
Beyond the Label, ESG Funds May Miss Their Mark

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KEY TAKEAWAYS

- Components of ESG in an investment strategy, how they're measured, and the method of incorporation can lead to a wide range of investment outcomes.
- ESG strategies exhibit a broad spectrum of characteristics, which may drive expected returns that differ from the market.
- Greenhouse gas emissions exposure has varied substantially across ESG strategies, highlighting the importance of looking beyond ESG labels to determine whether an ESG investment is consistent with one's goals.

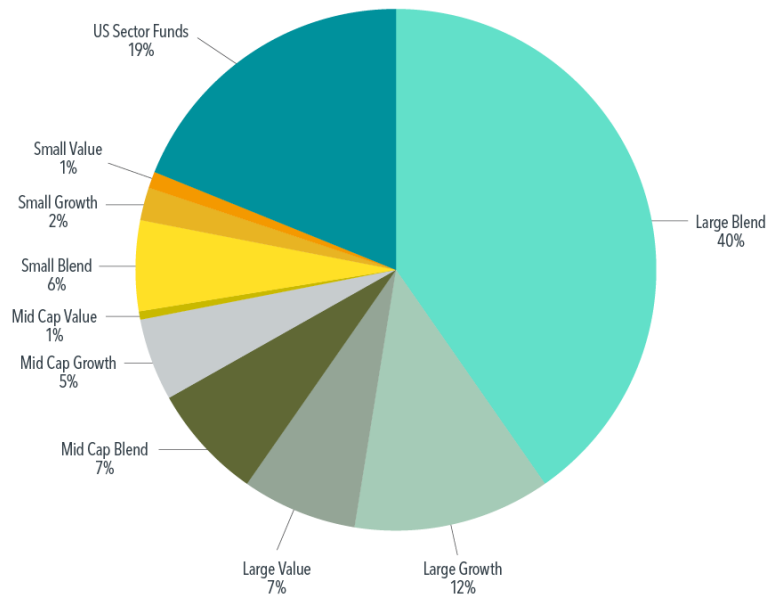
The absence of a universally accepted definition of environmental, social, and governance (ESG) investing has resulted in a broad array of approaches.¹ This presents a potential dilemma for investors, as the components of ESG considered in an investment strategy, variables by which they are measured, and the method of incorporation can lead to a wide range of investment outcomes. Our study of US-domiciled ESG-focused funds highlights a variety of both fund characteristics and sustainability profiles, a reminder that investors may need to look beyond ESG branding to evaluate whether an investment approach is consistent with their goals.

MANY FLAVORS TO ESG INVESTING

The first sign of a varied ESG investment landscape is the breadth of investment categories among ESG-focused strategies. **Exhibit 1** shows the Morningstar category breakdown for a sample of US equity mutual funds and ETFs categorized as "Sustainable Investments" as of June 30, 2021. While the majority of the \$214 billion in this sample's assets under management (AUM) is focused on large cap stocks, the 196 ESG funds are spread across 17 categories spanning size, style, and sector composition. In contrast to the mutual fund industry at large, the majority of these ESG funds are actively managed; less than 40% by net assets were categorized as index funds.

Exhibit 1**Variety Show**

US equity funds with a sustainability focus, percentage of AUM by Morningstar category, as of June 30, 2021



Source: Morningstar. Sample includes all US-domiciled open-end and exchange-traded equity funds that invest in US equities only that are categorized as Sustainable Investments-Overall based on the Morningstar Sustainability attributes field, as of June 30, 2021. Morningstar defines a fund as a Sustainable Investment-Overall if it is described as focusing on sustainability or impact or as considering ESG factors in its prospectus, offering document, or regulatory filings.

While research suggests ESG characteristics do not provide additional information about expected returns (Bebchuk et al., 2013; Blitz and Fabozzi, 2017; Dai and Meyer-Brauns 2020; Polbennikov et al., 2016), an emphasis on ESG characteristics might impact the performance of ESG strategies. For example, if the incorporation of ESG considerations leads to a systematic over- or underweighting of drivers of expected returns, such as size, relative price, or profitability, the expected returns of ESG strategies may be systematically higher or lower than the expected return of the market.

Viewed in aggregate, ESG-focused US equity funds differ from the broad US market. Characteristics for an asset-weighted sample of ESG funds as of June 30, 2021, in **Exhibit 2** show a tilt toward higher relative price and smaller market capitalization than the Russell 3000 Index. Interestingly, the number of distinct US stocks included in the aggregate ESG sample totals more than 2,800, approaching the index's 3,009 holdings. This implies that, depending on whom you ask, more than 90% of stocks in the US market fit the bill for ESG investing.

Aggregate characteristics obscure the range of outcomes across ESG strategies. Exhibit 2 also shows characteristics for the cross-section of ESG funds at the 25th, 50th, and 75th percentiles of the distribution. Portfolio positioning runs the full spectrum along all three characteristics. In particular, the interquartile range of weighted average market cap spans from a market-like \$466 billion down to under \$27 billion, the latter bordering on mid cap territory. The observed variation in size, relative price, and profitability implies meaningful differences in expected returns among these funds.

Exhibit 2

All Shapes and Sizes

US equity sustainability funds aggregate characteristics, as of June 30, 2021

	Russell 3000 Index	Aggregate US Sustainability Fund Sample	Percentiles of US Sustainability Fund Sample		
			25th Percentile	50th Percentile	75th Percentile
Valuation					
Aggregate Price-To-Book (No negatives)	4.17	5.33	4.05	5.01	6.21
Size					
Weighted Average Total Market Capitalization (millions)	\$449,354.40	\$343,499.58	\$27,995.72	\$220,150.90	\$466,454.86
Profitability					
Weighted Average Profitability	0.47	0.46	0.23	0.42	0.57
Market					
Number of Holdings Across all Funds	3,009	2,870	36	58	195

Data source: Morningstar. Sample includes all US-domiciled open-end and exchange-traded equity funds that invest in US equities only that are categorized as Sustainable Investments-Overall based on the Morningstar Sustainability attributes field, as of June 30, 2021. The aggregate sample of US sustainability funds is asset-weighted and based on individual fund holdings. To be included, a share class must have had net assets on June 30, 2021. Securities with negative book values are excluded when computing aggregate price-to-book ratios. Frank Russell Company is the source and owner of the trademarks, service marks, and copyrights related to the Russell Indexes.

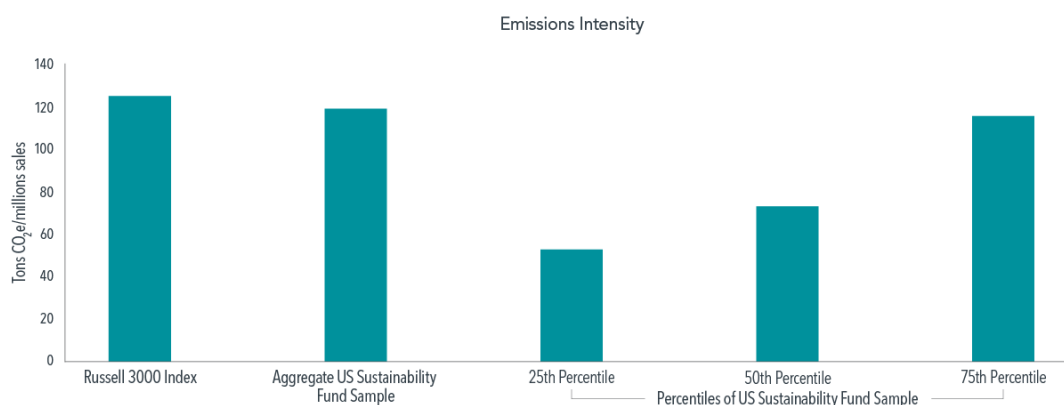
In addition to the broad range of individual fund characteristics, the results indicate many ESG funds select only a small subset of companies, an approach that leads to a limited investment universe and lower diversification. For example, Exhibit 2 shows that, at the 25th percentile, the number of stocks held in a sustainability fund is just 36.

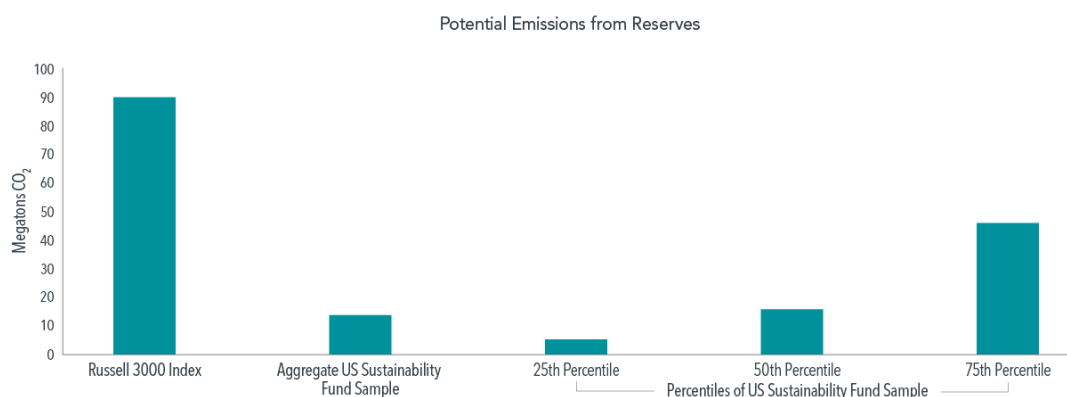
With so many approaches to ESG investing, one might expect substantial variation when assessing strategies through the lens of any individual ESG measure. This is exactly what we see in the greenhouse gas (GHG) emissions exposure data for our sample of ESG funds. As shown in **Exhibit 3**, both the emissions intensity and potential emissions of ESG funds in aggregate are meaningfully lower than those of the broad market. But the range of reduction is considerable. For example, for the 75th percentile of funds, emissions intensity is 7% lower than that of the Russell 3000 Index; by comparison, the reduction is 58% at the 25th percentile.

Exhibit 3

Looking Under the Hood

Emissions exposure for the US equity sustainability fund sample, as of June 30, 2021





Sample includes all US-domiciled open-end and exchange-traded equity funds that invest in US equities only that are categorized as Sustainable Investments-Overall based on the Morningstar Sustainability attributes field, as of June 30, 2021. Source: Morningstar. The aggregate sample of US sustainability funds is asset-weighted and based on individual fund holdings. To be included, a share class must have had net assets on June 30, 2021. Greenhouse Gas Emissions Intensity represents a company's recently reported or estimated Scope 1 (direct) + Scope 2 (indirect) greenhouse gas emissions in carbon dioxide equivalents (CO₂) normalized by sales in USD (metric tons CO₂ per USD million sales). Potential Emissions from Reserves is a theoretical estimate of carbon dioxide produced if a company's reported reserves of oil, gas, and coal were converted to energy, given estimated carbon and energy densities of the respective reserves. Source: Institutional Shareholder Services Inc (ISS) and MSCI ESG Research Inc. Frank Russell Company is the source and owner of the trademarks, service marks, and copyrights related to the Russell Indexes.

The emissions results are instructive in the context of investor expectations. The latest science² unequivocally pinpoints GHG emissions as the primary contributor to climate change. And data on GHG emissions are widely available for public companies (Chi, Geffroy, Thornton, and Whittington, 2021). To the extent that investors expect an ESG investment to reflect their concerns over environmental sustainability, the wide gamut in emissions exposure outcomes may be disappointing.

A ROAD MAP FOR CHANGE

Our findings show that the ESG label is hardly prescriptive when it comes to investing, highlighting the importance of evaluating an investment approach based on one's goals. Those with concerns over climate change may seek out strategies with reduced exposure to companies and sectors that drive climate change through carbon emissions. That means asking questions of the investment managers to evaluate which ones have delivered on the claim of reducing exposure to emissions vs. simply paying lip service.

Investors should also be wary of claims by ESG managers that their sustainability funds will meaningfully impact climate change. There is a distinction between GHG emissions exposure in one's asset allocation and actual GHG emissions in the real world: just because you're not holding shares of a company doesn't mean it stops burning hydrocarbons. As a result, while managers may use divestment to avoid companies with high greenhouse gas emissions, this does not mean that these types of strategies necessarily have a real-world impact. Investors should make sure that managers claiming to have actual real-world impact can provide objectively measurable reporting that backs up their claims.

GLOSSARY

Relative Price: Refers to a company's price, or the market value of its equity, in relation to another measure of economic value, such as

book value.

Profitability: A company's operating income before depreciation and amortization minus interest expense scaled by book equity.

Price to Book: The ratio of a firm's market value to its book value, where market value is computed as price multiplied by shares outstanding and book value is the value of stockholders' equity as reported on a company's balance sheet.

Market Capitalization: The total market value of a company's outstanding shares, computed as price times shares outstanding.

Asset-Weighted Sample: A sample that weights each fund in proportion to its fund assets under management.

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1. See Berg, Kölbel, and Rigobon (2020) and Chi, Geffroy, Thornton, and Whittington (2021).
 2. Per the Intergovernmental Panel on Climate Change 2021 study: [AR6 Climate Change 2021: The Physical Science Basis — IPCC](#).

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