
European Fee Study

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Executive Summary

European investors are paying lower expenses, on average, than ever before. There are several factors that have driven fees lower. Investors are increasingly aware of the importance of minimising investment costs, which has led them to favour lower-cost funds, in turn supporting the growth of the passive fund industry. Intensifying competition among asset managers has resulted in many cutting fees to vie for market share. Changes in the economics of advice, such as the move toward fee-based models of charging for financial advice, have also played a role.

The decline in fees is a strong positive for investors. Morningstar research has demonstrated that fees are a reliable predictor of future returns. Low-cost funds generally have greater odds of surviving and outperforming their more-expensive peers.

Key Takeaways

- ▶ The average fee paid by investors, represented by the asset-weighted average ongoing charge across all funds for the categories we analysed, was 0.69% in October 2020, a 31% decline from 2013.
- ▶ The average fee charged by industry, represented by the equal-weighted average across all funds for the categories we analysed, was 1.17%, a decline of 19% from 2013.
- ▶ The passive fund industry has led the charge in slashing expenses, with a 30% cut in equal-weighted fees since 2013 compared with a 17% reduction among active funds.
- ▶ Flows into funds and share classes charging fees that rank within the bottom quartile of their category have consistently outpaced flows into funds and share classes in the more-expensive quartiles. Within the cheapest-fee quartile, there is evidence of migration from active funds to passive ones.
- ▶ Average fees charged by the cohort of ESG funds are lower than those for the group of non-ESG peers. In October 2020, the asset-weighted average fee for ESG funds was 0.57%, whereas it was 0.71% for non-ESG funds. However, when splitting active and passive funds we find that passive ESG funds charge higher fees on average than non-ESG passive peers.
- ▶ The last couple of years have seen a strong increase in interest for ESG investments, but most money has gone into funds in the more-expensive fee quartiles.

Introduction

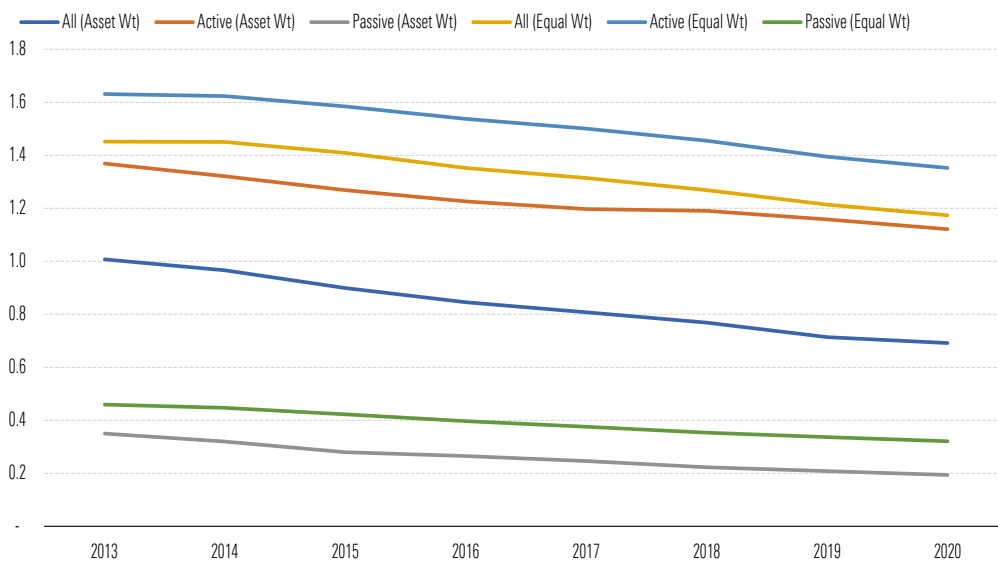
In this paper we analyse trends in fees for a group of equity and fixed-income Morningstar Categories during the period from 2013-20. These include 10 equity categories, mixing broad global and single-country exposures and two fixed-income categories. The selected categories are core market exposures that make up a large proportion of the holdings that the average European investor would have in a diversified portfolio. Assets in these categories represent 26% of total assets invested in active and passive funds in Europe as of this review. We plan to increase the number of categories in annual updates of this analysis.

We calculate equal-weighted and asset-weighted average fees for each category and aggregate the results to provide an overview of broad fee trends. The analysis of equal-weighted average fees provides an insight into the charges levied by fund houses for their products, regardless of the funds’ size. Meanwhile, the analysis of asset-weighted average fees is a measure of what investors paid for the funds in which they were invested during the period. We also separate actively managed funds from passive funds (the latter comprising index-tracking open-end funds and exchange-traded funds). Finally, acknowledging the increasing popularity of ESG investing, we analyse fee trends between the cohort of ESG and mainstream funds.

We use the Key Investor Information Document, or KIID, ongoing charge from 2013 through October 2020 as the common measure for fund fees. All calculations have been carried out at the share class level for open-ended active and passive funds and at the fund level for exchange-traded funds.

Investors were paying lower fund expenses in October 2020 than ever before. Our study found the asset-weighted average ongoing charge across funds was 0.69% in October 2020, a 31% decline from 2013. Over the same period, the equal-weighted average fee came down by 19% to 1.17%. Active and passive funds had declines in fees on both measures, with passive funds leading the charge.

Exhibit 1 Change in Fees



Source: Morningstar Direct. Data as of 30/10/2020.

Trends in Fund Fees Paid by Investors

The asset-weighted average ongoing charge across funds was 0.69% in October 2020, a 31% decline from 2013. Asset-weighted fees fell each year during this span. Compared with December 2019, the average fee paid by fund investors fell by 3%.

The decline in fees is a big positive for investors because fees compound over time and diminish returns. The only certainty when investing is that investors must pay fees every year. The easiest way to improve one's chances of maximising returns over the long term is to keep a tight rein on costs.

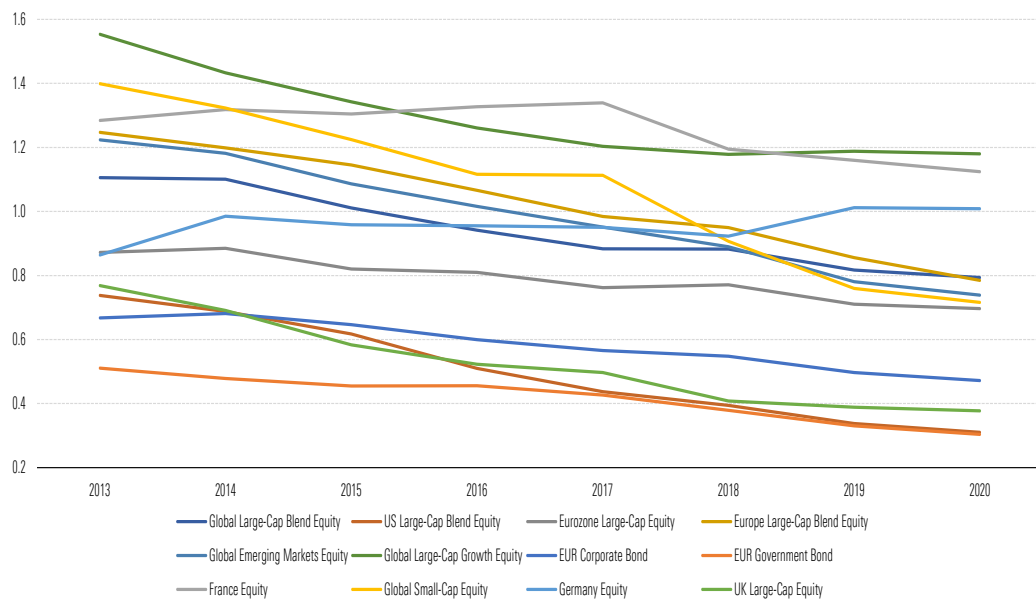
Declines in asset-weighted average fees were more pronounced among passively managed funds thanks to strong flows into the lowest-cost funds, as well as intense fee competition amongst passive asset managers. In aggregate, the asset-weighted fee for passive funds stood at 0.19% in October 2020, down 44% from 0.35% in 2013 and 7% lower than in 2019.

Declines in asset-weighted average fees on the active side were more muted. We calculated an aggregate asset-weighted fee for actively managed funds of 1.12% in October 2020, down 18% from 2013 and 3% from 2019. The decline in fees in the active fund space was largely driven by net outflows from expensive share classes to cheaper ones or into passive funds.

Across broad asset classes, the decline in asset-weighted average fees for the groups of equity and fixed-income categories in the period from 2013 to October 2020 was similar, at around 30%. However, the analysis of year-on-year figures shows that the decline in fees was more pronounced for equity funds than for fixed-income funds until 2017, whereas the latter saw steeper falls thereafter. This has been largely driven by investors responding to fee cuts in passive bond funds, which have accelerated in the past three years.

Competition in the passive bond fund sector has heated up. Many fund sponsors--particularly in the ETF arena--have cut fees or launched new cheaply priced core bond products to challenge the supremacy of iShares. To defend its dominant position, iShares responded with fee cuts for several of its core bond ETFs, which hold many assets. Similarly, in 2019 Vanguard also implemented a substantial fee cut for the retail share class of its popular EUR Government Bond Index Fund, which dropped from 0.25% to 0.12%. All this has pushed down the asset-weighted average fees for the two fixed-income categories we analysed.

Exhibit 2 Asset-Weighted Average Fees by Category



Source: Morningstar Direct. Data as of 30/10/2020.

Trends in Fund Fees Charged by the Industry

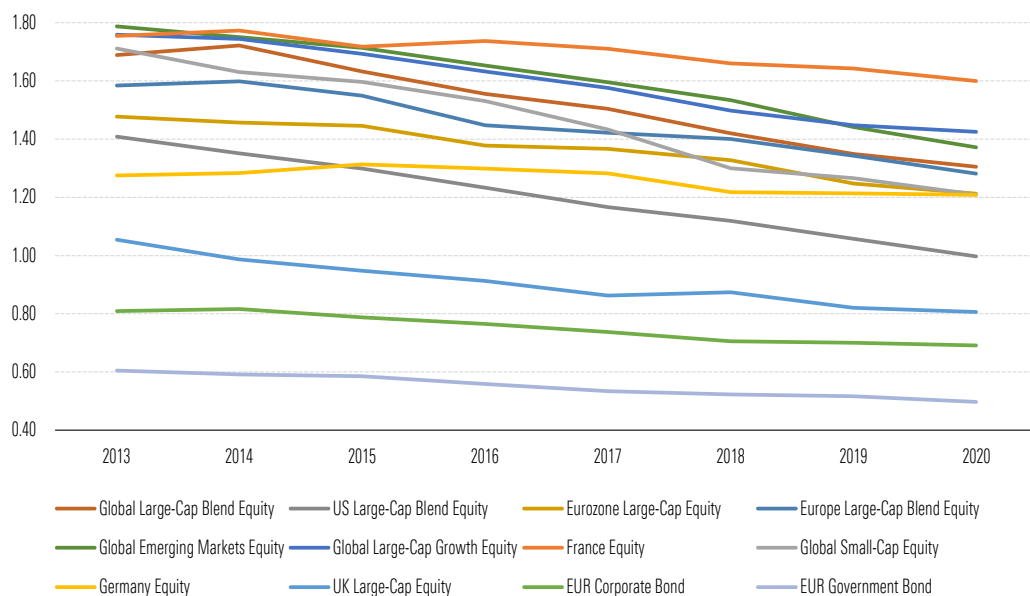
Changes in fees charged by asset managers are represented by trends in the equal-weighted average ongoing charge, which reflects what the asset-management industry is charging for its products, regardless of a fund's size. In October 2020, the equal-weighted average fee across all funds was 1.17%, a decline of 19% from 2013. Compared with December 2019, the average fee charged by all funds we examined fell by 3%.

Passive funds have led the charge in slashing expenses, with an estimated 30% cut in fees since 2013 compared with a 17% reduction among active funds. Most notably, providers of broad-based market-capitalisation-weighted passive funds have been engaged in what has been dubbed a "fee war."

It is only natural that fees have been reduced to single digits among broad-based passive funds. Given these funds' commodity-like nature, it seems inevitable that their prices would be pushed down to the marginal cost of managing them and that assets would consolidate in the hands of few large-scale manufacturers. Fee pressure is spreading into other corners of the market, most notably within the realm of strategic beta and, more recently, ESG ETFs.

Below, we show the equal-weighted average ongoing charge for active and passive funds for the group of Morningstar categories we analysed.

Exhibit 3 Equal-Weighted Average Fees by Category



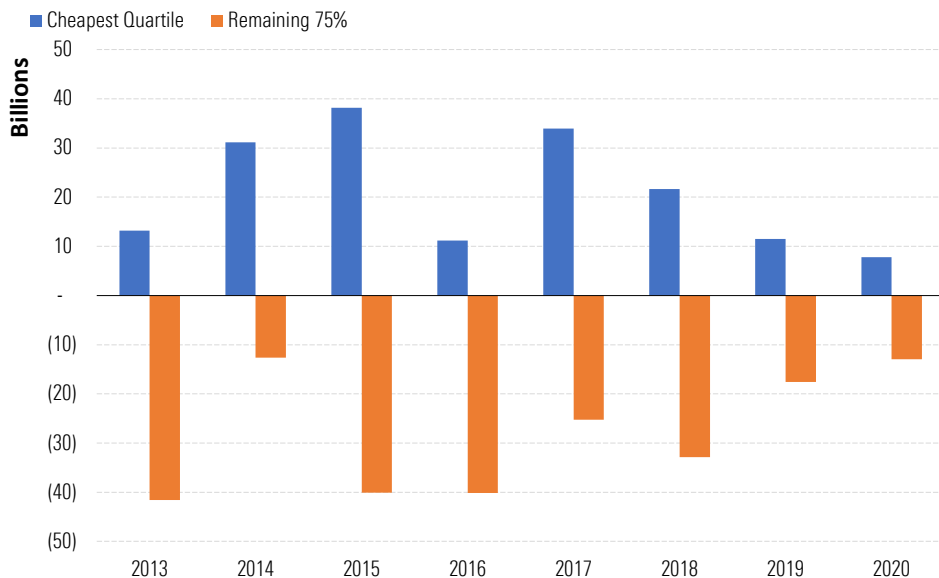
Source: Morningstar Direct. Data as of 30/10/2020.

Asset Flows Favour Lower-Cost Funds and Share Classes

Morningstar research has demonstrated that fees are a reliable predictor of future returns. Low-cost funds generally have greater odds of surviving and outperforming their more-expensive peers. Since 2013, investors have shown a clear preference for lower-cost propositions within the categories we analysed. The sum of flows into funds and share classes charging fees that rank within the bottom

quartile of their category have consistently outpaced flows into funds and share classes in the more-expensive quartiles.

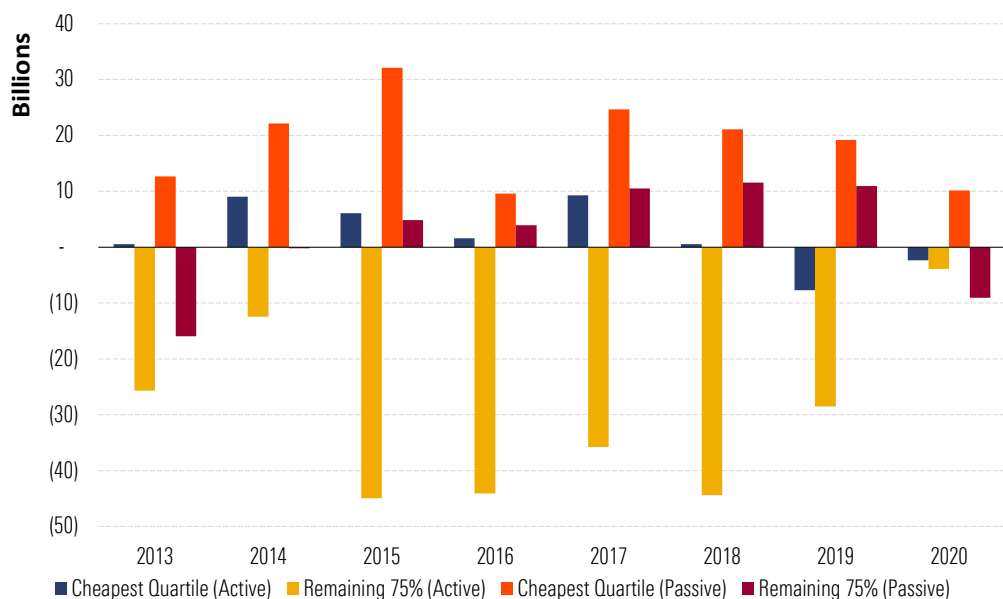
Exhibit 4 Aggregated Flows per Quartile



Source: Morningstar Direct. Data as of 30/10/2020.

Within the cheapest-fee quartile, there is evidence of migration from active funds to passive ones. For example, in the period from January to October 2020, bottom-quartile-fee funds in the categories we analysed netted EUR 8.1 billion, whereas passive funds had inflows of EUR 10.1 billion and active funds suffered outflows of EUR 2 billion.

Exhibit 5 Aggregated Flows by Quartile and Investment Style



Source: Morningstar Direct. Data as of 30/10/2020.

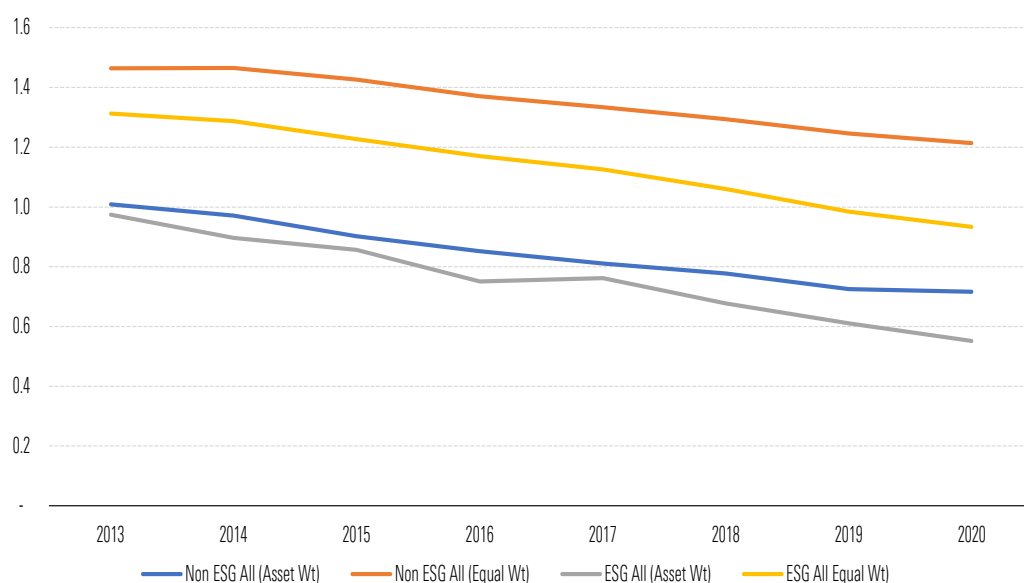
Trends in Sustainable Funds

ESG is increasingly at the forefront of investors' minds. In fact, the trend toward sustainable investing has accelerated in the past couple of years, with a wider choice of ESG strategies being offered to investors. One of the main questions that investors pose is whether choosing ESG funds comes at a fee premium relative to mainstream propositions. This question is particularly relevant for the group of investors who remain unsure of whether investing sustainably means sacrificing performance.

In that respect, in a study published in June 2020,¹ Morningstar found that average returns and success rates for sustainable funds across seven Morningstar categories suggest that there is no performance trade-off associated with sustainable funds. In fact, the study found that most sustainable funds have outperformed their traditional peers over multiple time horizons.

We found that, for the group of categories we analysed, the average fees charged by the consolidated cohort of ESG funds, that is, considering both active and passive funds, are lower than those for the group of non-ESG peers. In October 2020, the asset-weighted average fee for ESG funds was 0.57%, whereas it was 0.71% for non-ESG funds. Meanwhile in equal-weighted terms, the average fee for ESG funds was 0.93%, and for non-ESG it was 1.21%.

Exhibit 6 Change in Fees for ESG and non-ESG Funds



Source: Morningstar Direct. Data as of 30/10/2020.

In the last couple of years ESG funds have grown in popularity and the space is becoming increasingly competitive for both active and passive funds. Also, it is important to note that our data reflect a comparatively large weight of low-cost passive funds in the ESG cohort of some of the most popular categories that we analysed. For example, in the case of U.S. Large Cap Blend equity, assets in ESG passive funds account for 73% of the total in ESG investments.

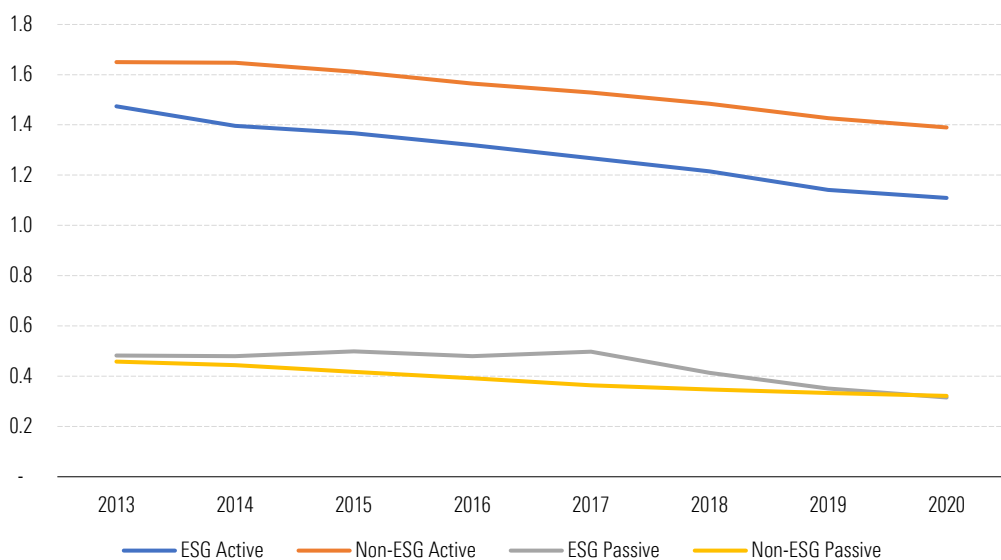
¹ [How Does European Sustainable Funds' Performance Measure Up?](#)

Both ESG and non-ESG funds have seen fees fall since 2013 but ESG fund fees have experienced a sharper decline. In asset-weighted terms, the average fee for ESG funds dropped by 42% and for non-ESG funds by 29.6%. In equal-weighted terms, the average fee for ESG funds fell by 29% and for non-ESG by 17%. The declines in fees has been steeper for passive funds.

On both fee measures, we find that average fees for both active and passive funds have dropped for most categories, with passive funds leading the charge (see tables in annex). Unsurprisingly, ESG passive funds charge lower fees across all categories. The exception is the Germany equity category where there are only two funds, including one that charges 1.75% and 2.21% for its share classes and is the only passive ESG fund launched prior to December 2019. In 2020, Lyxor launched a DAX 50 ETF with an ongoing charge of 0.23%.

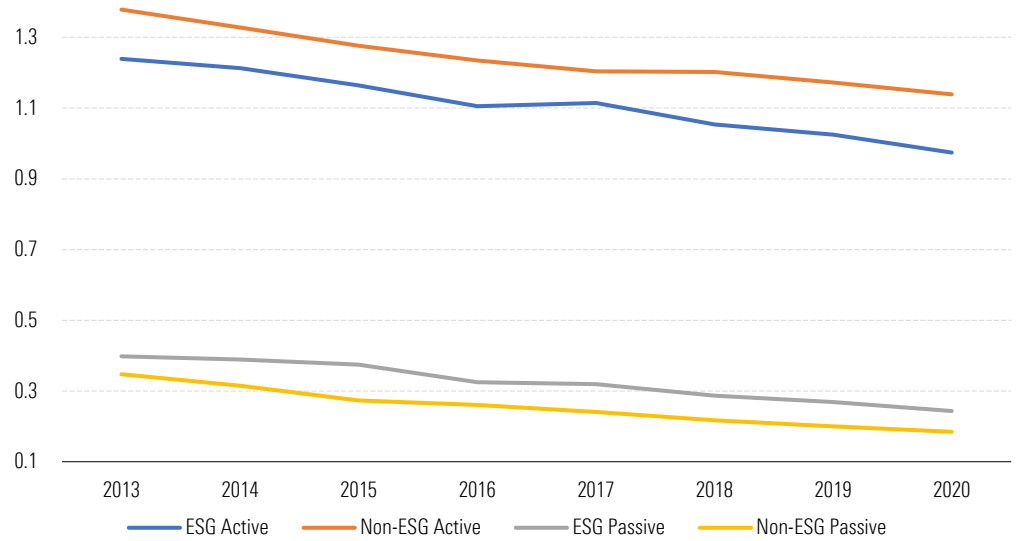
Looking separately at active and passive ESG relative to their non-ESG counterparts (see exhibits 7 and 8), we found that, on average, fees for active ESG funds are lower than those for non-ESG funds, while fees for passive ESG funds are higher than those for non-ESG funds. The latter can be explained by the fact that many passive non-ESG funds in popular categories such as U.S. Large Cap Blend equity charge rock-bottom fees. For example, there are ETFs tracking the standard S&P 500 index with ongoing charges as low as 0.05%.

Exhibit 7 Change in Equal-Weighted Fees for ESG and non-ESG Funds by Investment Style



Source: Morningstar Direct. Data as of 30/10/2020.

Exhibit 8 Change in Asset-Weighted Fees for ESG and non-ESG Funds by Investment Style

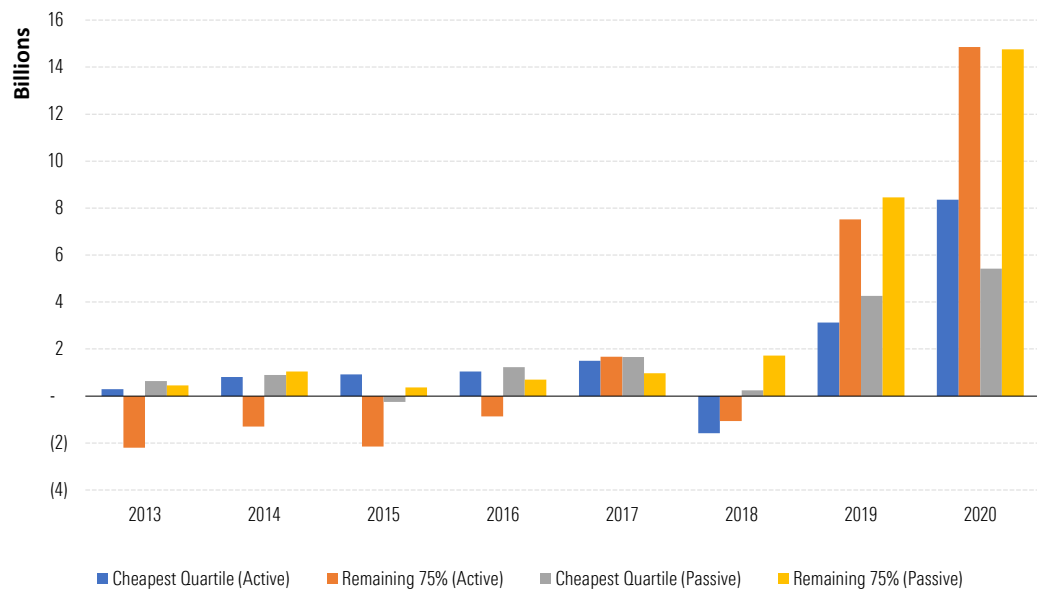


Source: Morningstar Direct. Data as of 30/10/2020.

Mixed-Flow Picture for Sustainable Funds

Flows into ESG funds in the categories we analysed, both active and passive, have grown exponentially in 2019 and 2020 relative to previous periods. Sustainable funds have proved a big draw in 2020 driven by increased investor interest in environmental and social issues, especially in the wake of the COVID-19 crisis.

Exhibit 9 Aggregated ESG Fund Flows by Investment Style



Source: Morningstar Direct. Data as of 30/10/2020.

With the interest for ESG strongly on the rise, we find that the flow picture in 2019 and 2020 is structurally biased toward funds in the more-expensive quartiles. In the case of passive ESG funds we find that fee ranges are tight, and in the cheapest-fee quartile we typically find funds which only apply basic exclusions, whereas funds that combine exclusions and best-in-class selection, and which investors now prefer, fall into the more-expensive fee quartiles.

For example, the threshold for the cheapest-fee quartile for passive ESG funds in the U.S. Large Cap category is 0.12%. Funds in the cheapest quartile include the likes of iShares MSCI USA ESG Screened ETF, with assets of EUR 1.8 billion and an ongoing charge of 0.07%. It only screens out controversial weapons, nuclear weapons, tobacco, thermal coal, oil sands, civilian firearms, and UN Global compact violators. Meanwhile, the iShares MSCI USA SRI ETF, which applies a best-in-class selection in addition to basic exclusions, is more popular with investors having amassed assets of EUR 5 billion, but charges 0.20%.

The picture for active ESG funds is a bit more mixed. The cheapest share classes have gained flows, while the more expensive have typically seen outflows. However, in 2019 and 2020 funds in the more-expensive fee quartiles have attracted more flows than funds in the cheapest-fee quartile. In these two years, funds managed by Nordea, Vontobel, Royal London, and Liontrust, all of which levy ongoing charges higher than the bottom quartile's threshold, have been net recipients of flows. For example, the Nordea Global Sustainability Enhanced Equity Fund gathered over EUR 2.3 billion in 2019 and 2020. ■■

Appendix - Tables

Exhibit 10 Consolidated Fees

Grouping	2013	2014	2015	2016	2017	2018	2019	2020
All (Asset Wt)	1.01	0.97	0.90	0.85	0.81	0.77	0.71	0.69
Active (Asset Wt)	1.37	1.32	1.27	1.23	1.20	1.19	1.16	1.12
Passive (Asset Wt)	0.35	0.32	0.28	0.26	0.25	0.22	0.21	0.19
Equity (Asset Wt)	1.17	1.13	1.04	0.98	0.93	0.89	0.83	0.81
Fixed Income (Asset Wt)	0.65	0.64	0.61	0.59	0.57	0.53	0.50	0.46
All (Equal Wt)	1.45	1.45	1.41	1.35	1.31	1.27	1.21	1.17
Active (Equal Wt)	1.63	1.62	1.58	1.54	1.50	1.45	1.39	1.35
Passive (Equal Wt)	0.46	0.45	0.42	0.40	0.38	0.35	0.34	0.32
Equity (Equal Wt)	1.59	1.59	1.54	1.47	1.43	1.37	1.31	1.26
Fixed Income (Equal Wt)	0.71	0.71	0.69	0.67	0.64	0.62	0.62	0.61

Source: Morningstar Direct. Data as of 30/10/2020.

Exhibit 11 Asset-Weighted Fees by Category

Morningstar Category	2013	2014	2015	2016	2017	2018	2019	2020
Global Large-Cap Blend Equity	1.11	1.10	1.01	0.94	0.88	0.88	0.82	0.79
US Large-Cap Blend Equity	0.74	0.69	0.62	0.51	0.44	0.39	0.34	0.31
Eurozone Large-Cap Equity	0.87	0.89	0.82	0.81	0.76	0.77	0.71	0.70
Europe Large-Cap Blend Equity	1.25	1.20	1.15	1.07	0.98	0.95	0.86	0.78
Global Emerging Markets Equity	1.22	1.18	1.09	1.02	0.95	0.89	0.78	0.74
Global Large-Cap Growth Equity	1.55	1.43	1.34	1.26	1.20	1.18	1.19	1.18
France Equity	1.28	1.32	1.30	1.33	1.34	1.19	1.16	1.12
Global Small-Cap Equity	1.40	1.32	1.22	1.12	1.11	0.91	0.76	0.72
Germany Equity	0.86	0.99	0.96	0.96	0.95	0.92	1.01	1.01
UK Large-Cap Equity	0.77	0.69	0.58	0.52	0.50	0.41	0.39	0.38
EUR Corporate Bond	0.67	0.68	0.65	0.60	0.57	0.55	0.50	0.47
EUR Government Bond	0.51	0.48	0.46	0.46	0.43	0.38	0.33	0.30

Source: Morningstar Direct. Data as of 30/10/2020.

Exhibit 12 Equal-Weighted Fees by Category

Morningstar Category	2013	2014	2015	2016	2017	2018	2019	2020
Global Large-Cap Blend Equity	1.69	1.72	1.63	1.56	1.50	1.42	1.35	1.31
US Large-Cap Blend Equity	1.41	1.35	1.30	1.23	1.17	1.12	1.06	1.00
Eurozone Large-Cap Equity	1.48	1.46	1.45	1.38	1.37	1.33	1.25	1.21
Europe Large-Cap Blend Equity	1.58	1.60	1.55	1.45	1.42	1.40	1.34	1.28
Global Emerging Markets Equity	1.79	1.75	1.71	1.65	1.60	1.53	1.44	1.37
Global Large-Cap Growth Equity	1.76	1.74	1.69	1.63	1.58	1.50	1.45	1.42
France Equity	1.75	1.77	1.72	1.74	1.71	1.66	1.64	1.60
Global Small-Cap Equity	1.71	1.63	1.60	1.53	1.43	1.30	1.27	1.21
Germany Equity	1.28	1.28	1.31	1.30	1.28	1.22	1.21	1.21
UK Large-Cap Equity	1.05	0.99	0.95	0.91	0.86	0.87	0.82	0.81
EUR Corporate Bond	0.81	0.82	0.79	0.77	0.74	0.71	0.70	0.69
EUR Government Bond	0.60	0.59	0.59	0.56	0.53	0.52	0.52	0.50

Source: Morningstar Direct. Data as of 30/10/2020.

Exhibit 13 Consolidated ESG and Non-ESG Fees

Grouping	2013	2014	2015	2016	2017	2018	2019	2020
Non ESG All (Asset Wt)	1.01	0.97	0.90	0.85	0.81	0.78	0.73	0.72
Non ESG Active (Asset Wt)	1.38	1.33	1.28	1.23	1.20	1.20	1.17	1.14
Non ESG Passive (Asset Wt)	0.35	0.32	0.27	0.26	0.24	0.22	0.20	0.18
ESG All (Asset Wt)	0.97	0.90	0.86	0.75	0.76	0.68	0.61	0.55
ESG Active (Asset Wt)	1.24	1.21	1.16	1.11	1.11	1.05	1.03	0.97
ESG Passive (Asset Wt)	0.40	0.39	0.38	0.33	0.32	0.29	0.27	0.24
Non ESG All (Equal Wt)	1.46	1.46	1.43	1.37	1.33	1.29	1.25	1.21
Non ESG Active (Equal Wt)	1.65	1.64	1.61	1.56	1.53	1.48	1.43	1.39
Non ESG Passive (Equal Wt)	0.46	0.44	0.42	0.39	0.36	0.35	0.33	0.32
ESG All Equal Wt)	1.31	1.29	1.23	1.17	1.13	1.06	0.98	0.93
ESG Active Equal Wt)	1.45	1.41	1.35	1.31	1.26	1.22	1.16	1.11
ESG Passive Equal Wt)	0.48	0.48	0.48	0.46	0.47	0.40	0.35	0.32

Source: Morningstar Direct. Data as of 30/10/2020.

Exhibit 14 Active ESG Asset-Weighted Fees by Category

Morningstar Category	2013	2014	2015	2016	2017	2018	2019	2020
Global Large-Cap Blend Equity	1.30	1.40	1.31	1.34	1.27	1.33	1.09	1.13
US Large-Cap Blend Equity	1.30	0.95	1.24	1.37	1.23	1.10	0.81	0.78
Eurozone Large-Cap Equity	1.03	1.22	1.18	1.16	1.09	1.07	1.13	1.06
Europe Large-Cap Blend Equity	1.43	1.41	1.29	1.30	1.22	1.16	1.10	0.97
Global Emerging Markets Equity	1.70	1.52	1.44	1.42	1.43	1.42	1.32	1.15
Global Large-Cap Growth Equity	1.65	1.28	1.29	1.26	1.17	1.16	1.14	1.12
France Equity	1.11	2.11	2.11	1.99	1.85	1.82	1.70	1.66
Global Small-Cap Equity	-	1.92	1.88	1.79	1.81	1.83	1.83	1.35
Germany Equity	-	-	-	-	-	-	-	-
UK Large-Cap Equity	-	1.52	1.48	1.40	1.29	1.24	1.19	1.03
EUR Corporate Bond	0.67	0.75	0.86	0.69	0.63	0.60	0.55	0.58
EUR Government Bond	0.48	0.54	0.54	0.54	0.54	0.54	0.54	0.53

Source: Morningstar Direct. Data as of 30/10/2020.

Exhibit 15 Passive ESG Asset-Weighted Fees by Category

Morningstar Category	2013	2014	2015	2016	2017	2018	2019	2020
Global Large-Cap Blend Equity	0.47	0.27	0.28	0.29	0.29	0.29	0.30	0.29
US Large-Cap Blend Equity	0.37	0.30	0.30	0.30	0.26	0.26	0.25	0.23
Eurozone Large-Cap Equity	0.40	0.75	0.65	0.57	0.43	0.32	0.27	0.25
Europe Large-Cap Blend Equity	0.20	0.56	0.50	0.50	0.33	0.35	0.29	0.24
Global Emerging Markets Equity	-	1.03	1.01	0.81	0.52	0.53	0.40	0.37
Global Large-Cap Growth Equity	-	-	-	-	-	-	-	-
France Equity	-	-	-	-	-	-	-	-
Global Small-Cap Equity	-	-	-	-	-	-	0.58	0.58
Germany Equity	-	-	-	1.49	1.76	1.59	1.74	1.41
UK Large-Cap Equity	-	-	-	0.28	1.15	1.07	0.97	0.26
EUR Corporate Bond	-	0.32	0.31	0.27	0.28	0.24	0.23	0.20
EUR Government Bond	-	-	-	-	-	-	0.17	0.17

Source: Morningstar Direct. Data as of 30/10/2020.

Exhibit 16 Active ESG Equal-Weighted Fees by Category

Morningstar Category	2013	2014	2015	2016	2017	2018	2019	2020
Global Large-Cap Blend Equity	1.63	1.59	1.49	1.48	1.45	1.38	1.23	1.15
US Large-Cap Blend Equity	1.46	1.16	1.33	1.35	1.32	1.14	1.07	1.07
Eurozone Large-Cap Equity	1.11	1.71	1.53	1.49	1.48	1.44	1.42	1.38
Europe Large-Cap Blend Equity	1.65	1.49	1.36	1.35	1.30	1.33	1.35	1.17
Global Emerging Markets Equity	1.61	1.91	1.77	1.79	1.73	1.52	1.46	1.32
Global Large-Cap Growth Equity	1.89	1.61	1.63	1.49	1.43	1.43	1.34	1.21
France Equity	1.47	1.63	1.60	1.53	1.29	1.20	1.12	1.32
Global Small-Cap Equity	-	2.19	1.88	1.54	1.54	1.56	1.67	1.46
Germany Equity	-	-	-	-	-	-	-	-
UK Large-Cap Equity	-	1.34	0.94	0.92	0.88	0.86	0.91	0.86
EUR Corporate Bond	0.89	0.81	0.88	0.80	0.76	0.71	0.69	0.69
EUR Government Bond	0.56	0.79	0.73	0.72	0.72	0.66	0.62	0.58

Source: Morningstar Direct. Data as of 30/10/2020.

Exhibit 17 Passive ESG Equal-Weighted Fees by Category

Morningstar Category	2013	2014	2015	2016	2017	2018	2019	2020
Global Large-Cap Blend Equity	0.50	0.46	0.45	0.46	0.42	0.48	0.42	0.39
US Large-Cap Blend Equity	0.42	0.42	0.41	0.42	0.35	0.36	0.36	0.29
Eurozone Large-Cap Equity	0.39	0.60	0.55	0.57	0.49	0.56	0.51	0.39
Europe Large-Cap Blend Equity	0.20	0.44	0.43	0.43	0.39	0.40	0.34	0.30
Global Emerging Markets Equity	-	1.02	0.94	0.80	0.68	0.59	0.43	0.39
Global Large-Cap Growth Equity	-	-	-	-	-	-	-	-
France Equity	-	-	-	-	-	-	-	-
Global Small-Cap Equity	-	-	-	-	-	-	0.45	0.45
Germany Equity	-	-	-	1.58	1.79	1.72	1.74	1.47
UK Large-Cap Equity	-	-	-	0.28	0.89	0.89	0.89	0.19
EUR Corporate Bond	-	0.32	0.31	0.28	0.28	0.25	0.28	0.26
EUR Government Bond	-	-	-	-	-	-	0.23	0.22

Source: Morningstar Direct. Data as of 30/10/2020.

Appendix - Methodology**Data Source**

Morningstar Direct. Europe-domiciled open-end and exchange-traded funds.

Ongoing Charge

We calculate our asset-weighted and equal-weighted average fees using the fund share classes' ongoing charge as stipulated in the Key Investor Information Document, or KIID.

Calculation Period

The calculation period begins in January 2013 and ends in October 2020.

Universe

The universe is made up of 10 equity and two fixed-income categories. We exclude funds and share classes for which we do not have both asset flows and ongoing charge information. We exclude share classes of open-end active funds with ongoing charges below 0.15% and and share classes of open-end passive traditional index funds with ongoing charges below 0.04%. This is because, in most cases, such share classes have negotiable fees, generally command very high minimum investment requirements, and are only available to a selected group of large institutional investors. This fee cut-off does not apply to exchange traded funds, as they come with a single ongoing charge structure applicable to all investors.

European Sustainable Fund Universe

The European sustainable fund universe encompasses open-end funds and exchange-traded funds domiciled in Europe that, by prospectus, fact sheet, or other available resources, claim to have a sustainability objective and/or use binding ESG criteria for their investment selection. The sustainable funds group does not contain funds that employ only limited exclusionary screens such as controversial weapons, tobacco, and thermal coal, nor does it contain the growing number of funds that now formally integrate ESG considerations in a nondeterminative way for their investment selection. Money market funds, feeder funds, and funds of funds are excluded funds.

Asset-Weighted Fees

We calculate the asset-weighted fees for each cohort using each share class' monthly assets and last available ongoing charge for the prior year. When a fund becomes obsolete, its historical asset-weighted fee remains in the sample.

Equal-Weighted Fees

We calculate the equal-weighted fees for each cohort using each share class' last available ongoing charge for the previous year that is then aggregated to derive a fund-level figure.

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