

Green bond comeback: one month after "Liberation Day"

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This study compares the performance of green bonds to traditional bonds (non-green) during the market recovery following "Liberation Day" week, when President Trump announced so-called "reciprocal tariffs" on most countries. Our previous study looked at green bond performance during the extensive sell-off period immediately following the tariff turmoil and found little evidence of preferential treatment for green bonds.[1] This paper asks a similar question: Did green bonds outperform the overall market rally?

This paper conducts a broad-based, cross-sectional study of large European and US investment grade bond indices, with USD 11 trillion outstanding between them. Bonds are classified into two categories: 'green' and 'non-green'. Comparisons are made within the same currency to control for currency-related pricing effects. We further disaggregate the indices by sector to examine idiosyncratic dynamics during the market recovery phase and compare these with trends observed during the preceding market sell-off.

We find key differences between these two phases. When the market rallied back, the recovery was faster in green bonds than in traditional bonds. No such dynamic was observed during the sell-off. This information could help investors optimise portfolios to take advantage of fluctuations in 'greenium' (the premium at which green bonds potentially trade relative to their non-green counterparts). Our findings suggest green bonds have a shorter recovery time following drawdowns. However, as a rally matures and markets enter a stable volatility regime, green bonds could then underperform as their short-term higher betas converge towards longer-term market beta levels. This means investors must take an active approach to generate alpha returns.

The markets continue to rally, supported by incrementally positive news on tariffs and the dovish stance of central banks, which together are helping to bolster the recovery. Primary markets have also reopened. This study highlights the potential liquidity advantages of green bonds, particularly within US markets.

We conclude green bonds have performed well overall through the "Liberation Day" aftermath

- **Green bonds have benefited in the recovery phases both in European and US markets.**
- **Credit spreads have largely recovered from the widening seen in the first two weeks of April.**
- **Sectors with more green bonds — like Utilities and Real Estate — have seen green bond outperformance, while the situation for Financials was more mixed.**

[1] "Green bond performance post Liberation Day", AFII, 15 Apr 2025.

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Introduction

Green bonds, or use-of-proceeds bonds, are a significant segment of the sustainable fixed income universe. They are now prevalent in the credit markets, and comparisons between green and non-green instruments are a popular topic of study.[2]

Past analysis explored the heightened volatility of UK credit markets that occurred in 2022, when then-Prime Minister Liz Truss catalysed a mini financial crisis., We concluded then that there was no difference in volatility or performance between green and non-green bonds in the UK markets.[3] In contrast, the events of "Liberation Day" were not confined to a specific country; they had global ramifications.

Indeed, they make for an excellent real-world case study of green vs non-green performance.This study looks to further our earlier work to see how the green bonds performed on the way back.[1] Often, longitudinal-based studies miss out on performance differentials in periods of turmoil because of averaging over the periods. However, investors gain experience during such phases and use their real-time observations of relative performance to construct optimised portfolios. Therefore, a cross-sectional study is highly relevant for practitioners.

Table 1 shows the composition of investment grade bonds in the European and US markets. This table has been refreshed since our

Table 1. Composition of investment grade corporate bond market (Bloomberg LP05TREU and LUACTRUU indices), with amount outstanding in $bn, count of bonds and avg duration. Source: Bloomberg, AFII, accessed 13 May 2025.

	Green				Non-Green			
EUR	Out	Count	Z-spd	Avg dur	Out	Count	Z-spd	Avg dur
Index	294	482	99	4.7	2345	3512	96	4.5
Communications	5	9	114	5.4	201	280	96	5.7
Consumer Discretionary	22	31	107	4.0	156	248	90	3.4
Consumer Staples	3	6	90	6.5	192	325	75	5.2
Energy	2	5	127	4.7	91	117	96	4.5
Financials	133	200	88	3.4	907	1205	101	3.7
Health Care	1	2	58	2.8	169	248	78	5.0
Industrials	7	15	103	6.6	297	406	86	4.6
Materials	12	22	80	5.9	83	152	89	4.8
Real Estate	30	60	128	6.1	80	191	150	6.9
Technology	1	2	55	6.8	33	41	67	4.8
Utilities	76	130	104	6.2	134	297	127	5.8
USD								
Index	119	184	157	7.2	7167	7984	149	7.3
Communications	7	7	124	8.0	519	369	163	11.2
Consumer Discretionary	5	6	133	5.8	413	519	147	6.6
Consumer Staples	5	4	112	7.2	465	556	127	7.6
Energy					502	589	179	9.3
Financials	9	12	113	3.4	2184	1850	140	4.9
Health Care	3	4	130	9.9	833	844	158	12.6
Industrials	3	5	110	5.7	542	775	135	7.3
Materials	11	16	148	7.7	208	308	158	8.3
Real Estate	24	40	150	6.3	239	434	140	5.7
Technology	7	7	157	6.0	581	507	132	6.8
Utilities	46	83	170	24.8	682	1233	170	10.2

[2] "The Green Corporate Bond Issuance Premium", J Caramichael, AC Rapp, Journal of Banking & Finance, May 2024.
[3] "Environmental gilt", AFII, Oct 2022.

last study. The population is largely stable. We note only minor changes with small duration reductions and a slight increase/decrease in the number of bonds for some sectors . Our dataset includes USD 2.8 trillion of outstanding bonds in Europe, with green bonds making up 10%. The US universe is 2.5 times the size of the European, but green bonds make up only 1.6% of this market. This suggests the US green bond market is underdeveloped, and/or that there are greater incentives to issue green bonds in Europe. Financials, Utilities, and Real Estate are the most favoured sectors in Europe for green bonds, and Utilities and Real Estate in the US. Duration is also lower for European bonds compared to US bonds. This is well understood by market participants, and translates to higher spreads for US bonds, all else being equal. For this reason, we limit bond comparisons to like currencies.

This analysis focuses on the investment grade universe over the one-month period of market recovery following "Liberation Day" week by studing percent spread changes of the bonds and a more robust market beta comparison.

Bond spread performance update

We use the percent change in spread as the standardised metric by which to measure the market impact on different bonds, shown in Table 2. This is in two parts. The left-hand side covers the period of sell-off and is derived from our earlier study. The right-hand side shows the latest in spread changes since 11 Apr. Though spreads sold off by 20% on average, as the table indicates the recovery is almost complete. Spreads have recovered by 13.5%. (Keep in mind that percentage changes are not symmetrical. A bond trading at 100bps would have widened to 120bps in a 20% sell-off, but a 20bps recovery to 100bps is the equivalent of a 16.6% tightening.)

The colour scales indicate relative performance during these two periods. US bonds issued by Utilities saw a smaller percentage change during the widening, at 12.1%. In the recovery, though, their tightening was in line with that of most other sectors.

Table 2. Percentage median change in Z-spread of bonds. The LHS is for the sell-off period 27 Mar 2025 until 10 Apr 2025. The RHS shows the recovery from 11 Apr 2025 to 13 May 2025. Source: Bloomberg, AFII, accessed 13 May 2025.

	EUR		USD		EUR		USD	
Sector	Green	Non-Green	Green	Non-Green	Green	Non-Green	Green	Non-Green
Index	20.8	22.3	19.5	19.6	-12	-13.7	-13.8	-13.6
Communications	29.5	20.6	16.3	16	-12.3	-16.1	-14.5	-12
Consumer Discretionary	25.2	29	35.9	25.4	-20	-18.5	-20.7	-17.8
Consumer Staples	20.3	20.4	21.2	19.9	-13.8	-13.3	-15.2	-14.5
Energy	18.9	29.5	NA	24.2	-10.8	-18	NA	-14.3
Financials	22.1	22.1	25.8	27	-14.5	-15.6	-18.6	-17.5
Health Care	28.8	24.1	19.5	16.3	-9.1	-9.6	-13.3	-9.9
Industrials	23.8	24.4	28.1	18.4	-15.5	-13.1	-20.2	-14.1
Materials	20.3	27.5	25	21.8	-11.1	-12.5	-16	-12.7
Real Estate	23.9	16.3	25.3	22.5	-13.4	-8	-17.2	-16.6
Technology	15.1	14.4	29.5	24.6	-11.2	-10.9	-20.8	-18.6
Utilities	17.4	15.1	12.1	12.2	-9.1	-10.4	-7.3	-8

We observe a general tightening of spreads since the sell-off. The more negative the number in Table 1 RHS, the better the sector's performance, as this indicates tightening. In European markets, we observe only a slight difference between green and non-green bonds, though differences between sectors are more marked. Consumer Discretionary saw much more tightening than Energy, for instance. Indeed, the current Energy sector underperformance in green bonds could make investor take-up of these instruments attractive, assuming their recovery eventually tracks with those of other sectors' green bonds.

Green bonds from the Real Estate sector recovered more than their non-green counterparts, but also sold off more during the sell-off period. Utilities and Financials, which are major issuers of green bonds, saw similar performance in the European markets.

The USD picture is clearer. Green bonds have generally outperformed, especially in Materials and Real Estate, where there are more bonds. Another factor to note is the relative scarcity of green bonds in USD, as we can see in Table 1. This could be a factor aiding the green bond recovery. It would be interesting to quantify this liquidity differential and further isolate greenium.

Credit spreads have largely recovered, although with notable underperformance in the Energy sector for green bonds in European markets. In the US market, green bond outperformance is quite clear, with a much better recovery in spreads. This could be attributed to the relative scarcity of these bonds.

Beta performance of green and non-green bonds

Another factor considered was the beta (β), performance of each bond compared to the market, expressed as the regression coefficient between bond returns and market returns.

For this analysis, we used the same broad bond market index. Higher beta is generally riskier, but given the market performance, if it continues to rally under normal volatility conditions it could be interpreted as showing better return performance.

In the prior analysis, beta was a measure of volatility as the market was selling off. We compare past month returns in short-term beta (st β) and provide a longer time frame to show general performance in long-term beta (lt β). Note that the market beta is one, and a value higher than one would mean higher returns/risk.

Table 3 (overleaf) shows green and non-green bonds' short-term and long-term performance denominated in EUR and USD. The bold figures are categories where beta differences are statistically significant.[4]

Green bonds had a higher beta in the short term than non-green bonds. EUR green instruments had a short-term beta of 0.75 compared to 0.70 for non-green. This outperformance is significant in the Consumer Discretionary, Industrial, and Technology sectors. Utilities green bonds outperformed in the rally. However, Financials, which hold the largest share of green bonds, have slightly underperformed.

[4] Calculated using Welch's t-test using average short-term beta of each category (green vs non-green in each currency).

In the US market, green and non-green bonds performed similarly overall. Compared to the long-term betas, the short-term betas are much higher, indicating better recovery over and above the market. The EUR market also experienced a relatively lower sell-off (lower st β) in the earlier sell-off period, so this recovery, even though it has a lower beta than the US market, is likely greater.

As a robustness check, the long-term beta has, on average, changed by 2% (range -10% to 9%) compared to our previous study. US Financials are experiencing a higher long-term beta now (from 0.82 in the sell-off period to 0.911 now), driven by short-term interest rate expectations, which impact this sector a lot more than others. As we find the long-term data to be stable, the conclusions drawn from the short-term moves can be assigned a high degree of confidence.

Table 3. Median short-term (11 Apr 2025 to 13 May 2025) and long term beta (10 Apr 2024 to 13 May 2025) moved compared with Global Credit market index. Source: Bloomberg, AFII, accessed 13 May 2025.

	Green		Non-Green	
EUR	st β	lt β	st β	lt β
Index	**0.755**	0.557	0.705	0.555
Communications	0.770	0.535	0.929	0.621
Consumer Discretionary	**0.815**	0.533	0.656	0.516
Consumer Staples	0.794	0.675	0.798	0.587
Energy	0.626	0.579	0.693	0.517
Financials	0.579	0.492	0.611	0.520
Health Care	0.534	0.483	0.691	0.541
Industrials	0.922	0.663	0.758	0.560
Materials	**0.860**	0.635	0.700	0.575
Real Estate	1.037	0.647	0.960	0.716
Technology	1.054	0.651	0.775	0.524
Utilities	0.960	0.633	0.923	0.633
USD				
Index	1.189	1.063	1.137	1.060
Communications	1.152	1.058	1.296	1.234
Consumer Discretionary	1.122	0.928	1.138	1.029
Consumer Staples	1.188	1.096	1.201	1.083
Energy			1.396	1.136
Financials	0.765	0.742	**0.984**	0.911
Health Care	1.162	1.226	1.188	1.316
Industrials	0.964	0.981	1.126	1.063
Materials	1.168	1.072	1.161	1.088
Real Estate	0.983	1.032	1.007	0.959
Technology	1.120	0.973	1.073	1.023
Utilities	**1.550**	1.635	1.285	1.243

Green bonds have outperformed in the recovery phase, with their relative scarcity aiding their tightening relative to traditional bonds. Green bonds from Utilities have recovered well in EUR and USD. Some underperformance in green bonds could be a potential entry point for investors.

Conclusions

Credit spreads have tightened since the sell-off in early April, closing back to pre-“Liberation Day” levels.

The recovery phase has favoured green bonds in both EUR and USD markets. During the sell-off, we did not find evidence of such differentiation. Liquidity plays a role in sectors where there is a relative scarcity of green bonds, as we saw in US markets.

Green bonds outperformed in the Real Estate and Utilities sectors, and there could be opportunities in other sectors where spread tightening has yet to be realised to the same degree.

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