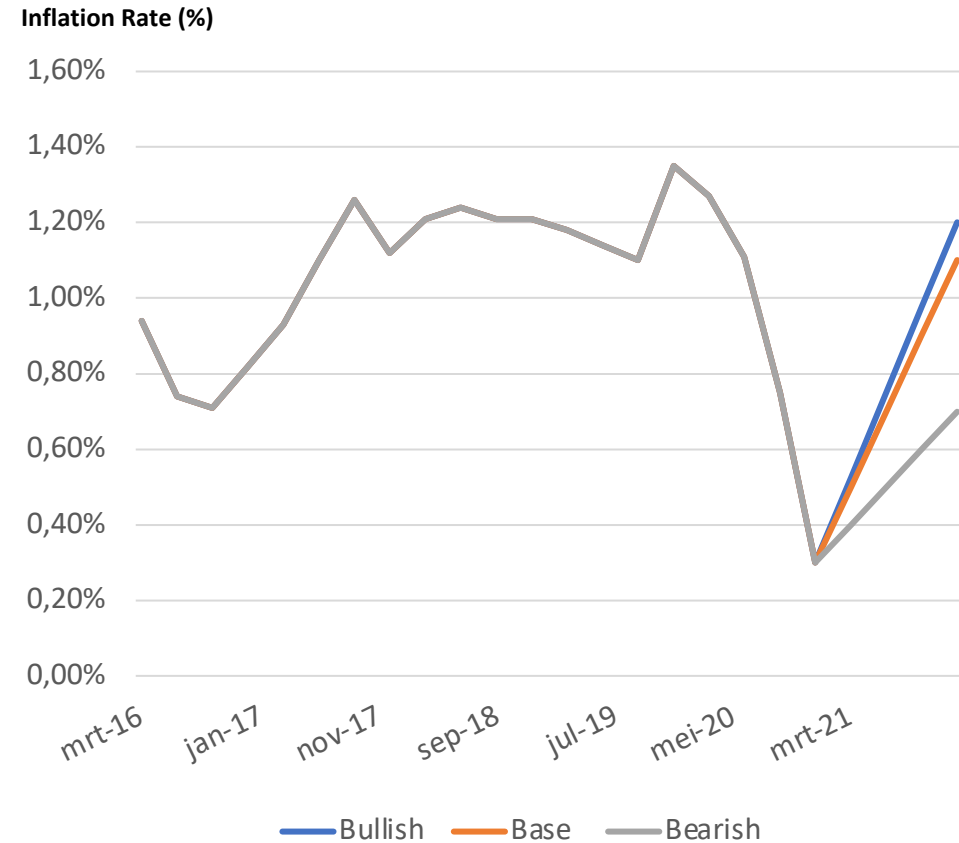
Source: Bloomberg – 30 October 2020.

Europe scenario projections

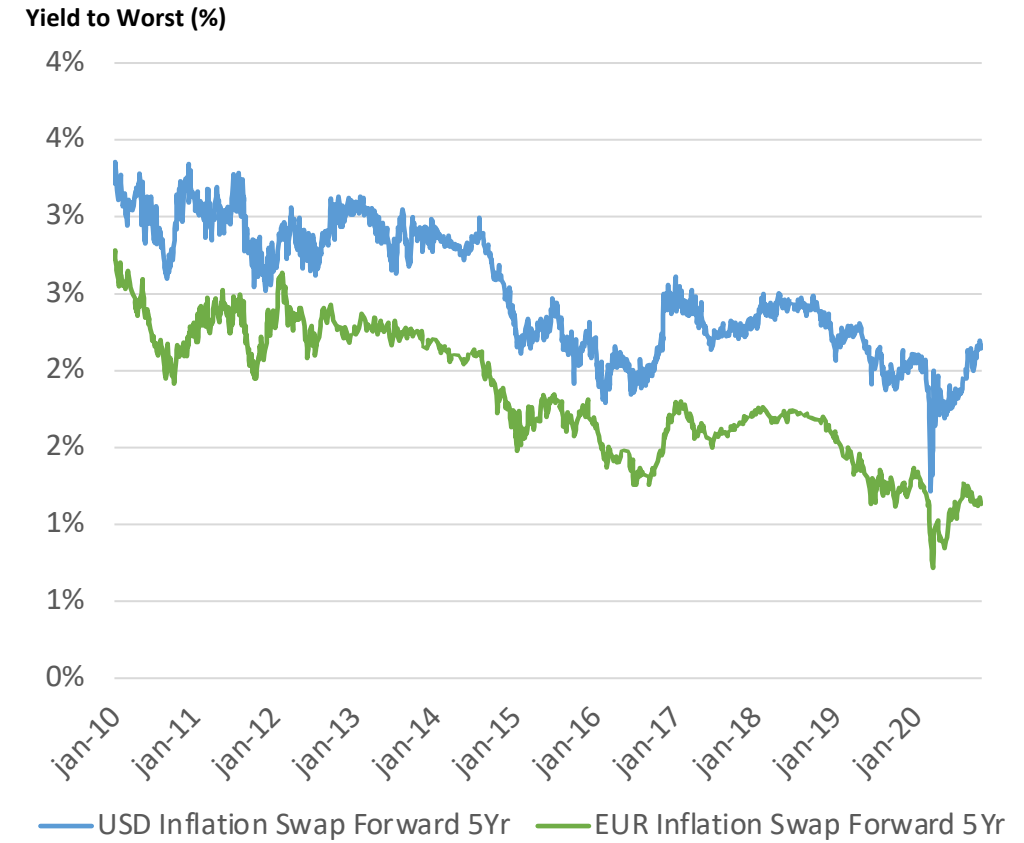
Growth Rates



Inflation scenario forecasts



Inflation swap forward rates

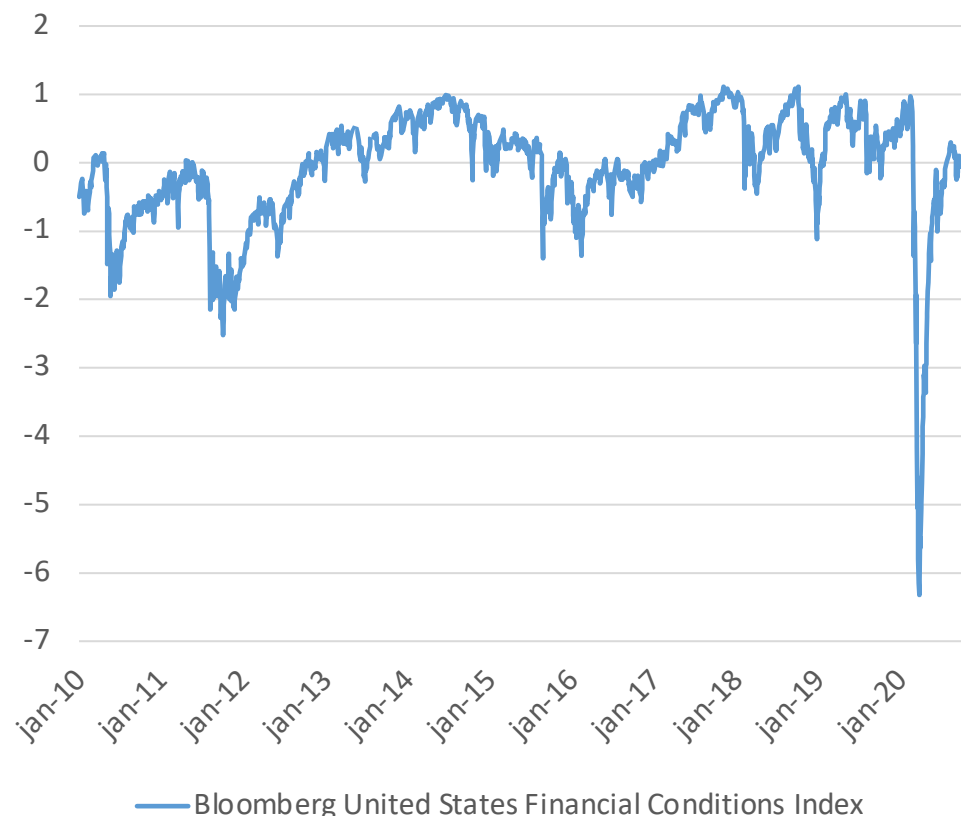


Source: Bloomberg – 30 October 2020.

European financial conditions



US financial conditions



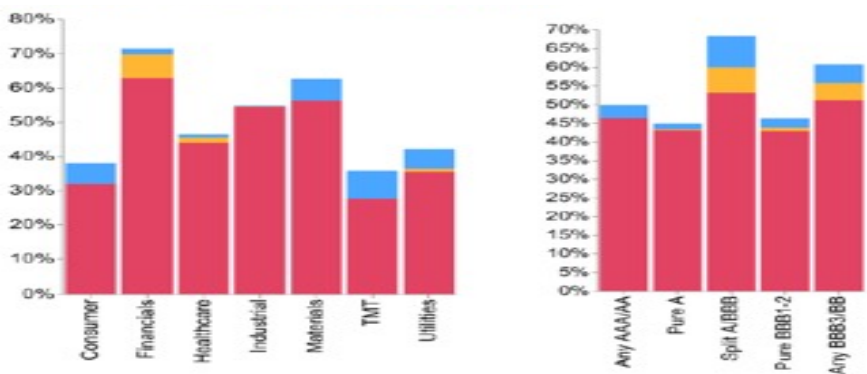
Source: Bloomberg – 30 October 2020.

Corporate fundamentals are deteriorating rapidly



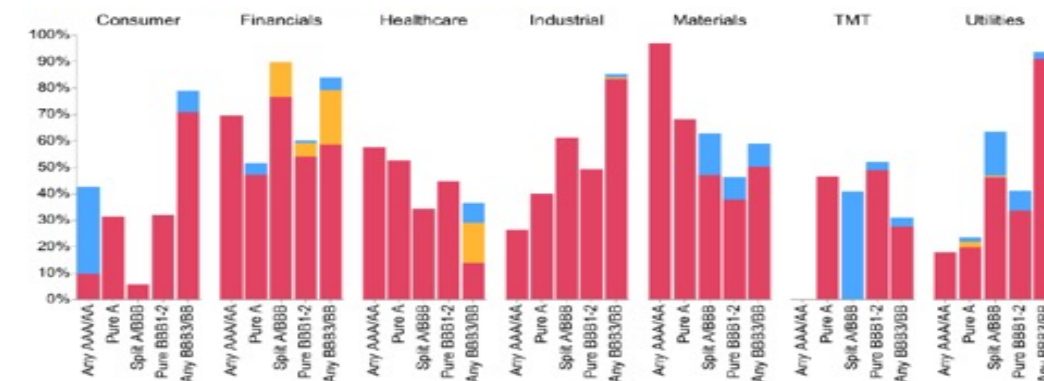
Downgrade and upgrade bias by any of three rating agencies

% of IG Index Face Value



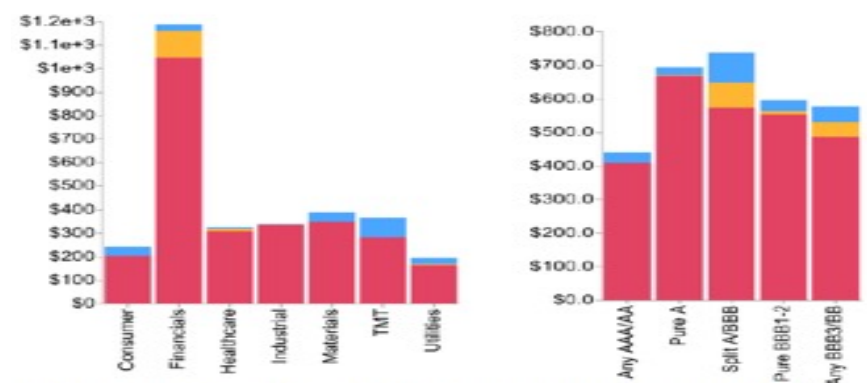
Downgrade and upgrade bias across rating category and major sectors by any of three rating agencies

% of IG Index Face Value



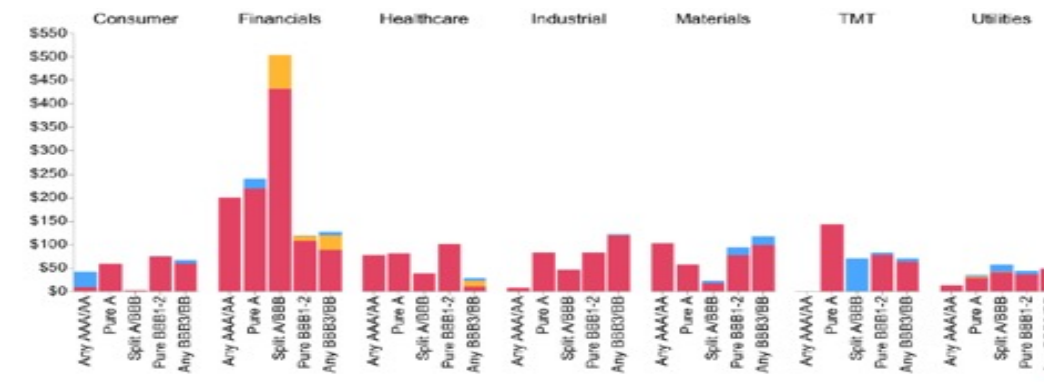
Downgrade and upgrade bias by any of three rating agencies

IG index face value, \$ bn



Downgrade and upgrade bias on US IG index by any of three rating agencies, across rating category and major sector

IG index face value, \$ bn



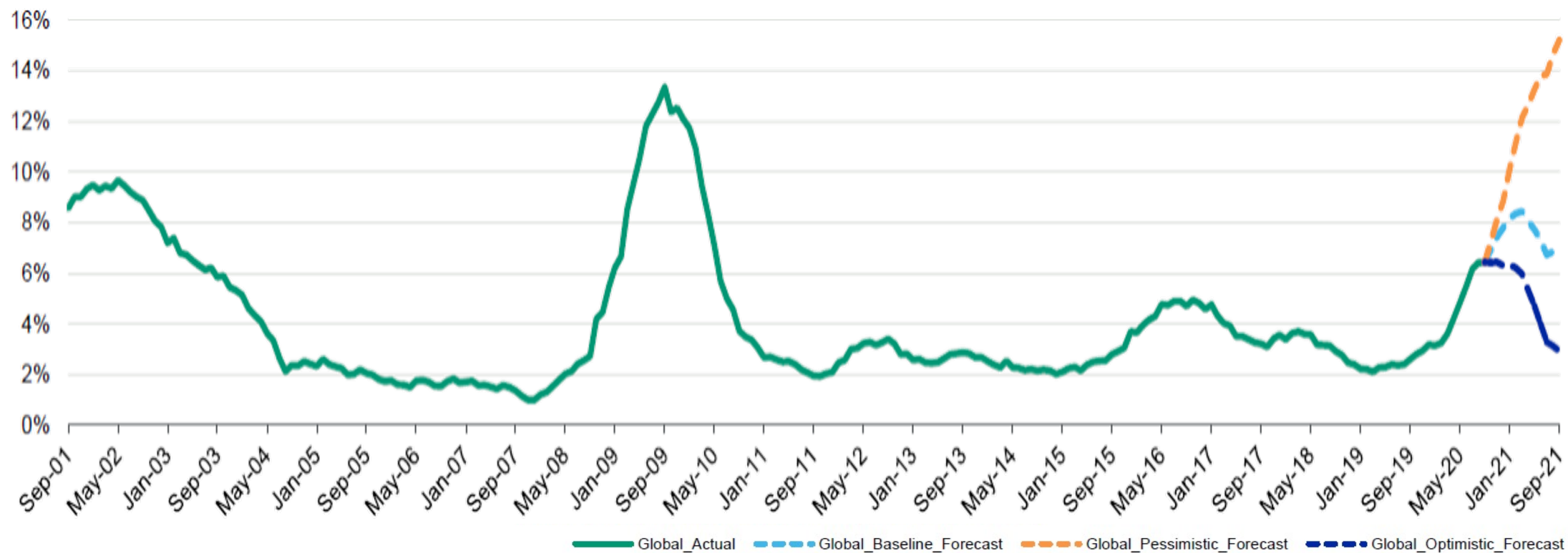
Source: Citi Research, Bloomberg, Refinitiv Datastream. All in USD

■ On Positive Outlook / Upgrade Watch ■ Has Positive and Negative Outlook/Watch ■ On Negative Outlook / Downgrade Watch

High Yield Performance over time



Global High Yield default rates over time



Source: Moody's Investor Service – 09 October 2020. Bloomberg High Yield index

Past performance is not a guide to future results

Z score is one measure of valuations across asset classes



Risk-adjusted expected returns for various asset classes

Inputs:	
Regressand:	Global Agg
Rank by:	Z-Score
Increment:	Months
Period From:	31/10/2019
Period To:	31/10/2020
Current:	10/11/2020

Sub-Index	OAS Range			Absolute OAS Changes			Risk Factors				Relative Value Indicator: Z-Score
	Current OAS	Tight/Wide	Current Percentile of Range	1M chg	3M chg	6M chg	Excess OAS	Beta	Beta Adj Excess OAS	Z-Score	
US Treasuries	0	-1 / 2	9%	0	0	0	-42	0.03	-1	0.31	Fair Value
Global Agg	42	38 / 82	18%	-5	-6	-29	0	1.00	0	0.00	Regressand
JACI	311	255 / 429	34%	-17	-9	-102	269	4.17	136	0.06	Fair Value
Global IG	105	92 / 241	21%	-13	-16	-89	63	3.28	-33	-0.07	Fair Value
US IG	111	93 / 272	21%	-15	-15	-101	69	3.77	-47	-0.04	Fair Value
Euro IG	98	93 / 239	13%	-14	-23	-94	56	3.28	-40	0.02	Fair Value
JACI IG	219	177 / 300	32%	-16	-14	-79	177	3.03	91	-0.02	Fair Value
Global HY	467	423 / 1008	14%	-49	-88	-334	425	13.18	-87	-0.03	Fair Value
US HY	412	336 / 880	20%	-57	-71	-313	370	11.86	-86	0.03	Fair Value
Euro HY	400	304 / 796	25%	-44	-71	-270	358	10.54	-43	0.05	Fair Value
JACI HY	689	535 / 958	44%	-10	12	-178	647	9.77	279	0.21	Fair Value
US Securitised	54	42 / 80	34%	-5	2	2	12	0.59	29	0.05	Fair Value
EMBI	347	277 / 577	26%	-27	-34	-188	305	6.95	55	-0.04	Fair Value
CEMBI	363	311 / 599	29%	-25	-32	-171	321	6.68	82	-0.08	Fair Value
GBI-EM Global Div yld	435	435 / 536	0%	-10	-2	-36	393	0.16	429	-0.23	Fair Value

Inputs:	
Regressand:	Global Agg
Rank by:	Z-Score
Increment:	Months
Period From:	31/10/2017
Period To:	31/10/2020
Current:	10/11/2020

Sub-Index	OAS Range			Absolute OAS Changes			Risk Factors				Relative Value Indicator: Z-Score
	Current OAS	Tight/Wide	Current Percentile of Range	1M chg	3M chg	6M chg	Excess OAS	Beta	Beta Adj Excess OAS	Z-Score	
US Treasuries	0	-1 / 2	14%	0	0	0	-42	0.03	-1	0.05	Fair Value
Global Agg	42	33 / 82	23%	-5	-6	-29	0	1.00	0	0.00	Regressand
JACI	311	213 / 429	79%	-17	-9	-102	269	4.72	113	1.45	Cheap
Global IG	105	79 / 241	37%	-13	-16	-89	63	3.03	-22	0.36	Fair Value
US IG	111	86 / 272	37%	-15	-15	-101	69	3.33	-29	0.32	Fair Value
Euro IG	98	74 / 239	22%	-14	-23	-94	56	3.18	-35	0.09	Fair Value
JACI IG	219	151 / 300	78%	-16	-14	-79	177	3.41	75	1.49	Cheap
Global HY	467	316 / 1008	58%	-49	-88	-334	425	13.67	-107	0.80	Fair Value
US HY	412	316 / 880	65%	-57	-71	-313	370	11.55	-73	1.14	Cheap
Euro HY	400	266 / 796	54%	-44	-71	-270	358	10.82	-54	0.96	Fair Value
JACI HY	689	418 / 958	82%	-10	12	-178	647	11.47	208	1.54	Cheap
US Securitised	54	27 / 80	79%	-5	2	2	12	0.97	13	1.47	Cheap
EMBI	347	277 / 577	33%	-27	-34	-188	305	6.32	81	0.41	Fair Value
CEMBI	363	248 / 599	73%	-25	-32	-171	321	7.02	68	0.85	Fair Value
GBI-EM Global Div yld	435	435 / 677	0%	-10	-2	-36	393	-2.11	524	-1.99	Expensive

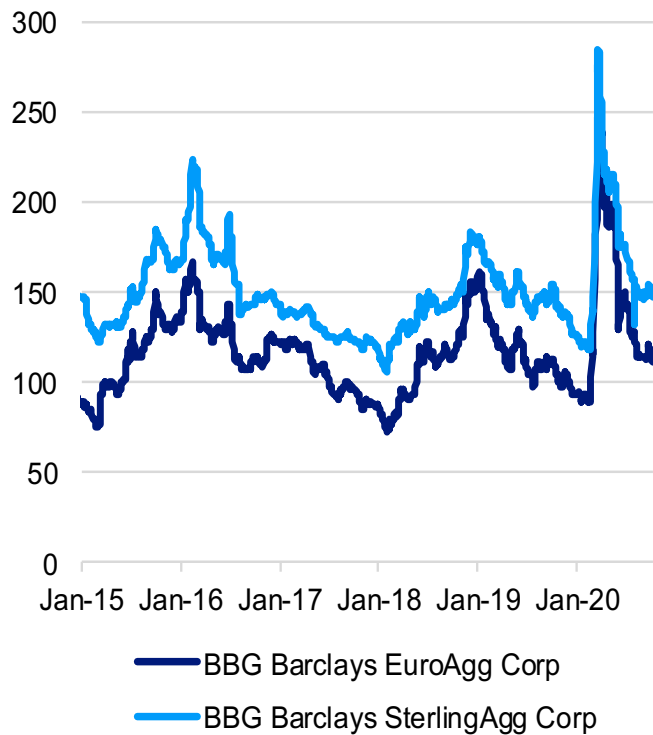
Source: Invesco – 31 October 2020. Please find on slide 21 which indices have been used. It cannot be guaranteed that these forecasts will come to pass.

The material spread widening has retraced equally as fast and index level spreads are now back to late 2019 levels.

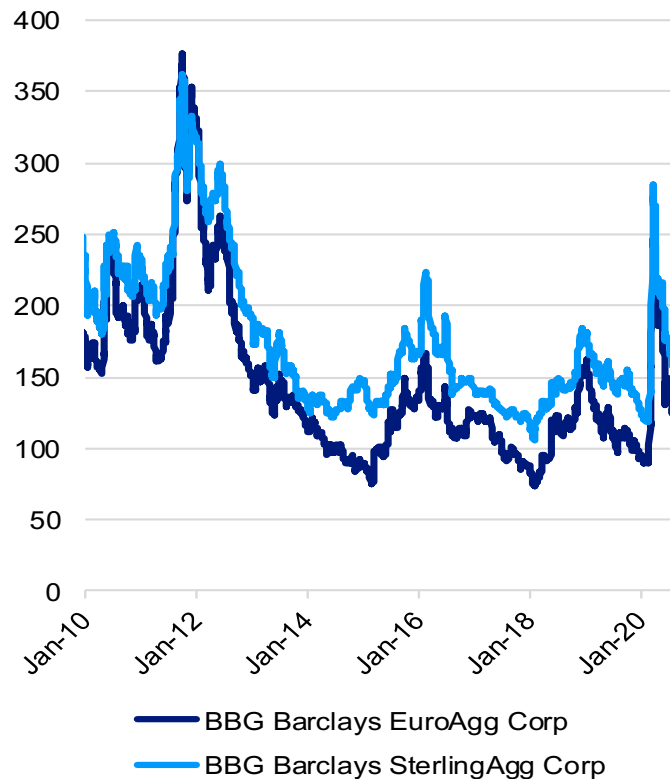


Spreads are wide versus recent history, but less so when compared to previous cycles

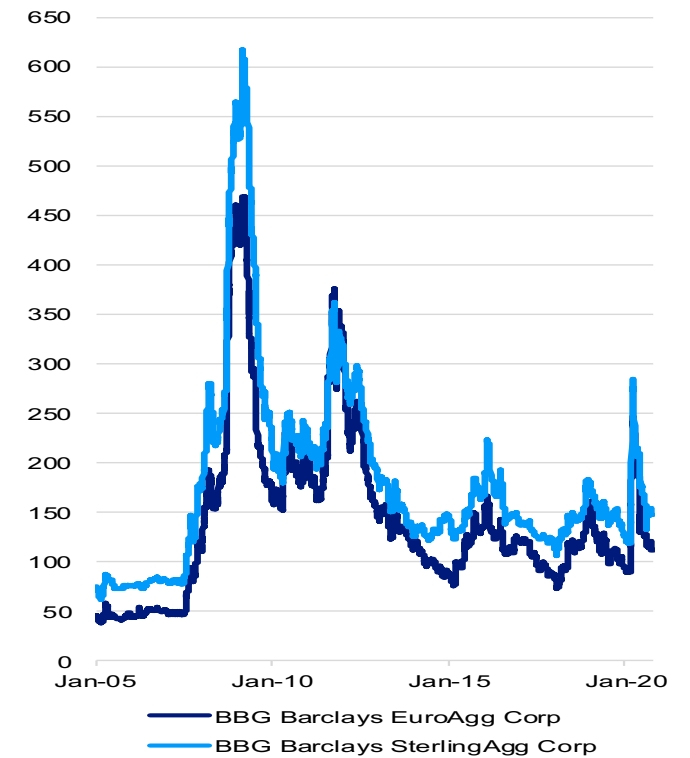
Spreads over past 5yr



Spreads over past 10yr



Spreads over past 15yr



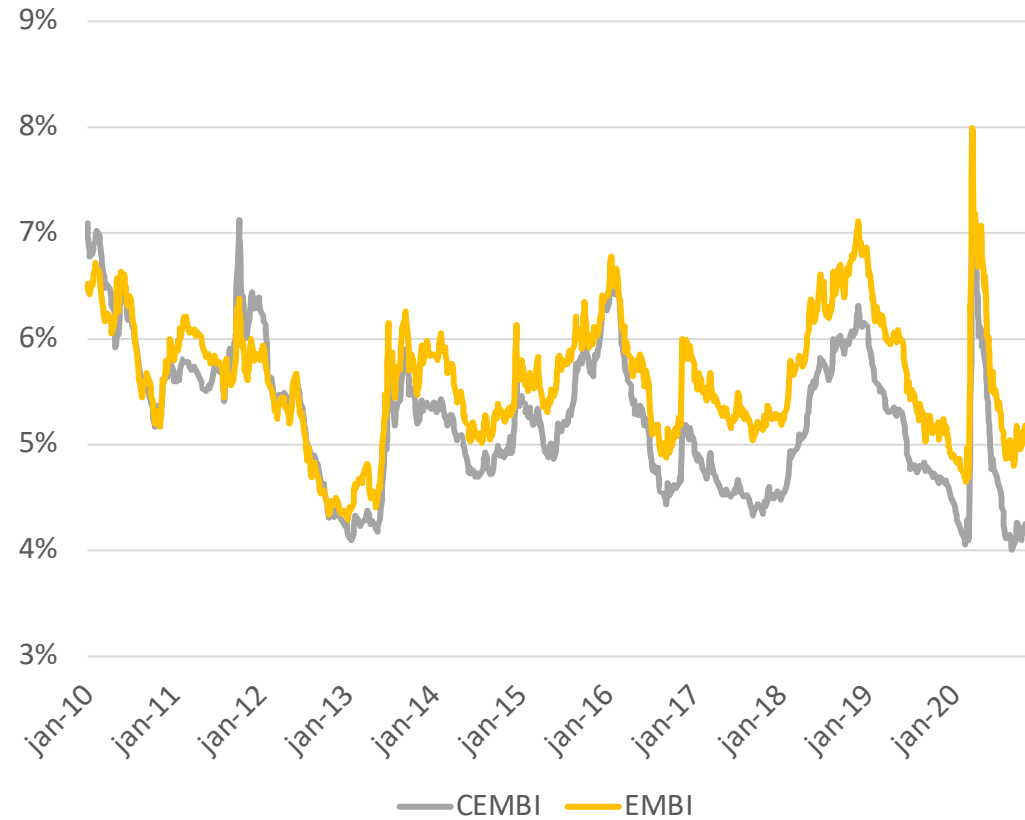
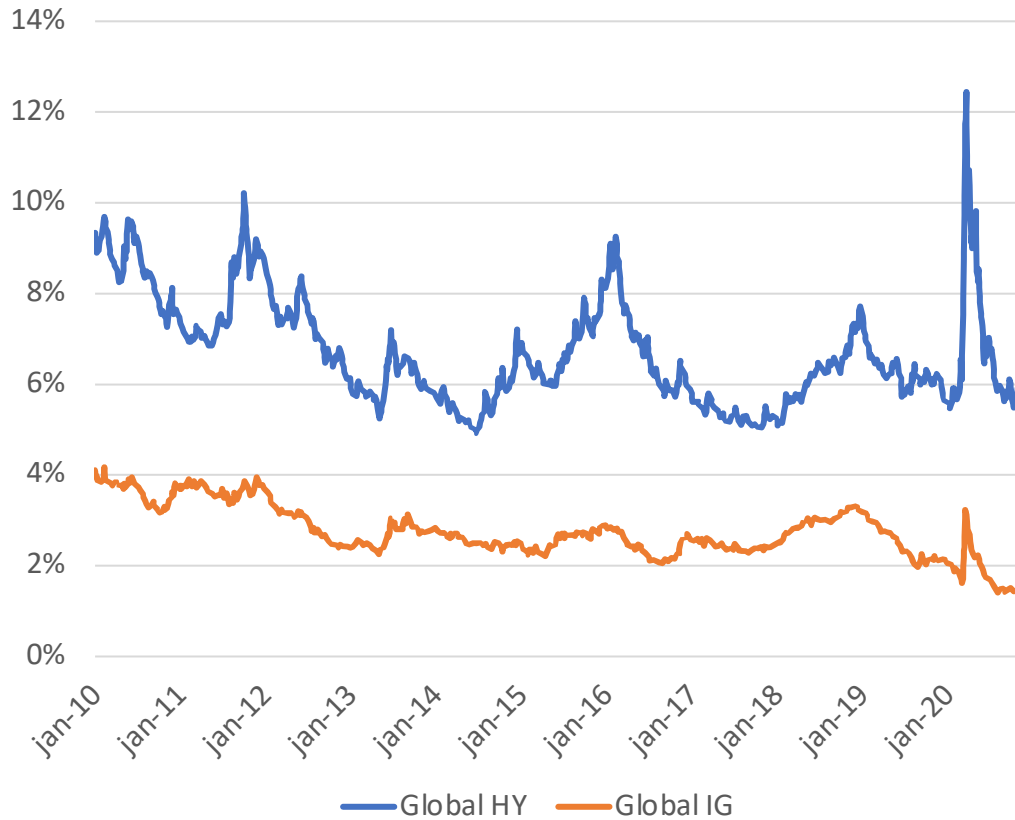
Source: ICE BofA, Invesco, October 2020.

Bond yields across asset classes at all time lows



Asset class return history

Yield to Worst (%)



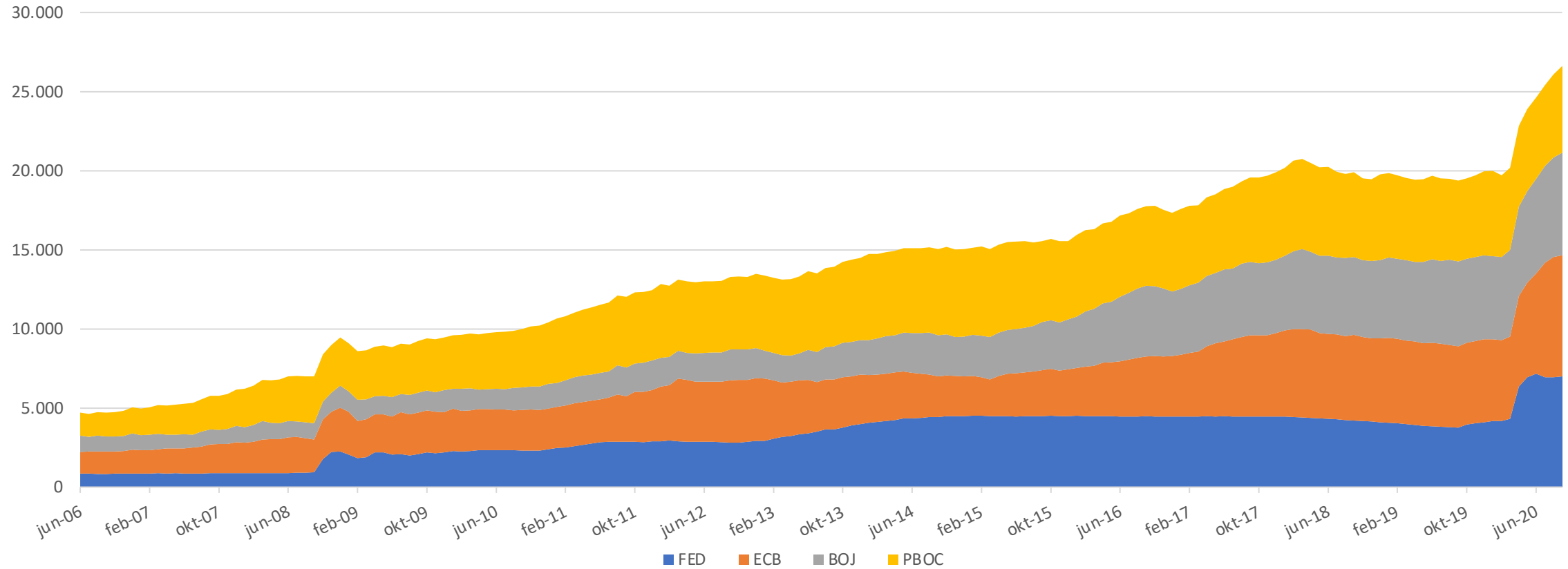
Source: Bloomberg – 30 October 2020. Please find on slide 21 which indices have been used.
Past performance is not a guide to future results.

Evolution of Central Bank Balance Sheet Assets



Cumulative Central Bank Balance Sheet values

Balance Sheet (\$USDbn)

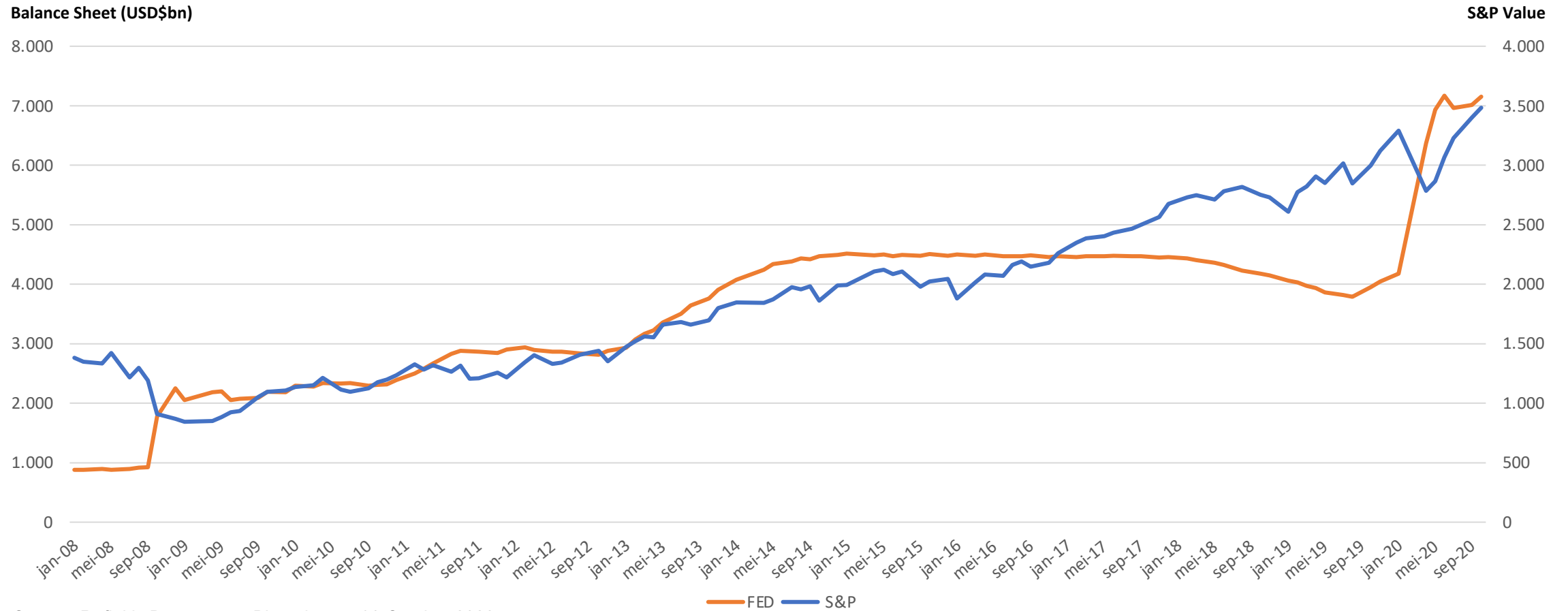


Source: Refinitiv Datastream – 30 October 2020.

Market impact of Quantitative Easing



Fed Balance Sheet values vs S&P



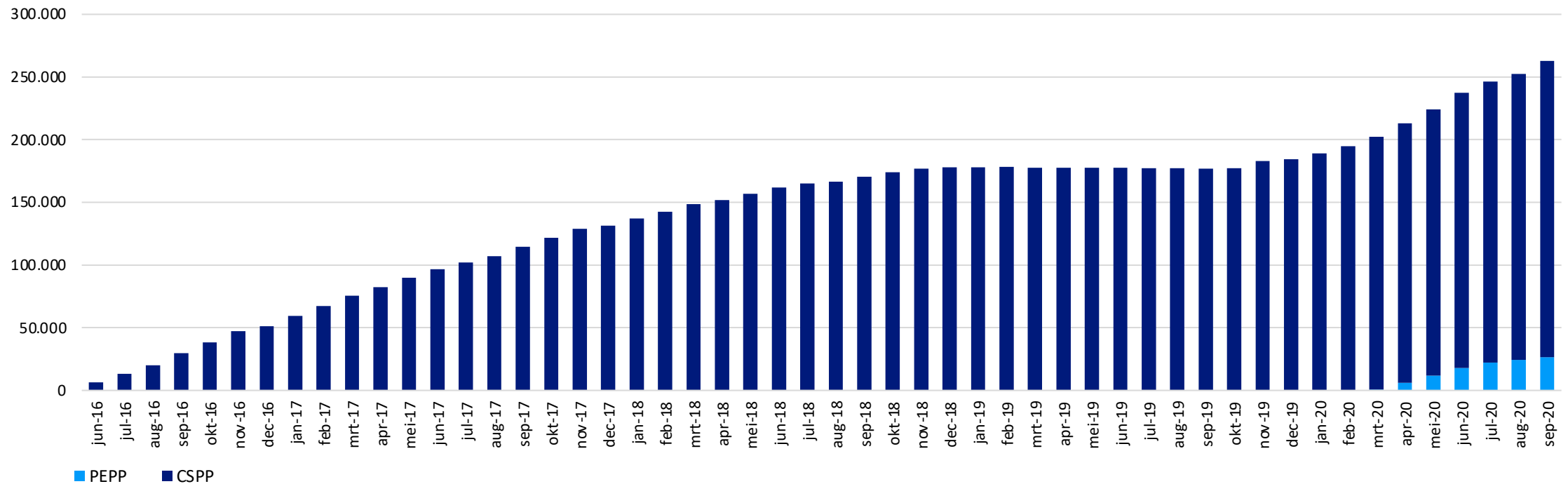
Source: Refinitiv Datastream, Bloomberg – 30 October 2020.

ECB extended PEPP* to June 2021 and will reinvest proceeds until at least end 2022.



ECB buying remains supportive split across CSPP and PEPP

Euro Credit Holdings of the ECB (Cumulative)



The ECB is currently buying €10bn of corporate debt per month, mostly under the CSPP**

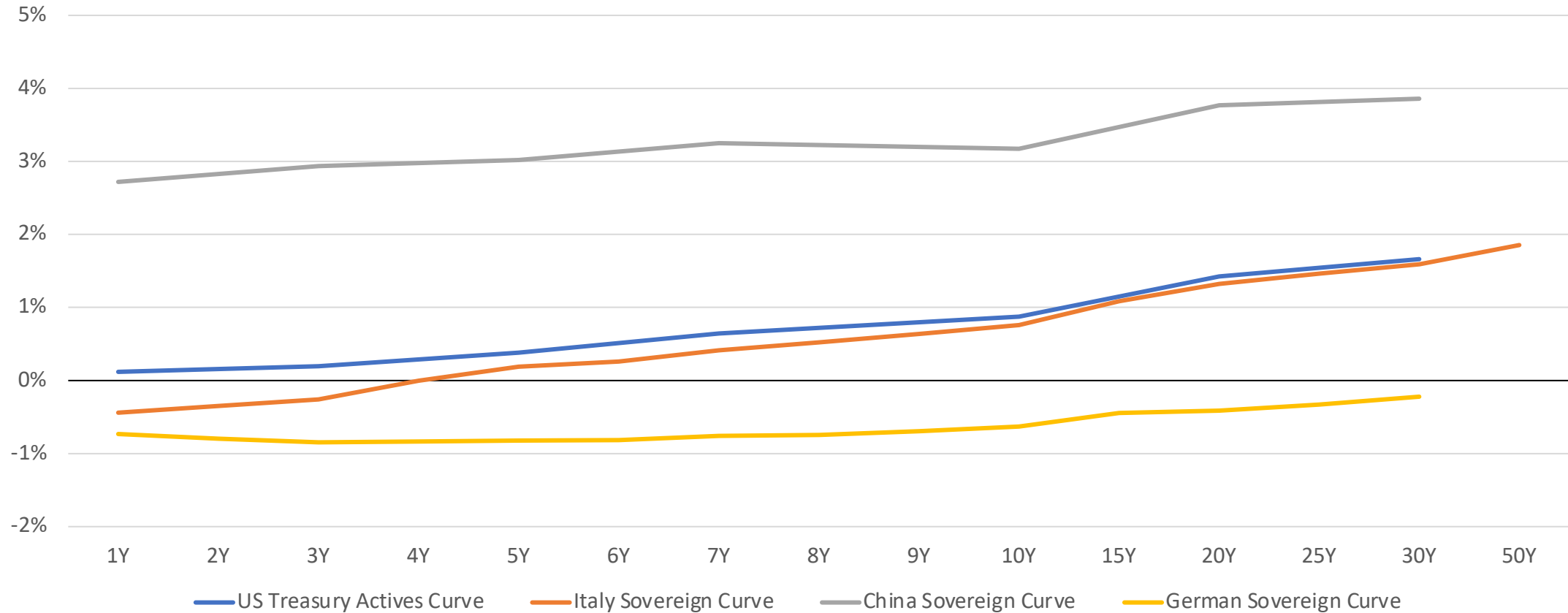
Source: ECB, October 2020.

* PEPP: Pandemic Emergency Purchase Programme. ** Corporate Sector Purchase Programme

Government bond yields close to zero...

Sovereign security yields

Yield to Maturity (%)



Source: Refinitiv Datastream, Bloomberg – 30 October 2020.

...and market expects little change in the years to come



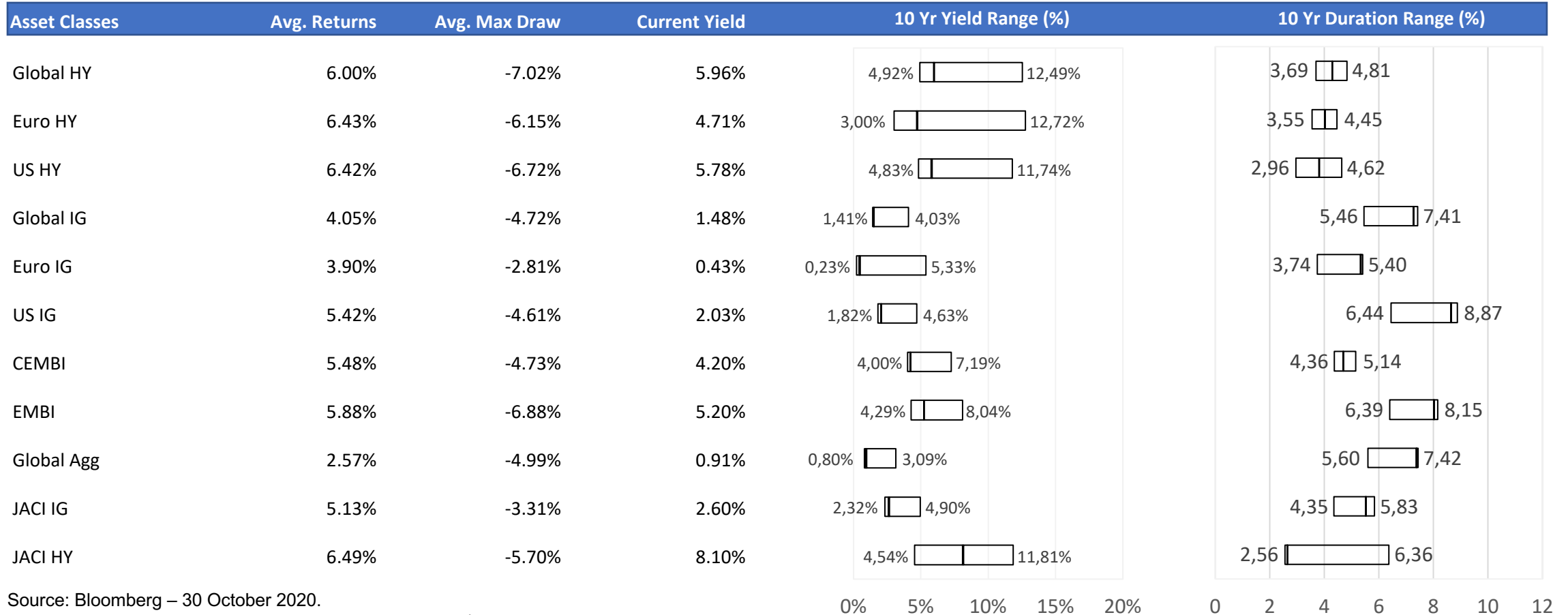
Country	Policy				Implied Policy						Total Change 3Y
	Rate	Efctv	Basis	Meeting	3M	6M	1Y	2Y	3Y	Curve	
Americas											
United States	0.13	0.090	-3.5	12/16	0.11	0.11	0.11	0.15	0.34		21
Canada	0.25	0.200	-5.0	12/09	0.31	0.29	0.31	0.50	0.76		51
Mexico	4.25	4.500	25.0	11/12	4.09	4.02	4.12	4.44	4.94		69
Chile	0.50	0.300	-20.0	12/07	0.66	0.69	0.73	1.25	1.79		129
Brazil	2.00	1.900	-10.0	12/09	2.30	3.15	4.88	7.27	8.19		619
EMEA											
Eurozone	-0.50	-0.473	2.7	12/10	-0.52	-0.54	-0.56	-0.55	-0.51		-1
United Kingdom	0.10	0.053	-4.7	12/17	0.08	0.06	0.04	0.03	0.14		4
Switzerland	-0.75	-0.769	-1.9	12/17	-0.77	-0.75	-0.75	-0.69	-0.56		19
Norway	0.00	0.510	51.0	12/17	-0.18	-0.15	-0.08	0.12	0.31		31
Sweden	0.00	-0.074	-7.4	11/26	0.00	0.03	-0.02	0.15	0.22		22
Denmark	-0.60	-0.459	14.1		-0.56	-0.63	-0.66	-0.69	-0.65		-5
Czech Republic	0.25	0.350	10.0	12/17	0.23	0.28	0.38	0.61	0.78		53
Poland	0.10	0.220	12.0	12/02	0.07	0.07	0.12	0.27	0.59		49
Asia/Pacific											
Australia	0.10	0.050	-5.0	12/01	0.10	0.09	0.09	0.13	0.38		28
New Zealand	0.25	0.250	0.0	11/11	0.22	0.03	-0.08	-0.01	0.15		-10
Japan	-0.03	-0.034	-0.4	12/18	-0.05	-0.06	-0.07	-0.09	-0.07		-4
China	2.20	2.550	35.0		2.09	2.18	2.28	2.49	2.65		45
India	4.00	3.430	-57.0	12/04	4.06	4.13	4.34	4.84	5.33		133
Korea	0.50	0.660	16.0	11/26	0.60	0.58	0.66	0.86	0.99		49

Source: Bloomberg, October 2020.

Asset Class Analysis



Asset class performance over the past 10 years

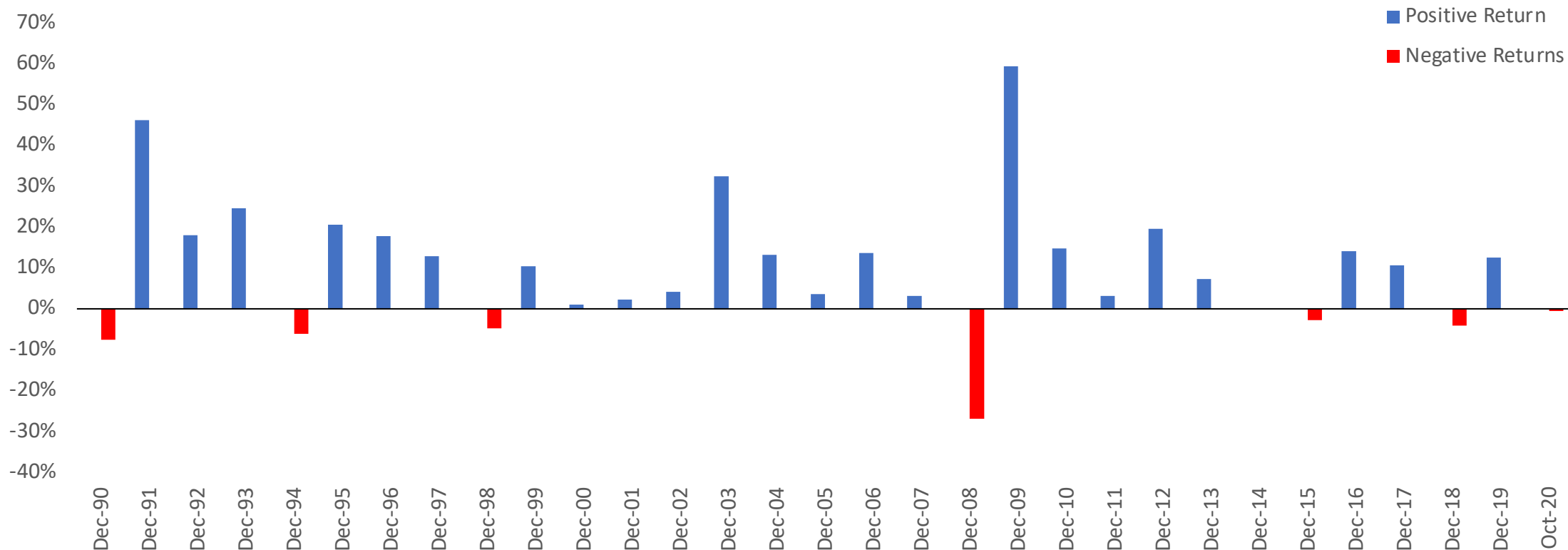


Source: Bloomberg – 30 October 2020.
 Bloomberg Barclays Global High Yield Index, LG30TRUU)

High Yield Performance over time



Annual return of the high yield asset class over 30 years



Source: Bloomberg – 30 October 2020. Please find on slide 21 which indices have been used.
Past performance is not a guide to future results.

1. We maintain a positive risk outlook given growth and financial conditions outlook but volatility is likely to persist
2. We think the investment returns of fixed income over the past decade are going to be difficult to replicate
3. Consider rotating out of what's Central Banks have been buying into higher yielding assets such as high yield and Emerging Market which still offer value
4. Our view is to consider allocating to high real yield markets and steep curves
5. We are wary of low yield and high duration markets, there is little cushion if yields begin to rise
6. Active managers could take advantage of dispersions within indices and manage risk over the investment cycle.

Risks to my rather optimistic view

1. Delay in vaccine, it's availability or mutation of the virus
2. Inflation makes a comeback
3. Central Bank driven intentional/unintentional tightening of financial conditions
4. An abrupt reverse in the retail flows that we have seen into fixed income this year

Asset Class	Index Name	Bloomberg Code
Global HY	Bloomberg Barclays Global High Yield Index	LG30TRUU
Euro HY	Bloomberg Barclays Pan-European High Yield Index	LP01TREU
US HY	Bloomberg Barclays US Corporate High Yield Bond Index	LF98TRUU
Global IG	Bloomberg Barclays Global Aggregate Credit Total Return Index Value Unhedged USD	LGDRTRUU
Euro IG	Bloomberg Barclays Euro-Aggregate: Corporates Index	LECPTRUU
US IG	Bloomberg Barclays US Corporate Bond Index	LUACTRUU
CEMBI	J.P. Morgan Corporate EMBI Broad Diversified Composite Index Level	JBCDCOMP
EMBI	J.P. Morgan EMBI Global Divers Composite	JPEIDIVR
Global Agg	Bloomberg Barclays Global Aggregate Index	LEGATRUU
JACI IG	J.P. Morgan JACI Investment Grade Total Return	JACIIGTR
JACI HY	J.P. Morgan JACI Non-Investment Grade Total Return	JACINGTR

Data as at 30 October 2020, unless otherwise stated

This marketing document is exclusively for use by Professional Clients and Financial Advisers in Continental Europe as defined below, Qualified Investors in Switzerland and Professional Clients in Isle of Man and the UK. It is not intended for and should not be distributed to, or relied upon, by the public. By accepting this document, you consent to communicate with us in English, unless you inform us otherwise. This document is not for consumer use, please do not redistribute.

This document is marketing material and is not intended as a recommendation to invest in any particular asset class, security or strategy. Regulatory requirements that require impartiality of investment/investment strategy recommendations are therefore not applicable nor are any prohibitions to trade before publication. The information provided is for illustrative purposes only, it should not be relied upon as recommendations to buy or sell securities.

Where individuals or the business have expressed opinions, they are based on current market conditions, they may differ from those of other investment professionals, they are subject to change without notice and are not to be construed as investment advice.

For the distribution of this document, Continental Europe is defined as Austria; Belgium; Denmark; Finland; France; Germany; Italy; Luxembourg; Netherlands; Norway; Spain; Sweden.

Issued in Austria and Germany: Invesco Asset Management Deutschland GmbH, An der Welle 5, 60322 Frankfurt am Main, Germany.

Issuing details covering BELGIUM, DENMARK, FINLAND, FRANCE, GREECE, ITALY, LUXEMBOURG, NETHERLANDS, NORWAY, PORTUGAL, SPAIN and SWEDEN: Invesco Management S.A., President Building, 37A Avenue JF Kennedy, L-1855 Luxembourg, regulated by the Commission de Surveillance du Secteur Financier, Luxembourg.

IRELAND, ISLE OF MAN,, JERSEY, GUERNSEY and UK issuing details: Invesco Asset Management Limited, Perpetual Park, Perpetual Park Drive, Henley-on-Thames, Oxfordshire RG9 1HH, UK. Authorised and regulated by the Financial Conduct Authority.

SWITZERLAND and LIECHTENSTEIN issuing details Invesco Asset Management (Schweiz) AG, Talacker 34, 8001 Zurich, Switzerland.

EMEA 9159/2020