Key Features Asset-Weighted Expense Ratio Active/Passive Exposure Open/Closed Architecture Total Net Assets (\$M) Silver 0.73% 88% Active 100% Closed 164,048

Executive Summary	Rating:
Process	Positive

Management's research suggests investors spend more money in retirement than they anticipate and risk outliving their savings. As a result, the funds' glide path has a higher equity allocation than many of its rivals', both before and during retirement. The majority of the underlying funds come recommended via their Morningstar Analyst Ratings.

Price • Neutral

This series' funds aren't as cheap as peers that invest in passively managed options, but they are reasonably priced, especially compared with series that invest predominantly in active strategies.

The series' three-, five-, and 10-year returns through December 2017 handily outpaced the majority of its peers'. But the funds' relatively heavy equity stake can lead to greater short-term volatility than many rivals. For example, the funds lost more than their average competitor during 2008's market slide and rebounded more sharply than most during 2009's rally.

T. Rowe Price's asset-allocation committee makes the strategic decisions for the funds, while firm veteran Jerome Clark leads a group of associate managers who run the funds' day-to-day operations. Longtime team member Wyatt Lee joined the manager roster in August 2015. The underlying funds largely feature solid, proven managers.

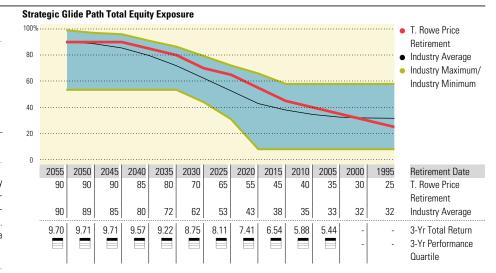
T. Rowe Price's corporate culture and regulatory history are impressive. The firm stresses long-term investing, high-quality securities, and sensible risk management. T. Rowe also does a good job describing its target-date funds and communicating with investors. Manager transitions are typically planned well in advance.

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Analyst Rating Spectrum





Morningstar Opinion

Available Funds

2005 Fund

2010 Fund

2015 Fund

Strong underlying funds and a robust asset-allocation approach give the T. Rowe Price Retirement series a discernible edge, earning a Morningstar Analyst Rating of Silver.

2020 Fund

2025 Fund

2030 Fund

Jerome Clark has served as the series' lead manager since its 2002 inception, and Wyatt Lee joined the roster in 2015. The firm has invested heavily in its target-date team, which now stands at 30 members. That's an impressive size, and the firm plans to continue growing the multi-asset group.

With the risk of outliving one's assets in mind, the group designed a glide path that looks more aggressive than the typical competitor's. Except for the early savings years and about 20 years after retirement, the series keeps a higher equity weighting than the industry norm throughout the glide path.

In late 2017, the series began making changes within the bond sleeve. It's reducing exposure to an intermediate-term fixed-income fund to 45% of the bond sleeve to make way for an unconstrained bond fund and a hedged international-bond fund, which will take 10% and 15% of bond assets, respectively. As lower-volatility strategies, those funds represent core bond allocations. The remaining 30% of the bond sleeve will strategically shift exposures to more-volatile sectors, including high-yield bonds, emerging-markets debt, bank loans, and long Treasuries as the investor ages. (Previously, this allocation held 10%

Leo Acheson

2035 Fund

2040 Fund

2045 Fund

Analyst - Fund of Fund Strategies 02-02-2018

weightings in unhedged foreign bonds, emerging-markets debt, and high-yield bonds.) Once these changes are complete, about 35% to 60% of each target-date fund's bond sleeve will be altered, depending on the fund year. T. Rowe Price conducted in-depth analysis to support these changes and believes they will lower total portfolio risk without impacting returns.

2050 Fund

2055 Fund

2060 Fund

Following the bond sleeve changes, the series will hold 21 unique underlying funds. Overall, it's a compelling lineup. We rate 15 of those, and 14 are Morningstar Medalists, meaning we expect them to outperform peers going forward.

The bond sleeve changes didn't stem from performance concerns. During the last 10 years, all of the series' funds outpaced at least 95% of peers. An equity-heavy glide path has helped. Attribution from T. Rowe Price indicates that it has also added significant value from security selection, and tactical allocation had a modestly positive effect.

Strong returns have attracted investors, and the team now manages more than \$225 billion in target-date assets. Four of the series' five small- and mid-cap funds are closed to new investors, so continued growth could create capacity constraints. The series has the option to invest in small- and mid-cap index funds, but access to top-tier active funds has been a key strength, so we will keep an eye on changes in this area.



Process: Approach

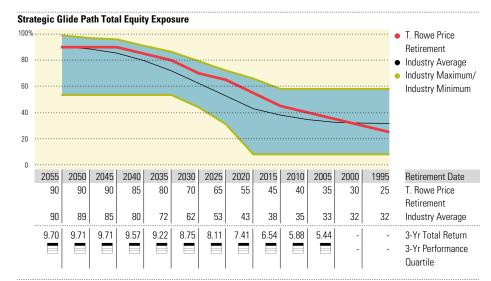
In conducting extensive in-house studies, T. Rowe Price found that 401(k) plan participants' average savings rate was less than half the recommended rate, while the average withdrawal rate was more than twice the recommended rate. The firm concluded that retirees' biggest risk is outliving their savings. As a result, it emphasizes sizable exposure to stocks to boost asset growth.

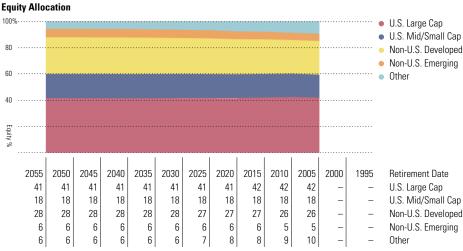
The series has a relatively aggressive asset-allocation glide path. It begins with a 90% equity/10% fixedincome portfolio when investors are the furthest from retirement. That split roughly matches the typical peer 40 years from retirement, but the series' funds maintain a higher equity stake than most rivals both leading up to and during retirement. The funds slowly transition from stocks to bonds at the end of each guarter until they reach the target allocation of 55% equity at retirement. The shifting doesn't stop at retirement, because T. Rowe Price doesn't view the retirement year as a distinct year in the course of an individual's retirement planning. Even after investors arrive at the 55% equity/45% fixed-income allocation at the target retirement date, the quarterly shifts continue for 30 more years until the equity stake plateaus at 20%.

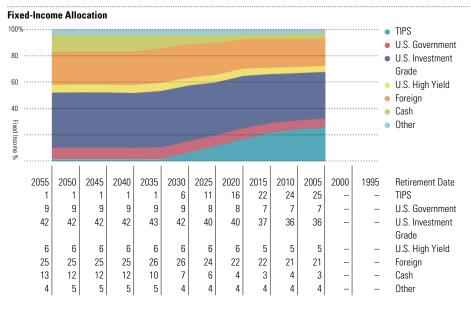
Management has modest leeway to adjust the funds' stock/bond split (up to 5 percentage points) and make sub-asset-class tilts, such as growth versus value stocks or developed-markets versus emerging-markets stocks. A committee of veteran T. Rowe Price managers uses primarily qualitative inputs to determine which asset classes appear to have the most favorable return prospects for the next six to 18 months. The group's tactical tilts have added value over the long haul.

The asset-allocation approach has remained consistent and is supported by sound reasoning, earning the series a Positive Process rating. However, the team could enhance its method for selecting and overseeing underlying managers. The group picked underlying funds based on their mandates and won't swap out strategies unless their approaches or styles change. In fact, the series has not fired a manager since its 2002 inception. Instead, it relies on various steering committees at the firm to provide oversight.











Process: Portfolio

This series and its underlying funds benefit from T. Rowe Price's strong investment culture. Long manager tenures and an emphasis on high-quality securities are common. Following recent fund additions, the series' total number of underlying funds stands at 21, excluding a money market fund. We rate 15 of those funds, and 14 receive medals, including nine Bronzerated funds, two Silver-rated funds, and three Goldrated funds. We upgraded two of those funds during the past year, with T. Rowe Price International Stock increasing to Bronze and T. Rowe Price Emerging Markets Stock increasing to Silver. Overall, the lineup is strong.

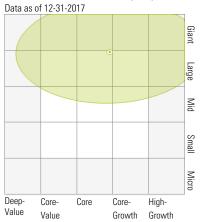
T. Rowe Price revisited the series' bond exposure and began to make changes in late 2017. It added four relatively new fixed-income funds to the underlying mix. As part of the change, the team has reduced exposure to an intermediate-term bond fund to make way for a nontraditional bond fund and swapped an un-

Rating: Positive

hedged international-bond fund for a one that hedges currency exposure. The former fund's inception was in January 2015, and the latter launched in late 2017. Ideally, these funds would have longer track records before joining the series. Meanwhile, the series' exposure to high-yield bonds, emerging-markets debt, bank loans, and long-term Treasuries will vary as the investor ages. (Bank-loan and long-term Treasury funds also represent new fund additions). T. Rowe Price expects these changes to lower volatility and have a neutral effect on returns over the long haul. Indeed, robust research backs these changes.

Over the coming year, the team will take a close look at the firm's equity fund offerings to see if there's anything worth adding to the series. While many of the firm's funds leverage research from a common analyst pool, there's a large number of unique funds to choose from.

Series Holding-based Style Map - Equity



- Zone represents 75% of series' largest domestic stock holdings
- Fund centroid represents weighted average of series' domestic stock holdings

Top Investments as of 12-31-2017									
				3-Yr			5-Yr		
		% of	3-Yr	% Rank	3-Yr	5-Yr	% Rank	Analyst	Star
	Category	Assets	Return %	in Cat	Std Dev	Return %	in Cat	Rating	Rating
T. Rowe Price New Income	Intermediate-Term Bond	17.64	2.26	47	2.77	2.02	51	🐺 Bronze	***
T. Rowe Price Equity Index 500	Large Blend	12.95	11.14	22	10.06	15.50	24	🐺 Bronze	****
T. Rowe Price Growth Stock	Large Growth	11.37	14.53	8	12.10	17.88	11	🐺 Bronze	****
T. Rowe Price Value	Large Value	10.88	9.05	43	10.42	15.08	12	🐺 Bronze	****
T. Rowe Price Overseas Stock	Foreign Large Blend	6.86	8.40	33	10.95	8.17	23	🐺 Bronze	****
T. Rowe Price International Value Eq	Foreign Large Value	6.50	5.59	80	10.90	6.51	56	ः □ Bronze	***
T. Rowe Price International Stock	Foreign Large Growth	5.98	9.17	43	11.55	8.08	52	🐺 Bronze	***
T. Rowe Price Ltd Dur Infl Focus Bd	Inflation-Protected Bond	4.02	0.84	93	1.62	-0.05	42	_	**
T. Rowe Price Emerging Markets Stock	Diversified Emerging Mkts	2.96	12.27	5	14.99	6.47	14	🐺 Silver	***
T. Rowe Price Mid-Cap Growth	Mid-Cap Growth	2.91	12.25	8	10.78	16.98	6	🐯 Gold	****

Total # Holdings

% Portfolio in Top 10 Holdings

Overall Average Morningstar Rating

82.08 3.62

Price

In 2015, T. Rowe Price rolled out a new set of funds, the T. Rowe Price Retirement I series, which mimic the legacy T. Rowe Price Retirement funds but at a lower cost. The I series' fees fell by 5 to 7 basis points during 2017. Its funds now cost between 0.42% and 0.60% and sport a median expense ratio of 0.57%. That's a fair deal compared with series that invest mostly in active underlying funds, though it's not especially compelling, considering that about 14% of series-wide assets reside in an S&P 500

Rating: Neutral

fund. As a result, the series receives a Neutral Price rating.

The no-load share classes of the T. Rowe Price Retirement funds, which hold the bulk of investor assets, also carry reasonable price tags for primarily actively managed target-date funds, with fees ranging from 0.58% to 0.74%. Meanwhile, the Retirement and Advisor share classes look relatively unattractive versus similarly sold peers.

Asset-Weighted Cost vs. Industry Average

T. Rowe Price Retirement

νhΑ

Other

Retirement

 Avg Cost Per Share Class
 Exp Ratio (%)
 Net Assets (\$M)

 No Load
 0.68%
 120,496

 Inst
 0.54%
 16,594

0.93%

1.18%

0.74%



19

0.73%

15 817

11,120

21

Performance

The series' above-average equity allocation shapes its performance. In the immediate years leading up to retirement, it keeps roughly 10 percentage points more in equities than the industry norm and remains above-average throughout most of retirement. Thus, the strength of the equity market can make a big difference in the series' performance pattern. For instance, during 2008's financial crisis, nearly all of the series' funds trailed their peer group averages.

The bold equity allocation has paid off as the market has risen since 2008: The series' funds averaged a topquartile ranking in their peer groups in six of the past

Rating: Positive

nine calendar years. Even during 2011's tumultuous market, the majority of the funds in the series still surpassed their typical peer. That consistent record burnishes the series' long-term results: Among the funds with 10-year records through December 2017, every fund ranks at or near the top of its respective peer group.

The series' above-average equity allocation has resulted in above-average volatility, as measured by standard deviation. But the funds' gains have more than compensated for the bumpy ride. Most of the funds' risk-adjusted returns in the trailing five- and 10-year

periods rank in the top quartile of their categories, helping the series earn a Positive Performance rating.

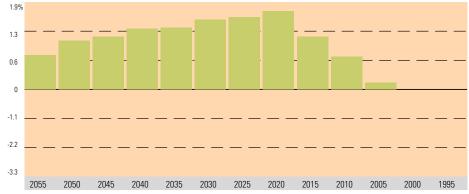
A solid cast of underlying funds further aids the series' overall performance. The underlying funds show a similar level of consistency in their calendar-year rankings as the series' target-date funds, with the majority outperforming their typical peer each year. Eleven of the 19 underlying funds in the series with Morningstar Ratings earn 4 or 5 stars, reflecting their strong long-term, risk-adjusted results.

Toward Data Found Doubermann										
Target-Date Fund Performance as										
	2017	2017 %	2016	2015	3-Yr	3-Yr %	3-Yr	5-Yr	5-Yr %	
	Return %	Rank in Cat	Return %	Return %	Return %	Rank in Cat	Std Dev	Return %	Rank in Cat	Rating
T. Rowe Price Retirement 2005	10.7	37	6.7	-0.7	5.4	20	4.7	6.1	37	****
T. Rowe Price Retirement 2010	11.7	13	7.1	-0.8	5.9	10	5.1	6.9	10	****
T. Rowe Price Retirement 2015	13.3	12	7.3	-0.6	6.5	7	5.9	8.0	1	****
T. Rowe Price Retirement 2020	15.7	1	7.4	-0.3	7.4	1	6.8	9.1	1	****
T. Rowe Price Retirement 2025	17.7	1	7.5	-0.2	8.1	1	7.5	10.1	_	****
T. Rowe Price Retirement 2030	19.4	4	7.7	0.0	8.7	2	8.2	10.9	3	****
T. Rowe Price Retirement 2035	20.9	7	7.6	0.1	9.2	4	8.7	11.5	3	****
T. Rowe Price Retirement 2040	22.0	6	7.6	0.2	9.6	6	9.2	12.0	3	****
T. Rowe Price Retirement 2045	22.4	9	7.7	0.2	9.7	6	9.3	12.0	4	****
T. Rowe Price Retirement 2050	22.4	12	7.7	0.2	9.7	8	9.3	12.0	_	****
T. Rowe Price Retirement 2055	22.3	15	7.7	0.2	9.7	10	9.3	12.0	8	****
T. Rowe Price Retirement 2060	22.3	20	7.6	0.2	9.7	30	9.3	_	_	****

For peer comparisons, 1 = highest return or lowest risk, 100 = lowest return or highest risk

Target Date Funds Risk-Adjusted Returns +/- Category Average

Data as of 12-31-2017

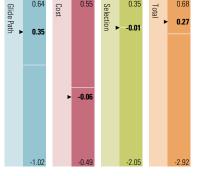


- Risk-adjusted return exceeding category average
- Risk-adjusted return trailing category average
- Category Average

Data is based on longest available performance history: three or five years. For series with more than 18 months of history, but less than three years of history, the risk-adjusted return of the appropriate Morningstar Lifetime Moderate Index is used to create a 3-year history.

Attribution Analysis

Trailing 3-Year Returns as of 12-31-2017



T. Rowe Price Retirement

•	Glide Path	0.35
•	Cost	-0.06
•	Selection	-0.01

• Total 0.27



People

The experience and tenure of T. Rowe Price's assetallocation group along with the strength of the underlying funds lead to a Positive People rating. Jerome Clark, a firm veteran, has managed the series since its 2002 inception. Wyatt Lee, a longtime associate to Clark, officially joined the manager roster in August 2015. Kim DeDominicis assists Clark and Lee.

The target-date group has grown significantly in recent years. It currently stands at more than 30 members, including 10 people who joined within the last three years. The broader asset-allocation team, which includes groups that focus on areas such as alternatives or customized solutions, has more than 50 investment professionals. That makes this team one of the larger asset-allocation groups. Its size reflects a strong commitment to the asset-allocation space.

T. Rowe Price's asset-allocation committee, which guides the series' tactical tilts, has seen changes but remains solid. Richard Whitney, who formerly headed up asset allocation at the firm, retired at the end of

Rating: Positive

2016. Charles Shriver and David Giroux replaced Whitney as co-chairs of the committee. In October 2017, the committee added three new members, rounding it out at 14 people. The group's membership includes leaders from the firm's equity and fixed-income funds. Sebastien Page, a PIMCO transplant, replaced Whitney as the sole head of asset-allocation strategies and broadly oversees the group.

The underlying fund managers used in the series are also a sound bunch. The 8.7-year average manager tenure of the series' underlying funds lands well ahead of the target-date and mutual fund industry average. T. Rowe Price has a history of handling manager changes for the underlying funds well, with a long transition period being the norm.

Clark and Lee each have more than \$1 million invested in T. Rowe Price's similarly managed target-date collective trusts, according to the firm's Statement of Additional Information.

Series Management

Manager	Start Date
Jerome Clark	09-2002
Wyatt Lee	08-2015
Average Tenure	8.9 years
Longest Tenure	15.4 years
Target-Date Industry	
Average Tenure	4.8 years

Underlying Funds' Management

Average Tenure	9.6 years
Longest Tenure	25.6 years
Mutual Fund Industry	
Λυργασο Τοριικο	7.2 years

Parent

T. Rowe Price is evolving but retains the strong research-focused culture that's driven its long-term success. Despite the retirements of some long-tenured portfolio managers, the former CEO, and outgoing CIO Brian Rogers, the firm's careful focus on succession planning and long transition periods have eased the process. Even with a changing of the guard, there's no lack of talent. Successful former portfolio manager Rob Sharps is now co-head of global equities and oversees five CIOs who are among the firm's top managers. The analyst team is on solid footing, and the firm has continued hiring despite the pressures facing active managers. CEO Bill Stromberg, who joined T. Rowe in 1987 as an analyst, maintains an investment focus while recognizing that the busi-

Rating: Positive

ness must evolve to flourish in an industry that's gravitated toward passive investing. The firm is bolstering its technology resources and is expanding its distribution overseas, achievable goals given its pristine balance sheet. In 2017, the firm opportunistically acquired the Henderson High Yield Opportunities team, led by a former T. Rowe employee, as it addresses demand for capacity-constrained strategies that are also part of its popular target-date lineup and potentially new multiasset products down the line (several T. Rowe strategies are closed). T. Rowe is sensibly adapting, and its fundholder-first mentality and ability to attract and retain investment talent support its Positive Parent rating.

Fund Family Data

Average Overall Star Rating ****
% of Assets w/Star Rating 87.6%

Assets	(listed in USD \$Mil)
Total Assets Under Mgt	761,863
Average Manager Tenure 5-year Manager Retention	8.0 years
Rate (%)	93.1%
Manager Investment Over 1 Million USD (% Assets)	33.9%
Average Fee Level (%)	40.0%
3-year Firm Success	
Ratio (%)	83.0%



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The date shown next to the Morningstar Analyst Rating is the date on which the Morningstar Manager Research Analyst assigned or reaffirmed the current rating for the target-date fund series based on the analyst's latest review and research report for the target-date fund series.

The Five (5) Pillars

Momingstar has identified five key areas that we believe are crucial to predicting the future success of funds: People, Parent, Process, Performance, and Price. Each pillar is evaluated when assessing a fund as well as the interaction between the pillars, which we believe is crucial to understanding a fund's overall merit

People

The overall quality of a target-date fund series' investment team is a significant key to its ability to deliver superior performance relative to its benchmark and/or peers. Evaluating a target-date fund series' investment team requires that analysts assess several relevant items including how key decisions are made.

Parent

We believe the parent organization is of utmost importance in evaluating a target-date fund series. The target-date fund series' management set the tone for key elements of our evaluation, including capacity management, risk management, recruitment and retention of talent, and incentive pay. Beyond these operational areas, we prefer firms that have a culture of stewardship and put investors first to those that are too heavily weighted to salesmanship.

Process

We look for target-date fund series with a performance objective and investment process (for both security selection and portfolio construction) that is sensible, clearly defined, and repeatable. In addition, the portfolio should be constructed in a manner that is consistent with the investment process and performance objective.



Performance

We do not believe past performance is necessarily predictive of future results, and this factor accordingly receives a relatively small weighting in our evaluation process. In particular, we strive not to anchor on short-term performance. However, we do believe that the evaluation of long-term return and risk patterns is vital to determining if a target-date fund series is delivering to our expectations.

Price

To reflect actual investor experience, price is evaluated within the context of the relevant market or cross-border region—for example, the United States, Australia, Canada, or Europe. In recognition of differences in scale and distribution costs in various markets, the level at which a target-date fund series is penalized for high fees or rewarded for low fees can vary with region. In Europe, for example, target-date fund series are penalized if they land in the most expensive quintile of their Morningstar category and are rewarded if they land in the cheapest quintile. The assessment is made using prospectus expense ratios, but in the case of target-date fund series with performance fees, expenses are evaluated excluding any performance fees and then the structure of the performance fee is evaluated separately.

Morningstar Analyst Ratings

Momingstar Analyst Ratings are assigned on a five-tier scale running from Gold to Negative. The top three ratings, Gold, Silver, and Bronze, all indicate that our analysts think highly of a target-date fund series; the difference between them corresponds to differences in the level of analyst conviction in a target-date fund series' ability to outperform its benchmark and peers through time, within the context of the level of risk taken.

Gold

Represents target-date fund series that our analyst has the highest-conviction in for that given investment mandate. By giving a target-date fund series a Gold rating, we are expressing an expectation that it will outperform its relevant performance benchmark and/or peer group within the context of the level of risk taken over the long term (defined as a full market cycle or at least five years). To earn a Gold rating, a target-date fund series must distinguish itself across the five pillars that are the basis for our analysis.

Silver

Represents target-date fund series our analyst has high-conviction in, but not in all of the five pillars. With those fundamental strengths, we expect these target-date fund series will outperform their relevant performance benchmark and/or peer group within the context of the level of risk taken over the long term (defined as a full market cycle or at least five years).

Bronze

Represents target-date fund series that have advantages that clearly outweigh any disadvantages across the pillars, giving analyst the conviction to award them a positive rating. We expect these target-date fund series to beat their relevant performance benchmark and/or peer group within the context of the level of risk taken over the long term (defined as a full market cycle or at least five years).

Neutra

Represents target-date fund series in which our analysts don't have a strong positive or negative conviction. In our judgment, these target-date fund series are not likely to deliver standout returns, but they aren't likely to seriously underperform their relevant performance benchmark and/or peer group either.

Negativ

Represents target-date fund series that possess at least one flaw that our analysts believe is likely to significantly hamper future performance, such as high fees or an unstable management team. Because of these faults, we believe these target-date fund series are inferior to most competitors and will likely underperform their relevant performance benchmark and/or peer group, within the context of the level of risk taken, over a full market cycle.

Morningstar Research Services may also use two other designations in place of a rating:

Under Review

This designation means that a change that occurred with the target-date fund series or at the target-date fund series company requires further review to determine the impact on the rating.

Not Ratabali

This designation is used only where we are providing a Report on a new strategy or on a strategy where there are no relevant comparators, but where investors require information as to suitability.

For more information about our Analyst Rating methodology please go to http://corporate1.morningstar.com/ResearchLibrary/

Morningstar Star Rating

The Moningstar Star Rating is a proprietary data point that is quantitatively driven. Target-date fund series are rated from one to five stars based on how well the target-date fund series performed (after adjusting for risk and accounting for sales charges) in comparison to similar target-date fund series. Within each Morningstar Category, the top 10% of target-date fund series receive 5 stars and the bottom 10% receives 1 star. target-date fund series are rated for up to three time periods —three-, five-, and ten-years—and these ratings are combined to produce an overall star rating, which is noted within the Report. target-date fund series with less than three years of history are not rated. Star Ratings are based entirely on a mathe-

matical evaluation of past performance. Star Ratings are in no way to be considered a buy or sell signal nor should be viewed as a statement of fact.

Equity-Related Data Points

The Report lists the top ten holdings in the target-date fund series as of the dated noted. For each underlying holding, a series of data points is provided including, where applicable, that security's Economic Moat rating as of the date noted.

Economic Moat

The concept of an economic moat plays a vital role in our equity analyst's qualitative assessment of a firm's long-term investment potential, but also in the actual calculation of its fair value estimate. An economic moat is a structural feature that allows a firm to sustain excess profits over a long period of time. We define economic profits as returns on invested capital (or ROIC) over and above our estimate of a firm's cost of capital, or weighted average cost of capital (or WACC). Without a moat, profits are more susceptible to competition. We have identified five sources of economic moats: intangible assets, switching costs, network effect, cost advantage, and efficient scale.

Companies with a <u>narrow moat</u> are those we believe are more likely than not to achieve normalized excess returns for at least the next 10 years. <u>Wide-moat</u> companies are those in which we have very high confidence that excess returns will remain for 10 years, with excess returns more likely than not to remain for at least 20 years. The longer a firm generates economic profits, the higher its intrinsic value. We believe low-quality, <u>no-moat</u> companies will see their normalized returns gravitate toward the firm's cost of capital more quickly than companies with moats.

For more information about methodology in analysing stocks, please go to http://global.morningstar.com/equitydisclosures.

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The Analyst has not served as an officer, director or employee of the target-date fund series company within the last 12 months, nor has it or its associates engaged in market making activity for the target-date fund series company.

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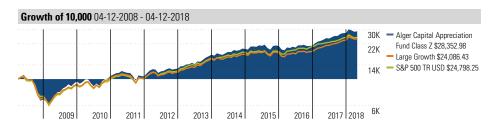


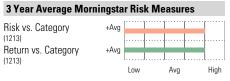
Release date 04-13-2018 Page 1 of 4

Alger Capital Appreciation Fund Class Z ACAZX

Morningstar Analyst Rating Bronze

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ **Investment Style** Load Category 26.30 **↑**0.28 | 1.08 0.00 \$500,000 Open None 0.88% Large Growth Large Growth





Investment Strategy

The investment seeks long-term capital appreciation. The fund invests at least 85% of its net assets, plus any borrowings for investment purposes, in equity securities of companies of any market capitalization that Fred Alger Management, Inc. believes demonstrate promising growth potential. It can leverage, that is, borrow money to buy additional securities.

Performance 04-12-201	8					
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Anr
Growth of 10,000	10,403	9,467	12,430	13,713	20,616	28,353
Fund	4.03	-5.33	24.30	11.10	15.57	10.98
+/- S&P 500 TR USD	3.85	-1.21	8.45	0.59	2.35	1.48
+/- Category	0.78	-0.55	1.70	0.78	1.75	1.17
% Rank in Cat	38	74	36	42	24	_
# of Funds in Cat	1,408	1,415	1,360	1,187	1,077	764
* Currency is displayed in BA	QE .					

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# of Funds in Cat	1,408	1,415	1,360	1,187	1,077	764
* Currency is displayed in BAS	SE					
Top Holdings 01-31-201	8					

Top Holdings 01-31-2018				
	Weight %	Last Price	Day Chg %	52 Week Range
 Amazon.com Inc 	9.14	— BASE	-0.49 ↓	884.49 - 1,617.54
Microsoft Corp	6.53	92.90 BASE	-0.73 ↓	64.89 - 97.24
Facebook Inc A	5.17	164.51 BASE	0.42 🛧	139.33 - 195.32
Alphabet Inc C	5.05	— BASE	-0.16 ↓	821.44 - 1,186.89
Apple Inc	4.40	174.93 BASE	0.44 🛧	140.45 - 183.50
0/ A+-: T F	20.20			

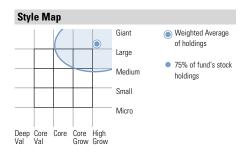
% Assets in Top 5 Holdings 30.30

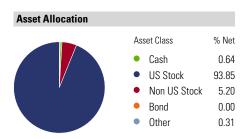
Increase

op Sectors 01-31-2018					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Technology	34.01	37.34	34.01	31.11	
Consumer Cyclical	19.72	19.72	13.48	16.82	
Financial Services	13.75	13.94	8.28	13.63	
Healthcare	11.73	16.01	11.73	13.79	
Industrials	8.55	8.55	8.05	10.31	

Dividend and Capital Gains Distributions						
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Tota
12-15-2017	25.35	1.5908	0.0772	0.0000	0.0000	1.6680
12-14-2016	20.76	0.1684	0.0000	0.0000	0.0000	0.1684
12-16-2015	20.69	1.6694	0.0000	0.0000	0.0000	1.6694
12-18-2014 12-18-2013	20.88 20.73	2.6839 0.8278	0.5463 0.7067	0.0000 0.0000	0.0000 0.0000	3.2302 1.5345







Management	
	Start Date
Patrick Kelly	09-30-2004
Ankur Crawford	06-01-2015



Release date 04-13-2018 Page 2 of 4

Alger Capital Appreciation Fund Class Z ACAZX

Analysis

Success and the challenge of size.

By Alec Lucas, Ph.D. 12/8/2017

Alger Capital Appreciation has a Morningstar Analyst Rating of Bronze because lead manager Patrick Kelly has proved skilled at executing Alger's aggressive-growth, high-turnover approach. From Kelly's 2004 start date through November 2017, the fund's 12.7% annualized gain beat the Russell 1000 Growth Index by 2.4 percentage points and outpaced all but a few largegrowth Morningstar Category peers.

Lofty fees have always been a hurdle for Kelly, but in recent years he's also faced the challenge of size. Per Statement of Additional Information disclosures, Kelly has managed more than \$15 billion across all accounts since late 2014, versus less than one third that figure at year-end 2009.

The increase in assets here has coincided with a move up the market-cap spectrum. Between late 2004 and late 2009, when the fund and its openend clones together had less than \$2 billion in assets, the fund's combined small- and mid-cap stake was on average 17.4 percentage points more than the Russell 1000 Growth Index's. The now \$7 billion Alger Capital Appreciation open-end lineup has consistently had a lighter small- and mid-cap weighting since 2010, however. As of September 2017, this fund had a 9.8% stake, versus the index's 17.7%.

The fund still has an aggressive edge. With 43.8% of assets in it top 10 holdings, as of September 2017, the fund was more top-heavy than three fourths of its peers. Sector bets remained sizable, too. Its 45.4% tech weighting was nearly 8 percentage points more than the index's.

The fund's willingness to stand out can be a liability. The fund struggled in the early 2016 market plunge and started slowly in that year's post-election rally; its 0.3% gain trailed the index by 6.7 percentage points. The fund has rebounded in 2017, and its calendar-year returns under Kelly have been otherwise competitive, including crush-

ing the index from 2005 to 2007 and in 2009, while edging it from 2012 to 2015.

The huge chunk of assets Kelly now manages will make difficult to build on his long-term record. Yet, with his skill, experience, and ability to adapt, he should have a good shot.

Process Pillar: O Positive

Lead manager Patrick Kelly's skilled use of Alger's aggressive-growth approach to investing merits a Positive Process rating. Like his colleagues, Kelly looks for companies that are poised for growth in one of two stages. Some have high unit volume growth leading to increased product demand and market share, like search-engine giant Alphabet GOOG. Others undergo positive lifecycle changes, such as benefiting from new management or product advancements. Apple AAPL, with its series of innovative iPhone, iPad, and Apple Pay launches, is an example.

Kelly taps Alger's team of analysts to find growing firms within their respective sectors. The analysts come up with one-, three-, and five-year target prices for each firm, modeling earnings and cash flows over five years. Kelly ultimately picks the stocks that he thinks have the most upside potential relative to their price targets and is willing to deviate meaningfully from the Russell 1000 Growth Index's sector weightings. He monitors risk/reward trade-offs and often trims positions after they come within 10% of their price targets, which is one reason for the portfolio's above-average, often triple-digit annual turnover. Kelly is willing to pay up for growth, but the portfolio's average price multiples tend to be in line with and sometimes below the benchmark's and typical rival's, suggesting that he's not insensitive to valuation.

The portfolio's exposure to stocks at the lower end of the market-cap spectrum is less pronounced than in the past. Between late 2004 and late 2009, when the fund and its open-end clones together had less than \$2 billion in assets, the fund's combined small- and mid-cap stake was on average 17.4 percentage points more than the Russell 1000

Morningstar's Take							
Morningstar Analyst Rating	Į.	Bronze					
Morningstar Pillars							
Process	0	Positive					
Performance	•	Positive					
People	•	Positive					
Parent	0	Neutral					
Price	•	Negative					

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

🖫 Bronze

Neutral

Negative

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	4.03	0.78
2017	31.69	4.02
2016	0.66	-2.56
2015	6.56	2.96
2014	13.50	3.51



Release date 04-13-2018 Page 3 of 4

Alger Capital Appreciation Fund Class Z ACAZX

Analysis

Growth Index's. The \$7 billion Alger Capital Appreciation open-end lineup has been consistently underweight since 2010, however. As of September 2017, this fund had a 9.8% small- and mid-cap stake, versus the index's 17.7%.

The portfolio isn't tame, though. It has become more top-heavy since mid-2014, and its 43.8% stake in its top 10 holdings, as of September 2017, ranked in the large-growth category's top quartile. Sector bets can still be sizable, too. The fund's 45.4% tech weighting was nearly 8 percentage more than the index's. Four the top five holdings were tech titans, including Alphabet GOOG, with tech-dependent retailer Amazon.com AMZN as the lone exception. Each position reflects management's optimism about firms poised to benefit from increased Internet usage.

Kelly often favors tech stocks, as the fund's double-digit overweighting early in his career and more recently in mid-2017 attest. Nonetheless, a tech tilt isn't inevitable. In mid-2012, for example, the fund's 24.6% tech allocation was 7.1 percentage points less than the index's.

Performance Pillar: • Positive

A topnotch, albeit volatile, record under lead manager Patrick Kelly earns the fund a Positive Performance rating. Since Kelly took the helm in late September 2004, the fund's 12.7% annualized return through November 2017 beat the Russell 1000 Growth Index by 2.4 percentage points and earned the large-growth category's sixth-best spot; its Morningstar Risk-Adjusted Return placed one notch higher.

Kelly's aggressive tactics can pay off handsomely in rallies but lead to sizable losses in downturns. The fund posted top-decile calendar-year returns among large-growth peers in 2005-07, as well as in 2009's rebound, but fared worse than roughly four fifths of rivals in 2008. That year, Kelly bought speculative fare like JA Solar JASO, which did not have positive cash flows, and was too slow to sell amid the burgeoning credit crisis.

Since year-end 2009, performance has moderated

but remained competitive overall. The fund edged its benchmark and typical rival each calendar year from 2012 to 2015 and again thus far in 2017. In 2016, however, its 0.3% gain trailed the index by 6.7 percentage points--its worst calendar-year showing versus the benchmark during Kelly's tenure. Stock-picking in 2016 was poor, especially in tech. Healthcare stocks also detracted, including top-20 positions in Allergan AGN and Vertex Pharmaceuticals VRTX that hurt in the January to mid-February market downturn.

People Pillar: O Positive

The fund's Positive People rating reflects Patrick Kelly's talent and experience. Since taking the helm here and at Alger Spectra SPECX in late September 2004, his first shot at portfolio management, Kelly has executed the firm's aggressive approach with great success. This fund and Alger Spectra, its more flexible counterpart, have consistently been top performers in the large-growth category. In June 2015, the firm tapped Ankur Crawford to assist Kelly as comanager on both funds as well as Alger Capital Appreciation Focus ALGRX, which he has managed since late 2012. Upon joining Alger in 2004, Crawford completed the firm's in-house training program, the same one Kelly went through in the late 1990s, and like Kelly worked as a tech analyst. She first became a comanager on Alger Mid Cap Growth AMCGX and its clones in late 2010. Another first will come in early 2018 when she becomes the sole lead manager of Alger 25, a focused portfolio of large- and mid-cap growth stocks.

Kelly and Crawford draw support from roughly 20 analysts who divide coverage based on global sectors and regions. Each analyst has at least 10 years of industry experience, but only four have been with Alger a decade or more.

Kelly has at least \$100,000 in the Alger Capital Appreciation strategy and Crawford at least \$150,000. Kelly also invests more than \$1 million in Alger Spectra and Crawford at least \$50,000.

Parent Pillar: O Neutral

Established in 1964 as a growth shop, privately held Fred Alger Management has overcome a

great deal since the early 2000s. Its World Trade Center headquarters were decimated on 9/11, claiming the lives of most of the firm's investment staff, including David Alger, the founder's brother and manager of Alger Spectra SPECX, which Smart Money magazine praised as the most successful mutual fund of the 1990s. Alumni returned to help rebuild the firm, but soon afterward it was implicated in the market-timing and late-trading scandal of 2003. Alger settled those charges by 2007. With a bolstered compliance department, it has had a clean regulatory record since. Alger Spectra has returned to prominence, as it has consistently been a top-performing large-cap growth fund since manager Patrick Kelly took the helm in September 2004.

Kelly's Alger Capital Appreciation ALARX has also excelled, but the firm has had less success running other strategies. That could change, though. Proven small-cap manager Amy Zhang joined in early 2015, and Alger acquired Weatherbie Capital in early 2017 for its small/mid-cap growth expertise. Both Zhang and the Weatherbie team build benchmark-agnostic portfolios of about 50 stocks. These additions are promising, but Alger still has room for improvement. Fees are above average, and overall manager investment is weak. The firm receives a Neutral Parent Pillar rating.

Price Pillar: Negative

Fees have come down in the past few years but remain lofty compared with most rivals', earning the fund a Negative Price rating. The A shares' 1.22% expense ratio, which applies to half the fund's asset base, is 10 basis points above the large-cap, front-load peer median. That ranks in the most expensive third of those peers. At 0.89%, the Z shares are more competitively priced, but their \$500,000 minimum investment places them in the large-cap institutional fee-level comparison group. As a result, they too have an above-average price tag.

Investors also face ample trading costs thanks to the portfolio's typically triple-digit annual turnover. In fiscal 2016, brokerage fees of 0.10% of average net assets were well above the 0.04% category



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Alger Capital Appreciation Fund Class Z \mbox{ACAZX}

Analysis

median.

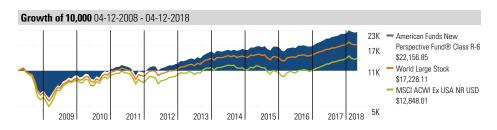


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American Funds New Perspective Fund® Class R-6 RNPGX

Morningstar Analyst Rating

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Load Expenses Morningstar Rating™ **Investment Style** Category **↑**0.25 | 0.56 \$250 44.65 0.70 Open None 0.45% World Large Stock Large Growth





Pillars Process Positive Performance 0 Positive People 0 Positive Parent 0 Positive 0 Price Positive Rating **₩** Gold

Investment Strategy

The investment seeks long-term growth of capital; future income is a secondary objective. The fund seeks to take advantage of investment opportunities generated by changes in international trade patterns and economic and political relationships by investing in common stocks of companies located around the world. In pursuing its primary investment objective, it invests primarily in common stocks that the investment adviser believes have the potential for growth. In pursuing its secondary objective, the fund invests in common stocks of companies with the potential to pay dividends in the future.

Performance 04-12-2018						
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	10,343	9,648	12,230	13,457	17,665	22,157
Fund	3.43	-3.52	22.30	10.40	12.05	8.28
+/- MSCI ACWI Ex USA NR USD	3.22	-2.26	3.96	5.00	6.13	5.74
+/- Category	2.81	-1.05	5.68	3.21	2.81	2.46
% Rank in Cat	12	82	17	11	10	_
# of Funds in Cat	932	939	865	702	584	338

OI FUNUS III GAL
* Currency is displayed in BASE

Top Holdings 12-31-2017				
	Weight %	Last Price	Day Chg %	52 Week Range
Amazon.com Inc	3.78	— BASE	-0.49 🗸	884.49 - 1,617.54
Facebook Inc A	2.33	164.55 BASE	0.45 🛧	139.33 - 195.32
Naspers Ltd Class N	2.30	— BASE	-2.44 ↓	243,402.00 - 414,299.00
Taiwan Semiconductor Manufacturing Co Ltd	2.30	244.50 BASE	-0.20 ↓	186.50 - 266.00
Microsoft Corp	1.96	92.86 BASE	-0.77 ↓	64.89 - 97.24

% Assets in Top 5 Holdings 12.68

Style Map		
	Giant	Weighted Average of holdings
	Large	or nordings
	Medium	 75% of fund's stock holdings
	Small	
	Micro	
Deep Core Core Core High Val Val Grow Grow	/	

Asset Allocation		
	Asset Class	% Net
	Cash	5.01
	 US Stock 	45.20
	 Non US Stock 	49.31
	Bond	0.13
	Other	0.34

Top Sectors 12-31-2017					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Technology	27.35	27.35	19.71	18.15	
Consumer Cyclical	16.80	17.89	16.80	12.64	
Financial Services	14.79	14.79	12.61	18.84	
Consumer Defensive	9.87	12.72	9.87	10.53	<u> </u>
Industrials	9.23	10.02	9.23	10.79	
					0 10 20 30 4

Dividend and Capital Gains Distributions						
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
12-21-2017	43.06	2.1792	0.0000	0.0000	0.3246	2.5038
12-22-2016	35.44	1.0754	0.0000	0.0000	0.4096	1.4850
12-23-2015	36.23	1.9500	0.0000	0.0000	0.3775	2.3275
12-26-2014	36.66	2.2900	0.0000	0.0000	0.3539	2.6439
12-26-2013	37.25	1.7520	0.0000	0.0000	0.4199	2.1719

Management	
	Start Date
Robert W. Lovelace	12-01-2000
Jonathan Knowles	12-01-2004
Brady L. Enright	12-01-2005
Jody F. Jonsson	12-01-2005
Steven T. Watson	12-01-2005
Isabelle de Wismes	12-01-2007
Noriko H. Chen	04-30-2012

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American Funds New Perspective Fund® Class R-6 RNPGX

Analysis

Reaping the rewards of international trade.

By Alec Lucas, Ph.D. 12/13/2017

American Funds New Perspective has a Morningstar Analyst Rating of Gold for its ability to find promising companies whose markets extend beyond their home region.

The fund's focus on multinational blue chips includes firms domiciled in emerging markets. Although the managers seek growth across the globe, they try to buy when it is mispriced or misunderstood, often hanging on through subsequent rough patches. For example, they built most of the fund's now top-10 position in Samsung Electronics in early 2017 as the firm sought to address issues that led to its Galaxy Note 7 phones catching fire and to recover from a corruption scandal involving company leadership. The fund is now poised to benefit from Samsung's development of wraparound screens for phones, tablets, and televisions.

The managers' preference for tech stocks extends beyond Samsung. Since year-end 2012, the fund's tech weighting has more than doubled to about a fourth of the portfolio. The fund's high-single-digit semiconductor stake is now one of the world large-stock Morningstar Category's biggest. Top-10 positions Taiwan Semiconductor Manufacturing, ASML Holding ASML, and Broadcom AVGO each stand to profit from increasing demand for chips and components used in Internet-connected devices.

American's multimanager system lets the fund's seven named managers play to their strengths. Each manager oversees a separate sleeve of the portfolio in line with his or her own style. Meanwhile, the combination of sleeves mutes volatility for the fund as a whole and helps it to fare well in different market conditions.

Outperformance has been the norm. Although the fund struggled in 2016, placing near the category's bottom quintile, it rebounded in 2017 and finished in the top half of the peer group in every other cal-

endar year in the past decade. Since its 1973 inception and during longest-tenured manager Robert Lovelace's 15-plus years, it has trounced its typical category rival and the MSCI All-Country World Index.

The fund is topnotch.

Process Pillar: O Positive

The fund's singular focus combined with its willingness to adapt merit a Positive Process Pillar rating. Since its March 1973 inception, the fund has sought to invest in firms poised to benefit from changing global trade patterns. While that mission has endured, the fund's methods have evolved with the market. In its early days, the investable universe consisted largely of the constituents of the MSCI World Index, the fund's longtime benchmark. As the global opportunity set broadened to include developing markets, the fund began investing there, too, and in October 2011 changed its benchmark to the MSCI All-Country World Index. The fund can now invest in firms located anywhere in the world if they receive at least 25% of their revenues from outside their home region and have at least a \$3 billion market cap float at time of purchase. Although those requirements lend themselves to a continued emphasis on developed-markets blue chips, the fund's emergingmarkets stake has increased in recent years. As of September 2017, it was 11% of assets, a bit higher than the fund's mid- to upper-single-digit historical norm.

American's multimanager approach lets the managers play to their strengths. With distinct styles, they can invest in their best ideas or hold cash and wait for compelling opportunities. The combination of separately managed sleeves mutes the overall fund's volatility. Only high portfolio turnover is frowned upon.

Sector and geographic allocations in the fund's roughly 250-stock portfolio are largely a byproduct of its managers' bottom-up analysis. The fund's balance of domestic and foreign stocks also shifts based on where the managers see the best opportunities. Its helping of U.S. stocks has ranged from

Morningstar's Take		
Morningstar Analyst Rating	ţ	G old
Morningstar Pillars		
Process	0	Positive
Performance	0	Positive
People	0	Positive
Parent	•	Positive
Price	•	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Bronze

Neutral

Negative

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	3.43	2.81
2017	29.30	5.68
2016	2.19	-3.35
2015	5.63	7.32
2014	3.56	0.77



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American Funds New Perspective Fund® Class R-6 RNPGX

Analysis

more than half to less than a fourth of assets during the past three decades and stood at 48.7% in October 2017, up from less than 30% near the U.S. market's 2007 peak.

The fund's managers seek growth across the globe but buy when it is mispriced or misunderstood, often hanging on through subsequent rough patches. For example, they built most of the fund's now top-10 position in Samsung Electronics in early 2017 as the firm sought to address issues that led to its Galaxy Note 7 phones catching fire and to recover from a corruption scandal involving company leadership. The fund is now poised to benefit from Samsung's development of wraparound screens for phones, tablets, and televisions.

Since year-end 2012, the fund's tech weighting has more than doubled to about a fourth of the portfolio. The fund's high-single-digit semiconductor stake is now one of the world large-stock category's biggest. Top-10 positions Taiwan Semiconductor Manufacturing, ASML Holding ASML, and Broadcom AVGO each stand to profit from increasing demand for chips and components used in Internet-connected devices.

Performance Pillar: O Positive

Consistent outperformance earns the fund a Positive Performance Pillar rating. Its trailing returns for the three- to 15-year periods through November 2017 all rank in the world-stock category's top quintile or better. Although the fund struggled in 2016, placing near the category's bottom quintile, it has finished in the top half of the peer group in every other calendar year in the past decade. Since its 1973 inception and during longest-tenured manager Robert Lovelace's 15-plus years, it has trounced its typical category rival, the MSCI All-Country World Index, and its former benchmark, the MSCI World Index.

The fund has amassed this record without incurring more volatility than its average peer or index. In fact, its Morningstar Risk rating for the trailing 10-year period through November 2017 is below average. It also has captured nearly 105% of the MSCI All-Country World Index's upside and 93%

of its downside since Lovelace joined the fund in December 2000.

The fund's focus on multinational blue chips has seldom hurt shareholders. In its 40-plus calendar years, the fund has lost money in only seven (1974, 1990, 2000-02, 2008, 2011). In each of those years the fund lost significantly less than the benchmark, except for 2011. Even then, the fund held its own during 2011's peak-to-trough plunge but lagged in the subsequent rebound and lost 7.6% for the year, versus the index's 5.5% drop.

People Pillar: O Positive

American Funds' multimanager approach helps to handle this fund's \$76 billion asset base, the world-stock category's second largest. The fund's Positive People rating reflects its systemic strengths as well as the managers' experience, ability, and aligned interests.

Capital Group, the parent of American Funds, divides these assets between management teams from subsidiaries Capital World Investors and Capital International Investors. Joanna Jonsson oversees CWI's team of Jonathan Knowles, Brady Enright, and Isabelle de Wismes. Longest-tenured manager Robert Lovelace heads up CII's team, which includes Noriko Chen and Steven Watson, who had been a CWI manager here prior to October 2015. Each of the managers, based in the United States, England, and Asia, oversees a separate sleeve of the portfolio, with Jonsson and Lovelace helping to ensure that their investing styles complement one another. For example, Knowles runs a very top-heavy portfolio of about 30 stocks with high returns on equity, while Watson sticks largely to value names in a more diffuse portfolio of 50-60 stocks. They're a veteran group. Each manager has been in the industry for at least 25 years. The CWI and CII teams are both supported by about 40 analysts, with each analyst group also responsible for its own slice of the portfolio.

Each manager has at least \$100,000 in the fund, with five investing more than \$1 million.

Parent Pillar: O Positive

As a standard-bearer in asset management, Capital Group earns a Positive Parent rating. Widely known in the U.S. for its American Funds open-end lineup, the active manager boasts some of the industry's more reliable equity and allocation offerings. The firm's multimanager system is key to its success. Dividing each fund into independently run sleeves lets managers invest in line with their styles, enhancing diversification and reducing the overall portfolio's volatility. The funds' analyst-led research portfolios help develop the next generation and recruit top talent with the promise of running money from the start. The result is an investment culture marked by lengthy tenures, strong manager fund ownership, and competitive longterm records.

Capital Group has improved its fixed-income approach through greater coordination, external hires, and enhanced risk management. The firm now has the tools to compete with best-in-class fixed-income shops, though its investment professionals could become more seasoned in their use.

Investors have shown renewed interest in American Funds amid the firm's efforts to expand in Europe, Australia, and Asia. The potential for these investors to pour money into the same strategies should incline Capital Group to clarify what would cause it to close a strategy to protect current shareholders, something the firm has said it would be willing to do.

Price Pillar: O Positive

This fund is one of the cheapest broker-sold options in its category, and it looks affordable compared with no-load funds, too. The A shares' 0.75% expense ratio, which applies to more than half of the fund's assets, is 50 basis points below the world-stock, front-load peer median and cheaper than 99% of those peers. It would also place in the cheapest quintile of the category's no-load options. Plus, 12 of the fund's 16 other share classes (together accounting for nearly all the remaining assets) sport bottom-quintile expense ratios versus similarly distributed rivals.

Trading costs across all share classes were also



Release date 04-13-2018 Page 4 of 4

American Funds New Perspective Fund® Class R-6 RNPGX

Analysis

comparatively modest. Brokerage fees of 0.03% of average net assets in fiscal 2017 were below the 0.06% category median.



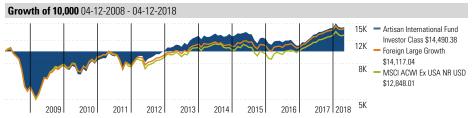
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Artisan International Fund Investor Class ARTIX

Morningstar Analyst Rating

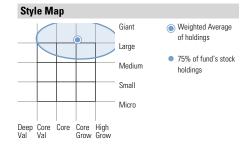
Silver

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ **Investment Style** Load Category **↑**0.11 | 0.33 Limited \$1,000 Large Growth 33.77 0.67 13.8 None 1.18% Foreign Large Growth

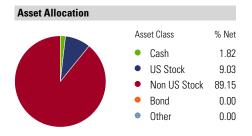


Pillars Process Positive **Investment Strategy** Performance 0 Positive People 0 Positive The investment seeks maximum long-term capital growth. The fund invests primarily in developed markets but also may invest Parent 0 Positive up to 35% of the fund's total assets at market value at the time of purchase in emerging and less developed markets. Under Negative Price normal market conditions, it is substantially fully invested in common stocks and similar securities, and invests at least 65% of its net assets at market value at the time of purchase in securities of non-U.S. companies. Rating 🐺 Silver

Performance 04-12-2018						
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	10,132	9,769	12,137	10,815	13,263	14,490
Fund	1.32	-2.31	21.37	2.65	5.81	3.78
+/- MSCI ACWI Ex USA NR USD	1.11	-1.05	3.03	-2.75	-0.11	1.24
+/- Category	0.10	-0.91	0.61	-3.71	-1.84	-0.02
% Rank in Cat	40	85	40	98	87	48
# of Funds in Cat	422	427	406	328	296	208
* Currency is displayed in BASE						



Top Holdings 12-31-2017				
	Weight %	Last Price	Day Chg %	52 Week Range
 Deutsche Boerse AG 	4.96	109.15 BASE	0.32 🛧	84.76 - 115.35
Linde AG	4.94	165.00 BASE	-1.08 ↓	155.50 - 199.40
Allianz SE	3.69	189.40 BASE	0.40 🛧	167.00 - 206.85
Wirecard AG	3.56	105.85 BASE	0.38 🛧	51.35 - 111.00
	3.52	14.14 BASE	0.53 🛧	13.19 - 16.69
% Assets in Top 5 Holdings	20.67			



⊕ Increase	⊕ Decrease	★ New to Portfolio

Top Sectors 12-31-2017					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Financial Services	28.87	28.87	10.45	18.00	
Technology	15.63	15.63	5.52	17.03	Y
ndustrials	14.31	14.31	7.23	13.69	
Consumer Defensive	13.74	17.88	12.46	14.02	
Basic Materials	11.16	11.16	6.22	6.09	
					0 10 20 30 4

Management	
	Start Date
Mark L. Yockey	12-28-1995
Andrew J. Euretig	02-01-2012
Charles-Henri Hamker	02-01-2012

Dividend and Capital Gains Distributions						
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
11-21-2017	33.22	0.0000	0.0000	0.0000	0.2233	0.2233
11-17-2016	25.76	0.0000	0.0000	0.0000	0.3003	0.3003
11-19-2015	29.32	0.0000	0.0000	0.0000	0.1282	0.1282
11-19-2014	30.46	0.0000	0.0000	0.0000	0.2284	0.2284
11-21-2013	29.49	0.0000	0.0000	0.0000	0.2922	0.2922

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Artisan International Fund Investor Class ARTIX

Analysis

Its flexible approach can lead to dry spells, but this fund's virtues are substantial.

By Greg Carlson 6/5/2017

Despite poor showings in 2015 and 2016, Artisan International's veteran leader, deep team, and sensible approach continue to earn a Morningstar Analyst Rating of Silver. This closed fund's lead skipper, Mark Yockey, has steered it for more than 21 years, and the results have been superb: From its December 1995 inception through May 2017, the fund surpassed all of its foreign large-growth peers, as well as 95% of the larger foreign largeblend Morningstar Category, on both a total-return and risk-adjusted basis. It also trounced its MSCI EAFE benchmark as well as the MSCI EAFE Growth Index (to which its returns have been a bit more correlated).

Yockey has generated this stellar record utilizing a flexible approach. He invests in a mix of rapidly growing firms, more-mature and stable growers, and turnaround plays. The size of each group varies depending on where he and his team find the most opportunities, but the first two groups tend to predominate. In the late 1990s, the fund shone because of a hefty stake in tech and telecom. More recently, the fund's hot streak from 2011-14 was due in part to a move into Macau-related gaming stocks and other firms benefiting from rising demand from Chinese consumers.

But the fund's shifts have also led to dry spells. For example, Yockey moved into beaten-down European banks in 2009-10, only to see those stocks drop further--a big reason the fund trailed more than 85% of peers in 2010. More recently, the fund's stake in China-related stocks was one reason why it trailed 95% of peers in 2015. Another was poor stock selection in automotive firms, which again weighed on returns in 2016 along with an increased stake in consumer staples firms-Yockey felt he found compelling values there because of business-model changes that may increase margins, but the stocks lagged.

Thus, the fund requires patience at times--its trail-

ing returns through May were subpar over three and five years. But the fund has been quite rewarding over the long term, and the depth of the team and a responsible approach to capacity management (the fund closed to new investors in 2016) trump concerns about above-average fees.

Process Pillar: O Positive

Lead manager Mark Yockey is a growth investor at heart. But he's always spread the fund's assets among faster-growing, somewhat pricey companies; higher-quality stable growers; and value plays, although the weightings of those three groups have shifted over time. The stable growers have lately played a bigger role at times, which helps explain why the fund moved back to the foreign large-growth category in 2014 after residing in foreign large-blend from 2010-13. Yockey invests loosely along themes, and the fund has always had somewhat of an independent streak; regional and sector weightings often stray significantly from the norm, and emerging-markets exposure has swung from minimal to 20% of assets over time. Thus, returns have been less correlated to the MSCI EAFE and the MSCI World ex USA indexes than those of the typical foreign large-blend or foreign large-growth fund. This distinctive approach earns a Positive Process rating.

The fund typically holds 60-100 stocks; the number depends in part on how many compelling stocks Yockey finds, but the portfolio also became more diffuse in the mid-2000s when assets in the strategy exceeded \$25 billion. Strategy assets are now about \$26 billion, but the portfolio remains somewhat compact at 70 stocks.

Yockey trades around positions at times but will hold on to solid picks for years. Portfolio turnover has averaged 51% over the past five years.

The fund owns a bigger slug of large-cap stocks than usual, and its average market cap significantly exceeded both that of its MSCI EAFE benchmark and the foreign large-growth norm at the end of March 2017. Yockey has generally found better values among large caps lately: Behemoths such as online marketplace Alibaba BABA of China,

Morningstar's Take	
Morningstar Analyst Rating	🖫 Silver
Morningstar Pillars	
Process	Positive
Performance	Positive
People	Positive
Parent	Positive
Price	Negative

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Bronze

Neutral

Negative

Analyst Rating Spectrum

℧ Silver

₩ Gold

Fund Performance		
	Total Return %	+/- Category
YTD	1.32	0.10
2017	31.02	0.14
2016	-9.66	-7.52
2015	-3.85	-4.81
2014	-0.97	2.96



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Artisan International Fund Investor Class ARTIX

Analysis

Swiss food giant Nestle NESN, and U.S. medical device firm Medtronic MDT were among the fund's top 25 holdings. Other stocks near the top of the portfolio with very large market caps included Japan Tobacco, Hong Kong-based insurer AIA Group, and German diversified financial firm Allianz ALV.

Yockey may also have a difficult time these days taking significant stakes in mid-cap stocks; the team ran a total of \$25.7 billion in the strategy at the end of April--strategy assets peaked at \$33 billion before recent outflows and investment losses, and the fund closed to new investors in 2016. (Artisan has a long track record of closing its funds to preserve flexibility.) The number of holdings was recently 70 here, at the lower end of the fund's range, so it doesn't appear the portfolio has been altered because of liquidity concerns. Furthermore, there were two mid-cap stocks in the top 25 at the end of March 2017. But the fund's large-cap-heavy profile could hold it back if smaller fare outperforms.

Performance Pillar: • Positive

This fund can run hot and cold--and it's been downright frigid lately--but it's been a strong performer over the very long haul. It posted a spectacular run of performance in the late 1990s as manager Mark Yockey played the runup in tech, media, and telecom quite well. In the 2000s, the fund's returns weren't nearly as impressive (on either an absolute or relative basis), but it still turned in respectable performance. More recently, the fund notched three consecutive finishes in the foreign large-blend category's top decile from 2011-13 before moving to foreign large growth and surpassing 80% of that peer group in 2014. Since then, the fund has struggled, lagging 95% of peers in 2015 and 97% of them in 2016.

Despite its recent tough stretch, from stocks' October 2007 peak through May 2017, the fund outpaced its MSCI EAFE benchmark, the MSCI All Country World ex USA Index, and the growth-oriented versions of those indexes while beating 55% of peers. And the fund looks stellar across Yockey's full tenure. From its late 1995 inception

through May 2017, the fund surpassed the foreign large-growth and foreign large-blend norms by 2.8 and 3.0 percentage points annualized, respectively. Although its returns have been volatile at times, the fund has outpaced all other foreign large-growth funds on a risk-adjusted basis when measured on Sortino ratio (which penalizes poor downside performance). Thus, it earns a Positive Performance rating.

People Pillar: O Positive

Although this team lost a veteran in early 2013, it remains quite proven.

Mark Yockey has managed this fund since its December 1995 inception. He's also run Artisan International Small Cap ARTJX, Artisan Global Equity ARTHX, and Artisan Global Small Cap since their respective 2001, 2010, and 2013 inceptions. (The latter fund was liquidated in January 2017.) Before Artisan, he managed Waddell & Reed Global Growth UNCGX for six years. All his charges boast fine results.

Andrew Euretig was named an associate manager here in February 2012 and a comanager in January 2013. He has comanaged Artisan Global Equity since January 2013. He joined the team in 2005 and covers industrials. Charles-Henri Hamker was named an associate manager of this fund and Artisan International Small Cap in February 2012. In January 2013, he became a comanager of the latter fund and Artisan Global Equity and was a comanager of Artisan Global Small Cap. He joined the team in 2000.

The trio is supported by 13 analysts and eight research associates. On average, the senior analysts have worked on the team for six years and have 14 years of investment experience. Yockey's long resume and the depth of his supporting cast earn a Positive rating for People.

Barry Dargan, a former MFS manager, comanaged Artisan Global Equity from its inception through January 2013 before leaving the firm.

Parent Pillar: O Positive

Artisan hires proven or promising managers and allows them to build and run their teams with a large degree of autonomy. Four of the five teams with long histories have performed strongly over longer-term periods. The emerging-markets team lags its benchmark since the strategy's June 2008 founding, though performance has rebounded lately. Three teams have joined since early 2014, and two of those reflect the firm's broadened lineup, which previously focused strictly on equities: One invests in high-yield debt, while another runs a thematically driven alternatives strategy. It's unlikely the firm will launch another equity strategy in the near future.

Beyond delivering largely solid performance, the firm tends to close funds to preserve their flexibility and increase the chances that they will continue to outperform. Indeed, five of the firm's 15 funds are currently closed to new investors. (Two others have been closed in the past.) The firm also has a clean regulatory history.

Artisan went public in March 2013. While this could pressure management (led by Eric Colson, who became CEO in 2010) into keeping popular funds open to boost revenue, it has thus far continued to close them. Its executives no longer control the stock's voting shares, but the firm's employees, founders Andy and Carlene Ziegler, and two private equity firms who have owned stakes since Artisan's 1994 founding own close to 40% of the firm combined.

Price Pillar: Negative

The 1.19% expense ratio of this fund's Investor shares, which hold 43% of the assets, earns a Morningstar Fee Level of Above Average. The Institutional shares hold 40% of the assets, charge 0.95%, and earn an Average fee level. The fund's Advisor shares, launched in April 2015, hold 17% of the assets, charge 1.01%, and earn an Above Average fee level.

With assets of \$13 billion, the fund is bigger than the vast majority of foreign large-cap funds, thus its expenses should be lower. It earns a Negative



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Artisan International Fund Investor Class ARTIX

Analysis

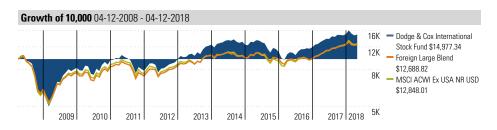
Price rating.

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Dodge & Cox International Stock Fund DODFX

Morningstar Analyst Rating

NAV \$ NAV Day Change % Yield TTM % Total Assets \$Bil Status Min. Inv. Load Expenses Morningstar Rating TM Category Investment Style 46.08 4 0.20 | 0.44 1.97 63.7 Limited \$2,500 None 0.64% 4



3 Year Average Morningstar Risk Measures Risk vs. Category (605) Return vs. Category (605) Low Avg High

Pillars Process Positive Performance 0 Positive People Positive Parent 0 Positive 0 Price Positive Rating **₩** Gold

Investment Strategy

The investment seeks long-term growth of principal and income. Under normal circumstances, the fund will invest at least 80% of its total assets in equity securities of non-U.S. companies, including common stocks, depositary receipts evidencing ownership of common stocks, preferred stocks, securities convertible into common stocks, and securities that carry the right to buy common stocks. The fund typically invests in medium-to-large well-established companies based on standards of the applicable market.

Performance 04-12-2018						
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	9,948	9,683	11,383	10,928	14,154	14,977
Fund	-0.52	-3.17	13.83	3.00	7.19	4.12
+/- MSCI ACWI Ex USA NR USD	-0.72	-1.91	-4.52	-2.40	1.27	1.58
+/- Category	-0.94	-2.36	-2.92	-2.07	1.02	1.44
% Rank in Cat	83	100	83	91	24	16
# of Funds in Cat	804	819	752	591	521	346

^{*} Currency is displayed in BASE

Top Holdings 12-31-2017				
	Weight %	Last Price	Day Chg %	52 Week Range
Naspers Ltd Class N	4.10	— BASE	-2.44 ↓	243,402.00 - 414.299.00
 Samsung Electronics Co Ltd 	3.90	— BASE	1.63 ↑	2,004,000.00 - 2,876,000.00
Sanofi SA	3.34	65.96 BASE	-0.51 ↓	62.88 - 92.97
ICICI Bank Ltd	2.88	288.25 BASE	0.52 🛧	241.09 - 365.70
Itau Unibanco Holding SA	2.53	50.65 BASE	-1.92 ↓	31.70 - 53.34
0/ A . : T FILLE	40.75			

% Assets in Top 5 Holdings 16.75

Sty	le M	ар				
					Giant	Weighted Average of holdings
					Large	or nordings
_			1		Medium	 75% of fund's stock holdings
						Holdings
					Small	
	-				Micro	
Deep Val	Core Val	Core	Core Grow	High Grow		

Asset Allocation					
	% Net	% Short	% Long	Bench mark	Cat Avg
Cash	0.56	0.44	1.00	0.00	0.63
US Stock	6.81	0.00	6.81	0.75	2.69
Non US Stock	92.66	0.01	92.66	99.15	94.58
Bond	0.00	0.00	0.00	0.00	1.45
Other	-0.02	0.04	0.01	0.10	0.65
US StockNon US StockBond	6.81 92.66 0.00	0.00 0.01 0.00	6.81 92.66 0.00	0.75 99.15 0.00	2. 94. 1.

Management

	Start Date
C. Bryan Cameron	05-01-2001
Diana S. Strandberg	05-01-2001
Mario C. DiPrisco	01-01-2004
Roger G. Kuo	05-01-2006
Keiko Horkan	05-01-2007
Charles F. Pohl	05-01-2007
Richard T. Callister	03-30-2012
Englebert T. Bangayan	02-28-2015

Top Sectors 12-31-2017					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Financial Services	31.81	31.81	23.49	20.81	
Technology	20.13	25.02	20.13	10.63	· · · · · · · · · · · · · · · · · · ·
♣ Healthcare	12.35	13.91	12.35	8.81	
♦ Energy	7.74	8.56	6.49	5.42	
Communication Services	6.77	7.76	6.77	4.11	0 10 20 30 40

Dividend and Capital Gains Distributions							
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total	
12-19-2017	45.77	0.0000	0.0000	0.0000	0.8920	0.8920	
12-20-2016	38.12	0.5434	0.0000	0.0000	0.8516	1.3950	
12-21-2015	36.10	0.0000	0.0000	0.0000	0.8400	0.8400	
12-19-2014	42.41	0.0000	0.0000	0.0000	0.9699	0.9699	
12-19-2013	41.83	0.0000	0.0000	0.0000	0.6950	0.6950	

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Dodge & Cox International Stock Fund DODFX

Analysis

A top international equity option for the right investor

By Andrew Daniels, CFA, CMA 11/22/2017

Dodge & Cox International Stock's deep investment team, decisive value approach, and low fees make it an excellent long-term choice. The fund continues to merit a Morningstar Analyst Rating of Gold.

Dodge & Cox's eight-person international equity investment committee, whose members average 23 years of firm tenure, manages the fund. Moreover, a deep and experienced analyst team, most of whom are Dodge & Cox lifers, supports the committee. The seasoned investment staff, combined with the consensus-oriented team approach, limit key-person risk.

The committee seeks non-U.S. stocks that look cheap on a range of valuation measures. It relies on bottom-up, fundamental research and favors firms with good management, competitive advantages, and solid growth potential. Oftentimes, they take advantage of bad news or a bad economic environment to buy fundamentally strong businesses. Once management initiates a position, it tends to hold on for the long term, so portfolio turnover is quite low. While the managers don't align country or sector weightings with the indexes, they do limit individual holdings to about 4% of assets to reduce the risks inherent in such a contrarian strategy.

The fund boasts an excellent long-term record. From its May 2001 inception through October 2017, its 8.1% annualized gain beats the MSCI ACWI Ex USA Index's 5.7% gain and 94% of its foreign large-blend peers. Moreover, the fund has been consistent, outperforming the index in 76% of the rolling five-year periods since inception.

The team's contrarian nature and willingness to be patient have contributed to the fund's long-term success but have also led to elevated volatility and downside capture levels. This was evident during a subpar 2015 owing to its long-standing over-

weighting of poor-performing emerging-markets stocks. But the fund's subsequent strong showing in 2016 illustrates how it overcomes such setbacks.

All told, this closed fund is likely to reward investors willing to stomach short-term bouts of underperformance, but it's not for everyone.

Process Pillar: O Positive

This fund's decisive value approach earns it a Positive Process rating.

The fund's investment committee seeks non-U.S. stocks that look cheap on a range of valuation measures. The managers rely on bottom-up, fundamental research and favor firms with good management, competitive advantages, and solid growth potential. Often they take advantage of bad news or a bad economic environment to buy fundamentally strong businesses.

The managers don't align country or sector weightings with the indexes, but they do limit individual holdings to about 4% of assets to reduce the risks inherent in such a contrarian strategy. Broader macro views or other high-level factors play lesser roles, though the team does consider issues such as potential legislation. Management is also long-term focused, so turnover has--and should remain-low. Indeed, annual turnover has averaged 14% during the past five calendar years, well below the foreign large-blend Morningstar Category average of 54%.

The managers sell when valuations get rich, fundamentals deteriorate, or better opportunities become available. When valuations decline, they often seize the opportunity to increase stakes in stocks in which they still have conviction. This leads the fund to appear out of step at times, so it requires patience. Management does tactically hedge currency exposure, but it typically hedges just part of the portfolio's total exposure.

Reflecting management's attention to valuations, price multiples such as price/earnings and price/book value have trended below--or in line

Į	G old
•	Positive
•	Positive
•	Positive
•	Positive
•	Positive
	0 0

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	-0.52	-0.94
2017	23.94	-1.18
2016	8.26	7.48
2015	-11.35	-9.77
2014	0.08	5.06

🖫 Bronze

Neutral

Negative



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Dodge & Cox International Stock Fund DODFX

Analysis

with--the MSCI ACWI Ex USA Index's and the typical foreign large-blend peer's. What's more, quality metrics such as returns on equity and net marqins have tended to be lower than its boqies.

As of September 2017, the fund's 16% exposure to healthcare stocks was significantly more than the index's 7% weighting, driven by European drugmakers Sanofi SNY and Roche. Moreover, the team had modest overweights to the economically sensitive financials and energy sectors. In financials, holdings included Brazil-based Itau Unibanco and India-based ICICI Bank IBN. In energy, historically low oil prices have led the fund to build sizable stakes in Statoil and Suncor Energy SU. On the flip side, the portfolio had limited exposure to the consumer defensive sector, where the managers find plenty of solid firms but few at prices they're willing to pay.

It's worth noting that the portfolio continues to emphasize emerging-markets stocks, at 18% of assets, compared with the category's 7% weighting. Prominent emerging markets stakes included Chinese Internet stocks JD.com JD and Baidu BIDU; the fund also has a sizable position in South Africa-based Naspers, which owns 34% of Tencent Holdings. Conversely, the portfolio continues to be underweight Japanese stocks.

Performance Pillar: • Positive

This fund has an excellent long-term record, earning it a Positive Performance rating.

Since the fund's May 2001 inception through October 2017, its 8.1% annualized gain beats the MSCI ACWI Ex USA Index's 5.7% gain, as well as 94% of its foreign large-blend peers. Risk-adjusted results are also solid: Its Sharpe ratio of 0.43 during the same period beats the index's 0.35 as well as 93% of its peers. What's more, the fund has been consistent, outperforming the index in 76% of the 138 rolling five-year periods since its inception.

The team's contrarian nature and willingness to be patient have contributed to the fund's long-term success, but have also led to elevated volatility and downside-capture levels. This was evident

during the financial crisis when bets in the financials sector hurt the fund. It also had a subpar 2015, when the fund's long-standing overweighting of emerging markets proved harmful as sentiment toward emerging markets soured. But the fund's subsequent strong showing in 2016 illustrates how it overcomes such setbacks.

In 2017 through October, the fund's 22.1% gain, though solid in absolute terms, trailed the index's 23.4% gain and 58% of its peers. The fund has benefitted from its overweighting to emerging markets--particularly Chinese Internet stocks JD.com JD and Baidu BIDU. But the fund has been held back by poor stock selection in energy.

People Pillar: O Positive

This fund's deep and experienced investment team earn it a Positive People rating.

Dodge & Cox's eight-member international equity investment committee manages the fund. The committee averages 23 years of tenure at the firm and includes director of international equity Diana Strandberg, chairman Charles Pohl, and vice president Roger Kuo. All but one of the committee members have more than \$1 million invested in the strategy, helping to align their interests with fundholders'. While the committee is guite stable overall, changes occasionally take place. In advance of the planned retirements of longtime committee members John Gunn and Greg Serrurier in 2016, Englebert Bangayan--who joined the firm in 2002--became a member of the committee in February 2015. Overall, Dodge & Cox's deep team, collaborative approach, and careful succession planning all help mitigate key-person risk.

The analyst ranks are also broad and deep, with impressive levels of experience. As of June 2017, the firm had 32 industry analysts and managers on the equity side; all but three have been at the firm for more than five years. There are also 28 analysts and managers with similar levels of experience on the fixed-income side--who sometimes pitch in here--as well as approximately 25 research associates on two- to four-year contracts. Nearly all team members have spent their entire

careers at Dodge & Cox. Indeed, they rarely leave for any reason besides retirement.

Parent Pillar: O Positive

Dodge & Cox is an exemplary firm and earns a Positive Parent rating.

The firm, based in San Francisco, benefits from a strong investment culture. CEO and president Dana Emery and chairman Charles Pohl are also lead members of the investment team; they run both the firm and its funds with a long time horizon.

But there are no stars here. Each fund is run collaboratively by one of five investment policy committees, whose members average more than 20 years at the firm. Moreover, the analyst ranks are broad and deep, with impressive levels of experience. In all, the firm has approximately 60 managers and analysts, most of whom are Dodge & Cox lifers. Indeed, team members rarely leave for any reason other than retirement.

Dodge & Cox's approach to new strategies is also admirable, having rolled out just six since its 1930 founding. The most recent is a global fixed-income offering that launched in May 2014; the firm developed its foreign-bond capabilities as a natural extension of its international-equity expertise. Management has also proved willing in the past to safeguard its strategies by closing funds.

Managers are heavily invested in the funds and the firm and have ample incentive to serve shareholders, as evinced by low costs, clear communications, and a sober long-term approach. In all, the firm is built to last.

Price Pillar: O Positive

This fund is one of the cheapest actively managed options available, giving it a built-in advantage over most foreign large-cap peers. The fund earns a Positive Price rating.

All assets are in the fund's no-load share class, which charges 0.64% and earns a Morningstar Fee Level of Low. By comparison, the median net expense ratio for the foreign large-cap no-load peer group was 1.02%. Moreover, management's low-



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Dodge & Cox International Stock Fund DODFX

Analysis

turnover strategy has also helped to keep transaction costs low.

It's worth noting that this fund has been closed to new investors since January 2015.

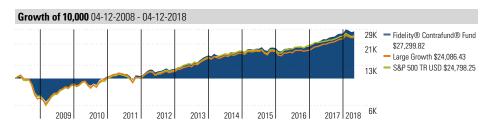


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Fidelity® Contrafund® Fund FCNTX

Morningstar Analyst Rating Silver

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Min. Inv. Expenses Morningstar Rating™ **Investment Style** Status Load Category 0.08 123.7 Open \$2,500 None 0.74% Large Growth Large Growth



3 Year Average Morningstar Risk Measures Risk vs. Category (1213) Return vs. Category (1213) Low Avg High

Pillars Process Positive Performance 0 Positive People Positive Parent 0 Positive 0 Price Positive Rating 🐺 Silver

Investment Strategy

The investment seeks capital appreciation. The fund normally invests primarily in common stocks. It invests in securities of companies whose value the advisor believes is not fully recognized by the public. The fund invests in domestic and foreign issuers. It invests in either "growth" stocks or "value" stocks or both. The fund uses fundamental analysis of factors such as each issuer's financial condition and industry position, as well as market and economic conditions to select investments.

Performance 04-12-201	18					
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	10,446	9,473	12,643	14,434	20,281	27,300
Fund	4.46	-5.27	26.43	13.01	15.19	10.56
+/- S&P 500 TR USD	4.27	-1.15	10.57	2.51	1.97	1.06
+/- Category	1.21	-0.49	3.82	2.69	1.37	0.75
% Rank in Cat	32	72	26	16	30	35
# of Funds in Cat	1,408	1,415	1,360	1,187	1,077	764
* Currency is displayed in BA	SE					

Top Holdings 02-28-2018				
	Weight %	Last Price	Day Chg %	52 Week Range
Facebook Inc A	6.80	164.55 BASE	0.45 🛧	139.33 - 195.32
Amazon.com Inc	6.06	— BASE	-0.48 🗸	884.49 - 1,617.54
Berkshire Hathaway Inc A	5.13	— BASE	-0.75 ↓	242,180.00 - 326,350.00
Alphabet Inc A	3.39	— BASE	-0.08 🗸	837.85 - 1,198.00
Microsoft Corp	3.26	92.89 BASE	-0.74 ↓	64.89 - 97.24
0/ Acceta in Ton E Holdings	24 64			

/0 Assets III	Top 5 Holdii	iys	24.0
⊕ Increase	Decrease	☼ New to Portfolio	

Style Map)		
		Giant	Weighted Average of holdings
		Large	 75% of fund's stock
		Medium	holdings
		Small	
		Micro	
 Deep Core Co	ore Core High		
Val Val	Grow Grow		

Asset Allocation					
	% Net	% Short	% Long	Bench mark	Cat Avg
Cash	1.57	0.00	1.58	0.00	1.39
US Stock	90.83	0.00	90.83	98.95	93.09
Non US Stock	6.30	0.00	6.30	1.05	5.37
Bond	0.17	0.00	0.17	0.00	0.09
Other	1.13	0.00	1.13	0.00	0.07

Managomont	
	Start Date
William Danoff	09-17-1990

Top Sectors 02-28-2018					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Technology	35.33	36.17	33.23	31.21	▼
Financial Services	25.01	25.01	21.05	13.67	
Consumer Cyclical	16.05	18.28	14.80	16.80	
→ Healthcare	9.11	9.54	8.96	13.76	
ndustrials	6.10	6.12	6.08	10.33	
_					0 10 20 30 40

Dividend and Capital Gains Distributions						
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
02-09-2018	122.16	1.8580	0.0000	0.0000	0.0000	1.8580
12-08-2017	121.93	6.7730	0.0000	0.0000	0.1040	6.8770
02-10-2017	104.60	0.6600	0.0000	0.0000	0.0160	0.6760
12-09-2016	100.08	2.8380	0.0000	0.0000	0.2770	3.1150
02-05-2016	88.14	0.6230	0.0000	0.0000	0.0140	0.6370

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Fidelity® Contrafund® Fund FCNTX

Analysis

Still a standout.

By Katie Rushkewicz Reichart, CFA 2/26/2018

Longtime manager Will Danoff's solid execution still sets Fidelity Contrafund apart. It retains its Morningstar Analyst Rating of Silver.

Danoff has led the fund, one of the industry's largest actively managed equity offerings, since 1990. He combines his own insights with Fidelity's broad analytical research to find companies capable of multiyear earnings growth. Beyond looking for companies with sound competitive advantages, he places a heavy emphasis on the management teams in charge.

As one of the largest owners of many of the stocks the fund owns, Danoff has unparalleled access to such teams, which helps him construct the portfolio. For instance, Facebook FB--a top contributor in 2017--has grown into the fund's top position as of year-end 2017 in part because of Danoff's confidence in CEO Mark Zuckerberg. The fund has long owned Berkshire Hathaway BRK.A, a less-common holding among large-growth Morningstar Category peers, because of Danoff's belief in its best-of-breed management team; he's largely avoided selling shares since he started purchasing them in 2002, and it's the fund's second-biggest position.

Positions such as Berkshire have dampened the fund's risk profile relative to other large-growth peers. Indeed, it's lost less than the Russell 1000 Growth Index in down markets under Danoff.

The fund hasn't kept pace with that benchmark at every point in the market cycle but has still managed to distinguish itself; it outperformed by 2 percentage points in 2017, on the back of strong stock-picking in technology, an area of strength at the firm. Danoff has Fidelity's large global analyst team at his disposal, which helps him keep tabs on the sprawling portfolio of 300-plus names and feeds him ideas that can keep the fund competitive, including some investments in private companies. Changes on the analyst team in the past couple of years bear watching, and the fund's

large asset base arguably makes it less nimble than most peers. However, Danoff's experience helps keep the fund on the right path.

Process Pillar: O Positive

Will Danoff follows a typical growth strategy, looking for firms with improving earnings, but his execution sets the fund apart. He weaves together his own analytical insights, gleaned from 30 years at Fidelity, with research from more than 100 global analysts. As the biggest owner of many stocks. Danoff has unparalleled access to company management, helping him understand a business' growth drivers. Capacity has long been a risk, given that Danoff manages more than \$100 billion across accounts. (In 2013, Fidelity named John Roth as comanager at Danoff's other charge, Fidelity Advisor New Insights FINSX, which in the past looked very similar to Fidelity Contrafund but has started deviating to a greater extent.) Even so, Contrafund is the second-biggest actively managed large-cap fund and is often a top owner of its holdings, so its size does limit its flexibility.

Danoff has made tweaks to the process through the years to accommodate its growing size, including trading less often, owning fewer mid- and small-cap names, and maintaining a portfolio of 270-500 stocks. (The name count has trended downward recently as he has focused on his best ideas.) These moves haven't affected long-term performance, which remains strong. The fund has been closed in the past, but it is currently open and has experienced outflows in recent years.

Danoff's consistent execution through the years earns the fund a Positive Process rating.

Despite the fund's large asset base and portfolio of hundreds of names, it has avoided looking too marketlike. It has held as much as 20% in non-U.S. equities in the past, though its 7% non-U.S. stake as of December 2017 was on the low end of its normal range during the past decade.

While the fund's size limits Will Danoff's ability to take meaningful positions throughout the portfolio, he doesn't shy away from making big bets where

Morningstar's Take		
Morningstar Analyst Rating	Ţ	Silver
Morningstar Pillars		
Process	•	Positive
Performance	•	Positive
People	•	Positive
Parent	•	Positive
Price	•	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Analyst Rating Spectrum

℧ Silver

₩ Gold

Fund Performance		
	Total Return %	+/- Category
YTD	4.46	1.21
2017	32.21	4.54
2016	3.36	0.14
2015	6.46	2.86
2014	9.56	-0.44

🖫 Bronze

Neutral

Negative



Release date 04-13-2018 Page 3 of 3

Fidelity® Contrafund® Fund FCNTX

Analysis

he can. Alphabet GOOG and Berkshire Hathaway BRK.A are long-standing bets in the portfolio, each at more than 5% of assets as of December. Facebook FB has grown into the top position based on Danoff's belief that it is a great franchise with excellent management. The fund's tech stake has ticked up in the past year, and it remains the biggest sector weighting, at 40% of assets. The fund's healthcare stake has come down to less than 10% of assets, and Danoff is treading carefully on concerns about drug pricing. The fund's 19% financials stake is above the large-growth norm (though closer to its S&P 500 prospectus benchmark's).

The fund has stakes in some private tech companies, including Uber, Pinterest, and Airbnb, though these totaled less than 2% of assets as of yearend. The fund, which held 4%-6% cash in early 2016, was close to fully invested as of December and has seen persistent outflows.

Performance Pillar: O Positive

This fund earns a Positive Performance rating. It's been a top large-growth offering under Will Danoff, who has managed it since September 1990. During his tenure through January 2018, the fund has gained 13.7% annualized to the S&P 500's 10.6%, the Russell 1000 Growth Index's 10.3%, and the category's 9.5%. Danoff's record is all the more impressive considering the huge sum of money he oversees, totaling more than \$100 billion. Undoubtedly, this fund is less flexible than the \$7 billion Fidelity Series Opportunistic Insights used exclusively in Fidelity's target-date series, which he's led to even better results since its late-2012 inception.

This fund isn't too volatile for a growth fund. Danoff, who has run money long enough to witness a few major market blowups, has outperformed large-growth peers and the Russell 1000 Growth Index in down markets during his tenure, including both bear markets of the 2000s. The fund's Morningstar Risk score, which penalizes downside deviations in returns, is low. Danoff prefers proven growers showing tangible signs of improving earnings to more-speculative fare, which means the

fund can lag in certain market environments such as 2009's rally. However, strong stock selection, particularly in the technology and consumer sectors, led to a 32% gain that was 2 percentage points ahead of the benchmark and almost 80% of its peers.

People Pillar: O Positive

Will Danoff has run this fund since September 1990, posting competitive results even as it has grown. Danoff's years of experience and stockpicking abilities have given the fund an edge and support its Positive People rating. He also relies on Fidelity's analyst team, which totals more than 100 globally. A fair amount of turnover occurred in 2016-17 within the consumer, energy/utilities, and cyclical teams, but Fidelity's tech and healthcare teams have historically been quite strong. The analysts' input is essential, as it would be difficult to effectively oversee a portfolio of 300-plus stocks himself. The analysts have incentives to relay their best ideas to him, as he commands more than \$100 billion in assets across all his charges. But Danoff is actively involved in stock-specific research and carries around a thick notebook listing the tickers of companies he's met with.

Given Danoff's heavy asset load, capacity has been a long-standing concern. In 2013, John Roth became comanager alongside Danoff at the \$30 billion Fidelity Advisor New Insights FINSX, but Danoff also runs the \$7 billion Fidelity Series Opportunistic Insights (used exclusively in the target-date series) and a fund sold in Canada. This fund courts significant key-person risk, but Danoff has announced no intention of retiring anytime soon. Danoff invests more than \$1 million in both this fund and Fidelity Advisor New Insights.

Parent Pillar: O Positive

Long one of the industry's biggest asset managers, Fidelity has faced pressure as investors have pulled money from the active U.S. equity funds for which the firm is best known. While significant outflows could gravely impact some firms, Fidelity is shielded by its diverse mix across asset classes (including its own competitively priced index funds), success in other business lines, and private ownership that helps it escape quarterly earnings

scrutiny.

The asset-management division remains wellstaffed amid cost-cutting across the firm. Still, the firm could stand to rationalize its active-equity fund lineup: There are many redundant or mediocre funds alongside the standouts run by longtime star managers and up-and-comers. Retaining talent remains critical, particularly following the unexpected retirement announcement of a talented young small-cap manager. To its credit, Fidelity has handled equity manager transitions better than in the past. Meanwhile, Fidelity's fixed-income division remains among the industry's best, with a team-oriented approach assuaging key-person risk. Fidelity's target-date funds have improved, and the firm's technology and trading resources remain topnotch.

Even as it has raced to address competitive headwinds by unveiling a handful of factor-based exchange-traded funds, Fidelity remains capable on the actively managed side, earning a Positive Parent rating.

Price Pillar: O Positive

This fund has a performance fee, so its expense ratio can change based on how its three-year returns look relative to the S&P 500. (For every percentage point of out- or underperformance, the expense ratio is adjusted by 0.02% up to a maximum of 0.20%.) The performance-based fee is in the interest of investors, who don't have to pay as much when the fund underperforms. The fund's Price rating is determined without considering the performance adjustment. The no-load and K shares are priced below average relative to similarly sold peers, so the fund receives a Positive Price rating. Expenses have ranged from 0.64% to 1.01% in the past decade; the latter is hard to justify given the fund's huge asset base. The no-load shares cost 0.68%.

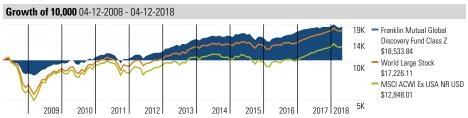


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Franklin Mutual Global Discovery Fund Class Z MDISX

Morningstar Analyst Rating Bronze

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ **Investment Style** Load Category **↑**0.21 | 0.66 \$100,000 0.99% 32.27 2.44 Open None World Large Stock Large Value

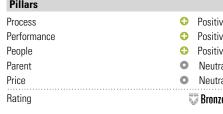


The investment seeks capital appreciation. The fund invests primarily in equity securities (including securities convertible into, or that the investment manager expects to be exchanged for, common or preferred stock) of U.S. and foreign companies that the investment manager believes are available at market prices less than their value based on certain recognized or objective criteria (intrinsic value). The equity securities in which the fund invests are primarily common stock. The fund may invest sub-

stantially and potentially up to 100% of its assets in foreign securities.

3 Year Average Morningstar Risk Measures Risk vs. Category (717)Return vs. Category High Inw Avg

Pillars		
Process	•	Positive
Performance	•	Positive
People	•	Positive
Parent	0	Neutral
Price	0	Neutral
Rating	E R	Bronze



Performance 04-12-2018						
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	9,954	9,814	10,518	11,234	14,490	18,534
Fund	-0.46	-1.86	5.18	3.95	7.70	6.36
+/- MSCI ACWI Ex USA NR USD	-0.67	-0.59	-13.17	-1.45	1.78	3.83
+/- Category	-1.08	0.62	-11.45	-3.24	-1.54	0.55
% Rank in Cat	72	28	98	93	74	35
# of Funds in Cat	932	939	865	702	584	338

*	Currency	is	displ	layed	in	BASE	

Investment Strategy

Top Holdings 12-31-2017				
	Weight %	Last Price	Day Chg %	52 Week Range
Medtronic PLC	2.28	79.56 BASE	-0.43 ↓	76.41 - 89.72
Royal Dutch Shell PLC Class A	2.28	— BASE	0.42 🛧	1,982.50 - 2,579.50
Novartis AG ADR	2.23	80.82 BASE	-0.80 ↓	72.67 - 94.19
NN Group NV	2.22	38.01 BASE	0.32 🛧	28.75 - 39.06
⊕ Time Warner Inc	2.15	96.79 BASE	0.35 🛧	85.88 - 103.89

11.16

⊕ Decrease

 ★ New to Portfolio

Style Map		
	Giant Large	Weighted Average of holdings
	Medium Small	 75% of fund's stock holdings
	Micro	
Deep Core Core Core Hig Val Val Grow Gr		

A	sset Allocation					
		% Net	% Short	% Long	Bench mark	Cat Avg
•	Cash	3.74	0.13	3.87	0.00	1.76
•	US Stock	53.24	0.14	53.38	51.99	51.27
•	Non US Stock	39.26	0.49	39.75	47.96	46.18
•	Bond	2.91	0.00	2.91	0.00	0.41
•	Other	0.85	0.00	0.85	0.05	0.38

Management	
	Start Date
Philippe Brugère- Trélat	12-07-2009
Peter A. Langerman	12-07-2009
Timothy Rankin	12-31-2010
Christian Correa	01-01-2018

Top Sectors 12-31-2017					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Financial Services	27.16	29.60	26.46	18.84	*
■ Healthcare	15.10	15.17	13.24	11.78	<u> </u>
Technology	12.51	13.56	11.93	18.15	
Consumer Cyclical	11.16	12.06	11.16	12.64	
♦ Energy	9.60	9.60	6.32	4.88	

Dividend and Capital Gains Distributions						
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
12-22-2017	32.45	0.4726	0.0000	0.0000	0.7632	1.2358
12-22-2016	31.24	0.7738	0.0396	0.0000	0.6748	1.4882
09-02-2016	30.75	0.4289	0.0430	0.0000	0.0109	0.4828
12-18-2015 09-04-2015	28.78 31.31	1.6120 0.3635	0.2677 0.0000	0.0000 0.0000	0.5166 0.0363	2.3963 0.3998

[%] Assets in Top 5 Holdings

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Franklin Mutual Global Discovery Fund Class Z MDISX

Analysis

Bargain-hunting can be a pain.

By Jonathan Wallace, CFA 4/5/2018

Franklin Mutual Global Discovery struggled in 2017 due to its value bias and a few poorly performing stock picks. Still, we expect the fund to perform well over the long haul, thanks to its robust process and experienced team. The fund earns a Morningstar Analyst Rating of Bronze.

The Franklin Mutual Series team is deep and tenured, which provides confidence that the fund's deep-value process will be consistently executed. The group of 27 investment professionals has an average of 21 years of industry experience, with more than 13 years on average with the Mutual Series team. The team also has dedicated merger/arbitrage and distressed-debt experts, an identifying feature and trademark of the Mutual Series style.

Management's bottom-up approach is primarily oriented toward cheap stocks but includes mergerarbitrage and distressed debt. Focusing on fundamentals helps them look past short-term drops to buy more when they think a security has become a bigger bargain. In mid-2015, the managers built a top-25 equity position in Volkswagen VOW3 because they thought its stock price didn't reflect the value of its Porsche and Audi businesses. When Volkswagen's shares then got crushed following its emissions scandal, management reassessed the company's value, including the impact of potential fines and lost sales, and increased the number of shares the fund held by roughly half. This focus on fundamentals also helped the managers add to names like Royal Dutch Shell RDS.A and Symantec SYMC after share prices slid in 2015, and those stocks became primary drivers of the fund's rebound in 2016.

The fund struggled in 2017 due to several factors. Growth outperformed value, which acted as a headwind given the fund's deeper value tilt. The fund's policy of hedging most of its foreign currency risk, which has helped the fund for the better part of a decade, turned against it. There were

also struggles with a few stock picks, such as General Electric, Teva Pharmaceutical, and Rite Aid.

Process Pillar: O Positive

This fund's integrated value approach receives a Positive Process Pillar rating. As with other Mutual Series offerings, it's focused on cheap stocks, but also includes merger-arbitrage plays on announced acquisitions and distressed debt. While the managers pay attention to standard valuation metrics like price multiples, they concentrate on firms' enterprise values as a function of what each individual business line is worth. Their activity in merger-arbitrage helps keep tabs on what informed buyers are willing to pay. Once they find companies whose securities are trading at a material discount to their estimates of intrinsic value, they look across the capital structure and invest where they see the best risk/reward opportunities. Positions often migrate across that structure. An initial stake in a bankrupt firm's senior collateralized debt can lead to buying its junior unsecured debt as management becomes comfortable with its restructuring plan, or it may lead to an exchange for equity following the reorganization.

The managers court risk by investing in troubled firms, but their expertise, combined with an insistence on an appropriate margin of safety on price, provide some protection. They're also willing to wait years for theses to play out and readily go to cash if compelling alternatives are lacking. In addition, they're quick to sell once securities reach their estimates of fair value.

Management aims to layer downside protection into the structure of the portfolio. It holds a diverse mix of roughly 130 equity and fixed-income securities. Cheap stocks and merger-arbitrage equity positions typically take up 80%-90% of the fund's assets, while the remainder is split largely between distressed debt and cash, as opportunity dictates. As of December 2017, the fund's equity stake stood at 93%, with roughly 2% of assets in distressed debt. Since bankruptcy plays, whether liquidations or reorganizations, move according to the courts' timing, they can reward investors independent of market movements. Yet they also come

Morningstar's Take		
Morningstar Analyst Rating	Ţ	Bronze
Morningstar Pillars		
Process	•	Positive
Performance	•	Positive
People	•	Positive
Parent	0	Neutra
Price	0	Neutra

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Bronze

Neutral

Negative

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	-0.46	-1.08
2017	9.84	-13.77
2016	12.86	7.32
2015	-3.36	-1.67
2014	5.33	2.54



Release date 04-13-2018 Page 3 of 3

Franklin Mutual Global Discovery Fund Class Z MDISX

Analysis

with their own brand of uncertainty.

The fund can invest all of its assets overseas and up to 25% in emerging markets. Foreign exposure peaked at 71% in 2007, 8% of which was in emerging markets (including South Korea and Taiwan). Since mid-2010, foreign exposure has generally trended downward, and most of the fund's stocks are multinationals like top-five holding Royal Dutch Shell RDS.A. While the managers don't hedge the foreign-currency exposure of holdings that do most of their business in U.S. dollars, like Shell, they do hedge the rest of their international currency exposure. Cash was near 30% when the current team took over in late 2009. It quickly came down and has since ranged from roughly 5% to 15%.

Performance Pillar: • Positive

By building a portfolio of cheap stocks, merger-arbitrage plays, and distressed debt, management aims to outperform the benchmark on a risk-adjusted basis. Since lead manager Peter Langerman began his second stint here at year-end 2009 through March 2018, this value portfolio's returns edged the MSCI World Value Index, but lagged both the world stock peer group average and the prospectus benchmark, the MSCI World Index. The fund has benefited from its policy of hedging most foreign currency risk as over that time period the hedged version of the MSCI World has outperformed the unhedged version. Offsetting the currency tailwind is the fact that value investing has been out of favor globally, demonstrated by the MSCI World Value Index lagging the MSCI World Index during the same period. The fund struggled in 2017 as value investing was again out of favor in comparison to growth and with stock picks like General Electric, Teva Pharmaceutical, and Rite Aid weighing on performance during the year.

The fund's results look better on a risk-adjusted basis, thanks to lower volatility than the benchmark. Since year-end 2009, the fund's Morningstar Risk-Adjusted Return beat the category average and the MSCI World Value Index, earning it a Positive Performance rating. However, the fund's risk-adjusted returns lag the manager's prospect-

us benchmark, the MSCI World Index.

People Pillar: O Positive

This fund's Positive People Pillar rating reflects management's expertise and shared experience. Lead manager Peter Langerman joined predecessor Heine Securities in the 1980s, while comanager Timothy Rankin joined the firm shortly after Franklin's 1996 acquisition. With comanager Philippe Brugere-Trelat's announced retirement. which will be effective in May 2018, Mutual Series named veteran Christian Correa to the manager roster in January 2018. Correa joined the firm in 2003 and serves as director of Research. Langerman and Rankin both left the firm for periods, Langerman between 2002 and 2005, and Rankin between 2004 and 2010. Langerman previously managed here from 1993 to 1998 and returned in late December 2009. Rankin was a comanager here from July 2001 to late 2004 and returned at year-end 2010.

The managers are part of Franklin's Mutual Series team. Tracing its lineage back to pioneering value investor Max Heine and his protege Michael Price, the team comprises 27 investment professionals who have been with the firm or its predecessor for 13-plus years on average. They divide coverage by global industry, region, and asset class. For example, Rankin covers chemicals, oil, gas, and coal while Correa specializes in merger arbitrage, software, and services. Langerman and Rankin each invest more than \$1 million in the fund, and Brugere-Trelat at least \$500,000.

Parent Pillar: • Neutral

Publicly traded but family controlled and managed, Franklin Resources BEN is the parent company of Franklin Templeton Investments. A global asset manager with \$738 billion in assets as of early 2017, the firm has grown through multiple acquisitions over the years.

Franklin's recent struggles highlight, albeit to an extreme, the challenges facing active manage-

ment. Between mid-2014 and early 2016, the firm's AUM fell by more than one fifth as investors increasingly opted for passive strategies and flagships like Franklin Income FKINX performed poorly. Franklin responded by cutting 300 personnel worldwide and launching seven exchange-traded funds in the United States, four of which passively track customized benchmarks built using a proprietary multifactor model for each.

The step toward passive investing illustrates the firm's tendency to add to its investment capabilities rather than foster excellence across its lineup. The firm's U.S. strategies are the most wide-ranging, and of the 36 U.S. open- and closed-end funds with a Morningstar Analyst Rating, half are Neutral. On the fixed-income side, although Templeton Global Bond TPINX remains a standout, the firm's other taxable- and municipal-bond strategies have had missteps, including ill-timed bets on energy and Puerto Rico debt. We have downgraded the firm's Parent Pillar rating to Neutral from Positive.

Price Pillar: O Neutral

The fund's assets-per-share weighted expense ratio of 1.21% is solidly in the average range relative to its world stock peers, earning it a Neutral Price rating, which is a downgrade from last year's Positive Price rating. Fees here haven't increased, but peers have cut expenses more aggressively than this fund. About 45% of the fund's assets are in the broker sold A-shares, which carry a 1.24% price tag, which is solidly in the middle of similarly sold peers. The legacy institutional shares, which hold roughly one third of the assets, come at a price tag 0.99%, which toes the line between the average and above-average ratings in the fee level group.



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Janus Henderson Enterprise Fund Class N JDMNX

Morningstar Analyst Rating Bronze

Positive

Positive

Positive

Neutral

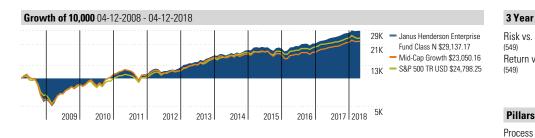
Positive 👺 Bronze

0

0

0

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ **Investment Style** Load Category 124.57 1.14 | 0.92 Limited \$1 mil Mid Growth 0.18 None 0.67% Mid-Cap Growth





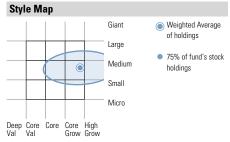
Performance

People

Investment Strategy

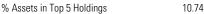
The investment seeks long-term growth of capital. The fund pursues its investment objective by investing primarily in common

stocks selected for their growth potential, and normally invests at least 50% of its equity assets in medium-sized companies. Medium-sized companies are those whose market capitalization falls within the range of companies in the Russell Midcap®							Parent Price		
Growth Index. Market capitalizate eign securities, which may include		,		d value of a com	pany. It may also	invest in for-	Rating		
							Style M	ар	
Performance 04-12-2018									
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann			+

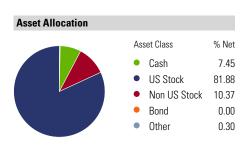


Performance 04-12-201	8					
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	10,504	9,636	12,584	14,297	20,796	29,137
Fund	5.04	-3.64	25.84	12.66	15.77	11.29
+/- S&P 500 TR USD	4.85	0.48	9.98	2.15	2.55	1.78
+/- Category	2.34	0.20	5.23	4.70	3.65	2.01
% Rank in Cat	15	44	18	3	4	_
# of Funds in Cat	617	621	606	541	475	345
* Currency is displayed in BA	SE					

Top Holdings 12-31-2017				
	Weight %	Last Price	Day Chg %	52 Week Range
Sensata Technologies Holding N.V.	2.38	53.85 BASE	0.13 🛧	38.71 - 57.40
TD Ameritrade Holding Corp	2.32	59.54 BASE	-1.31 ↓	36.12 - 63.01
TE Connectivity Ltd	2.22	99.46 BASE	0.34 🛧	71.93 - 108.23
Lamar Advertising Co Class A	1.96	63.49 BASE	0.41 🛧	61.36 - 79.17
Constellation Software Inc	1.87	861.00 BASE	-0.02 ↓	610.54 - 915.87
0/ Assats in Top E Holdings	10.74			



Increase ⊕ Decrease
 ★ New to Portfolio



Fop Sectors 12-31-2017					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Technology	33.06	33.06	29.70	22.46	
Industrials	19.92	27.40	19.92	17.71	
■ Healthcare	17.34	17.47	15.54	14.24	
Consumer Cyclical	13.84	13.84	10.39	16.77	
Financial Services	9.80	9.80	6.18	12.06	

Dividend and Capital Gains Distributions						
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
12-19-2017	119.18	2.0926	0.0000	0.0000	0.2279	2.3205
12-19-2016	96.92	1.5579	0.0000	0.0000	0.2134	1.7713
12-17-2015	86.14	2.8187	0.3164	0.0000	0.4000	3.5351
12-17-2014	85.38	4.9724	0.0000	0.0000	0.0921	5.0645
12-17-2013	79.46	4.3403	0.0000	0.0000	0.2324	4.5727

Management	
	Start Date
Brian Demain	11-01-2007
Philip Cody Wheaton	07-01-2016

Release date 04-13-2018 Page 2 of 3

Janus Henderson Enterprise Fund Class N JDMNX

Analysis

This hot fund closed to new investors.

By Greg Carlson 12/12/2017

Janus Henderson Enterprise's experienced team, patient approach, and reasonable fees earn a Morningstar Analyst Rating of Bronze.

There's a veteran crew behind this closed fund. Brian Demain has managed it since November 2007. He's backed by comanager Cody Wheaton, who joined Janus' small/mid-cap team in 2003, as well as five analysts with an average of nine years' tenure at Janus. Those analysts also support the managers of Janus Henderson Triton JATTX and Janus Henderson Venture JAVTX.

This fund's strategy is fundamentally appealing; it focuses primarily on relatively stable growers in the mid-cap universe and holds them for much longer than the fund's typical mid-growth Morningstar Category peer. Portfolio turnover has averaged just 14% over the past four years, while the category median was 49%.

The fund has sometimes fallen short of its Russell Midcap Growth benchmark, which has been hard for mid-growth funds to beat during Demain's tenure--the fund has beaten the index in just 52% of rolling five-year periods from November 2007 through November 2017. That showing owes in part to the fund's typical tilt toward steadier fare in the midst of a long bull market. But at times, the fund has also overpaid for growth or owned companies whose competitive advantages turned out to be weaker than expected. Nevertheless, the fund has won over the long haul, besting 85% of peers and the index on both total and risk-adjusted returns since November 2007.

Investors have taken notice. The fund grew from \$3.9 billion at the end of 2014 to \$16.1 billion in November 2017, making it the second-largest midgrowth fund. Some of that growth is due to appreciation as stocks have rallied strongly, but the fund also took in a net \$8 billion during that span, and Demain recently managed a total of \$19.5 billion in the strategy. Big stakes in some of the fund's

top holdings means it could take time to liquidate those positions, but Demain's patient approach mitigates those concerns to a degree. Inflows have also slowed dramatically since the fund closed to new investors in January 2017. It remains a fine holding.

Process Pillar: O Positive

This fund's patient, prudent approach earns a Positive rating for Process. Lead manager Brian Demain prefers companies with recurring revenues, competitive advantages, and strong or improving returns on invested capital. The portfolio's average profitability measures typically land above the mid-growth category norm. He is willing to pay up for durable growth at times; thus, valuations are typically at or above the category norm as well. The fund will also own, in far smaller quantities, companies with rapid, more-volatile growth.

Demain doesn't reflexively abide by typical quality metrics. For example, he cares less about the absolute amount of debt on a company's balance sheet as the structure of that debt. Thus, the fund's debt/capital ratio is often above average. He likes to see maturities staggered in a prudent way and wants companies that can generate more than enough cash to pay off their debt. Valuation is also a factor: Demain performs discounted cash flow analysis on every stock and will sell on valuation concerns. A recent example is security products maker Allegion ALLE; the firm made an acquisition the managers didn't like as its P/E ratio moved into the high teens, so they sold the stock in 2017's third quarter.

The fund typically owns 70-85 stocks. Demain is a patient investor--portfolio turnover averaged 14% over the past four years, while the category median was 49%.

Sector weightings are not strictly constrained at this fund. Its tech stake has been significantly higher than the Russell Midcap Growth benchmark's (33% of assets versus 24% at the end of September 2017). Brian Demain has found a wealth of tech firms he says have strong balance sheets and solid growth prospects. Top holdings in

Morningstar's Take		
Morningstar Analyst Rating		Bronze
Morningstar Pillars		
Process	•	Positive
Performance	•	Positive
People	•	Positive
Parent	0	Neutral
Price	•	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Bronze

Neutral

Negative

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	5.04	2.34
2017	26.65	2.73
2016	12.18	6.15
2015	3.57	4.51
2014	12.19	5.19



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Janus Henderson Enterprise Fund Class N JDMNX

Analysis

the sector include several that Morningstar believes possess economic moats, such as scientific instrument maker Sensata Technologies ST (the fund's largest holding) and semiconductor equipment maker Lam Research LRCX.

This fund has grown rapidly in recent years, from \$3.9 billion at the end of 2014 to \$16.1 billion at the end of October 2017, making it the secondlargest fund in the mid-growth category. True, some of that growth is due to appreciation as stocks have rallied strongly during that period. But the fund also took in a net \$8 billion over that span, and Demain recently managed a total of \$19.5 billion in the strategy. The fund hasn't shown typical signs of asset bloat--the number of holdings, and the fund's active share versus the index, are within historical norms. But the fund and the firm overall own substantial stakes in some of the fund's top holdings and smaller-cap picks, so it could be difficult to sell those positions quickly. That said, inflows have slowed greatly since the fund closed in January 2017, and Demain's patient approach partially mitigates size concerns.

Performance Pillar: • Positive

This fund hasn't consistently beaten its benchmark, but its attractive risk/reward profile earns a Positive rating for Performance.

Lead manager Brian Demain's modestly cautious approach has at times left the fund behind its Russell Midcap Growth benchmark in the bull market that began in early 2009, but he's generated strong returns since taking the helm in November 2007. Through November 2017, the fund gained an annualized 9.4%, besting the index by 0.9 percentage points and surpassing 88% of the fund's midgrowth category peers. The fund's risk-adjusted returns, as measured by Sharpe and Sortino ratios, have been similarly impressive.

The fund has typically gained an edge on both the benchmark and its typical peer when times are tough. When stocks have declined during Demain's tenure, the fund has lost 91% as much as the index and 88% as much as the average midgrowth fund. In rising markets, the fund has merely

matched the category average and gained 96% as much as the index. The fund's upside captures, combined with the market's long rise, are reflected in its rolling results. In 62 five-year periods during Demain's tenure, the fund beat the midgrowth category median 95% of the time but surpassed the index just 52% of the time. The fund may again gain ground on the benchmark when the market finally cools.

People Pillar: O Positive

Brian Demain has had a hand in running this fund for 13 years. He's been the lead manager since November 2007 and previously served as an assistant manager for three years. He joined the firm as an analyst in 1999. He invests more than \$1 million in this fund.

Demain is backed by Janus' small/mid-cap team, which is composed primarily of veterans and covers most of this fund's holdings. Comanager Cody Wheaton was promoted in July 2016 after 13 years on the team as an analyst (and assistant manager of this fund since 2014) and still covers consumer and financial stocks. Five full-time analysts, with an average of nine years' tenure at the firm, work on the team as well. The managers also get input from Scott Stutzman, an industrials analyst who also comanages the other two funds this team supports (Janus Henderson Triton JATTX and Janus Henderson Venture JAVTX), and Jonathan Coleman, a 23-year Janus veteran and the lead manager of those funds.

The team has delivered strong results at all three funds, and it's been fairly stable--the last departure was analyst and Venture comanager Maneesh Modi, who left in early 2015.

The rest of the fund's holdings are covered by the firm's large-cap team. That team has seen significant turnover in recent years, but Demain works most closely with the tech sector team, which has seen very few departures. The fund earns a Positive rating for People.

Parent Pillar: • Neutral

In October 2016, Janus Capital Group and Henderson Global Investors announced that they inten-

ded to merge. The deal was completed at the end of May 2017, with the new group named Janus Henderson Investors.

The business aims and rationale for combining the two entities were clear. Both firms had been looking to diversify their product ranges and increase their scope of distribution, and this merger achieves those objectives. The combined entity also has greater scale--total assets under management were \$345 billion at the end of June 2017-but no long-term fee cuts, which would help the firm better compete in an industry where fees are declining, have been announced. The previous firms' CEOs are co-leaders of the new group, and Enrique Chang, Janus' head of investments, is the overall CIO. This provides some potential for change to the Henderson culture, but Chang had a positive impact on the Janus equity team, and some senior members from the Henderson investment team still have a voice.

There have been personnel departures, but the fact that investment team overlap was relatively limited has been a positive. There are, however, likely to be further changes as the group strategy takes shape, not least in terms of the CEO role, which the board is expected to review in three years. We continue to monitor this situation. Both firms previously earned Neutral Parent ratings, and the combined firm does as well.

Price Pillar: O Positive

This fund has done a fairly good job of sharing economies of scale with shareholders across its largest share classes. The fund's I shares hold 30% of the assets, charge 0.78%, and earn a Morningstar Fee Level of Below Average. The T shares hold 29% of the assets, charge 0.93%, and also earn a Below Average. The N shares hold 19% of the assets, charge 0.68%, and earn a Low. And the D shares hold 11% of the assets, charge 0.84%, and earn a Below Average.

The fund's other four share classes hold the remaining 11% of its assets and collectively earn an Average fee level. Overall, the fund earns a Positive rating for Price.



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JPMorgan U.S. Equity Fund Class R6 JUEMX

Investment Strategy

including depositary receipts.

Increase

Industrials

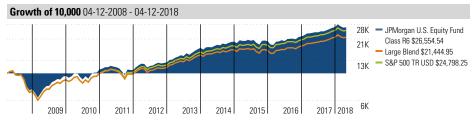
Decrease

★ New to Portfolio

12.59

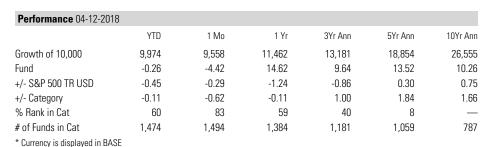
Morningstar Analyst Rating 🐺 Silver

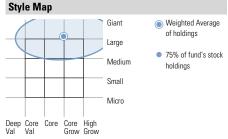
NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ Load Category **Investment Style ↑**0.16 | 0.99 Large Blend 16.25 1.06 14.9 Open \$15 mil None 0.44% Large Blend



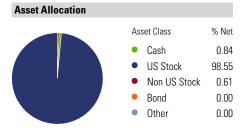


Pillars Process Positive Performance 0 Positive People 0 Positive The investment seeks to provide high total return from a portfolio of selected equity securities. Under normal circumstances, the Parent 0 Positive fund invests at least 80% of its assets in equity securities of U.S. companies. "Assets" means net assets, plus the amount of 0 Price Positive borrowings for investment purposes. In implementing its strategy, the fund primarily invests in common stocks of large- and medium-capitalization U.S. companies but it may also invest up to 20% of its assets in common stocks of foreign companies, Rating 🐺 Silver





Top Holdings 02-28-2018				
	Weight %	Last Price	Day Chg %	52 Week Range
Microsoft Corp	3.84	92.89 BASE	-0.74 🗸	64.89 - 97.24
 Bank of America Corporation 	3.46	29.94 BASE	-2.38 ↓	22.07 - 33.05
Apple Inc	3.42	174.95 BASE	0.45 🛧	140.45 - 183.50
Amazon.com Inc	3.11	— BASE	-0.48 ↓	884.49 - 1,617.54
Alphabet Inc A	3.08	— BASE	-0.08 ↓	837.85 - 1,198.00
% Assets in Top 5 Holdings	16.90			



Top Sectors 02-28-2018					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Technology	22.59	22.82	20.12	20.17	V
Financial Services	18.44	18.70	17.11	17.44	
→ Healthcare	14.89	14.89	14.11	14.02	
Consumer Cyclical	13.30	13.30	11.82	12.05	<u> </u>

11.21

11 49

12.80

Management	
	Start Date
Susan Bao	01-01-2001
Scott Davis	08-18-2014
David Small	07-21-2016

Dividend and Capita	al Gains Distribution	ıs				
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
03-27-2018	15.96	0.0000	0.0000	0.0000	0.0366	0.0366
12-20-2017	16.33	0.0000	0.0000	0.0000	0.0577	0.0577
12-13-2017	16.24	1.0986	0.1598	0.0000	0.0000	1.2585
09-27-2017	16.44	0.0000	0.0000	0.0000	0.0478	0.0478
06-28-2017	15.96	0.0000	0.0000	0.0000	0.0414	0.0414

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JPMorgan U.S. Equity Fund Class R6 JUEMX

Analysis

A sound core U.S. equity fund.

By Thomas Lancereau, CFA 1/19/2018

A solid team, robust process, and low fees support JPMorgan U.S. Equity's Morningstar Analyst Rating of Silver.

As anticipated, Tom Luddy, who had comanaged this fund since February 2006 and helped develop the strong stock-valuation model at the strategy's center, stepped back at the end of 2017. His transition was ably handled. Scott Davis, appointed comanager in August 2014 in anticipation of this transition, has since become lead manager. He runs about 65% of the portfolio. Susan Bao, who has been a comanager here since 2001, retains a 10% sleeve of the fund while assuming lead responsibility on the firm's Large Cap Core Plus (130/30) strategies.

The process remains designed to outperform incrementally, primarily through stock selection. In running their combined 75% of the fund, Davis and Bao rely extensively on the research of JPMorgan's strong core analyst team using the firm's proprietary dividend-discount model. The remaining 25% is directly managed by the analyst team under the leadership of David Small. Sector weightings stay within close range of the S&P 500's, and positions are rarely as much as 2 percentage points off the benchmark weightings, resulting in a well-diversified portfolio of more than 140 holdings.

As expected, tracking error relative to the S&P 500 has been in a narrow 2%-3% range over time, while active share has been below 60%. That may sound like a recipe for mediocrity, but the fund has consistently outperformed thanks to its numerous, yet modest, stock bets across sectors. Despite some manager changes on the edges over time, the fund's performance is firmly anchored in the top third of the U.S. large-blend Morningstar Category during the trailing three-, five-, and 10-year periods through December 2017. Those good results testify to the effectiveness of a robust investment process, skillfully executed by a strong team

of portfolio managers and analysts. The fund's low expenses are an additional edge, making this sound core holding even more compelling.

Process Pillar: O Positive

This disciplined, replicable process has been consistently executed over the long term. It earns the fund a Positive Process rating. The fund follows a benchmark-sensitive process to minimize sector and macroeconomic exposure relative to the S&P 500 and lets stock selection drive results over time. The fund can deviate from market industry and stock weightings by 4 percentage points, but it generally stays within 2 percentage points.

Scott Davis and Susan Bao rely on the research of the firm's core analyst team. These industry analysts rank stocks within each industry based on estimated fair value; they use an in-house model incorporating long-term earnings, cash flow, and growth-rate estimates, forecasting out four to eight years. Stocks are then ranked by quintile. The managers incorporate these rankings into their stock-picking. Most picks are in the first two quintiles, but Davis and Bao have some leeway and can express modest sector preferences based on their macroeconomic and market views. The analysts' sleeve is based on the same fundamental foundation, but it is sector-neutral at any time.

The fund is run within a modest active share range, generally lower than 60%. Although Davis tends to run a slightly more concentrated portfolio than his predecessor, the portfolio remains well-diversified across more than 140 holdings and holds about 20% of assets in the top 10.

The fund's consistent approach to stock-picking is highlighted by the portfolio's long-term earnings growth style factor: it has stayed within a 10%-13% range during the past five years through November 2017 while the same metric oscillated between 5% and 19% for large-blend funds on average over that period. In keeping with a philosophy that stock-picking should drive performance, sector weightings remain fairly close to the S&P 500's, with relative valuation driving most differences.

Morningstar's Take		
Morningstar Analyst Rating	Ţ	Silver
Morningstar Pillars		
Process	0	Positive
Performance	0	Positive
People	0	Positive
Parent	0	Positive
Price	0	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Analyst Rating Spectrum

℧ Silver

₩ Gold

Fund Performance		
	Total Return %	+/- Category
YTD	-0.26	-0.11
2017	21.71	1.27
2016	10.91	0.54
2015	0.90	1.97
2014	13.98	3.02

🖫 Bronze

Neutral

Negative



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JPMorgan U.S. Equity Fund Class R6 JUEMX

Analysis

The portfolio has an underweighting of 100-200 basis points in a few sectors that the team considers overvalued relative to their growth prospects: consumer staples, utilities, REITs, and materials. Large index constituents in those sectors, such as Procter & Gamble PG and AT&T T, are not owned. However, Scott Davis added Johnson & Johnson JNJ to the portfolio in October 2017. The stock is ranked in the third quintile by the analysts, but Davis likes its defensive characteristics for what he considers a reasonable price.

The portfolio is overweight industrials and technology by less than 250 basis points each. In tech, the managers and analysts maintain a positive view on selected names including Microsoft MSFT, Alphabet GOOGL, and Texas Instruments TXN. Among industrial picks, they favor Northrop Grumman NOC and Union Pacific UNP.

Performance Pillar: • Positive

A carefully circumscribed strategy has led to strong performance over the long term, earning the fund a Positive Performance rating. Outperformance is generally attributable to stock-picking across the board and has been very consistent over time. While the fund has had some manager changes on the edges over time, its performance is firmly anchored in the top quartile of its category during the trailing five-, 10-, and 15-year periods through December 2017 and ranks in the second quartile over three years.

Over the long term, the fund's Morningstar Risk ratings, which emphasize downside volatility, have been in line with the category average, though they have been higher in recent years. The strategy is designed to control risk, not minimize it. The fund has also outperformed its S&P 500 benchmark during five, 10, and 15-year periods, although an uncharacteristically poor 2016 has caused it to lag over three years. Stock selection in healthcare was particularly detrimental that year. Set against the fund's longer-term record, though this is not cause for concern. The fund's Sharpe ratio is higher than peers during periods of three years and longer, and higher than its index during

10- and 15-year periods.

Scott Davis became lead portfolio manager in January 2018, but he has been involved with the fund since August 2014, and data provided by JP-Morgan shows he has added value during that time span.

People Pillar: • Positive

The depth of the analyst team and portfolio managers supporting this fund earns it a Positive People rating. As anticipated, Tom Luddy, who had comanaged it since February 2006 and helped develop the stock-valuation model at the strategy's center, stepped back at the end of 2017.

His transition has been ably handled. In January 2018, Scott Davis, who started at JPMorgan in 2006 and was a media and Internet analyst on the team, became lead manager, in charge of about 65% of the portfolio. He had been appointed comanager in August 2014. Susan Bao, who has been with JPMorgan since 1997 and a comanager here since 2001, retains a 10% sleeve here in addition to her responsibility as lead on the 130/30 fund, JPMorgan U.S. Large Cap Core Plus JLCAX, effective January 2018.

The 25% remaining sleeve, run by the analyst team under David Small, was not affected by this transition. Davis and Bao rely heavily on this team's research for their own stock picks. The 25 core analysts in JPMorgan's U.S. equity division are career analysts, with average industry experience of more than 19 years, and average tenure with the firm of more than 11 years.

Co-investment alongside fund shareholders is uneven among the portfolio managers. Small has more than \$1 million in the fund; Davis has \$100,000-\$500,000; and Bao has less than \$50,000.

Parent Pillar: O Positive

J.P. Morgan Asset Management is one of the largest asset managers in the world, with nearly \$2 trillion in assets. After healthy inflows in 2015, it continues to rank among the top 10 U.S. mutual fund companies. Its U.S. fund business boasts a di-

verse lineup of more than 120 funds and ETFs supported by a global investment team, and a distribution effort centered on education has built advisor trust

Many of the most popular funds are Morningstar Medalists, and a number are run by managers on the job for a decade or more, including Jonathan Simon of JPMorgan Mid Cap Value FLMVX and Giri Devulapally of JPMorgan Large Cap Growth SEEGX. While Doug Swanson, longtime manager of the firm's largest fund, JPMorgan Core Bond WOBDX, began a leave of absence in 2015, veteran Barb Miller stepped in, supported by the same strong team. The SmartRetirement target-date series is another bright spot. The lineup earns an average of 3 stars but has been improving. One concern has been whether the fast-growing JP-Morgan Strategic Income Opportunities JSOSX has been adequately supported, though it has seen outflows lately.

An experienced board of trustees has maintained strong oversight, and fees are competitive. Manager investment in the funds has increased significantly, and compensation now factors in 10-year performance where applicable, which exceeds industry standards.

Price Pillar: O Positive

The fund's asset-weighted fees rank in the 21st percentile, earning it a Positive Price rating. The bulk of assets is in the R6 share class, which bears a Low Morningstar Fee Level compared with similarly distributed shares of other large-cap funds.

On Nov. 1, 2017, JPMorgan Asset Management lowered by 2-7 basis points the expense caps on six of this fund's share classes, making the fund even more competitive overall.

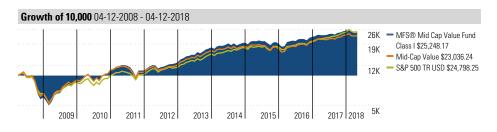


Release date 04:13-2018 Page 1 of 2

MFS® Mid Cap Value Fund Class I MCVIX

Morningstar Analyst Rating

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ Load Category **Investment Style** 0.65 7.3 Open None 0.86% Mid-Cap Value ■ Mid Value



3 Year Average Morningstar Risk Measures Risk vs. Category (361) Avg Avg High

Pillars		
Process	_	_
Performance	_	_
People	_	_
Parent	_	_
Price	_	_
Rating		

Investment Strategy

The investment seeks capital appreciation. The fund normally invests at least 80% of the fund's net assets in issuers with medium market capitalizations. The adviser generally defines medium market capitalization issuers as issuers with market capitalizations similar to those of issuers included in the Russell Midcap® Value Index over the last 13 months at the time of purchase. It normally invests the fund's assets primarily in equity securities.

Performance 04-12-2018						
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	9,882	9,719	10,937	12,090	16,893	25,248
Fund	-1.18	-2.81	9.37	6.53	11.06	9.70
+/- S&P 500 TR USD	-1.36	1.31	-6.49	-3.97	-2.16	0.20
+/- Category	0.31	-0.06	0.20	-0.07	0.85	0.85
% Rank in Cat	42	53	42	57	36	33
# of Funds in Cat	424	426	403	354	301	220
* Currency is displayed in BASE						

Top Holdings 02-28-2018				
	Weight %	Last Price	Day Chg %	52 Week Range
KeyCorp	1.40	19.25 BASE	-3.07 ↓	16.28 - 22.40
The Hartford Financial Services Group Inc	1.36	51.80 BASE	-0.42 ↓	46.69 - 59.20
Comerica Inc	1.32	96.43 BASE	-2.05 ↓	64.04 - 102.66
Huntington Bancshares Inc	1.25	14.73 BASE	-1.74 ↓	12.14 - 16.60
SunTrust Banks Inc	1.25	67.79 BASE	-1.92 ↓	51.96 - 73.37

% Assets in Top 5 Holdings 6.59

igoplus Increase igoplus Decrease igoplus New to Portfolio

Style Map	
	Giant Weighted Average of holdings
	Large
	Medium 75% of fund's stock holdings
	Small
	Micro
Deep Core Core High Val Val Grow Grow	

Asset Allocation					
	% Net	% Short	% Long	Bench mark	Cat Avg
Cash	0.98	0.09	1.07	0.00	2.84
US Stock	95.96	0.00	95.96	99.32	92.51
 Non US Stock 	3.07	0.00	3.07	0.68	4.55
Bond	0.00	0.00	0.00	0.00	0.07
Other	0.00	0.00	0.00	0.00	0.04

ivianagement	
	Start Date
Kevin J. Schmitz	11-20-2008
Brooks A. Taylor	11-20-2008

	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Financial Services	23.81	24.62	23.04	21.10	
Industrials	12.27	12.50	11.98	14.50	<u> </u>
Consumer Cyclical	12.14	12.85	11.51	13.64	
Technology	11.53	11.53	6.75	10.11	
Utilities	7.90	7.90	7.74	5.67	

Dividend and Capital Gains Distributions									
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total			
12-19-2017	23.61	0.5183	0.1653	0.0000	0.1566	0.8402			
12-20-2016	21.96	0.0000	0.0138	0.0000	0.2894	0.3032			
12-17-2015	18.85	0.4368	0.3575	0.0000	0.1063	0.9007			
12-18-2014	20.22	0.9552	0.2681	0.0000	0.1404	1.3637			
12-17-2013	19.08	0.7832	0.1441	0.0000	0.1358	1.0631			

$\textbf{MFS} \textbf{®} \ \textbf{Mid} \ \textbf{Cap Value Fund Class I} \ \textbf{MCVIX}$

Analysis

Morningstar's Take					
Morningstar Analyst Rating		_			
Morningstar Pillars					
Process	_	_			
Performance	_	_			
People	_	_			
Parent	_	_			
Price	_	_			

Fund Performance		
	Total Return %	+/- Category
YTD	-1.18	0.31
2017	13.69	0.47
2016	15.68	-2.38
2015	-2.27	3.14
2014	10.15	0.84

We do not currently publish an Analyst Report for this fund.

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

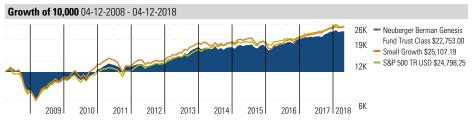
Analyst Rating Spectrum

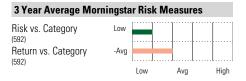


Neuberger Berman Genesis Fund Trust Class NBGEX

Morningstar Analyst Rating
Bronze

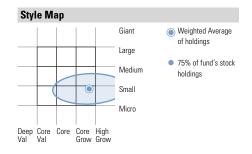
NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ **Investment Style** Load Category **↑**0.34 | 0.59 0.08 Small Growth 58.16 Open None 1.09% Small Growth





Pillars Process Positive **Investment Strategy** Performance 0 Positive People 0 Positive The investment seeks growth of capital. The fund invests mainly in common stocks of small-capitalization companies, which it Parent 0 Positive defines as those with a total market capitalization within the market capitalization range of companies in the Russell 2000® In-0 Price Positive dex at the time of initial purchase. It may continue to hold or add to a position in a company after its market capitalization has grown outside the range of the Russell 2000® Index. The fund seeks to reduce risk by diversifying among many companies and Rating 👺 Bronze industries.

Performance 04-12-201	8					
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	10,088	9,701	11,548	13,128	17,129	22,753
Fund	0.88	-2.99	15.48	9.50	11.36	8.57
+/- S&P 500 TR USD	0.70	1.14	-0.37	-1.01	-1.86	-0.94
+/- Category	-3.07	-0.24	-6.71	0.61	-1.16	-1.85
% Rank in Cat	84	66	81	39	70	89
# of Funds in Cat	710	714	676	582	523	398
* Currency is displayed in BA	SE					

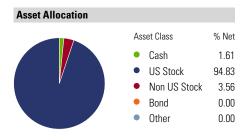


	Weight %	Last Price	Day Chg %	52 Week Rang
West Pharmaceutical Services Inc	2.16	88.80 BASE	0.74 🛧	77.97 - 103.36
→ Pool Corp	2.05	145.09 BASE	-0.66 ↓	97.25 - 150.26
→ Fair Isaac Corp	1.74	169.89 BASE	-0.67 ↓	125.88 - 179.58
→ Aspen Technology Inc	1.67	83.03 BASE	-0.67 ↓	53.51 - 84.40
➡ Littelfuse Inc	1.66	205.27 BASE	-0.45 ↓	149.81 - 226.33

Increase

Decrease

★ New to Portfolio



•	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Technology	20.62	20.62	18.09	24.48	▼
Industrials	19.08	20.98	19.08	17.39	
Financial Services	17.11	17.64	11.98	11.17	
Consumer Cyclical	14.81	16.18	13.83	13.04	
Healthcare	12.03	16.76	12.03	16.48	

ivianagement	
	Start Date
Judith M. Vale	02-01-1994
Robert W. D'Alelio	08-01-1997
Brett S. Reiner	12-19-2005
Gregory G. Spiegel	02-01-2015

Dividend and Capital Gains Distributions							
Distribution	Distribution	Long-Term	Short-Term	Return of	Dividend	Distribution	
Date	NAV	Capital Gain	Captial Gain	Capital	Income	Total	
12-15-2017	57.07	7.6989	0.1883	0.0000	0.0502	7.9374	
12-16-2016	57.07	3.2949	0.0405	0.0000	0.0308	3.3663	
12-17-2015	50.92	5.2632	0.0000	0.0000	0.0325	5.2957	
12-15-2014	54.37	4.6587	0.0000	0.0000	0.0338	4.6925	
12-16-2013	59.59	4.2697	0.0033	0.0000	0.1813	4.4544	

Neuberger Berman Genesis Fund Trust Class NBGEX

Analysis

Veteran managers with a solid long-term record.By Tony Thomas 11/22/2017

Managers Judy Vale and Bob D'Alelio are poised to add to a solid track record on Neuberger Berman Genesis that spans more than two decades, earning the fund a Morningstar Analyst Rating of Bronze.

Vale and D'Alelio employ a conservative, lowturnover approach to small-cap investing. They aren't interested in the flashiest growers; instead, they want strong companies with low debt and high returns on assets. They and their deep team of two associate managers and four dedicated analysts then pore over 10 years of financial statements to examine how firms generate and allocate cash, and they look for companies with defensible competitive advantages that allow for steady, modest rates of future growth. Once they settle on a name, the veteran duo-each has more than 35 years in the industry—wade in gradually, making sure their thesis is correct. They will buy and hold for long periods; annual turnover has averaged 18% since D'Alelio joined Vale at the helm in 1997.

Consistent execution has produced a quality portfolio and attractive results. The portfolio's 9.8% ROA as of September 2017 outpaces the meager 0.8% for the Russell 2000 Index benchmark and the 3.7% small-growth Morningstar Category average. Its 32% debt/capital ratio is well below the index's 38% and the 44% peer average. With such a quality orientation, the fund has held up relatively well in downturns, contributing to long-run outperformance. Its 10.8% annualized total return from August 1997 through October 2017 led the benchmark by 3.8 percentage points and bested 95% of peers.

The fund's size bears watching, though the managers have shown they can work with a lot of money in the small-cap space. At \$10.8 billion in assets, the fund ranks among the largest actively managed small-cap funds, and it has held more than \$10 billion for most of the time since late

2005. Still, the managers have generated aboveaverage returns since then while keeping the portfolio's number of holdings, turnover, and average market cap in check. As long as those indicators remain benign, this is an attractive small-cap fund.

Process Pillar: O Positive

The managers' conservative approach to growth stocks leads to a high-quality portfolio, earning the fund a Positive Process rating.

The process filters out flashier growth companies in favor of moderate growers. The team begins by screening for firms with market caps generally less than \$2 billion dollars and showing signs of profitability such as above-average or improving threeyear returns on assets. Ideas can also come from meetings with management, competitors, or customers. Prospects are then scrutinized through an analysis of 10 years of financial statements. The team focuses first on how each firm generates and uses cash, followed by the visibility of its earnings and the barriers to entry for other competitors. Ideal companies are deemed capable of sustainable, modest earnings growth (usually in the midteens in a normal economic environment) while trading at a discount to their historical averages and the Russell 2000 Index as a whole.

A long-term investing horizon allows the managers to scale into or out of positions gradually. They like to start individual positions at under 0.5% of assets each and add only if a few rounds of earnings reports show they've hit on the right opportunity. Their sell discipline usually involves trimming slowly as positions reach their expected valuations or as the managers pare existing holdings to make room for new picks.

The portfolio typically consists of 90-150 names. Individual position sizes are capped at 5% of assets each, though most positions stay below 2%. The managers prefer to buy and sell gradually, leaving numerous small positions in the portfolio. As of September 2017, 45 holdings took up less than 0.5% of assets each.

The managers are benchmark agnostic, but don't

Morningstar's Take		
Morningstar Analyst Rating		Bronze
Morningstar Pillars		
Process	0	Positive
Performance	•	Positive
People	0	Positive
Parent	•	Positive
Price	0	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Bronze

Neutral

Negative

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	0.88	-3.07
2017	15.50	-6.00
2016	18.06	6.86
2015	0.15	2.56
2014	-0.31	-2.74



Neuberger Berman Genesis Fund Trust Class NBGEX

Analysis

expect high sector concentrations. Industrials were the largest sector weighting at 20% of assets as of September 2017, but this was modestly higher than the Russell 2000 Index's 15% and the 17% small-growth category average. Technology, consumer cyclicals, and financials usually flesh out the portfolio. Healthcare stocks also appear, but speculative biotechs don't make the cut. West Pharmaceutical WST, the top holding as of September 2017, specializes in syringes.

The unique mix of equities makes it difficult to characterize this portfolio. While the managers prefer small-cap companies, their willingness to hold winners makes this more of a smid-cap fund, with mid-caps taking up nearly 45% of assets as of September 2017. Their interest in "moderate growth" stocks keeps the portfolio from tilting too far toward growth. As a result, the portfolio often straddles the lines between blend/growth and small/mid-cap. It's currently in the small-growth category.

Performance Pillar: • Positive

Apparently erratic relative annual returns mask this fund's relatively consistent, solid performance over the long run.

This fund isn't as volatile as a cursory glance suggests. Despite bouncing between different categories and turning in almost as many bottom-quartile annual returns as top-flight ones in the past 10 years, the fund's 10.8% annualized total return from August 1997, when the manager team of Judy Vale and Bob D'Alelio formed, through October 2017 beats the Russell 2000 Index's 8% rise. Its volatility, as measured by standard deviation, was almost 5 percentage points below the index's tally, with the fund capturing only 56% of the benchmark's downdrafts in the period.

The result of this steady performance is an impressive risk/reward profile and a Positive Performance rating. The fund's Sortino ratio of 0.90 during the manager duo's tenure surpasses the index's 0.60. Its rolling three-year returns led the benchmark's in more than 70% of periods, outperforming significantly in periods that included the

bursting of the dot-com bubble or the financial crisis. Far from erratic, this consistent fund rewards investors through the full market cycle.

People Pillar: • Positive

An experienced pair of managers supported by two associate managers, a dedicated analyst team, and a centralized research unit earn this fund a Positive People rating.

The fund's manager bench is deep, experienced, and invested in the fund. Judy Vale became a manager of the fund in February 1994, and Bob D'Alelio was named a manager in August 1997. Each has more than 35 years of industry experience. Brett Reiner and Gregory Spiegel came aboard as associate managers in 2005 and 2015, respectively, and both rose from the fund's analyst ranks. Spiegel's appointment preceded the retirement of Michael Bowyer, a healthcare analyst and comanager who left in July 2016. Manager ownership is excellent: Vale, D'Alelio, and Reiner each hold more than \$1 million in the fund, while Spiegel has \$500,001-\$1 million.

The managers and four dedicated analysts research the small- and mid-cap stocks that make up this fund's fare. Vale and D'Alelio are generalists, but the rest of the team has sector responsibilities, though these are not strict and analysts are encouraged to learn about other sectors to critique each other's picks more effectively. Although the four analysts each joined the team in 2012 or after, they average 14 years of industry experience, and two came from elsewhere in the firm. The team also taps Neuberger Berman's centralized global equity research unit, with 36 analysts and associates, as needed.

Parent Pillar: O Positive

Neuberger Berman's steady approach to its evolution earns the firm a Positive Parent rating.

The firm, founded in 1939, emerged from the collapse of Lehman Brothers with new capabilities and a new ownership structure. Lehman's fixed-income and private-equity acquisitions became part of Neuberger Berman in the wake of Lehman's 2008 collapse, when chairman and CEO George

Walker led employees in taking the more diversified firm private. Over 460 employees now own the business, which manages \$270 billion in assets

Once known primarily as a U.S. value equities shop, the new Neuberger Berman sees growth opportunities in Europe and Asia. Clients in those regions own 30% of the firm's assets under management. Although solely an investment manager, its retail mutual funds make up only one fifth of business. The rest is institutional and private client money, long bastions of the firm's identity.

The firm has lifted a few teams out of other firms to expand its circle of competence, including a talented emerging-markets-debt team from ING in 2013. While the firm has been selective in its acquisitions, its hands-off approach lets the new teams do what they do best. Meanwhile, the firm's partnership structure allows these new teams to integrate more fully into Neuberger by becoming managing partners over time.

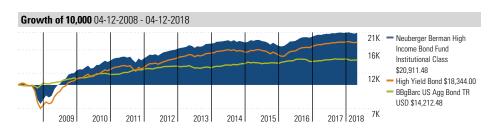
Price Pillar: O Positive

The fund can be a reasonably affordable way to invest in small- and mid-cap stocks, earning it a Positive Price rating. Its two largest share classes by assets, the Institutional and R6 shares, levy low fees relative to their respective peers. The Institutional shares carry a 0.85% expense ratio, 15 basis points below the median for similarly distributed shares. The no-load Advisor shares don't help the case, however; their 1.38% expense ratio is well above the 1.18% median for similar shares.

Advisors should urge investors to hold this fund in a nontaxable account. The fund sits on sizable unrealized capital gains owing to the managers' buyand-hold approach.



NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Load Expenses Morningstar Rating™ Category **Investment Style ↑**0.02 | 0.25 High Yield Bond 8.55 5.58 Open \$1 mil None 0.71%





Process Positive Performance Neutral People Parent Positive Price Neutral Rating

Investment Strategy

Increase

Decrease

☆ New to Portfolio

The investment seeks high total return consistent with capital preservation. To pursue its goal, the fund normally invests mainly in a diversified portfolio of U.S. dollar-denominated, High-Yield Bonds, with an emphasis on debt securities rated below investment grade (commonly called "junk bonds"). The fund is normally expected to have a weighted averaged maturity between five and ten years.

Performance 04-12-2018						
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	9,991	10,035	10,266	11,068	12,064	20,911
Fund	-0.09	0.35	2.66	3.44	3.82	7.66
+/- BBgBarc US Agg Bond TR USD	1.61	-0.06	2.32	2.34	2.20	4.08
+/- Category	0.11	0.04	-1.06	-0.41	0.02	1.05
% Rank in Cat	56	55	86	74	59	_
# of Funds in Cat	731	736	685	585	487	318
* Currency is displayed in BASE						

Style Map 12-31-2017				
			High	
			Med	
			Low	
Ltd	Mod	Ext	1	

Top Holdings 02-28-2018							
,	Weight %	Maturity Date	Amount Mil	Value Mil			
Ally Financial Inc. 8% SNR PIDI NTS 15/03/2020 USD (SEC REGD)	1.08	03-15-2020	24.84	26.89			
Frontier Communications Corporation 11% SNR PIDI NTS 15/09/2025 USD (SEC RE	1.07	09-15-2025	33.94	26.60			
Embarq Corporation 7.995% SNR PIDI NTS 01/06/2036 USD	1.00	06-01-2036	26.17	24.76			
 Park Aerospace Holdings Limited 5.25% SNR PIDI NTS 15/08/2022 USD (144A) 	0.93	08-15-2022	23.03	23.06			
	0.89	05-15-2022	22.64	22.05			
% Assets in Top 5 Holdings	4.96						



Top Sectors 02-28-2018				
	Fund	BMark	Cat Avg	■ Fund ▼ Cat Avg
Corporate Bond	90.25	_	83.83	*
Bank Loan	4.05	_	0.13	Y
Asset-Backed	0.82	_	0.77	<u> </u>
Convertible	0.24	_	1.32	<u> </u>
Preferred	0.00	_	0.15	V

Asset Allocation		
	Asset Class	% Net
	Cash	4.38
	 US Stock 	0.00
Y	 Non US Stock 	0.00
	Bond	95.11
	Other	0.51

Dividend and Capital Gains Distributions							
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total	
03-29-2018	8.48	0.0000	0.0000	0.0000	0.0395	0.0395	
02-28-2018	8.58	0.0000	0.0000	0.0000	0.0392	0.0392	
01-31-2018	8.71	0.0000	0.0000	0.0000	0.0374	0.0374	
12-29-2017	8.69	0.0000	0.0000	0.0000	0.0398	0.0398	
11-30-2017	8.72	0.0000	0.0000	0.0000	0.0389	0.0389	

Management	
	Start Date
Thomas P. O'Reilly	10-03-2005
William (Russ) Covode	02-28-2011
Daniel J. Doyle	02-28-2014
Patrick Flynn	01-01-2016

Neuberger Berman High Income Bond Fund Institutional Class NHILX

Analysis

A credible way to gain high-yield exposure.

By Maciej Kowara 2/20/2018

Neuberger Berman High Income's cautious approach, experienced team, and deep resources are definite positives, though its returns have been lackluster of late. We still come down on the side of maintaining the fund's Analyst Rating of Silver, but its performance bears watching.

The last two calendar years in which the fund unambiguously shone were 2008 and 2009. The fund entered the financial crisis of 2008 with an underweighting in the riskiest parts of the high-yield market. After the worst of the crisis was over, the fund managed to transition quickly to a more aggressive stance and was able to capitalize well on the huge high-yield rally of 2009. Ever since, however, performance has been mediocre. The fund trailed its average unique-share-class peer in five of the next eight calendar years. In the three years in which it did beat its peers, the margins were small.

That said, performance is just one of many attractive features here. Each of the fund's four managers has no less than 25 years of industry experience. They are backed by 27 credit analysts—mostly in the United States and Europe—which, by industry standards, is a very large team. Furthermore, the group has been reasonably stable; there has been some turnover, but nothing that would raise concerns. The last notable change was the 2015 retirement of longtime head of high yield, Anne Benjamin. The managers who took over had worked with her for a long time, though, and maintained continuity of the investment process.

That process is thorough and extensive and is codified in the firm's proprietary "Credit Best Practices" checklist. It ensures that all the portfolio's candidates for investment are compared against the same set of criteria. These range from global macro considerations, such as economic indicators, credit cycle stage, regulatory and political concerns, and industry attractiveness among others, down to issue-specific factors such as business fundamentals, cash flow quality, capital structure, and the like.

Process Pillar: O Positive

Based on the thoroughness of its credit analysis and emphasis on downside risk protection, the fund earns a Positive Process rating.

Downside risk protection is the overriding theme of this fund's approach. The fund focuses on liquid BB and B rated issues—it filters out most illiquid, distressed, and defaulted names—though it allows itself an opportunistic use of CCC (and BBB) rated paper. The fund does not invest in non-USD debt (developed or emerging) or derivatives, but it can hold up to 20% in bank loans, a sector for which the firm has a dedicated team.

The fund's decision-making process combines topdown considerations with individual security selection and is formalized in the firm's proprietary "Credit Best Practices" checklist, which ensures that all bonds are evaluated on the same set of criteria. Its top-down analysis looks to take measure of global economic trends, credit attractiveness, and valuations, and then supplement it with analysis of individual industries. The bottom-up part of the process looks at fundamentals, such as interest coverage, valuations, a company's ability to deleverage, and susceptibility to market shocks, while also considering less quantifiable items such as management quality. That does not guarantee the outcomes of this process are always correct, but the process itself is well-structured.

As of Dec. 31, 2017, the fund was positioned relatively conservatively on several levels. Management had brought down the fund's CCC rated stake to 8% from an already market-underweighted 11.6% at the end of 2016, and carried an overweighting in the junk market's highest tier BB strata. The fund held 4.7% in bank loans, which offer better structural security than bonds, the latter of which included a 2.3% position in investment-grade paper. Finally, the fund's duration was marginally shorter than that of its ICE BofA Merrill Lynch U.S. High Yield Master II Constrained Index

Morningstar's Take		
Morningstar Analyst Rating	Ţ	Silver
Morningstar Pillars		
Process	•	Positive
Performance	0	Neutral
People	•	Positive
Parent	•	Positive
Price	0	Neutral

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Analyst Rating Spectrum

G Gold	ÿ Silver	∰ Bronze	Neutral	Negative
Fund Pe	erformance			
		Total Dat		. / Cotogoni

Fund Performance		
	Total Return %	+/- Category
YTD	-0.09	0.11
2017	5.46	-1.01
2016	14.17	0.87
2015	-4.77	-0.77
2014	1.51	0.40



Neuberger Berman High Income Bond Fund Institutional Class NHILX

Analysis

benchmark and had been so for the whole year. This conservative stance, evident at the end of 2017 but in force throughout the year, was rooted in heightened concerns about potential new-administration-driven disruptions in the regulatory and trade environment, as well as an anticipation of higher interest rates. As it turned out, these concerns were by-and-large nonevents, and the cautious bias that they reflected—and continue to reflect—stymied fund's performance in 2017 as high yield outperformed bank loans and lower rungs of the credit universe outperformed higher-quality paper.

While the fund is trimming risks on the margins, Neuberger Berman is generally positive on the high-yield market as a whole, as it sees solid fundamentals are constructive and improving U.S. economic growth.

Performance Pillar: • Neutral

It's been a while since the fund showed convincingly strong returns, and we are downgrading its Performance rating to Neutral.

The last two calendar years in which the fund unambiguously shone were 2008 and 2009. Ever since, however, its performance has been mediocre. The fund trailed its average unique-shareclass peer in five of the subsequent eight calendar years. In the three years in which it did beat them, the outperformance margins were small. As result, while the fund's 10-year return of 7.8% looks very competitive with the rest of its peers, its shorter-term returns do not. Volatility-adjusted metrics tell the same story.

Most of this peer-relative deterioration was recent. The fund was tripped up by a 2014 overweighting in energy, whose weakness spilled into 2015 and infected the whole high-yield market. The fund ended both 2014 and 2015 behind its index and its average peer. More recently, after a reasonably good 2016, the fund entered 2017 quite cautiously and missed out on hot performance among lower-rated credits. 2017 also saw several issue-specific misses, such as Frontier Communications FTR, whose 2025 maturity bonds declined

by more than 25% on troubles related to integrating wireline and broadband operations acquired from Verizon VZ in California and Texas. The fund finished the year in the bottom quintile of the high yield Morningstar Category.

People Pillar: • Positive

The fund earns a Positive People rating based on the experience of its management team, the depth of its resources, and well-aligned incentives.

The fund is managed by four comanagers, one of whom, Tom O'Reilly, is recognized as the team leader. O'Reilly joined Neuberger Berman in 1997, has been on the fund since 2005, and became the team leader in late 2015, when previous lead Ann Benjamin retired. O'Reilly is joined by comanagers Russ Covode, Dan Doyle, and Patrick Flynn, who filled in the slot vacated by Benjamin. Each of the four managers has at least 25 years of industry experience.

The overall credit research team is large, experienced, and has had relatively low turnover. There are nine portfolio managers and 27 credit analysts. In 2017, the group saw one departure of a relatively junior analyst and an internal transfer of another. On the hiring side, the credit research team added four analysts, two of them very junior, and two quite seasoned.

The managers' incentives are properly aligned. Up to 20% of each one's bonus (depending on seniority) goes into funds the managers run and is locked up for three years. As a result, O'Reilly has more than \$1 million dollars invested in the fund; the other comanagers have smaller, but not negligible, amounts in it. Finally, almost half of the team owns equity in the firm.

Parent Pillar: O Positive

Neuberger Berman's steady approach to its evolution earns the firm a Positive Parent rating.

The firm, founded in 1939, emerged from the collapse of Lehman Brothers with new capabilities and a new ownership structure. Lehman's fixed-income and private-equity acquisitions became part of Neuberger Berman in the wake of Lehman's

2008 collapse, when chairman and CEO George Walker led employees in taking the more diversified firm private. Over 460 employees now own the business, which manages \$270 billion in assets

Once known primarily as a U.S. value equities shop, the new Neuberger Berman sees growth opportunities in Europe and Asia. Clients in those regions own 30% of the firm's assets under management. Although solely an investment manager, its retail mutual funds make up only one fifth of business. The rest is institutional and private client money, long bastions of the firm's identity.

The firm has lifted a few teams out of other firms to expand its circle of competence, including a talented emerging-markets-debt team from ING in 2013. While the firm has been selective in its acquisitions, its hands-off approach lets the new teams do what they do best. Meanwhile, the firm's partnership structure allows these new teams to integrate more fully into Neuberger by becoming managing partners over time.

Price Pillar: O Neutral

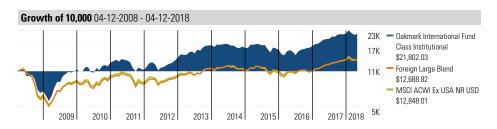
The fund hasn't changed its fee structure, but the industry has moved in the cheaper direction. Accordingly, the fund's fees, which held Morningstar Fee Level rankings of Below Average are now Average. Relative to its peers, the fund is thus less attractive on price and earns a Neutral Price Pillar rating.

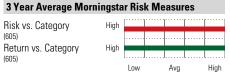


Oakmark International Fund Class Institutional OANIX

Morningstar Analyst Rating ₩ Gold

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ Load Category **Investment Style ↑**0.16 | 0.57 28.37 1.53 47.2 Limited \$1 mil None 0.77% Foreign Large Blend Large Value





Pillars Process Positive Performance 0 Positive People 0 Positive 0 Parent Neutral 0 Price Neutral Rating **₩** Gold

Giant

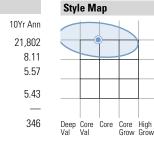
Large

Small Micro

Investment Strategy

The investment seeks long-term capital appreciation. The fund invests primarily in a diversified portfolio of common stocks of non-U.S. companies. It may invest in non-U.S. markets throughout the world, including emerging markets. Ordinarily, the fund will invest in the securities of at least five countries outside of the U.S. There are no geographic limits on the fund's non-U.S. investments. The fund may invest in securities of large-, mid-, and small- capitalization companies.

Performance 04-12-2018						
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	9,923	9,837	11,860	12,312	15,116	21,802
Fund	-0.77	-1.63	18.60	7.18	8.61	8.11
+/- MSCI ACWI Ex USA NR USD	-0.98	-0.37	0.26	1.78	2.69	5.57
+/- Category	-1.19	-0.81	1.85	2.11	2.44	5.43
% Rank in Cat	87	86	26	_	_	_
# of Funds in Cat	804	819	752	591	521	346





Weighted Average

Increase

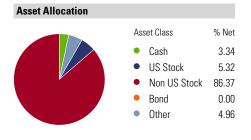
Top Holdings 12-31-2017				
	Weight %	Last Price	Day Chg %	52 Week Range
Lloyds Banking Group PLC	5.05	68.18 BASE	0.04 🛧	61.81 - 73.58
Daimler AG	4.81	65.71 BASE	0.37 🛧	59.01 - 76.48
⊕ Glencore PLC	4.64	346.25 BASE	1.11 ↑	270.00 - 416.90
BNP Paribas	4.57	61.48 BASE	0.41 🛧	57.24 - 69.17
Bayerische Motoren Werke AG	4.21	91.31 BASE	1.54 ↑	77.07 - 97.50



% Assets in Top 5 Holdings

★ New to Portfolio

Decrease



Top Sectors 12-31-2017					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Financial Services	33.27	33.27	32.04	20.81	
Consumer Cyclical	31.12	31.12	27.38	12.04	V
	15.08	19.12	15.08	13.47	
Basic Materials	9.54	9.54	7.22	8.55	
Consumer Defensive	4.20	6.17	4.20	11.03	
_					0 10 20 30 40

Management	
	Start Date
David G. Herro	09-30-1992
Michael L. Manelli	11-30-2016

Dividend and Capital Gains Distributions							
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total	
12-14-2017	28.13	0 4836	0.0000	0.0000	0.4338	0.9174	

^{*} Currency is displayed in BASE

Oakmark International Fund Class Institutional OANIX

Analysis

Solid as ever.

By Greg Carlson 1/8/2018

The strong team behind Oakmark International and its distinctive, repeatable process earn a Morning-star Analyst Rating of Gold.

This fund's substantial merits start with its leader. David Herro has steered the fund through a variety of market environments since its 1992 inception and has generated a superb record. His supporting cast has changed over the years, and the team endured a substantial loss in 2016 when Rob Taylor, comanager of this fund since 2008 and a 22-year veteran of Harris Associates, the advisor to the Oakmark funds, retired. However, the team has generally become more stable. Michael Manelli, who joined the firm in 2005 and has comanaged Oakmark International Small Cap OAKEX since 2011, replaced Taylor as comanager here in November 2016. He and Herro are backed by eight other managers and analysts with an average of seven years' tenure on the team and a decade of investment experience.

The team continues to employ its long-standing approach of buying companies that trade at steep discounts to the team's estimate of their prospects, based on its assessment of a firm's management, balance sheet, and other factors. Herro and company won't limit themselves to traditional value stocks; they're willing to buy anything that looks cheap based on their criteria. The fund has nevertheless had a value tilt of late, including a hefty stake in financials that has stoked volatility. But it has surpassed 90% of its foreign large-blend Morningstar Category peers and its MSCI World ex USA benchmark on both total and risk-adjusted returns through 2017 since the fund's 1992 launch and since stocks' October 2007 peak, as well as during other key periods.

Herro now runs \$51 billion in this strategy. This fund, which holds about 85% of those assets, reopened to new investors in July 2016 and has lately seen strong inflows, partly because of excellent showings in 2016 and 2017. The fund focuses

heavily on large-cap stocks, and relative to its universe (which, like the fund, has rapidly appreciated of late) it's no larger than it was two years ago. But given the recent pace of flows, it wouldn't be surprising to see the fund close again.

Process Pillar: O Positive

Like all Oakmark stock-pickers, lead manager David Herro and team seek companies trading at deep discounts to their assessment of companies' intrinsic values. The estimate of a business' worth is based on multiple valuation models and, depending on the company under consideration, may focus on a firm's likely private-market acquisition price, its tangible book value, or normalized discounted cash flows.

That's not unusual, but the degree to which Oakmark focuses on steep discounts on an absolute basis sets the shop apart. Firms that appear attractively valued compared with industry peers will only garner attention if they also seem cheap relative to their own stringently vetted prospects. But the team doesn't focus solely on traditional value fare; faster-growing companies that trade at significant discounts are fair game, too.

Herro also favors companies with shareholderaligned managements, as evidenced by (among other things) their own investment in the firm and their capital-allocation skill. Stock-repurchase programs, dividend hikes, and sensible acquisitions that are accretive to earnings are generally regarded favorably, but as with all aspects of the entirely bottom-up process, judgments are made strictly on a case-by-case basis. Herro aims for long holding periods, but volatility can force his hand. Portfolio turnover typically ranges from 30% to 50% annually. This distinctive approach earns a Positive rating for Process.

As usual, this fund looks significantly different from its typical foreign large-blend category peer and its benchmark. At the close of September 2017, the fund's combined 80% stake in the United Kingdom and the rest of developed Europe was well above the 57% stake of the MSCI World ex USA Index and the fund's typical peer. The

Morningstar's Take		
Morningstar Analyst Rating	ţ	G old
Morningstar Pillars		
Process	•	Positive
Performance	0	Positive
People	0	Positive
Parent	0	Neutral
Price	0	Neutral

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Bronze

Neutral

Negative

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	-0.77	-1.19
2017	30.00	4.88
2016	_	_
2015	_	_
2014	_	_



Oakmark International Fund Class Institutional OANIX

Analysis

fund's hefty stake in European financial-services firms such as Lloyds Banking LLOY in the U.K., Credit Suisse CSGN of Switzerland, BNP Paribas BNP of France, and Intesa Sanpaolo ISP of Italy drove that weighting.

Indeed, financials along with consumer cyclical companies were the fund's largest sector exposures, soaking up a combined 63% of assets at the end of the third quarter. With industrial stocks accounting for an additional 17% of assets, the fund tilts toward cyclicals, although (as usual) it has no exposure to energy. Healthcare and consumer staples, typically more defensive areas of the market, garner a combined 6% weighting here while constituting 20% of the benchmark MSCI World ex USA Index and its typical peer.

David Herro managed \$51 billion in this strategy in late 2017. This fund reopened to all new investors in 2016 and has always had a large-cap focus, but it would be tough to take hefty positions in firms at the low end of the fund's capitalization range (\$5 billion). It took in a net \$8.8 billion in 2017 through November; it wouldn't be surprising if it closed again.

Performance Pillar: O Positive

Between the fund's October 1992 inception and Dec. 31, 2017, it gained an annualized 10.4%, 4.0 percentage points better than its benchmark, the MSCI World ex USA Index. The fund's margin of victory versus the typical foreign large-blend fund was almost as large. It has performed consistently well, too. In the time frame's rolling five-year periods, the fund bested those yardsticks 86% and 83% of the time, respectively.

The fund has garnered most of its outperformance versus its benchmark during downturns while hovering near the norm in rallies. Meanwhile, the fund has lost 92% as much as its typical peer in down markets while gaining 11% more in upturns. True, the fund has been more volatile; its overall Morningstar Risk rating is High. However, the fund's Sortino ratio, a measure of risk-adjusted return, is far higher than the benchmark's and typical peer's figures. Thus, its Performance rating is Positive.

The fund has had a bumpier ride in recent years, including a rough stretch in 2014 and 2015 when big stakes in financials and automakers hurt badly. While its overall record since stocks' October 2007 peak was quite strong through 2017, the fund's downside captures versus the benchmark and its typical peer were 93% and 94%, respectively. Those less-impressive numbers reflected a more volatile environment for the value stocks the fund often prefers. In a valuation-driven downturn, the fund will likely hold up well on a relative basis.

People Pillar: O Positive

The fund's highly accomplished, veteran leader and the solid team behind him earn a Positive People rating. David Herro has managed this fund since its 1992 inception and has generated a stellar record during his tenure. Michael Manelli has only comanaged the fund since November 2016, but he's comanaged Oakmark International Small Cap with Herro since 2011 and joined the firm in 2005 as an analyst. The duo is backed by eight other managers and analysts with an average of seven years' tenure at the firm and 10 years of investment experience.

The team suffered a significant loss in September 2016 when Rob Taylor, the comanager of this fund since 2008, retired. He had also comanaged Goldrated Oakmark Global OAKGX since 2005 and served as the head of international-stock research from 2004-15.

However, there shouldn't be a drop-off here. Herro took over Taylor's spot managing the fund's non-U.S. portion of Oakmark Global. The team has also grown increasingly stable, in contrast to the turnover it previously endured. In November 2016, Herro made several promotions besides Manelli's: Justin Hance, Jason Long, and Eric Liu became comanagers on Oakmark International Small Cap, Oakmark Global, and Oakmark Global Select OAKWX, respectively. Herro turns 58 this year and has no plans to retire, but he wanted to give team members more responsibility as part of long-term succession planning.

Parent Pillar: • Neutral

Paris-based Natixis Global Asset Management is the parent to a number of different asset managers globally, including Natixis AM in France and Loomis Sayles and Harris Associates in the United States. These affiliated companies have maintained a large degree of autonomy, both in operational terms and in terms of their investment philosophies. The quality of investment culture varies significantly from one subsidiary to another. The results of the teams at Loomis Sayles and Harris Associates, manager for the U.S. Oakmark funds, for example, are excellent, communications with investors are of high quality, and fund launches have been minimal. NGAM's latest acquisition, DNCA, has also begun improving its funds' fee structures.

On the other hand, the results obtained by Natixis AM are more mixed, and its teams are less stable. Furthermore, in July 2017, the French financial regulator Autorité des Marchés Financiers imposed a EUR 35 million fine on Natixis AM for failings relative to its range of formula-based funds, arguing that the firm had overcharged investors and had failed to adequately disclose charges in the funds' filings. The sanction on Natixis AM thus weighs negatively on our assessment of the group's stewardship, but we recognize that strengths in other parts of the organization, particularly in the U.S.-based affiliates, partly compensate for this weakness, resulting in a Neutral Parent Pillar rating.

Price Pillar: O Neutral

At 1.00% as of the most recent prospectus (November 2016), the price tag for the fund's Investor shares, which hold 72% of the assets, is a bit lower than the median price tag in the fund's fee-level comparison group of foreign large-cap no-load funds and earns a Morningstar Fee Level of Average. The Institutional shares hold 22% of the assets, charge 0.81%, and earn a Below Average. The Advisor shares hold 5% of the assets, charge 0.92%, and earn an Average.

Judged by asset size, the fund doesn't look like a bargain. At \$43.6 billion, it ranks among the foreign large-blend category's largest offerings. The fund could stand to share more of its economies of



Oakmark International Fund Class Institutional OANIX

Analysis

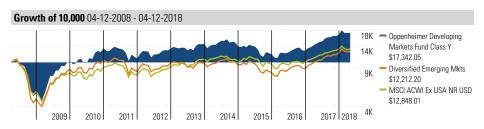
scale with fundholders. It earns a Price rating of Neutral



Oppenheimer Developing Markets Fund Class Y ODVYX

Morningstar Analyst Rating 🐺 Silver

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ Load Category **Investment Style ↑**0.06 | 0.14 44.25 0.55 40.8 Limited None 1.07% Diversified Emerging Large Growth





Pillars Process Positive Performance 0 Positive People 0 Positive Parent 0 Neutral 0 Price Positive Rating 🐺 Silver

Investment Strategy The investment seeks capital appreciation. The fund mainly invests in common stocks of issuers in developing and emerging markets throughout the world and at times it may invest up to 100% of its total assets in foreign securities. Under normal market conditions, it will invest at least 80% of its net assets, plus borrowings for investment purposes, in equity securities of is-

oping market country. The fund will invest in at least three developing markets.



suers whose principal activities are in a developing market, i.e. are in a developing market or are economically tied to a devel-

*	Currency	is	displa	yed in	BASE
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T II II' 00 00 0040				
Top Holdings 02-28-2018				
\	Neight %	Last Price	Day Chg %	52 Week Range
Taiwan Semiconductor Manufacturing Co Ltd	5.92	244.50 BASE	-0.20 ↓	186.50 - 266.00
 Alibaba Group Holding Ltd ADR 	5.74	171.96 BASE	-2.25 ↓	109.82 - 206.20
 Tencent Holdings Ltd 	5.08	408.00 BASE	-1.26 ↓	228.00 - 476.60
Master China Series 1	3.49	_	_	_
Housing Development Finance Corp Ltd	3.36	— BASE	0.63 🛧	1,461.15 - 1,986.05
0/ A T . E.I. I.I.	00.50			

% Assets in Top 5 Holdings 23.59

X New to Portfolio Increase Decrease

Style Map			
		Giant	Weighted Average of holdings
		Large	3
		Medium	 75% of fund's stock holdings
		Small	C
		Micro	
Deep Core Core Val Val	Core High Grow Grow		

Asset Allocation		
	Asset Class	% Net
	Cash	3.09
	US Stock	0.00
,	 Non US Stock 	92.95
	Bond	0.00
	Other	3.96

Management	
	Start Date

Top Sectors 02-28-2018					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Consumer Cyclical	23.54	25.11	23.46	13.08	*
Financial Services	22.81	22.81	21.41	24.31	
Technology	18.78	20.14	16.82	24.20	
Consumer Defensive	9.99	13.76	9.99	9.24	
Basic Materials	6.95	7.48	3.34	6.64	
					0 10 20 30 40

Dividend and Capit	al Gains Distributior	ıs				
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
12-04-2017	41.64	0.0000	0.0000	0.0000	0.2451	0.2451
12-02-2016	31.52	0.0000	0.0000	0.0000	0.1664	0.1664
12-02-2015	30.90	0.0000	0.0000	0.0000	0.2240	0.2240
12-05-2014	36.45	0.5977	0.0000	0.0000	0.2236	0.8213
12-06-2013	37.07	0.1792	0.0000	0.0000	0.1635	0.3427

Justin M. Leverenz 05-01-2007



Oppenheimer Developing Markets Fund Class Y ODVYX

Analysis

Going for growth.

By Patricia Oey 9/26/2017

Oppenheimer Developing Markets' well-established process, reasonable fees, and seasoned manager make it a solid choice for emerging-markets exposure. The fund earns a Morningstar Analyst Rating of Silver.

Portfolio manager Justin Leverenz looks for firms that he thinks will benefit from growth trends in emerging markets, namely a broadening middle class, new technology, and institutional progress (such as improved governance, industry consolidation). As a result, the portfolio tilts toward consumer companies, large-cap growth names, and also includes multinational firms such as Kering SA KER and insurance firm AIA.

What the fund doesn't own is just as important as what it does. Leverenz avoids many of the government-controlled firms and capital-intensive cyclical companies that dominate the MSCI EM Index, such as the big Chinese banks and hardware firms from Taiwan and South Korea. Leverenz doesn't believe these firms have the competitive advantages and above-average earnings growth potential that he prizes highly.

However, with this benchmark-agnostic portfolio, performance can lag. In 2016, emerging-markets returns were driven by the commodity sector, where Leverenz typically has an underweighting. So far in 2017, his very low exposure in the rallying markets of Taiwan and South Korea is dragging on performance. It is typically these persistent underweightings, and not bad picks, that can have an impact on the fund's relative performance. But despite this, Leverenz has managed to stay ahead of the pack through a variety of market conditions since he took the reins in May 2007.

At \$38 billion, this is by far the largest U.S.-listed, actively managed emerging-markets fund. It is closed to new investors in the U.S., but in late 2016, Oppenheimer launched European listings of this fund. Starting in 2015, the fund started to shift

toward larger names, and so far, this has not had a significant impact on returns. While asset growth and its impact on performance bear monitoring, given emerging markets' lower levels of liquidity, we continue to think this fund is a strong choice.

Process Pillar: O Positive

The team has employed a thoughtful, bottom-up approach that earns the fund a Positive Process rating.

Justin Leverenz aims to buy firms with competitive advantages and above-average earnings growth potential. Often these stocks fit an investment theme--for exposure to leapfrogging technologies, the fund was an early holder of Internet firms Tencent and Alibaba BABA, who more recently have been capitalizing on the large market potential for their respective mobile payment platforms. Leverenz also has some long-held, well-run banks that benefit from the growth in consumer finance, such as mortgages and credit cards. Given the long-term nature of these themes, the fund tends to hold names for years. As a result, annual turnover has averaged 20%-30%, well below the category norm.

Entry price and valuations are key elements of the process. In the first quarters of 2016 and 2017, the team added to top-10 holding Taiwan Semiconductor, believing its dominant market share is unrivaled. They will also pick up names after a sharp price decline, such as retailer Steinhoff International, which is well positioned in Africa. However, these ideas can become misses, such as clothing retailer Fast Retailing (owner of Uniqlo), which is expanding in Asia but continues to struggle in its main Japan market. The fund bought the name in early 2016 and exited about 12 months later.

Over the past few years, the fund has grown more concentrated, which is a concern. In 2015, Justin Leverenz began pruning smaller holdings and smaller companies, given the fund's large asset base, and the number of holdings has declined to about 100 from 120. Over that same period, strong outperformance by large holdings such as Tencent, Alibaba BABA, Taiwan Semiconductor, and Hous-

Morningstar's Take		
Morningstar Analyst Rating	Ţ	Silver
Morningstar Pillars		
Process	0	Positive
Performance	0	Positive
People	0	Positive
Parent	0	Neutral
Price	•	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Analyst Rating Spectrum

Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	3.05	1.11
2017	35.10	0.93
2016	7.17	-1.30
2015	-13.84	-0.05
2014	-4.55	-1.54

🖫 Bronze

Neutral

Negative



Oppenheimer Developing Markets Fund Class Y ODVYX

Analysis

ing Development Finance Corp. HDFC has further concentrated the portfolio. In August 2015, the top 10 holdings accounted for 26% of the portfolio. Currently, they account for 38%, among the highest in the category.

Last year, Leverenz said he is looking to opportunistically shift allocations to achieve more equal weighting, especially across the top half of names in the portfolio. However, he conceded that he was not able to make much headway in the past 12 months, given the strong performance of many of his largest holdings. Even after recently removing names such as Baidu BIDU and JD.com JD, the fund still has a large 15% exposure to Chinese Internet names, which, while not likely, could face some regulatory risks.

Some new ideas Leverenz has been working into the portfolio are biologics, with the purchase of Samsung Biologics, Celltrion, and Jiangsu Hengrui Medicine, and South African names, with recently added Steinhoff, Firstrand, and Shoprite. These two new themes remain small, accounting for less than 3% of the portfolio.

Performance Pillar: • Positive

The fund tends to outshine its peers in challenging market conditions, and it hasn't sat out during market rallies. It earns a Positive Performance rating.

Good stock-picking, rather than being in the right countries at the right time, has kept the fund in good shape through a full market cycle. For example, from 2011 through 2015, the cumulative return for the MSCI China Index was 8%, whereas this fund's China holdings returned 51%. Similarly, over the same time period the MSCI India Index returned negative 9%, whereas this fund's India holdings returned 34%.

Valuation is also a key driver of long-term performance. In 2007, Justin Leverenz had an underweighting in the largest, most liquid Chinese stocks because they were expensive, and those

names were among the hardest-hit during the 2008 financial crisis. This portfolio positioning helped the fund outperform the category average return by more than 500 basis points in 2008, and it has since contributed to the fund's long-term outperformance relative to peers.

The overall results are impressive. Since Leverenz took over in May 2007, the fund's A shares' 86% cumulative gain through August 2017 landed well ahead of the category average return of 28% and the MSCI Emerging Markets Index's return of 44%. His record looks even better when accounting for risk, as downside protection has made for a less-volatile experience overall.

People Pillar: • Positive

Lead manager Justin Leverenz has done a solid job steering this fund, and he invests more than \$1 million alongside fundholders. The fund earns a Positive People rating.

Leverenz has over 20 years of investment experience, has worked in the Greater China region, and is fluent in Chinese. He joined Oppenheimer's international equity team in 2004 as an analyst for Rajeev Bhaman on Oppenheimer Global OPPAX and took over as portfolio manager here in May 2007. He is also the director of emerging-markets equities, where he leads a team of seven professionals and also serves as co-portfolio manager for small-cap-focused Emerging Markets Innovators. Earlier this year, Oleg Maksimov joined the analyst team. He has 25 years of investment experience and was most recently a co-portfolio manager for a long-short fund. His background in commodities helps bolster an area that has not been Leverenz's strong suit.

Leverenz is in his late 40s, and managers on Oppenheimer's international equity team typically stay on for decades. Given his unique investment approach, there is some key-person risk here, especially because there is no heir apparent on the analyst team. In September 2015, seven-year veteran analyst John Paul Lech was named co-portfo-

lio manager, but Leverenz retained all discretion on portfolio trades. In March 2017, Lech stepped down and left the team. Aside from Lech, there have been no analyst departures under Leverenz.

Parent Pillar: O Neutral

Art Steinmetz became CEO of OppenheimerFunds in July 2014, the firm's first from its investment ranks, after managing several of its taxable-bond funds for many years. Steinmetz replaced Bill Glavin, who joined the firm in 2009 to help clean up the mess that occurred following the 2008 financial crisis, when several key Oppenheimer fixed-income funds suffered massive losses due to hidden risks. Since taking over, Steinmetz has been trying to move Oppenheimer forward in a positive way, launching new funds and emphasising offerings that can (he hopes) outperform in areas where passive and index vehicles don't do well.

Overall fund performance has improved since the financial crisis, and the company has made strides in the area of manager ownership of fund shares. More than half of fund assets are run by managers with at least \$1 million personally invested alongside fundholders, twice the level of two years ago. And although the firm's average feelevel percentile still lands in the "average" range for fees overall, it represents continued improvement.

That being said, Oppenheimer still has to show that it can attract and retain top portfolio managers in all parts of its business. It still remains to be seen if Oppenheimer can stand out from the industry set as it transitions from "fix-it" mode to one more of growth and new-product initiatives and one under new leadership.

Price Pillar: O Positive

The fund's fees are lower than those of similarly distributed peers within the emerging-markets category. As such, this fund earns a Positive Price rating.

The retail class A shares' fee (as per the October 2016 prospectus) included a management fee of



Oppenheimer Developing Markets Fund Class Y ODVYX

Analysis

0.78%, 12b-1 fees of 0.25%, and other expenses of 0.29%, for a total of 1.32%. This expense ratio is lower than the median fee of 1.60% for emerging-markets funds distributed to retail investors with front loads (typically A shares).

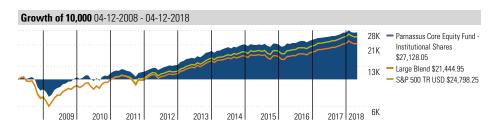
About 75% of the assets are in two institutional share classes: class Y, which charges 1.07%, and class I, which charges 0.88%. These fees are lower than the institutional group median of 1.20%.



Parnassus Core Equity Fund - Institutional Shares PRILX

Morningstar Analyst Rating 🐺 Silver

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Load Expenses Morningstar Rating™ **Investment Style** Category **↑**0.28 | 0.66 \$100,000 Large Blend 42.73 1.53 15.5 Open None 0.66% Large Blend





Pillars Process Positive Performance 0 Positive People 0 Positive Parent 0 Positive Price Neutral Rating 🐺 Silver

Giant

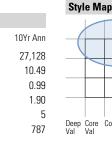
Large

Small

Investment Strategy

The investment seeks to achieve both capital appreciation and current income. The fund's objective is to achieve both capital appreciation and current income by investing primarily in a diversified portfolio of equity securities. Equity securities include common and preferred stock. Under normal circumstances, the fund will invest a minimum of 80% of its net assets (plus borrowings for investment purposes) in equity securities. At least 75% of the fund's total assets will normally be invested in equity securities that pay interest or dividends.

Performance 04-12-201	8					
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	10,042	9,671	11,369	12,860	17,566	27,128
Fund	0.42	-3.29	13.69	8.75	11.93	10.49
+/- S&P 500 TR USD	0.24	0.83	-2.16	-1.76	-1.29	0.99
+/- Category	0.57	0.51	-1.03	0.11	0.24	1.90
% Rank in Cat	29	23	69	56	57	5
# of Funds in Cat	1,474	1,494	1,384	1,181	1,059	787





holdings

Deep Core Core Core High Val Val Grow Grow

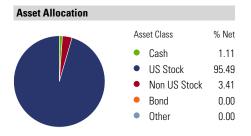
* Currency	ic	dienla	hav	in	RASE
Guilency	19	uispia	yeu	ш	DAGL

Top Holdings 02-28-2018				
	Weight %	Last Price	Day Chg %	52 Week Range
Intel Corp	5.92	52.08 BASE	-1.21 ↓	33.23 - 53.78
Danaher Corp	5.64	99.09 BASE	0.10 🛧	78.97 - 104.82
Gilead Sciences Inc	5.31	75.08 BASE	-0.27 ↓	63.76 - 89.54
Praxair Inc	4.84	147.39 BASE	0.30 🛧	117.40 - 166.95
	4.42	63.20 BASE	-1.28 ↓	60.14 - 84.00



Increase ⊕ Decrease

 ☼ New to Portfolio



Top Sectors 02-28-2018					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
♣ Healthcare	21.92	21.92	14.58	14.02	
Technology	16.83	23.00	15.50	20.17	
	14.84	21.94	14.84	11.49	
Consumer Cyclical	11.50	11.57	6.86	12.05	
Financial Services	10.94	13.57	10.94	17.44	
					0 10 20 30 40

wanagement	
	Start Date
Todd C. Ahlsten	05-01-2001
Benjamin E. Allen	05-01-2012

Dividend and Capital	Gains Distribution	ıs				
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
03-29-2018	42.46	0.0000	0.0000	0.0000	0.1799	0.1799
12-27-2017 11-21-2017	42.83	0.0000	0.0000	0.0000 0.0000	0.2327	0.2327 2.5008
09-29-2017	42.14 43.12	2.5008 0.0000	0.0000 0.0000	0.0000	0.0000 0.1500	0.1500
06-30-2017	43.12	0.0000	0.0000	0.0000	0.1300	0.1350
UD-3U-ZU1/	41.85	0.0000	0.0000	0.0000	U.1254	U.1254

Parnassus Core Equity Fund - Institutional Shares PRILX

Analysis

Investing responsibly and successfully. By Andrew Daniels, CFA, CMA 11/8/2017

Parnassus Core Equity's experienced team and disciplined approach earn it a Morningstar Analyst Rating of Silver.

Todd Ahlsten has been this fund's lead manager since 2002. Ben Allen, Parnassus' current president and soon-to-be CEO, was named Ahlsten's comanager in 2012. The pair has successfully--and consistently--executed Parnassus' responsible investment approach. In fact, the fund has beaten 97% of its large-blend Morningstar Category peers during Ahlsten's tenure.

The managers avoid investing in firms that derive significant revenue from alcohol, tobacco, gambling, weapons, or nuclear power, or which have financial ties to Sudan. They also emphasize positive environmental, social, and governance, or ESG, criteria, believing that such criteria help identify companies likely to outperform industry peers. While they don't avoid fossil-fuel stocks entirely, as some ESG funds do, such stocks must clear an especially high bar to make it into the portfolio.

Fundamental research focuses on identifying highquality companies, characterized by sustainable competitive advantages, increasingly relevant products or services, and capable management. The managers are mindful of valuations: Often, companies they've identified as good businesses first go to the managers' watchlist of roughly 150 names and enter the portfolio only after the price drops to an attractive entry point.

This quality tilt has helped the fund protect against losses in down markets. For example, during the bear market from October 2007 to March 2009, the fund's 30.7% loss--while large in absolute terms-fared much better than the S&P 500's 43.0% decline. On the flip side, the fund doesn't fare as well during market rallies. Indeed, during the past five years--a period of rising equity prices--the fund has lagged the benchmark by approximately

1.0 annualized percentage points and 53% of its large-blend peers.

Despite recent underperformance, the fund remains poised to outperform through a full market cycle.

Process Pillar: O Positive

A disciplined approach earns this fund a Positive Process rating.

This fund has typical socially conscious restrictions: It avoids companies deriving significant revenue from alcohol, tobacco, weapons, nuclear power, or gambling, or those with ties to Sudan. However, Parnassus also emphasizes positive ESG criteria, believing that such criteria help identify companies likely to outperform industry peers.

From the 400 or so stocks that pass initial screens, the team searches for companies with sustainable competitive advantages, increasingly relevant products or services, and capable management teams. If a stock meets these three criteria, the team then dives into its fundamentals to assess its three-year range of potential outcomes and ultimately creates a price target. Management is careful not to overpay for a good business. Instead, the team keeps a watchlist of approximately 150 names that it has thoroughly researched, waiting for an opportunity to buy at a more attractive price.

This bottom-up approach can lead to sector biases, but the managers limit sector weightings to twice that of the S&P 500. They also cap individual position sizes at 5% of assets. While the fund must have 75% of assets in dividend-paying stocks, there is no particular emphasis on high dividends or dividend growth.

Todd Ahlsten and Ben Allen are patient, high-conviction investors. They hold 40 or so names and initiate a position only if they are willing to stake at least 1% of assets. When the managers buy a stock, they intend to hold it for years. Therefore, turnover has averaged just 21% during the past five years, well-below the large-blend category av-

Morningstar Analyst Rating	Ţ	Silver
Morningstar Pillars		
Process	•	Positive
Performance	0	Positive
People	•	Positive
Parent	•	Positive
Price	0	Neutral

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

🖫 Bronze

Neutral

Negative

Analyst Rating Spectrum

℧ Silver

₩ Gold

Fund Performance		
	Total Return %	+/- Category
YTD	0.42	0.57
2017	16.81	-3.63
2016	10.60	0.24
2015	-0.33	0.74
2014	14.70	3.74



Parnassus Core Equity Fund - Institutional Shares PRILX

Analysis

erage of 60%.

The portfolio has a clear quality focus: Its returns on invested capital and returns on equity have trended much higher than the S&P 500 benchmark's. Furthermore, 63% of the fund's assets are invested in firms with wide Morningstar Economic Moat Ratings, more than the benchmark's 48% and the typical large-blend peer's 57%.

As of September 2017, the fund had a large overweighting in healthcare, at 25% of assets, compared with the benchmark's 14% allocation. In fact, the portfolio's top two holdings, Gilead Sciences GILD and Danaher Corp DHR, are healthcare stocks. Conversely, the fund had a significant underweighting in technology, at 14% of assets, compared with the benchmark's 21% weighting. Concerned with protecting against an economic decline, the managers won't stomach the inflated valuations of most high-flying tech companies. The fund is also light in energy. While the managers explicitly state that the fund is not fossil-fuel-free, there is a high bar for energy stocks to make it into the portfolio.

Performance Pillar: • Positive

This fund's outstanding long-term record earns it a Positive Performance rating.

Since lead manager Todd Ahlsten joined this fund in May 2001, through October 2017, the fund's 9.2% annualized gain beat the S&P 500's 6.6% as well as 97% of its large-blend peers. Moreover, the fund has outperformed the benchmark in 67% of the rolling five-year periods during Ahlsten's tenure. Risk-adjusted results are also solid: Indeed, the fund's Sortino ratio of 1.01 trounced the benchmark's 0.61 as well as 99% of its peers.

Consistent with management's approach, the fund has tended to hold up well when stocks decline. For example, during the bear market from October 2007 to March 2009, the fund's 30.7% loss--while large in absolute terms--fared much better than the S&P 500's 43.0% decline. On the flip side, the fund doesn't fare as well during market rallies. In-

deed, during the past five years ending October 2017--a period of rising equity prices--the fund lagged the benchmark by approximately 1.0 annualized percentage points as well as 53% of its large-blend peers. Moreover, the fund's 12.6% gain in 2017 through October trailed the benchmark's 16.9% gain and 83% of its peers. Poor stock selection in healthcare--including drug manufacturer Allergan AGN and retail pharmacist CVS Health CVS--was the culprit. Despite recent underperformance in a bull market, the fund is poised to outperform through a full market cycle.

People Pillar: O Positive

A stable and experienced team earns this fund a Positive People rating.

Lead manager Todd Ahlsten is Parnassus' chief investment officer. He joined the firm as a research analyst in 1995 and became director of research in 1998. Ahlsten began comanaging this fund with Parnassus' founder Jerome Dodson in 2001 and took over as sole manager in 2002. Ahlsten has more than \$1 million invested in this fund, demonstrating that his interests are aligned with investors'.

Ben Allen joined as comanager in May 2012. Allen joined Parnassus as an analyst in 2005 and posted solid results at Parnassus Mid-Cap PARMX from October 2008 through April 2012 before stepping on here. In January 2017, Allen was named president of the firm and is expected to assume the CEO role in 2018. Allen has increased his investment here, and it now stands between \$500,001 and \$1 million.

While Ahlsten has final say on picks, each manager is responsible for half of the fund's 40 or so holdings. Ahlsten generally covers healthcare and technology stocks, while Allen favors industrials and business services. They are supported by a 12-person team of research analysts, all of whom contribute to this fund, though most have other responsibilities as well. Seven of these analysts serve as portfolio managers on other Parnassus funds, while three of them primarily do ESG research.

Parent Pillar: O Positive

Change is under way at Parnassus Investments. Jerome Dodson, who founded the company in 1984, announced in February 2017 that Ben Allen had succeeded him as the firm's president. Dodson remains the chief executive officer, but Allen is expected to assume that role in 2018. Dodson will continue to manage money at Parnassus indefinitely. Allen embodies the Parnassus approach to recruiting and retaining investment talent. He joined the firm as a research intern, a rite of passage for members of the research team, and worked his way from senior research analyst to director of research to portfolio manager. The transition is not cause for panic. Allen is talented and experienced, the plan is thoughtful, and the firm retains all its high-caliber research leaders.

Parnassus has six funds, the newest of which is an Asia-focused fund launched in April 2013. A foreign fund is a first for the company, but the firm has not grown recklessly; the last time it had launched a new fund was in 2005. The funds invest only in securities that pass its environmental, social, and governance screens. From there, the managers find companies with relevant products, sustainable competitive advantages, quality management, and ethical practices, and it buys when the stock is undervalued. The fixed-income fund also uses equity research for security selection. A well-defined wheelhouse combined with a strong culture of investment excellence adds up to a Parent rating of Positive.

Price Pillar: • Neutral

This fund doesn't offer much of a fee advantage, so it earns a Neutral Price rating.

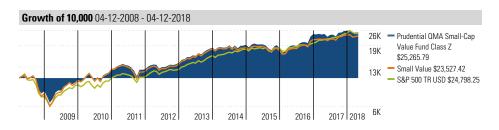
The fund offers two share classes: Investor and Institutional. For retail investors, the no-load Investor shares hold 62% of assets, charge 0.87%, and earn a Morningstar Fee Level of Average. The fund's Institutional shares hold 38% of assets, charge 0.66%, and rank as Below Average. For comparison, the median net expense ratio for the large-cap institutional peer group is 0.77%.



Prudential QMA Small-Cap Value Fund Class Z TASVX

Morningstar Analyst Rating

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ Load Category **Investment Style** 1.69 Open \$5 mil None 0.70% Small Value



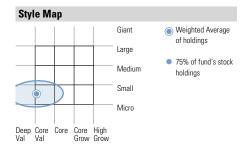


Pillars Process — Performance — People — Parent — Price — Rating —

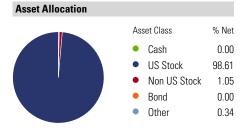
Investment Strategy

The investment seeks above-average capital appreciation. The fund normally invests at least 80% of its investable assets in equity and equity-related securities of small-cap companies. The subadviser considers small-cap companies to be companies with market capitalizations within the market cap range of companies included in the Russell 2000 Index or the Standard & Poor's SmallCap 600 Index. Most assets will typically be invested in U.S. equity and equity-related securities, including up to 25% of total assets in real estate investment trusts (REITs).

Performance 04-12-201	8					
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	9,748	9,772	10,654	12,478	16,637	25,266
Fund	-2.52	-2.28	6.54	7.66	10.72	9.71
+/- S&P 500 TR USD	-2.71	1.84	-9.32	-2.85	-2.50	0.20
+/- Category	-1.30	-0.21	-2.76	0.73	1.11	0.77
% Rank in Cat	80	60	78	42	38	35
# of Funds in Cat	417	422	405	345	300	208
* Currency is displayed in BAS	SE					



Top Holdings 02-28-2018				
	Weight %	Last Price	Day Chg %	52 Week Range
MGIC Investment Corp	1.29	10.83 BASE	-0.73 ↓	10.07 - 16.21
Stifel Financial Corp	1.22	58.14 BASE	-0.95 🗸	41.93 - 68.76
Radian Group Inc	1.20	16.11 BASE	-0.86 ↓	15.52 - 23.49
Tech Data Corp	1.18	81.88 BASE	-0.34 ↓	76.89 - 111.10
 Washington Federal Inc 	1.10	32.50 BASE	-0.15 🗸	29.80 - 37.70
% Assets in Top 5 Holdings	6.00			



Increase	→ Decrease	X New to Portfolio
T IIICI Casc	Decircuse	TATION TO LOUGH

	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Financial Services	34.43	38.03	33.86	26.18	
Consumer Cyclical	17.68	18.44	12.37	13.66	
Industrials	14.28	15.18	14.28	17.20	
Real Estate	13.04	14.28	12.16	7.75	
Basic Materials	5.59	5.59	4.72	7.32	_
_					0 10 20 30

Management	
	Start Date
Stephen Courtney	01-15-2015
Robert Leung	01-15-2015
Mitchell B. Stern	01-15-2015

Dividend and Capit	al Gains Distribution	ıs				
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
12-13-2017	20.07	1.6322	0.7317	0.0000	0.3707	2.7346
12-19-2016	21.81	0.0000	0.0534	0.0000	0.3426	0.3961
12-15-2015	16.42	6.3835	0.3703	0.0000	0.6137	7.3674
12-22-2014	25.45	2.4013	0.1384	0.0000	0.2763	2.8159
12-16-2013	25.96	1.4755	0.4373	0.0000	0.2763	2.1891

Prudential QMA Small-Cap Value Fund Class Z TASVX

Analysis

Morningstar's Take		
Morningstar Analyst Rating		_
Morningstar Pillars		
Process	_	_
Performance	_	_
People	_	_
Parent	_	_
Price	_	_

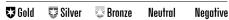
Fund Performance		
	Total Return %	+/- Category
YTD	-2.52	-1.30
2017	6.31	-2.23
2016	33.94	7.95
2015	-7.04	-0.34
2014	5.89	2.55

We do not currently publish an Analyst Report for this fund.

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

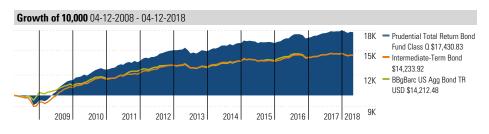
Analyst Rating Spectrum



Prudential Total Return Bond Fund Class Q PTRQX

Morningstar Analyst Rating
Silver

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ **Investment Style** Load Category 14.24 4-0.03 | -0.20 3.07 32.5 Open \$5 mil None 0.41% Intermediate-Term 🖫 Small Blend



Pillars		
Process	•	Positive
Performance	•	Positive
People	•	Positive
Parent	•	Positive
Price	•	Positive
Rating		Silver

Investment Strategy

The investment seeks total return. The fund will seek to achieve its objective through a mix of current income and capital appreciation as determined by the fund's investment subadviser. It invests, under normal circumstances, at least 80% of the fund's investable assets in bonds. For purposes of this policy, bonds include all fixed-income securities, other than preferred stock, with a maturity at date of issue of greater than one year. The fund may invest up to 30% of its investable assets in high risk, below investment-grade securities having a rating of not lower than CCC. It may invest up to 30% of its investable assets in foreign debt securities.

Performance 04-12-2018						
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	9,840	10,056	10,245	10,754	11,518	17,431
Fund	-1.60	0.56	2.45	2.45	2.87	5.71
+/- BBgBarc US Agg Bond TR USD	0.10	0.15	2.10	1.35	1.24	2.14
+/- Category	-0.13	0.26	1.88	1.27	1.29	1.92
% Rank in Cat	56	4	4	5	4	_
# of Funds in Cat	1,027	1,037	986	839	767	547

^{*} Currency is displayed in BASE

Top Holdings 02-28-2018				
	Weight %	Maturity Date	Amount Mil	Value Mil
★ US 5 Year Note (CBT) June18	25.71	06-29-2018	0.12	13,309.72
💥 US 10 Year Note (CBT) June18	9.87	06-20-2018	0.04	5,109.20
💥 Us Ultra Bond Cbt Jun18	6.38	06-20-2018	0.02	3,301.74
💥 2 Year US Treasury Note Future June18	-3.70	06-29-2018	0.01	-1,913.28
SGX 10-Year Mini Japanese Government Bond Futures Mar18	-1.03	03-12-2018	0.00	-533.30

% Assets in Top 5 Holdings 37.24

⊕ Increase ⊕ Decrease

New to Portfolio

Style IVIAP 12-31-2017					
			High		
			Med		
			Low		
Ltd	Mod	Ext	-		

Ctula Man 12 21 2017

Asset Allocation

Bond Statistics	Value
Average Effective Duration	6.46
Average Effective Maturity (Years)	_
Average Credit Quality	BBB
Average Weighted Coupon	3.76
Average Weighted Price	101.60

	0/			
% Net S	% Short			Cat Avg
• Cash 1.45	1.23	2.68	— -5.	53
 US Stock 0.24 	0.00	0.24	— -0.	02
Non US Stock 0.01	0.00	0.01	— 0.	00
Bond 96.61 1	1.42	108.03	—105.	06
• Other 1.70	0.20	1.90	— 0.	50

Management	
	Start Date
Robert Tipp	10-30-2002
Michael J. Collins	11-18-2009
Richard Piccirillo	12-31-2012
Gregory Peters	03-05-2014

Top Sectors 02-28-2018				
	Fund	BMark	Cat Avg	■ Fund ▼ Cat Avg
Other Government Related	40.69	_	12.36	—
Corporate Bond	23.16	_	30.02	<u> </u>
Asset-Backed	14.91	_	7.69	
Commercial MBS	6.77	_	2.66	
Non-U.S. Government	6.29	_	1.58	
				0 15 30 45 60

Dividend and Capital Gains Distributions							
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total	
03-29-2018	14.29	0.0000	0.0000	0.0000	0.0402	0.0402	
02-28-2018	14.20	0.0000	0.0000	0.0000	0.0347	0.0347	
01-31-2018	14.43	0.0000	0.0000	0.0000	0.0376	0.0376	
12-29-2017	14.60	0.0000	0.0000	0.0000	0.0371	0.0371	
11-30-2017	14.51	0.0000	0.0000	0.0000	0.0378	0.0378	

Prudential Total Return Bond Fund Class Q PTRQX

Analysis

Investors here benefit from a methodical approach and impressive resources.

By Eric Jacobson 4/9/2018

Prudential Total Return Bond boasts a methodical approach, a strong risk framework, and impressive resources. Combined with reasonable pricing, those factors help support its Morningstar Analyst Rating of Silver.

This fund (which will become PGIM Total Return Bond in mid-2018 as part of a branding change) is run by a fixed-income group that's well-resourced in people and analytics. Prudential has roots in the insurance industry, and the firm boasts at least 80 credit analysts and has historically carried something of a credit bias.

But while the fund's corporate exposure has long topped the benchmark's (including its high-yield bonds and bank loans), valuations have pressed its managers to trim corporate credit risk in recent years, mostly in favor of securitized assets. Corporates and bank loans constituted 35% of the fund as of December 2017, compared with 49% two years earlier. Securitized assets had risen to 43% of the portfolio at that point, up from 34% at the end of 2015. That mix has included highly rated collateralized-loan-obligation tranches and both nonagency residential and commercial mortgagebacked securities. By contrast, the fund held 7% in U.S. government bonds--roughly a tenth of their weighting in the benchmark--down from 43% at the end of 2007. That shift might be a greater challenge for a team with fewer resources, but Prudential has a fairly large staff dedicated to securitized sectors, including eight portfolio managers and 10plus analysts.

That profile normally gives the fund a different look than most peers', though many have been adding to their securitized holdings, too. Despite its modest Treasury exposure, though, the fund has been willing to take more interest risk than its index, with a 6.5-year duration at the end of 2017 versus 5.9 years for the bogy.

The fund has endured above-average volatility and requires a level of comfort with its composition, but it has survived rough markets without severe or lasting damage: In 2008, it had exposure to rallying Treasuries as its other sector exposures struggled, keeping it from deeper trouble.

Process Pillar: O Positive

This fund's managers focus on finding issues that have good fundamentals but generate a healthy amount of income. That gives it a bias toward corporates, securitized assets, and smaller helpings in non-U.S. developed- and emerging-markets debt, with very little exposure to Treasuries and agencies.

The team has long gravitated toward corporate credit. In that context, the managers compare internal credit scores against rating agencies', assign scores based on yield premiums versus the broad market, and build rankings based on liquidity and event risk. Internally developed risk analytics are then applied to portfolios.

The team targets a goal of 150 basis points of outperformance per year over the Bloomberg Barclays U.S. Aggregate Bond Index, ideally averaging contributions of roughly 75 basis points from sector allocation, 60 basis points from subsector and security selection, and 15 basis points from plays on duration, currency, and the yield curve. With the use of its risk models, the team also looks to cap the fund's tracking error at 250 basis points.

Overall, the team has managed strong execution of a straightforward, well-developed strategy, which has earned the fund a Positive Process Pillar rating.

The fund still carries a credit bias, but with a greater securitized tilt and a longer duration. After taking that figure to 3.8 years in March 2009, the fund's managers drove it up to 6.5 years as of December 2017, more than a half-year longer than the benchmark's and nearly a year longer than the (distinct) intermediate-bond Morningstar Category median.

Morningstar's Take		
Morningstar Analyst Rating	Ţ	Silver
Morningstar Pillars		
Process	•	Positive
Performance	•	Positive
People	•	Positive
Parent	•	Positive
Price	•	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Bronze

Neutral

Negative

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	-1.60	-0.13
2017	6.71	3.00
2016	4.83	1.59
2015	0.09	0.34
2014	7.25	2.07



Prudential Total Return Bond Fund Class Q PTROX

Analysis

The fund held 35% in corporate credit, roughly three fourths of which was investment-grade, with the rest in high-yield and bank loans, reflecting a continued trimming of credit risk: That figure had hovered around 49% two years earlier. Many of those assets have been absorbed into the fund's securitized exposure, which totaled 43% at the end of 2017.

That allocation was heavily tilted toward highly rated CLO tranches, which the team has favored more and more for their reasonable valuations and high credit quality. The rest comprised other asset-backed sectors, nonagency residential mortgages, and commercial-mortgage-backed securities. The fund also held 8% in foreign government and 5% in emerging-markets issues (nearly doubling the latter in early 2018). With only a 1% stake in agency mortgages and 4% in Treasuries and agency debt, that leaves the fund with a massive underweighting in those sectors relative to its benchmark, and the category, albeit to a lesser degree.

Performance Pillar: • Positive

The fund's long-term record has been attractive: Its trailing long-term returns all place in its category's best quartile. And though its volatility during those periods has been higher than average, it hasn't been extreme, and the fund hasn't suffered serious blows. It earns a Positive Performance Pillar rating.

The ride has been a little choppy at times. The fund's duration was 3.8 years in early 2009 and ratcheted up to 6.5 years by December 2017. Many rivals trimmed rate sensitivity, though, producing different relative outcomes. Unsurprisingly, the fund suffered a bit more than its average peer when Treasury yields spiked during the last four months of 2016 and again during the first two of 2018.

When Treasury yields spiked between Oct. 8, 2010, and Feb. 10, 2011, though, the fund's duration was still in the range of 4.5-4.9 years, and its 1.4% loss placed in the best third of distinct funds in the group. And while it trimmed credit risk over

the past couple of years, the fund has been more aggressive there since 2008 when it placed in the category's middle and dipped to the group's bottom half during the third-quarter 2011 credit selloff. The fund also had some poor relative months when credit sold off in the second half of 2014 and then 2015, but it didn't fare notably worse on a relative basis than during the third quarter of 2011.

People Pillar: O Positive

The fund is run by Michael J. Collins, Robert Tipp, Richard Piccirillo, and Gregory Peters; they also manage Prudential Absolute Return Bond PADZX. They average more than 20 years of experience and are backed by a group with big research manpower by virtue of a cadre of portfolio managers and roughly 100 analysts. The group also draws on a team focused on proprietary analytics, risk management, and performance attribution. The managers' record and substantial resources support a Positive People rating and helped them win Morningstar's 2017 Fixed-Income Fund Manager of the Year award.

Collins also manages some of the firm's other multisector strategies. He has been at Prudential since 1986 and has experience as a high-yield manager and developing proprietary quantitative international interest-rate and currency models. Tipp has been with the firm since 1991; he heads its global bonds team and drives global rate positioning for several portfolios. Piccirillo has been with Prudential since 1993 and specializes in mortgage- and asset-backed securities. Prior to joining the firm, he worked as a fixed-income analyst for Fischer Francis Trees & Watts. Peters has experience as Morgan Stanley's global director of fixed income and economic research and was responsible for that firm's macro research and asset-allocation strategy. His prior experience included stints at Salomon Smith Barney and the U.S. Treasury.

Parent Pillar: O Positive

The Prudential funds are part of PGIM, the new name for the former Prudential Investment Management, the asset-management arm of conglomerate Prudential Financial. PGIM has notable strengths, including a culture that's positive in many ways, and it has continued to move in the

right direction. Our increasing confidence in the firm earns it a Positive Parent rating.

Nearly all of the Prudential funds are subadvised by subsidiaries of PGIM, primarily Jennison Associates, Quantitative Management Associates, PGIM Fixed Income, and PGIM Real Estate. The fixed-income team, with more than half of the firm's fund assets, is well-resourced and risk-aware, while the actively managed fundamental equity funds are run by Jennison with an established, repeatable investment process. The Prudential funds as a group have respectable long-term records.

PGIM has launched a lot of new funds since 2010, about half of its 79 open-end funds (as of June 2017). That's a potential concern, but these new funds have been in areas where the firm already has significant resources.

The Prudential funds are overseen by an engaged, active board. The trustees have pushed for lower fees, and the fund's expenses have been coming down, though they could go even lower. Manager investment in the Prudential funds has also improved from its previous low levels.

Price Pillar: O Positive

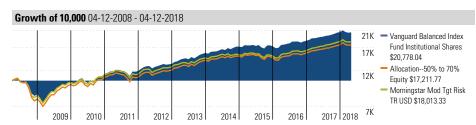
The fund's pricing had historically been a mixed bag, with share classes holding half its assets all priced below average relative to their respective peer groups of similarly distributed funds, with the other half of the fund's asset base residing in classes charging above-average fees. Prudential addressed that problem in early 2016, however, contractually limiting expenses on the fund's share classes. They're not required to maintain that agreement, but it would be unusual for a bond fund to raise its prices after such a move. Since then, enough assets have been charged below-average fees to push the fund's Price Pillar rating to Positive.



Vanguard Balanced Index Fund Institutional Shares VBAIX

Morningstar Analyst Rating

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ **Investment Style** Load Category **↑**0.14 | 0.41 34.42 2.05 Open \$5 mil None 0.06% Allocation--50% to Large Blend 70% Equity



Performance 04-12-2018						
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	9,965	9,779	10,949	12,080	14,995	20,778
Fund	-0.35	-2.21	9.49	6.50	8.44	7.59
+/- Morningstar Mod Tgt Risk TR USD	0.02	-0.65	-0.20	0.64	1.77	1.53
+/- Category	0.31	-0.38	0.80	1.82	1.88	1.52
% Rank in Cat	47	70	42	14	13	13
# of Funds in Cat	795	798	762	663	615	437

^{*} Currency is displayed in BASE

Top Holdings 02-28-2018				
	Weight %	Last Price	Day Chg %	52 Week Range
Apple Inc	1.75	175.00 BASE	0.48 🛧	140.45 - 183.50
Microsoft Corp	1.54	92.92 BASE	-0.71 ↓	64.89 - 97.24
Amazon.com Inc	1.32	— BASE	-0.48 ↓	884.49 - 1,617.54
Facebook Inc A	0.90	164.66 BASE	0.51 🛧	139.33 - 195.32
→ JPMorgan Chase & Co	0.85	110.44 BASE	-2.59 ↓	81.64 - 119.33
% Assets in Top 5 Holdings	6.36			

[⊕] Increase ⊝ Decrease 💥 New to Portfolio

Top Sectors 02-28-2018					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Technology	21.53	21.53	17.73	18.43	
Financial Services	17.05	17.05	16.62	18.24	Y
Healthcare	13.58	13.58	13.28	13.19	
Consumer Cyclical	12.09	12.09	11.32	11.48	
to Industrials	11.27	11.43	11.27	11.20	Y
_					0 10 20 30 4

	Fund	BMark	Cat Avg	■ Fund ▼ Cat Avg
Government	16.21	15.87	10.60	
Agency Mortgage-Backed	8.71	14.89	5.84	
Government-Related	2.17	1.16	1.52	
Commercial MBS	0.45	0.00	0.57	
Asset-Backed	0.24	0.00	1.59	*
				0 5 10 15 20

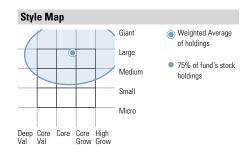
Dividend and Capital Gains Distributions							
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total	
03-21-2018	34.70	0.0000	0.0000	0.0000	0.1791	0.1791	
12-22-2017	34.72	0.0000	0.0000	0.0000	0.1908	0.1908	
09-21-2017	33.39	0.0000	0.0000	0.0000	0.1790	0.1790	
06-22-2017	32.89	0.0000	0.0000	0.0000	0.1520	0.1520	
03-28-2017	32.06	0.0000	0.0000	0.0000	0.1570	0.1570	

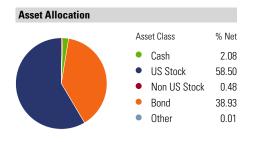
3 Year Average Morr	ningsta	r Risk I	Measures	3
Risk vs. Category (680) Return vs. Category	-Avg +Avg			
(680)		Low	Avq	High

Pillars		
Process	•	Positive
Performance	•	Positive
People	•	Positive
Parent	•	Positive
Price	•	Positive
Rating		℧ Gold

Investment Strategy

The investment seeks to track the performance of the benchmark index that measures the investment return of the overall U.S. stock market with 60% of its assets; the fund seeks to track the performance of a broad, market-weighted bond index with 40% of its assets. The fund employs an indexing investment approach designed to track the performance of two benchmark indexes. With approximately 60% of its assets, the fund seeks to track the investment performance of the CRSP U.S. Total Market Index. With approximately 40% of its assets, the fund seeks to track the investment performance of the Bloomberg Barclays U.S. Aggregate Float Adjusted Index.







Vanguard Balanced Index Fund Institutional Shares VBAIX

NAV \$ NAV Day Change % Yield TTM %Total Assets \$ Bil Status Min. Inv. Load Expenses Morningstar Rating™ Category **Investment Style** 2.05 37.0 \$5 mil 0.06% Allocation--50% to Large Blend Open None 70% Equity

 Management
 Start Date

 Joshua C. Barrickman
 02-22-2013

 William A. Coleman
 04-26-2016

 Gerard C. O'Reilly
 04-26-2016



Vanguard Balanced Index Fund Institutional Shares VBAIX

Analysis

Success by doing less.

By Gretchen Rupp 12/11/2017

Vanguard Balanced Index takes a straightforward, index-based approach with this 60% stock/40% bond allocation fund. The fund's preference for high-quality fixed-income securities has helped produce steadier returns than most allocation-50% to 70% equity Morningstar Category peers. Low fees keep the fund well-positioned to continue its record of superior risk-adjusted returns over the long term. The fund earns a Morningstar Analyst Rating of Gold.

This fund stands out among its peers for its simplicity. Unlike many rival fund managers who use tactical management to adjust attributes like overall stock/bond weighting, credit quality, or growth and value tilts, this fund doesn't waver. Maintaining this predictable mix mitigates the risk of ill-timed portfolio changes. Its stock portfolio tracks the CRSP U.S. Total Stock Market Index, which includes virtually the entire domestic stock market. The fund's average peer invests about 14% in foreign equities. The fund's 16% in mid- and small-cap equities as of October 2017 was slightly higher than the typical peer's 13% weighting.

This U.S.-centric approach sticks to high-quality fixed income. The bond sleeve tracks the Bloomberg Barclays U.S. Aggregate Float Adjusted Bond Index, which serves as a proxy for U.S. investment-grade taxable bonds. As a result, the fund doesn't hold high-yield debt, whereas the typical moderate-allocation fund invests more than 21% of fixed-income assets in unrated bonds or those rated BB and below. This preference benefited the fund during the credit crunch from July 2011 through September 2011 when the fund lost about 260 basis points less than its typical peer.

The low-maintenance approach hasn't hampered this fund's performance over the long term. During the 10 years through November 2017, for example, its 7.0% annualized gain ranked in its peer group's top quintile. It achieved those results with less volatility than most, as shown by a Sharpe ratio

that tops about 95% of peers during that period.

Process Pillar: • Positive

This fund maintains a near constant 60%/40% balance between U.S. stocks and bonds. While many allocation funds will make shifts in asset allocations, this fund doesn't waver. To the extent possible, the fund will use cash flows, both into and out of the portfolio, to bring the allocation back toward its target. The implication is that following a period of strong equity market appreciation, the fund will add to its fixed-income portfolio to bring the allocation back to its target (and vice versa). A disciplined rebalancing approach has helped to keep relative volatility in check, earning the fund a Positive Process rating.

The equity sleeve follows the CRSP U.S. Total Stock Market Index, which tracks nearly every stock in the U.S. market and allows it to achieve the level of diversification deemed optimal by the efficient-market hypothesis. The fund holds about 3,300 names, spanning mega- to micro-cap stocks.

The fixed-income portion of the fund also follows a passive approach, tracking the Bloomberg Barclays U.S. Aggregate Float Adjusted Bond Index. It holds about half the number of bonds as the index, but sampling is common for passive bond funds because of the large number of bonds in the index and their low trading volume. This fund still carefully replicates the index's key characteristics, such as duration and credit quality.

The fund's equity exposure stays in line with its index's norms, and some of these traits distinguish it from the moderate-allocation crowd. Because of the expansive nature of its target stock index, the CRSP U.S. Total Stock Market Index, it has considerably more sector and industry breadth and somewhat more market-cap diversification than the majority of its peers. It replicates a purely domestic stock index, so it normally has nothing in foreign equities; most of its rivals invest about 14% of their stock assets abroad. Yet the fund's market-cap-weighting approach means that giant-cap names such as Apple AAPL, Microsoft MSFT, and Amazon.com AMZN hold the largest sway.

Morningstar's Take		
Morningstar Analyst Rating		♂ Gold
Morningstar Pillars		
Process	•	Positive
Performance	•	Positive
People	•	Positive
Parent	•	Positive
Price	•	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Bronze

Neutral

Negative

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	-0.35	0.31
2017	13.86	0.65
2016	8.81	1.47
2015	0.52	2.45
2014	10.00	3.79



Vanguard Balanced Index Fund Institutional Shares VBAIX

Analysis

Government and government-backed securities dominate the bond side of the portfolio. The average duration of the fund's holdings, a proxy for interest-rate risk, is longer than the category average. However, this reflects the index, which excludes securities with less than one year to maturity. In addition, the fund strives to be fully invested, so it holds less cash than the category average. The credit quality of the portfolio is slightly higher than the category's because the index excludes high-yield securities. The index also excludes Treasury Inflation-Protected Securities. In addition to these omissions, the fund lacks exposure to international fixed-income securities, whereas most funds in the category include a stake

Performance Pillar: O Positive

This fund's cost advantage and steady process has helped it generate attractive long-term performance relative to the allocation--50% to 70% equity category, supporting a Positive Performance rating.

The fund's passive approach may cause performance to vary from the typical moderate-allocation fund, but a stable and broadly diversified asset mix isn't likely to become too far out of favor. In fact, the fund lands in the top quartile of its peer group in 72% of three-year rolling periods during the 10 years through November 2017. On top of its strong performance, the fund has not distributed any capital gains in the past decade. Steady inflows aid the rebalancing process, and the equity index team's effective trading techniques also reduced gains.

The exceptionally diversified nature of its stock and bond portfolios serves to moderate risk. During the past 10 years, the fund's standard deviation is less than about 85% of its category peers. Because the fund has consistently produced above-average returns with below-average risk, its risk-adjusted return ranking is slightly better than its rank based purely on return. The fund's investor returns suggest that some investors became disillusioned with the promise of diversification in 2008. After all, the fund was still down

22% that year. But patient investors recouped their losses in less than two years.

People Pillar: O Positive

A well-equipped group manages all of Vanguard's equity index funds. The team's extensive experience, deep bench of talent, and strong trading infrastructure underpin the fund's Positive People rating.

Vanguard's Equity Index Group uses a team-based approach. That group includes more than 60 investment professionals, of which more than 20 are portfolio managers or traders. Portfolio manager rotation is part of the normal course of business. and the team believes that this further develops expertise and minimizes key-manager risk, ultimately benefiting fundholders. For example, Gerard O'Reilly and Bill Coleman joined this fund's roster in 2016. O'Reilly has been with Vanguard since 1992 and has managed stock index portfolios since 1994. He comanages a number of other index funds, including Vanguard Growth Index VI-GIX and Vanguard Total Stock Market Index VT-SAX. Coleman joined Vanguard in 2006 and runs other stock index funds as well as Vanguard's target-date funds.

Joshua Barrickman has managed the fund's bond portfolio since February 2013. Barrickman, who leads the fixed-income indexing group, joined Vanguard in 1998 and has comanaged the firm's bond funds since 2005. He also oversees the \$190 billion Vanguard Total Bond Market Index VBTLX, which tracks the same index as this fund's bond portfolio. Christopher Wrazen joined as comanager in 2015.

Parent Pillar: O Positive

Vanguard has one of the mutual fund industry's strongest corporate cultures and earns a Positive Parent rating. Its consistent messages to investors to keep costs low, diversify, and stay the course are reflected in the firm's own behavior. Vanguard's U.S. fundholders own the firm through small investments by each mutual fund, mitigating potential conflicts of interest that can exist at other firms that are serving two masters. Fund performance is strong overall: Over the past three-,

five-, and 10-year periods, its Morningstar Success Ratios are greater than 70%--high among large, diversified fund families.

Over the past year, the firm has collected more than USD 200 billion in net inflows, thanks in large part to investors' interest in passive investing. The firm's indexing and ETF prowess, low costs, and success in penetrating the financial-advisor sales channel all have fueled growth. Total assets under management now exceed USD 3.3 trillion, giving Vanguard a significant more-than-20% market share across U.S. mutual funds.

Vanguard has been a global player for years but has only more recently turned its focus to growing internationally. The firm is a large player in Australia, where it has the most history, but doesn't yet have the brand recognition and trust it enjoys in the United States in other parts of the world. While non-U.S. funds don't participate in the ownership of Vanguard, the firm's investorcentric culture extends globally.

Price Pillar: O Positive

Vanguard is based on the concept of low-cost investing, and this fund is no exception, earning a Positive Price rating. The Admiral share class, which has a minimum initial investment of \$10,000, has an expense ratio of 0.07%, while the Investor share class, which has a minimum initial investment of \$3,000, charges 0.19%. The median no-load expense ratio for the category is 0.91%. Thus, this fund enjoys an enormous cost advantage over its peers. Unlike many of Vanguard's funds, this fund does not offer an exchange-traded fund share class. However, investors could invest a similar 60/40 split in cheaper broad-market ETFs Vanguard Total Stock Market VTI and Vanguard Total Bond Market BND, but this approach reguires that the investor rebalance to maintain the target allocation.

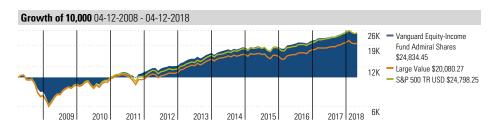


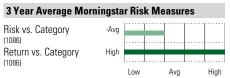
Vanguard Equity-Income Fund Admiral Shares VEIRX

Morningstar Analyst Rating

Silver

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ Load Category **Investment Style** 76.36 **↑**0.53 | 0.70 2.47 30.8 \$50,000 ■ Large Value Open None 0.17% Large Value



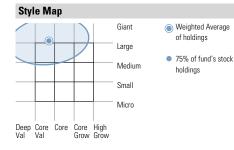


Pillars Process Positive Performance 0 Positive People 0 Positive Parent 0 Positive 0 Price Positive Rating 🐺 Silver

Investment Strategy

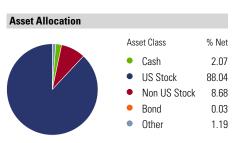
The investment seeks to provide an above-average level of current income and reasonable long-term capital appreciation. The fund invests mainly in common stocks of mid-size and large companies whose stocks typically pay above-average levels of dividend income and are, in the opinion of the purchasing advisor, undervalued relative to similar stocks. In addition, the advisors generally look for companies that they believe are committed to paying dividends consistently. Under normal circumstances, it will invest at least 80% of its assets in equity securities. The fund uses multiple investment advisors.

Performance 04-12-201	18					
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	9,847	9,756	11,214	13,260	17,298	24,834
Fund	-1.53	-2.44	12.14	9.86	11.58	9.52
+/- S&P 500 TR USD	-1.72	1.68	-3.72	-0.64	-1.64	0.02
+/- Category	-0.03	0.52	0.97	2.44	1.28	1.82
% Rank in Cat	54	24	42	8	21	8
# of Funds in Cat	1,307	1,314	1,251	1,069	941	672



* Currency is displayed in BASE				
Top Holdings 12-31-2017				
	Weight %	Last Price	Day Chg %	52 Week Range
Microsoft Corp	5.32	92.92 BASE	-0.71 ↓	64.89 - 97.24
JPMorgan Chase & Co	3.85	110.44 BASE	-2.59 ↓	81.64 - 119.33
Johnson & Johnson	2.81	130.04 BASE	-0.31 ↓	120.95 - 148.32
 Philip Morris International Inc 	2.66	101.82 BASE	1.60 ↑	95.51 - 123.55
Wells Fargo & Co	2.49	51.08 BASE	-3.06 ↓	49.27 - 66.31

% Assets in Top 5 Holdings 17.12



	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Financial Services	17.22	18.17	17.17	23.24	
Technology	14.92	14.92	13.64	11.63	
Healthcare	13.39	13.39	12.23	13.25	
Consumer Defensive	12.07	12.07	11.83	9.05	
Energy	11.14	11.26	10.05	10.17	

ivialiayellielli	
	Start Date
James P. Stetler W. Michael Reckmeyer	12-31-2003
	08-15-2007
Binbin Guo	01-27-2016

Dividend and Capital	Gains Distribution	ıs				
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
03-15-2018	77.27	0.0000	0.0000	0.0000	0.4012	0.4012
12-18-2017	78.04	0.7366	0.1996	0.0000	0.5454	1.4816
09-21-2017 06-22-2017	74.24 72 11	0.0000 0.0000	0.0000 0.0000	0.0000 0.0000	0.4960 0.4490	0.4960 0.4490
03-28-2017	72.11	0.0000	0.0000	0.0000	0.4490	0.4490
U3-Z0-ZU1/	71.05	0.0000	0.0000	0.0000	0.4890	0.4890

Vanguard Equity-Income Fund Admiral Shares VEIRX

Analysis

An effective pair.

By Alec Lucas, Ph.D. 6/5/2017

Aided by a low fee hurdle, Vanguard Equity-Income's subadvisor duo combines to produce a resilient portfolio of dividend-paying stocks. The fund earns a Morningstar Analyst Rating of Silver.

The fund pairs experienced teams from Wellington Management and Vanguard's in-house quantitative equity group. Industry veteran Michael Reckmeyer has led Wellington's two thirds of the portfolio since year-end 2007. James Stetler has overseen the rest of the fund's assets for Vanguard's team since 2003.

The teams use complementary strategies. Reckmeyer runs a roughly 60-70 stock portfolio of stout dividend payers that he tries to buy when they're out of favor. In late 2016, for example, he added to the fund's position in now top-25 holding Unilever UN because of its geographically diverse product mix and above-average organic growth rate. The Vanguard team rounds out the portfolio by taking small stakes in 100-plus stocks based on factors such as valuation and earnings sustainability.

The fund's sector weightings hew closely to those of FTSE High Dividend Yield Index, rarely diverging by more than 5 percentage points. Versus its large-value Morningstar Category peer group, however, the fund tends to tread heavily in income-oriented sectors such as utilities, telecom, and consumer staples. As of March 2017, the fund's 22.8% combined stake in these sectors ranked near the category's top decile.

The fund has the wind at its back whenever investors seek safety in yield-rich sectors. The fund held up better than 90% of its large-value Morningstar Category peers in 2011's equity market plunge from May to early October and more recently in the 2015-16 correction. The fund, though, is prone to lag when interest rates spike, as in 2016's second half.

Over the long haul, Reckmeyer's stock-picking skill

and the Vanguard quant team's model have produced strong risk-adjusted results. From Reckmeyer's late 2007 start date through May 2017, the fund's top-decile 7.9% annualized gain edged its benchmark with less volatility.

The fund is a worthy option.

Process Pillar: O Positive

Two subadvisors here take distinct but effective approaches to finding value in the market's shortterm dislocations, earning the fund a Positive Process Pillar rating. Manager Michael Reckmeyer, who runs about two thirds of the fund's assets, is a stickler for dividends, valuations, and healthy balance sheets. He buys stocks with above-average dividends and low valuations but unappreciated growth prospects. Typically, these stocks offer a yield above the S&P 500's upon purchase. Unlike the strategy he runs for Vanguard Wellesley Income VWINX, however, his portfolio here can hold a stock if its yield falls below the S&P 500's. Reckmeyer can be contrarian, adding to solid but out-of-favor stocks whose challenges are more than reflected in their share prices. While he generally holds stocks for about four to five years, Reckmeyer is quick to sell if stocks' fundamentals deteriorate or hit their target price. He can also swap a name for a similar stock trading at a better valuation.

Vanguard's James Stetler and his quant team manage about one third of the fund's assets. They rely on computer models that pick stocks from the FTSE High Dividend Yield Index based on valuation, growth, management decisions (stock buybacks, dividend increases, and so on), momentum, and earnings sustainability. They turn their portfolio over more than Reckmeyer, but the fund's overall turnover still tends to be below most peers'.

The fund has a diverse portfolio of about 150-200 dividend-paying stocks. They consistently produce an above-average yield versus the large-value category norm, although they are typically well-capitalized firms. Currently, the fund derives its top-decile 2.6% trailing 12-month yield from stocks that, on average, have a return on assets that

Morningstar's Take		
Morningstar Analyst Rating	Ţ	Silver
Morningstar Pillars		
Process	•	Positive
Performance	0	Positive
People	•	Positive
Parent	•	Positive
Price	•	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	-1.53	-0.03
2017	18.49	2.55
2016	14.82	0.01
2015	0.86	4.90
2014	11.38	1.16

Bronze

Neutral

Negative



Vanguard Equity-Income Fund Admiral Shares VEIRX

Analysis

ranks in the category's top quintile. The fund largely steers clear of higher-yielding stocks, which can signal a distressed dividend or limited growth prospects.

While Vanguard's portion of the portfolio doesn't stray too far from the U.S.-focused FTSE High Dividend Yield Index, Wellington's Michael Reckmeyer has recently found a number of attractively valued dividend payers overseas. Since early 2013, the fund's foreign stake has hovered around 10%. Most of these holdings are multinationals that pay stout dividends, like British American Tobacco BATS, which has a wide Morningstar Research Services Economic Moat Rating.

Sector weightings tend to stay fairly close to the fund's benchmark but can diverge dramatically from the Russell 1000 Value Index. Financials claimed 17.3% of the fund's assets as of April 2017. That was more than any other sector but still below the Russell index's 26.4% stake. While exposure to dividend havens like telecom and utilities (a combined 10.8% presently) can be significant, the fund is more diversified than most incomeoriented peers.

Performance Pillar: O Positive

The fund's Positive Performance Pillar rating reflects its strong record under the current subadvisor lineup. Since Wellington Management and Vanguard's in-house quantitative equity group became solely responsible for this fund's asset base in late 2005, its 8.8% annualized gain through May 2017 beat the Russell 1000 Value Index by 1.6 percentage points and landed in the large-value category's top decile, with below-average volatility.

Wellington's management team underwent a change at year-end 2007, when Michael Reckmeyer took over the lead role from John Ryan. That transition went smoothly because Reckmeyer had been a longtime member of the firm's value equity-income team and he uses the same approach as his predecessor. The fund has continued to fare well. From January 2008 through May 2017, it topped the Russell index in 44 of 54 five-year rolling periods. The fund has had less suc-

cess against the FTSE High Dividend Yield Index, its primary prospectus benchmark since mid-2007, but maintains a slight cumulative edge versus that bogy during the same period.

Vanguard does not disclose individual subadvisors' results, but Reckmeyer's use of a nearly identical strategy on Hartford Equity Income HOIAX gives a sense of how the two teams have done. Although the Hartford fund has better long-term gross returns, there are years when the quant group adds value, like 2011.

People Pillar: O Positive

Consistent and capable subadvisor leadership earns the fund a Positive People Pillar rating. Since late 2005, the fund's assets have been split between anchor Wellington Management and Vanguard's in-house quantitative equity group. Wellington, a subadvisor here since 2000, boasts ample resources in overseeing about two thirds of assets. Michael Reckmeyer took over as lead manager of Wellington's slice in late 2007 and has been a member of the firm's seasoned seven-person value equity-income team since 1994. While the team parted ways with its energy, chemicals, and paper analyst in late 2016, it has access to the firm's 50-plus global industry analysts as it looks for a replacement. Two members of the otherwise Pennsylvania-based team live in London.

The quantitative equity group runs the rest of the portfolio. James Stetler has been investing at Vanguard since 1996 and has been running a slice of this fund since 2003. Binbin Guo came aboard in early 2016, replacing James Troyer, who had joined the fund in early 2012. Michael Roach, who joined the fund around the same time as Troyer, left in May 2017 to head up Vanguard's quantitative equity group in Australia. The entire global team includes nearly 30 strategists, analysts, and managers combined, who have on average more than a decade of industry experience.

Reckmeyer invests more than \$1 million in the fund.

Parent Pillar: • Positive

Vanguard has one of the mutual fund industry's

strongest corporate cultures and earns a Positive Parent rating. Its consistent messages to investors to keep costs low, diversify, and stay the course are reflected in the firm's own behavior. Vanguard's U.S. fundholders own the firm through small investments by each mutual fund, mitigating potential conflicts of interest that can exist at other firms that are serving two masters. Fund performance is strong overall: Over the past three-, five-, and 10-year periods, its Morningstar Success Ratios are greater than 70%--high among large, diversified fund families.

Over the past year, the firm has collected more than USD 200 billion in net inflows, thanks in large part to investors' interest in passive investing. The firm's indexing and ETF prowess, low costs, and success in penetrating the financial-advisor sales channel all have fueled growth. Total assets under management now exceed USD 3.3 trillion, giving Vanguard a significant more-than-20% market share across U.S. mutual funds.

Vanguard has been a global player for years but has only more recently turned its focus to growing internationally. The firm is a large player in Australia, where it has the most history, but doesn't yet have the brand recognition and trust it enjoys in the United States in other parts of the world. While non-U.S. funds don't participate in the ownership of Vanguard, the firm's investorcentric culture extends globally.

Price Pillar: O Positive

Rock-bottom fees earn the fund a Positive Price Pillar rating. The Investor shares' 0.26% expense ratio, which applies to about one fifth of the fund's assets, is 64 basis points below the large-cap noload peer median and lower than 94% of those peers. The Admiral shares contain the rest of the fund's assets and are even cheaper at 0.17%, which beats 95% of their rivals' fees. Modest trading costs are another plus. In fiscal 2016, brokerage fees of 0.01% of average net assets fell below the category's 0.04% median.

The fund's price tag will shift, however. Vanguard pays subadvisor Wellington an asset-based fee,



$\textbf{Vanguard Equity-Income Fund Admiral Shares} \ \forall \textbf{EIRX}$

Analysis

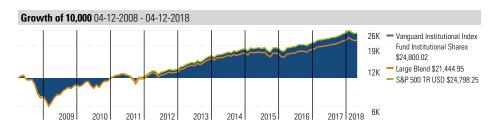
with breakpoints, and the expense ratio also includes a performance adjustment based on the fund's three-year rolling return versus the FTSE High Dividend Yield Index.



Vanguard Institutional Index Fund Institutional Shares VINIX

Morningstar Analyst Rating ₩ Gold

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Load Expenses Morningstar Rating™ **Investment Style** Category 1.83 Large Blend Open \$5 mil None 0.04% Large Blend





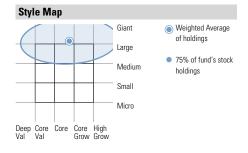
Pillars Process Positive Performance 0 Positive People 0 Positive Parent 0 Positive 0 Price Positive Rating **₩** Gold

Investment Strategy

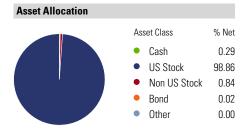
The investment seeks to track the performance of a benchmark index that measures the investment return of large-capitalization stocks. The fund employs an indexing investment approach designed to track the performance of the Standard & Poor's 500 Index, a widely recognized benchmark of U.S. stock market performance that is dominated by the stocks of large U.S. companies. The advisor attempts to replicate the target index by investing all, or substantially all, of its assets in the stocks that make up the index, holding each stock in approximately the same proportion as its weighting in the index.

8					
YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
10,018	9,587	11,582	13,484	18,579	24,800
0.18	-4.13	15.82	10.48	13.19	9.51
-0.01	0.00	-0.04	-0.03	-0.03	0.00
0.33	-0.33	1.09	1.84	1.50	0.91
41	65	38	12	12	21
1,474	1,494	1,384	1,181	1,059	787
	YTD 10,018 0.18 -0.01 0.33 41	YTD 1 Mo 10,018 9,587 0.18 -4.13 -0.01 0.00 0.33 -0.33 41 65	YTD 1 Mo 1 Yr 10,018 9,587 11,582 0.18 -4.13 15.82 -0.01 0.00 -0.04 0.33 -0.33 1.09 41 65 38	YTD 1 Mo 1 Yr 3Yr Ann 10,018 9,587 11,582 13,484 0.18 -4.13 15.82 10.48 -0.01 0.00 -0.04 -0.03 0.33 -0.33 1.09 1.84 41 65 38 12	YTD 1 Mo 1 Yr 3Yr Ann 5Yr Ann 10,018 9,587 11,582 13,484 18,579 0.18 -4.13 15.82 10.48 13.19 -0.01 0.00 -0.04 -0.03 -0.03 0.33 -0.33 1.09 1.84 1.50 41 65 38 12 12

	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	10,018	9,587	11,582	13,484	18,579	24,800
Fund	0.18	-4.13	15.82	10.48	13.19	9.51
+/- S&P 500 TR USD	-0.01	0.00	-0.04	-0.03	-0.03	0.00
+/- Category	0.33	-0.33	1.09	1.84	1.50	0.91
% Rank in Cat	41	65	38	12	12	21
# of Funds in Cat	1,474	1,494	1,384	1,181	1,059	787
* Currency is displayed in BA	SE					



Top Holdings 02-28-2018				
	Weight %	Last Price	Day Chg %	52 Week Range
Apple Inc	3.94	175.14 BASE	0.56 🛧	140.45 - 183.50
Microsoft Corp	3.11	93.16 BASE	-0.45 🗸	64.89 - 97.24
 Amazon.com Inc 	2.60	— BASE	-0.46 ↓	884.49 - 1,617.54
Facebook Inc A	1.83	164.48 BASE	0.40 🛧	139.33 - 195.32
JPMorgan Chase & Co	1.73	110.43 BASE	-2.60 ↓	81.64 - 119.33
% Assets in Top 5 Holdings	13.21			



Increase	○ Decrease	¥¥ New to Portfolio

Top Sectors 02-28-2018					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Technology	22.43	22.43	18.58	20.17	
Financial Services	17.21	17.21	16.21	17.44	Y
H ealthcare	13.99	14.01	13.75	14.02	
Consumer Cyclical	11.70	11.70	10.97	12.05	<u> </u>
Industrials	10.67	11.03	10.67	11.49	· · · · · · · · · · · · · · · · · · ·
					0 10 20 30

Management	
	Start Date
Donald M. Butler	12-31-2000
Michelle Louie	11-30-2017

Dividend and Capita	al Gains Distribution	ıs				
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
03-15-2018	250.22	0.0000	0.0000	0.0000	0.9996	0.9996
12-22-2017	244.26	0.0000	0.0000	0.0000	1.2258	1.2258
09-21-2017	227.68	0.0000	0.0000	0.0000	1.2030	1.2030
06-22-2017	221.73	0.0000	0.0000	0.0000	0.9740	0.9740
03-28-2017	214.71	0.0000	0.0000	0.0000	1.0330	1.0330

Vanguard Institutional Index Fund Institutional Shares VINIX

Analysis

This is among the cheapest S&P 500 trackers available

By Adam McCullough 3/23/2018

Vanguard Institutional Index is a compelling option. This fund gains a leg up over most of its Morningstar Category peers by efficiently tracking a broadly diversified and representative benchmark at a low cost. It earns a Morningstar Analyst Rating of Gold.

The fund tracks the S&P 500, a market-cap-weighted index that includes large-cap stocks representing about 80% of the U.S. stock market. A committee selects the index's holdings, and this offers more flexibility than indexes that adhere to rigid rules but also reduces transparency. However, the S&P 500's performance has been, and should continue to be, highly correlated with large-cap indexes that follow mechanical rules.

Market-cap weighting pulls the portfolio toward the largest U.S. stocks and accurately reflects the composition of the market. The fund's average market capitalization of just under \$100 billion is nearly double the market cap of the average fund in the category. The fund is broadly diversified, which should help control individual stock risk. Its top 10 holdings make up about 20% of its portfolio and include household names like Apple AAPL, Microsoft MSFT, and Amazon.com AMZN.

Low turnover is a key advantage of the fund's broad market-cap-weighted approach. Lower turnover equates to lower transaction costs and a smaller likelihood of taxable capital gains distributions. The fund's average turnover over the past decade was 5%, much lower than the category average of over 60%. Tax efficiency adds to the fund's appeal. It has not distributed any capital gains since its inception.

The fund's cost advantage has translated into strong performance. During the decade through February 2018, its Admiral share class outpaced the large-blend category by 1.7% annually, and the fund's risk-adjusted returns, as measured by

Sharpe ratio, landed in the category's top quintile. Because this index fund remains fully invested, it suffered a larger drawdown than the category average during the financial crisis. But its smaller cash drag pays off during bull markets, and the fund's performance during the market recovery more than made up for its larger drawdown.

Process Pillar: O Positive

This fund uses full replication to track the S&P 500. This index effectively diversifies risk, promotes low turnover, and accurately represents its target market segment, supporting the Positive Process rating.

Unlike many other indexes, a committee selects the constituents for the S&P 500. These large-cap stocks represent about 80% of the total market capitalization of the U.S. stock market. The S&P 500 has a slight quality tilt because new constituents must be profitable before they are eligible to be added in the index. However, that screen probably won't have a big impact on performance because most large-cap stocks meet this requirement. While qualifying stocks must pass some quantitative screens, the index committee has some discretion in its stock-selection process. This gives the S&P 500 a greater degree of flexibility than indexes that follow more-mechanical rules, though it also reduces transparency. Despite this difference, the S&P 500's performance has been, and should continue to be, highly correlated with other large-cap indexes that follow mechanical rules.

The portfolio managers use dividend reinvesting and derivatives to keep pace with the benchmark. The fund has historically used securities lending to generate additional income to offset expenses.

This is a well-diversified offering that captures nearly 80% of the investable U.S. equity market. Its top 10 holdings represent just under 20% of the portfolio and include household names such as Apple, Microsoft, Amazon, and Exxon Mobil XOM. Sector weightings for the fund nearly match those of the large-blend category average because the fund's index relies on market capitalization to

Morningstar's Take		
Morningstar Analyst Rating		ÿ Gold
Morningstar Pillars		
Process	•	Positive
Performance	•	Positive
People	•	Positive
Parent	•	Positive
Price	•	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Analyst Rating Spectrum

℧ Silver

Gold 😯

Ť	·
Total Return %	+/- Category
0.18	0.33
21.79	1.35
11.93	1.56
1.37	2.44
13.65	2.69
	0.18 21.79 11.93 1.37

■ Bronze

Neutral

Negative



Vanguard Institutional Index Fund Institutional Shares VINIX

Analysis

weight its holdings. The technology, healthcare, and financial-services sectors represent the fund's largest sector weightings, while the real estate, utilities, and materials sectors carry the smallest weightings.

Stocks are added and removed from the S&P 500 at the committee's discretion, so it can be difficult to anticipate changes ahead of time. Because this is one of the most widely tracked indexes, changes tend to move stock prices. In January 2010, S&P announced Berkshire Hathaway BRK.B would be added to the index, and Berkshire's stock price appreciated more than 10% over the next few days.

The portfolio managers reinvest dividends and use index futures to keep pace with the benchmark and manage redemptions. During the past decade through February 2018, the fund averaged only a 0.3% cash allocation, about a tenth of its average actively managed peer. The fund has historically used securities lending to generate additional income to offset expenses.

Performance Pillar: • Positive

The fund has generated strong risk-adjusted longterm performance compared with its large-blend category peers. It earns a Positive Performance Pillar rating.

During the past 10 years through February 2018, the fund's return topped the category average by 1.7 percentage points annually. The fund's cost advantage and efficient construction have contributed the most to its outperformance over the longrun. Because the fund generates its edge from its low cost, its advantage is consistent. Over the trailing 14 years through February 2018, the fund's rolling three-year returns landed in the top half of the category 99% of the time. Because it was fully invested, this fund performed worse than the category average during the bear market drawdown from October 2007 to March 2009, but its subsequent recovery more than made up for the slightly larger drawdown.

The fund benefits from securities lending and the use of derivatives to efficiently track its index. It

has not distributed capital gains over the prior decade. And its annualized tax-cost ratio was 0.5% over the past 10 years, compared with the 0.9% average of all S&P 500-tracking funds. That places this offering in top decile of S&P 500-tracking funds.

People Pillar: O Positive

A well-equipped group manages all of Vanguard's equity index funds. The team's extensive experience, deep bench of talent, and strong trading infrastructure underpin this fund's Positive People Pillar rating.

Vanguard veteran Donald Butler has served as a manager on the fund since December 2000. Butler is a principal of Vanguard Group, has been with the firm since 1992, and has managed investment portfolios since 1997. Butler comanaged the fund with George Sauter until April 2005, when Sauter went on to lead Vanguard's retail investor group. Sauter led that initiative until his retirement June 2012. Michelle Louie replaced Scott Geiger as a portfolio manager in November 2017. Louie has been a portfolio manager since 2012 and has been with Vanguard since 2010. Butler and Louie also manage the more accessible Admiral share class version of this fund, Vanguard 500 Index VFIAX.

According to the Statement of Additional Information, neither manager has money invested in the fund. Vanguard links the managers' compensation to operating efficiency, which helps keep costs low and aligns their interests with investors'. Minimizing costs and tracking error are their primary objectives. Vanguard has automated much of this process and provides the managers with robust tools to handle flows, corporate actions, and benchmark changes.

Parent Pillar: O Positive

Vanguard has one of the mutual fund industry's strongest corporate cultures and earns a Positive Parent rating. Its consistent messages to investors to keep costs low, diversify, and stay the course are reflected in the firm's own behavior. Vanguard's U.S. fundholders own the firm through small investments by each mutual fund, mitigating potential conflicts of interest that can exist at oth-

er firms that are serving two masters. Fund performance is strong overall: Over the past three-, five-, and 10-year periods, its Morningstar Success Ratios are greater than 70%--high among large, diversified fund families.

Over the past year, the firm has collected more than USD 200 billion in net inflows, thanks in large part to investors' interest in passive investing. The firm's indexing and ETF prowess, low costs, and success in penetrating the financial-advisor sales channel all have fueled growth. Total assets under management now exceed USD 3.3 trillion, giving Vanguard a significant more-than-20% market share across U.S. mutual funds.

Vanguard has been a global player for years but has only more recently turned its focus to growing internationally. The firm is a large player in Australia, where it has the most history, but doesn't yet have the brand recognition and trust it enjoys in the United States in other parts of the world. While non-U.S. funds don't participate in the ownership of Vanguard, the firm's investorcentric culture extends globally.

Price Pillar: O Positive

This is among the cheapest S&P 500-tracking funds. It charges a low 0.04% annual fee, well below the large-blend category median of 0.84%, supporting its Positive Price Pillar rating.

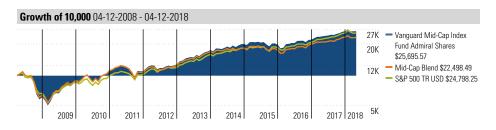
As an institutional-focused fund, this fund's minimum initial purchase amount is high but may be available on select 401(k) platforms. Vanguard 500 Index also tracks the S&P 500 and levies a 0.04% fee, but this fund's minimum initial purchase is a more accessible \$10,000. The portfolio's ETF equivalent, Vanguard S&P 500 VOO, also levies 0.04% per year but does not require an initial minimum purchase beyond the cost of one share.



Vanguard Mid-Cap Index Fund Admiral Shares VIMAX

Morningstar Analyst Rating 🕶 Gold

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Expenses Morningstar Rating™ Load Category **Investment Style** 191.59 **1**.05 | 0.55 1.39 Open \$10,000 None 0.06% Mid-Cap Blend Mid Blend





Pillars		
Process	•	Positive
Performance	•	Positive
People	•	Positive
Parent	•	Positive
Price	•	Positive
Rating		₩ Gold

Giant

Large

Small

Core High Grow Grow

Weighted Average of holdings

75% of fund's stock

Style Map

Deep Core Core Val Val



Increase

Decrease

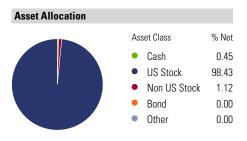
★ New to Portfolio

The investment seeks to track the performance of a benchmark index that measures the investment return of mid-capitalization stocks. The fund employs an indexing investment approach designed to track the performance of the CRSP US Mid Cap Index, a broadly diversified index of stocks of mid-size U.S. companies. The advisor attempts to replicate the target index by investing all, or substantially all, of its assets in the stocks that make up the index, holding each stock in approximately the same proportion as its weighting in the index.

8					
YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
10,035	9,644	11,369	12,413	17,795	25,696
0.35	-3.56	13.69	7.47	12.22	9.90
0.16	0.57	-2.16	-3.03	-1.00	0.39
0.78	-0.38	1.61	1.16	1.63	1.13
24	78	32	42	19	33
461	463	443	347	315	219
	YTD 10,035 0.35 0.16 0.78 24	YTD 1 Mo 10,035 9,644 0.35 -3.56 0.16 0.57 0.78 -0.38 24 78	YTD 1 Mo 1 Yr 10,035 9,644 11,369 0.35 -3.56 13.69 0.16 0.57 -2.16 0.78 -0.38 1.61 24 78 32	YTD 1 Mo 1 Yr 3Yr Ann 10,035 9,644 11,369 12,413 0.35 -3.56 13.69 7.47 0.16 0.57 -2.16 -3.03 0.78 -0.38 1.61 1.16 24 78 32 42	YTD 1 Mo 1 Yr 3Yr Ann 5Yr Ann 10,035 9,644 11,369 12,413 17,795 0.35 -3.56 13.69 7.47 12.22 0.16 0.57 -2.16 -3.03 -1.00 0.78 -0.38 1.61 1.16 1.63 24 78 32 42 19







Top Sectors 02-28-2018					
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Technology	18.26	18.26	15.49	16.45	▼
Consumer Cyclical	16.32	17.16	16.32	15.06	
Financial Services	15.42	15.42	13.32	16.64	
Industrials	13.74	14.25	13.70	15.10	 -
→ Healthcare	8.46	8.46	8.22	9.01	

Management	
	Start Date
Donald M. Butler	05-21-1998
Michael A. Johnson	04-27-2016

Dividend and Capital Gains Distributions						
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
03-21-2018 12-20-2017	195.71 190.95	0.0000 0.0000	0.0000 0.0000	0.0000 0.0000	0.6376 0.8025	0.6376 0.8025
09-26-2017	180.95	0.0000	0.0000	0.0000	0.8025	0.6300
06-22-2017	176.66	0.0000	0.0000	0.0000	0.5830	0.5830
03-28-2017	171.57	0.0000	0.0000	0.0000	0.5710	0.5710

5 10 15 20

Vanguard Mid-Cap Index Fund Admiral Shares VIMAX

Analysis

This is a well-constructed mid-cap fund with a sizable cost advantage.

By Adam McCullough 10/11/2017

Vanguard Mid-Cap Index is a compelling marketcap-weighted fund that accurately represents the U.S. mid-cap market while keeping turnover low. Its well-diversified portfolio, efficient index construction, and low expense ratio should provide a persistent edge over its peers in the long run. It earns a Morningstar Analyst Rating of Gold.

The fund tracks the CRSP U.S. Mid Cap Index, a broadly diversified, representative index that accurately represents the U.S. mid-cap stock market. The index targets U.S. stocks smaller than the largest 70% ranked by market cap and larger than the smallest 15%. This brings in more than 330 holdings, most of which have not established durable competitive advantages and tend to be riskier than larger stocks. But the fund effectively diversifies firm-specific risk. Its top 10 holdings represent about 7% of assets, compared with the mid-blend Morningstar Category average of 24%.

The fund has two primary advantages that reduce its transaction costs. It invests in larger stocks than many of its category peers, which tend to be more liquid and less expensive to trade than their smaller counterparts. And its index employs buffer rules that wait to move a stock until it is squarely in an adjacent size segment and then only moves half the position at once. This reduces unnecessary trades and the market impact cost of trading. The fund's average 10-year turnover of 19% is less than a fourth of the category average.

In early 2013, the fund changed its underlying index to the CRSP U.S. Mid Cap Index from the MSCI Mid Cap 450 Index to reduce expenses. The change nearly doubled its holdings' average market cap. Despite the change, the fund's low fee and thoughtful index construction (current and prior) has paid off. During the trailing 10 years through September 2017, it bested the category average by 1.5 percentage points per year with similar volatility. This fund's low fee and broad di-

versification contributed the most to this outperformance

Process Pillar: • Positive

The fund employs full replication to track the market-cap-weighted CRSP U.S. Mid Cap Index. This index effectively diversifies risk, promotes low turnover, and accurately represents its target market segment, supporting a Positive Process rating.

The CRSP U.S. Mid-cap Index targets stocks representing the largest 70th-85th percentile of the U.S. stock market. But it doesn't immediately add or remove securities when they cross those thresholds. A stock must first pass through a wide market-cap buffer zone before it is added to or removed from the index. At that point, CRSP transfers only half of the holding. If the stock in guestion remains on the other side of the buffer zone at the next quarterly review, CRSP will transfer the remaining half. This approach limits turnover where it doesn't significantly affect the fund's market-cap orientation, which should help reduce transaction costs. The buffer zones can make a big difference here as holdings can migrate into two adjacent size segments. Breaking the trades in half effectively doubles capacity and reduces market impact cost. In September 2017, the index started to spread its trades out across five days, which should further lower transaction costs. The index rebalances quarterly. In early 2013, the fund changed its underlying index to its current index from the MSCI U.S. Mid-cap 450 Index to reduce licensing fees.

This broad, market-cap-weighted portfolio offers efficient exposure to mid-cap stocks. Its index will likely incur lower transaction costs than some of its index peers because it owns larger stocks, which are less expensive to trade, and applies generous buffer rules to limit turnover where it doesn't significantly affect the fund's style characteristics.

The case for indexing boils down to two considerations: costs and whether the index represents its peers' opportunity set. Like most of its index peers, this fund charges a much lower fee than its act-

Morningstar's Take		
Morningstar Analyst Rating	ţ	ÿ Gold
Morningstar Pillars		
Process	•	Positive
Performance	0	Positive
People	0	Positive
Parent	•	Positive
Price	•	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	0.35	0.78
2017	19.25	3.32
2016	11.22	-2.92
2015	-1.34	3.41
2014	13.76	5.96

🖫 Bronze

Neutral

Negative



Vanguard Mid-Cap Index Fund Admiral Shares VIMAX

Analysis

ively managed counterparts. And because its portfolio is representative of its active peers, it should do better than average net of fees over the long term. But there are some drawbacks. Market-capweighting relies on market participants to incorporate information into stock prices, and the fund is always fully invested. During bull markets, that can help performance, but hurt during market downturns.

The fund's market-cap orientation is 50% greater than the category average. Most of the fund's sector weightings are similar to the category average, but it has a greater consumer discretionary sector weighting and less exposure to materials and financials stocks. The portfolio is well-diversified: Its top 10 holdings represent around 7% of the portfolio.

Performance Pillar: • Positive

The fund has generated attractive long-term performance compared with its mid-blend category peers. It earns a Positive Performance Pillar rating. During the past decade through September 2017, the fund's return topped the category average by 1.5 percentage points each year. Its cost advantage has contributed the most to this outperformance over the long run.

Because the fund generates its edge from its low cost, the advantage is consistent. during the trailing 12 years through September 2017, the fund's rolling three-year returns land in the top half of the category 88% of the time. And because it was fully invested, this fund performed worse than the category average during the bear market drawdown from October 2007 to March 2009. But the slightly higher drawdown was more than offset by its subsequent recovery. The fund benefits from the use of derivatives and securities lending to efficiently track its index. During the past decade through September 2017, the fund averaged only a 0.3% cash allocation, about a tenth of its typical actively managed peer's. It has not distributed a capital gain in the prior decade. The fund's annualized tax-cost ratio measured 0.4% during the past 10 years, less than half the figure for the average mid-blend index fund.

People Pillar: O Positive

A well-equipped group manages all of Vanguard's equity index funds. The team's extensive experience, deep bench of talent, and strong trading infrastructure underpin this fund's Positive People rating.

Donald Butler and Michael Johnson comanage the fund. Butler is a principal of Vanguard Group, has been with the firm since 1992, managed investment portfolios since 1997, and served as comanager of this fund since 2009. Butler comanages 11 other funds including Vanguard 500 Index VFINX and Vanguard Extended Market Index VEXMX. Johnson has been with Vanguard since 1999 and began managing portfolios in 2010. Johnson comanages 17 other funds including Vanguard Mega Cap Index VMCTX and Vanguard Large Cap Index VLACX. Butler and Johnson also co-manage Vanguard Mid-Cap Growth VMGRX and Vanguard Mid-Cap Value VMVIX.

According to the Statement of Additional Information, neither manager has money invested here, but Vanguard links the managers' compensation to operating efficiency, which helps keep costs low and aligns their interests with investors'. Minimizing costs and tracking error are their primary objectives. Vanguard has automated much of this process and provides the managers with robust tools to handle flows, corporate actions, and benchmark changes.

Parent Pillar: O Positive

Vanguard has one of the mutual fund industry's strongest corporate cultures and earns a Positive Parent rating. Its consistent messages to investors to keep costs low, diversify, and stay the course are reflected in the firm's own behavior.

Vanguard's U.S. fundholders own the firm through small investments by each mutual fund, mitigating potential conflicts of interest that can exist at other firms that are serving two masters. Fund performance is strong overall: Over the past three-, five-, and 10-year periods, its Morningstar Success Ratios are greater than 70%--high among large, diversified fund families.

Over the past year, the firm has collected more than USD 200 billion in net inflows, thanks in large part to investors' interest in passive investing. The firm's indexing and ETF prowess, low costs, and success in penetrating the financial-advisor sales channel all have fueled growth. Total assets under management now exceed USD 3.3 trillion, giving Vanguard a significant more-than-20% market share across U.S. mutual funds.

Vanguard has been a global player for years but has only more recently turned its focus to growing internationally. The firm is a large player in Australia, where it has the most history, but doesn't yet have the brand recognition and trust it enjoys in the United States in other parts of the world. While non-U.S. funds don't participate in the ownership of Vanguard, the firm's investorcentric culture extends globally.

Price Pillar: O Positive

This is among the cheapest market-cap-weighted mid-blend funds available, which supports its Positive Price Pillar rating.

The Investor share class charges an 0.18% fee and has a \$3,000 minimum investment requirement. The Admiral shares carry a \$10,000 minimum, but only levy a 0.06% fee. The ETF share class' expense ratio matches the Admiral share class at 0.06%, but it doesn't have a minimum investment beyond the price of one share. The Institutional share class (VMVIX) carries a 0.05% fee but may be only available to investors through qualified accounts such as those on a 401(k) platform. The fund uses index derivatives to manage cash, which should benefit shareholders by minimizing its cash drag.

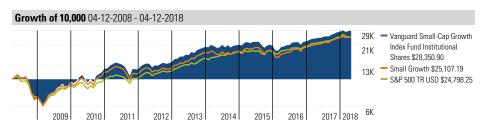


Vanguard Small-Cap Growth Index Fund Institutional Shares VSGIX

Morningstar Analyst Rating

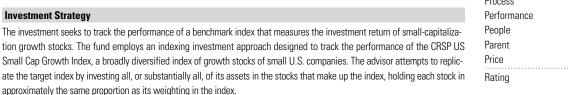
Silver

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Load Expenses Morningstar Rating™ **Investment Style** Category 46.69 **↑**0.30 | 0.65 Open \$5 mil None 0.06% Small Growth Mid Growth

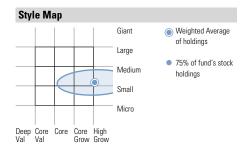




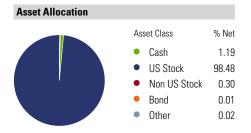
Prillars Process Performance People Parent Price Pating Pating Pillars Positive Positive Positive Pillars Positive Positive Pillars Positive Positive Pating



Performance 04-12-201	8					
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	10,324	9,704	12,019	12,642	17,537	28,351
Fund	3.24	-2.96	20.19	8.13	11.89	10.98
+/- S&P 500 TR USD	3.05	1.17	4.33	-2.38	-1.33	1.48
+/- Category	-0.72	-0.21	-2.00	-0.75	-0.64	0.56
% Rank in Cat	58	64	55	62	61	36
# of Funds in Cat	710	714	676	582	523	398
* Currency is displayed in BA	SE					



Top Holdings 02-28-2018				
	Weight %	Last Price	Day Chg %	52 Week Range
 Nektar Therapeutics Inc 	0.84	101.95 BASE	-1.79 ↓	17.33 - 111.36
 Diamondback Energy Inc 	0.76	118.73 BASE	2.10 🛧	82.77 - 134.60
 XPO Logistics Inc 	0.73	99.42 BASE	-1.33 ↓	44.85 - 106.20
IAC/InterActiveCorp	0.70	155.85 BASE	-0.85 🗸	74.60 - 166.64
 Bioverativ Inc 	0.70	_	_	_
% Assets in Top 5 Holdings	3.73			



Increase	Decrease	★ New to Portfolio	
Ton Coote	NO 02 20 201	0	

	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Technology	24.10	24.10	21.15	24.78	
Healthcare	17.51	17.51	13.14	16.72	
Industrials	15.40	15.40	14.68	17.29	
Consumer Cyclical	13.35	15.10	13.35	12.85	
Real Estate	10.72	15.18	10.72	3.35	

Management	
	Start Date
Gerard C. O'Reilly	12-30-2004
William A. Coleman	04-27-2016

Dividend and Capit	al Gains Distribution	ıs				
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
03-21-2018	47.48	0.0000	0.0000	0.0000	0.0674	0.0674
12-20-2017	45.14	0.0000	0.0000	0.0000	0.1572	0.1572
09-19-2017	42.06	0.0000	0.0000	0.0000	0.0600	0.0600
06-20-2017	40.99	0.0000	0.0000	0.0000	0.0600	0.0600
03-23-2017	38.78	0.0000	0.0000	0.0000	0.0960	0.0960

Vanguard Small-Cap Growth Index Fund Institutional Shares VSGIX

Analysis

This is one of the cheapest small-growth funds available

By Alex Bryan, CFA 3/26/2018

Vanguard Small Cap Growth Index is one of the lowest-cost small-growth funds available. It effectively diversifies risk, accurately represents its actively managed peers' opportunity set, and applies generous buffer rules to mitigate unnecessary turnover, supporting its Morningstar Analyst Rating of Silver.

The fund targets stocks representing the faster-growing and more richly valued half of the U.S. small-cap market and weights them by market capitalization. This brings in more than 600 holdings, most of which are not well-known and lack durable competitive advantages. These stocks have greater growth potential than their larger counterparts, but they also tend to be riskier. While the fund's holdings tend to have attractive outlooks, there is always a risk that they won't live up to the market's expectations. However, the fund's broadly diversified portfolio limits its exposure to firm-specific risk and keeps it from loading up on highly speculative names.

To mitigate unnecessary turnover and transaction costs, the fund's benchmark holds on to stocks that move slightly outside of its targeted market segment. So, it tends to hold on to stocks with slowing growth and rising market caps longer than do the Russell 2000 Value and S&P Small-Cap 600 indexes. But it also has less overlap with its growth counterpart than do rival value and growth funds based on those two indexes. The resulting portfolio offers a similar growth orientation, though it does climb further up the market-cap ladder.

To further reduce these costs, the fund's index moves only half of each position into or out of the portfolio at a time. In September 2017, the fund started to spread its rebalancing trades across five days, so it doesn't move prices as much as it had concentrating all the trades on one day.

While this portfolio often looks a lot like the small-growth Morningstar Category norm, its low fee and broad diversification have been a winning combination. The fund outpaced the category average by 1.39 percentage points annualized during the trailing 10 years through February 2018, with comparable volatility.

Process Pillar: • Positive

The fund employs full replication to track the CRSP U.S. Small Cap Growth Index. This broad, market-cap-weighted index diversifies risk, accurately reflects the composition of the small-growth investment style, and keeps turnover low, supporting the Positive Process rating.

CRSP ranks all U.S. stocks by market cap and excludes the largest 85% and smallest 2% from the small-cap universe. It then ranks those stocks on their composite value and growth characteristics. The growth metrics include projected short- and long-term earnings-per-share growth, three-year historical earnings and sales-per-share growth, current investment/assets, and return on assets. CRSP evaluates value on book/price, forward and trailing earnings/price, dividend yield, and sales/price. It fully allocates stocks with the strongest growth characteristics to the small-cap growth index until it represents half the assets in the small-cap market.

CRSP keeps 100% of each stock in its respective style index until it passes through a buffer zone. At that point, it moves only 50% of the stock from one style index to the other, spreading the trades across five days. If the stock stays on the opposite side of the buffer zone at the following quarterly review, CRSP will transfer the remaining half. This mitigates turnover where it does not significantly affect the fund's style characteristics.

This is a broadly diversified portfolio that includes more than 600 stocks, each of which represents less than 1% of the portfolio. While these companies have strong growth prospects, about 21% of the fund is invested in stocks that were not profitable over the trailing 12 months through February 2018.

Morningstar's Take		
Morningstar Analyst Rating	Ţ	Silver
Morningstar Pillars		
Process	•	Positive
Performance	•	Positive
People	•	Positive
Parent	•	Positive
Price	0	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	3.24	-0.72
2017	21.94	0.44
2016	10.74	-0.46
2015	-2.52	-0.11
2014	4.04	1.60

🖫 Bronze

Neutral

Negative



Vanguard Small-Cap Growth Index Fund Institutional Shares VSGIX

Analysis

The fund does not constrain its sector weightings or apply any sector-relative adjustments in its stock selection process, leading to persistent sector biases. Most of the fund's sector weightings are similar to the category average, though the fund has greater exposure to real estate stocks. While these firms may not grow as quickly as many other growth stocks, many qualified for inclusion because they have experienced high historical growth rates and currently trade at high earnings multiples.

Market-cap weighting does not necessarily pull the portfolio toward the fastest-growing stocks, but it does reflect the market's view about the relative value of each stock. It also promotes low turnover, as do the fund's style-buffering rules, which allow stocks with slowing growth to stay in the portfolio longer. That said, the fund's growth orientation is usually similar to the category norm, but it does have a larger market-cap orientation than most of its category peers.

Performance Pillar: • Positive

The fund has regularly outperformed most of its small-growth category peers and thus warrants a Positive Performance rating. From its inception in May 1998 through February 2018, the fund outpaced the category average by 1.28 percentage points annually. It continued this strong performance streak over the past decade, beating the category average by 1.39 percentage points annualized, with comparable volatility, largely thanks to its cost advantage and more-favorable stock exposure in the consumer cyclical and healthcare sectors.

Performance also looks good over shorter horizons. The fund's returns ranked in the top half of the category average in 88% of all three-year rolling periods over the trailing 14 years through February 2018. As an added benefit, the fund has not distributed a capital gain in the past 10 years. This is because of the fund's low turnover, savvy tax management, and separate exchange-traded fund share class, which allows the managers to transfer low-cost-basis shares out of the portfolio in a

tax-free transaction with the fund's authorized participants.

Full index replication has kept tracking error low. Over the trailing three years through February 2017, the fund's Admiral share class beat the benchmark by 7 basis points annually. This was partially because of securities-lending revenue, which helped offset the fund's expenses.

People Pillar: O Positive

A well-equipped group manages all of Vanguard's equity index funds. The team's extensive experience, deep bench of talent, and strong trading infrastructure underpin this fund's Positive People Pillar rating.

William Coleman and Gerard O'Reilly have been listed as the fund's managers since April 2016 and December 2004, respectively. O'Reilly has served as a portfolio manager at Vanguard since 1994 and is a Principal with the firm. Coleman joined the firm in 2006 and has served as a portfolio manager since 2013. The duo manages several other index funds, but Vanguard's team approach and supporting infrastructure keep their workload manageable.

Vanguard's equity index management team extends beyond the named portfolio managers. Coleman and O'Reilly draw on the firm's equity trading desk and supporting analysts, who help the managers prepare for corporate actions and upcoming changes to the index portfolio.

The managers do not have any money invested in this fund. Vanguard links their compensation to operating efficiency, which helps keep costs low and align their interests with investors'. Minimizing transaction costs and tracking error are their primary objectives, though they also pay attention to tax efficiency.

Parent Pillar: O Positive

Vanguard has one of the mutual fund industry's strongest corporate cultures and earns a Positive Parent rating. Its consistent messages to investors to keep costs low, diversify, and stay the course are reflected in the firm's own behavior.

Vanguard's U.S. fundholders own the firm through small investments by each mutual fund, mitigating potential conflicts of interest that can exist at other firms that are serving two masters. Fund performance is strong overall: Over the past three-, five-, and 10-year periods, its Morningstar Success Ratios are greater than 70%--high among large, diversified fund families.

Over the past year, the firm has collected more than USD 200 billion in net inflows, thanks in large part to investors' interest in passive investing. The firm's indexing and ETF prowess, low costs, and success in penetrating the financial-advisor sales channel all have fueled growth. Total assets under management now exceed USD 3.3 trillion, giving Vanguard a significant more-than-20% market share across U.S. mutual funds.

Vanguard has been a global player for years but has only more recently turned its focus to growing internationally. The firm is a large player in Australia, where it has the most history, but doesn't yet have the brand recognition and trust it enjoys in the United States in other parts of the world. While non-U.S. funds don't participate in the ownership of Vanguard, the firm's investorcentric culture extends globally.

Price Pillar: O Positive

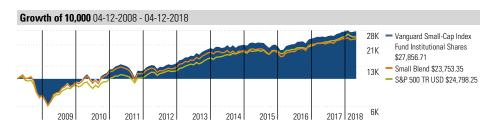
Vanguard charges a razor-thin 0.07% expense ratio for the fund's Admiral shares and 0.19% for the Investor shares, which makes it the cheapest option in the category and supports the Positive Price rating. The minimum investments for the Investor and Admiral shares are \$3,000 and \$10,000, respectively. Vanguard charges a \$20 annual account maintenance fee for balances below \$10,000, but investors can avoid it by agreeing to receive statements and fund documents electronically. Vanguard also offers this fund in an ETF format, Vanguard Small-Cap Growth ETF VBK, for a 0.07% fee with no minimum. The managers generate ancillary income for the fund through securities lending, which partially offsets its expenses.



Vanguard Small-Cap Index Fund Institutional Shares VSCIX

Morningstar Analyst Rating ₩ Gold

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Load Expenses Morningstar Rating™ **Investment Style** Category **↑**0.39 | 0.55 1.39 Small Blend 71.15 Open \$5 mil None 0.05% Mid Blend



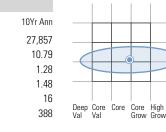


Pillars Process Positive Performance 0 Positive People 0 Positive Parent 0 Positive 0 Price Positive Rating **₩** Gold



The investment seeks to track the performance of a benchmark index that measures the investment return of small-capitalization stocks. The fund employs an indexing investment approach designed to track the performance of the CRSP US Small Cap Index, a broadly diversified index of stocks of small U.S. companies. The advisor attempts to replicate the target index by investing all, or substantially all, of its assets in the stocks that make up the index, holding each stock in approximately the same proportion as its weighting in the index.

Performance 04-12-201	18					
1 01101111111100 01 12 201	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10.000	10.083	9.730	11.449	12.635	17.617	27,857
Fund	0.83	-2.70	14.49	8.11	11.99	10.79
+/- S&P 500 TR USD	0.64	1.42	-1.36	-2.40	-1.23	1.28
+/- Category	0.38	-0.22	1.36	0.70	1.15	1.48
% Rank in Cat	47	61	41	42	32	16
# of Funds in Cat	797	806	763	608	522	388



Style Map

Asset Allocation



1.67

0.44

0.00

0.00

^{*} Currency is displayed in BASE

Top Holdings 02-28-2018				
	Weight %	Last Price	Day Chg %	52 Week Range
 Nektar Therapeutics Inc 	0.38	101.95 BASE	-1.79 ↓	17.33 - 111.36
 Diamondback Energy Inc 	0.34	118.73 BASE	2.10 🛧	82.77 - 134.60
XPO Logistics Inc	0.33	99.42 BASE	-1.33 ↓	44.85 - 106.20
 Broadridge Financial Solutions Inc 	0.33	106.88 BASE	-0.32 ↓	66.92 - 110.05
⊕ IAC/InterActiveCorp	0.32	155.85 BASE	-0.85 🗸	74.60 - 166.64
% Assets in Top 5 Holdings	1.70			



Increase	Decrease	★ New to Portfolio

Management	
	Start Date
William A. Coleman	04-27-2016
Gerard C. O'Reilly	04-27-2016

Bond

Other

	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Technology	16.69	16.69	14.84	14.95	V
Industrials	16.62	16.62	16.39	17.64	
Financial Services	13.54	14.46	13.19	18.29	
Consumer Cyclical	13.16	13.38	13.06	14.02	
■ Healthcare	11.40	11.40	9.08	10.62	<u> </u>

Dividend and Capital Gai	ns Distribution	ıs				
Distribution Date	Distribution NAV	Long-Term Capital Gain	Short-Term Captial Gain	Return of Capital	Dividend Income	Distribution Total
03-21-2018 12-20-2017	72.18 70.59	0.0000	0.0000 0.0000	0.0000 0.0000	0.2198 0.3736	0.2198 0.3736
09-19-2017	70.59 66.08	0.0000 0.0000	0.0000	0.0000	0.3730	0.3736
06-20-2017	64.65	0.0000	0.0000	0.0000	0.2370	0.1280
03-23-2017	62.57	0.0000	0.0000	0.0000	0.2040	0.2040

Vanguard Small-Cap Index Fund Institutional Shares VSCIX

Analysis

A well-constructed fund with a sizable cost advantage.

By Adam McCullough 9/28/2017

Vanguard Small-Cap Index is a compelling marketcap-weighted fund that accurately represents the U.S. small-cap target market while keeping turnover low. Its well-diversified portfolio, efficient index construction, and low expense ratio should provide a persistent edge over its peers. It earns a Morningstar Analyst Rating of Gold.

The fund tracks the CRSP U.S. Small Cap Index, a broadly diversified index that accurately represents the U.S. small-cap stock market. The index targets U.S. stocks smaller than the largest 85% ranked by market capitalization and larger than the smallest 2%. This brings in more than 1,400 holdings, most of which have not yet established durable competitive advantages and tend to be riskier than larger stocks. But the fund effectively diversifies firm-specific risk. Its top 10 holdings represent about 3% of assets, compared with the small-blend Morningstar Category average of 21%.

The fund has two primary advantages that reduce its transaction costs. It invests in larger stocks than many of its category peers, which tend to be more liquid and less expensive to trade than their smaller counterparts. And its index employs buffer rules that wait to move a stock until it is squarely in an adjacent size segment and then only moves half the position at once. This reduces unnecessary trades and the market impact cost of trading. The fund's average 10-year turnover of 15% is less than a quarter of the small-blend category average.

In early 2013, the fund changed its underlying index to the CRSP U.S. Small Cap Index from the MSCI USA Small Cap Index to reduce expenses. The change nearly doubled its holdings' average market capitalization. Despite the change, the fund's low fee and thoughtful index construction (current and prior) have paid off. For the trailing 10 years through August 2017, it bested the category

average by 2.0 percentage points per year with similar volatility. More-favorable stock exposure in the energy, telecom, and financial sectors contributed the most to this outperformance.

Process Pillar: • Positive

The fund tracks the CRSP U.S. Small Cap Index, which offers exposure to U.S. stocks smaller than the largest 85% ranked by market capitalization and larger than the smallest 2%. This index effectively diversifies risk, promotes low turnover, and accurately represents its target market segment, supporting its Positive Process Pillar rating.

Its index will likely incur lower transaction costs than some of its index peers because it owns larger stocks than the category average, which are less expensive to trade, and applies generous buffer rules to limit turnover where it doesn't significantly affect the fund's style characteristics. When the index does move positions into or out of the portfolio, it breaks the trade in half to smooth the transition between size segments and further reduce transaction costs. In September 2017, the index started to spread its trades out over five days, which should further lower transaction costs.

To be included in the index, at least 12.5% of the stock's shares must publicly traded, and like most of its index peers, the fund weights it holdings by free-float market capitalization. Stocks must also meet trading liquidity hurdles. The index rebalances quarterly. In early 2013, the fund changed its underlying index to the CRSP U.S. Small Cap Index from the MSCI USA Small Cap Index to reduce expenses.

Small-cap stocks tend to be riskier and less profitable than large-cap stocks because they have less established competitive advantages and are more sensitive to the business cycle. But they offer diversification benefits and may compensate investors with higher returns. Over the long term, small-cap stocks have generated higher returns than their larger counterparts, but they can experience decade-long stretches of underperformance.

Market-cap weighting skews the portfolio toward

Morningstar's Take		
Morningstar Analyst Rating	Į.	♂ Gold
Morningstar Pillars		
Process	•	Positive
Performance	•	Positive
People	•	Positive
Parent	•	Positive
Price	•	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Analyst Rating Spectrum

℧ Silver

Gold 😯

-	ŭ
)	
Total Return %	+/- Category
0.83	0.38
16.25	3.96
18.32	-2.46
-3.63	1.75
7.53	3.74
	Total Return % 0.83 16.25 18.32 -3.63

■ Bronze

Neutral

Negative



Vanguard Small-Cap Index Fund Institutional Shares VSCIX

Analysis

the larger stocks in the small-cap segment and keeps turnover low. Indeed, the fund's average market capitalization is double the category average. Turnover has averaged 15% during the past 10 years, less than a fourth of the category average's. This weighting approach allows market prices to determine the portfolio's sector weightings. The fund's sector weightings are similar to the category average, but it has a greater real estate sector weighting and less exposure to financial stocks. The portfolio holds more than 1,400 stocks, and its top 10 holdings represent around 3% of the portfolio compared with the category average of 21%. Market-cap-weighted index funds have some drawbacks. They rely on market participants to incorporate information into stock prices. While market participants have done a good job of valuing stocks over the long term, the market has gone through episodes of mania and panic.

Performance Pillar: • Positive

Compared with its small-blend category peers, the fund has generated strong long-term performance, underpinning its Positive Performance Pillar rating.

During the past decade through August 2017, the fund's 8.4% annualized return bested the smallblend category's average return by 2 percentage points with similar volatility. The fund's Sharpe ratio, a measure of risk-adjusted returns, landed in the category's top quintile over the same period. Compared with its category, the fund benefited the most from its cost advantage. Its market-capweighted portfolio promotes low turnover, and the fund hasn't issued a capital gains distribution since its inception. In fact, the fund's tax-cost ratio, a measure of the portion of the fund's returns forgone to taxes, measured 0.5% during the trailing 10 years through August 2017. This places the fund's tax-cost ratio in the best quintile of the category.

Because the fund remains fully invested, it had a slightly higher drawdown than its average peer during the financial crisis from October 2007 to March 2009. But staying fully invested paid off in the long run, and the fund more than made up for

its drawdown, handily outpacing its category peers during the subsequent recovery.

People Pillar: O Positive

A well-equipped group manages all of Vanguard's equity index funds. The team's extensive experience, deep bench of talent, and strong trading infrastructure underpin this fund's Positive People Pillar rating.

Vanguard occasionally rotates managers across its equity index funds. It replaced Michael Buek with William Coleman and Gerard O'Reilly as named managers on the fund in April 2016. O'Reilly joined Vanguard in 1992 and has served as a portfolio manager since 1994. Coleman has been with Vanguard since 2006 and has served as a named portfolio manager since 2013. Both managers are members of Vanguard's Global Equity Index Group, which offers trade execution and risk-management support for the fund. Coleman and O'Reilly run several other funds, including Vanguard Balanced Index VBIAX, Vanguard FTSE Social Index VFTSX, and Vanguard Small Cap Value Index VSI-AX. Vanguard's team approach keeps this workload manageable.

The managers do not have any money invested in this fund. Vanguard links their compensation to operating efficiency, which helps keep costs low and align their interests with investors'. Minimizing costs and tracking error are their primary objectives. Vanguard has automated much of this process and provides the managers with robust tools to handle flows, corporate actions, and benchmark changes.

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cess Ratios are greater than 70%--high among large, diversified fund families.

Over the past year, the firm has collected more than USD 200 billion in net inflows, thanks in large part to investors' interest in passive investing. The firm's indexing and ETF prowess, low costs, and success in penetrating the financial-advisor sales channel all have fueled growth. Total assets under management now exceed USD 3.3 trillion, giving Vanguard a significant more-than-20% market share across U.S. mutual funds.

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Price Pillar: O Positive

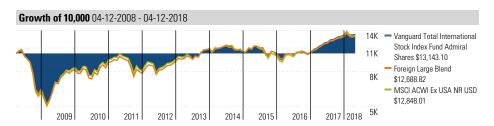
This is among the cheapest market-cap-weighted small-blend funds available, which supports its Positive Price Pillar rating.

The Investor share class charges an 0.18% fee. The Investor shares have a \$3,000 minimum investment requirement. The Admiral shares carry a \$10,000 minimum, but only levy a 0.06% fee. The exchange-traded fund share class' expense ratio matches the Admiral share class at 0.06%, but it doesn't have a minimum investment beyond the price of one share. The Institutional share class (VSCIX) carries a 0.05% fee but may be only available to investors through qualified accounts, such as those on a 401(k) platform. The fund uses index derivatives to manage cash, which should benefit shareholders by minimizing its cash drag.



Vanguard Total International Stock Index Fund Admiral Shares VTIAX ♥ Gold

NAV \$ NAV Day Change % Yield TTM % Total Assets \$ Bil Status Min. Inv. Load Expenses Morningstar Rating™ Category **Investment Style** Foreign Large Blend H Large Blend **↑**0.09 | 0.29 \$10,000 30.67 2.72 341.6 Open None 0.11%



Investment Strategy

The investment seeks to track the performance of a benchmark index that measures the investment return of stocks issued by companies located in developed and emerging markets, excluding the United States. The fund employs an indexing investment approach designed to track the performance of the FTSE Global All Cap ex US Index, a float-adjusted market-capitalization-weighted index designed to measure equity market performance of companies located in developed and emerging markets, excluding the United States. The index includes approximately 5,800 stocks of companies located in over 45 countries.

Performance 04-12-2018						
	YTD	1 Mo	1 Yr	3Yr Ann	5Yr Ann	10Yr Ann
Growth of 10,000	10,075	9,913	11,861	11,905	13,661	13,143
Fund	0.75	-0.87	18.61	5.99	6.44	2.77
+/- MSCI ACWI Ex USA NR USD	0.54	0.39	0.26	0.59	0.52	0.23
+/- Category	0.33	-0.06	1.86	0.92	0.27	0.09
% Rank in Cat	35	60	26	24	45	_
# of Funds in Cat	804	819	752	591	521	346

^{*} Currency is displayed in BASE

Top Holdings 02-28-2018				
	Weight %	Last Price	Day Chg %	52 Week Range
Tencent Holdings Ltd	1.14	408.00 BASE	-1.26 ↓	228.00 - 476.60
Nestle SA	0.96	76.44 BASE	0.39 🛧	73.00 - 86.40
Samsung Electronics Co Ltd	0.80	— BASE	1.63 ↑	2,004,000.00 - 2,876,000.00
HSBC Holdings PLC	0.77	684.30 BASE	0.40 🛧	618.00 - 798.60
 Taiwan Semiconductor Manufacturing Co Ltd 	0.75	244.50 BASE	-0.20 ↓	186.50 - 266.00

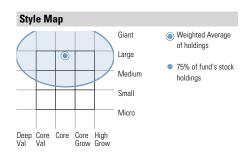
[%] Assets in Top 5 Holdings 4.42

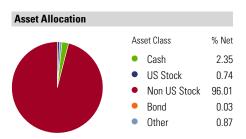
	Fund	3 Yr High	3 Yr Low	Cat Avg	■ Fund ▼ Cat Avg
Financial Services	22.07	22.07	21.18	21.19	<u> </u>
Industrials	12.22	12.23	12.13	13.26	
Technology	11.71	11.71	9.36	10.64	<u> </u>
Consumer Cyclical	11.52	11.62	11.42	12.09	<u> </u>
Consumer Defensive	9.21	9.68	9.21	10.89	Y

Dividend and Capital Gains Distributions						
Distribution	Distribution	Long-Term	Short-Term	Return of	Dividend	Distribution
Date	NAV	Capital Gain	Captial Gain	Capital	Income	Total
03-23-2018	29.66	0.0000	0.0000	0.0000	0.0765	0.0765
12-20-2017	30.06	0.0000	0.0000	0.0000	0.2896	0.2896
09-19-2017	29.52	0.0000	0.0000	0.0000	0.1600	0.1600
06-20-2017	27.73	0.0000	0.0000	0.0000	0.2990	0.2990
03-23-2017	26.56	0.0000	0.0000	0.0000	0.0860	0.0860

3 Year Average Morningstar Risk Measures				
Risk vs. Category (605) Return vs. Category	+Avg Avg			
(000)		Low	Avg	High

Pillars		
Process	•	Positive
Performance	0	Neutral
People	0	Positive
Parent	•	Positive
Price	•	Positive
Rating		℧ Gold





Management	
	Start Date
Michael Perre	08-05-2008
Christine D. Franquin	11-30-2017



Vanguard Total International Stock Index Fund Admiral Shares VTIAX

Analysis

This is one of the cheapest and most broadly diversified funds in its category.

By Daniel Sotiroff 9/6/2017

Vanguard Total International Stock Index Fund is an excellent choice for exposure to stocks listed outside of the U.S. It accurately represents the foreign investable universe and is well diversified across developed and emerging markets. Its broad coverage, combined with a low fee support a Morningstar Analyst Rating of Gold.

This fund tracks the FTSE Global All-Cap Ex-U.S. Index, and covers stocks listed in more than 40 countries. The broad reach of this index includes all stocks that land in the top 98% by market capitalization. Holdings are weighted by market capitalization, which helps mitigate turnover and the associated transaction costs. The inclusion of small-cap stocks gives this fund a modest tilt toward smaller firms, and improves its overall diversification. Top-10 holdings account for only 8% of this fund's assets.

The market-cap-weighting approach emphasizes multi-national firms that are large and profitable. Companies such as Nestle, Samsung, and Novartis are among this fund's top holdings. Sector and country allocations are similar to a typical fund in this category, with stocks from Japan representing the largest single country allocation, at almost 18% of the portfolio.

The volatility of this fund has been in line with the category norm, despite holding more emerging market stocks than many of its peers. And while the fund's greater exposure to emerging market stocks can cause its performance to diverge from its peers', its total and risk-adjusted returns landed in the middle of the category over the trailing three and five years through July 2017. But we remain confident that its cost advantage and representative portfolio will lead to strong category-relative performance over a full market cycle.

Vanguard recently cut the fund's expense ratio on this fund and charges 0.18% for Investor shares.

Admiral shares and the ETF each cost 0.11%. These are among the lowest expense ratios in the category, and should give the fund a durable edge over its peers.

Process Pillar: O Positive

This fund tracks a heavily diversified index of international stocks that cover developed and emerging markets across large-, mid-, and small-cap stocks. Its broad reach accurately represents the investable universe of stocks outside of the U.S. Holdings in this portfolio are weighted by market capitalization, which captures the market's consensus opinion regarding the value of each stock while promoting low turnover, and supports a positive process pillar rating.

This fund tracks the FTSE Global All-Cap ex-U.S. Index, which covers more than 40 countries across developed and emerging markets. It sorts stocks by their free float adjusted market capitalization, and holds those that land in the top 98%. The index uses buffering rules around this cutoff point to help mitigate excessive turnover. Holdings are weighted by market capitalization, which emphasizes large multinational firms while keeping turnover and the associated transaction costs in check. Qualifying stocks are subject to liquidity screens to help ensure that the index is investable. The index is reconstituted semiannually in March and September. Additional quarterly reviews in June and December are used to make smaller changes, such as adding IPOs. The managers use near full replication to fulfill their index-tracking objective.

The portfolio holds more than 5,900 stocks with 8% of assets in its top 10 holdings. This makes it one of the best diversified funds in the foreign large blend Morningstar Category. The inclusion of small caps causes the average market capitalization of this fund to be modestly smaller than he category norm. However, market-cap weighting skews the portfolio toward the largest stocks, which include major multinational firms such as Nestle and Samsung.

The fund's sector allocations are similar to the cat-

Morningstar's Take		
Morningstar Analyst Rating	Į	♂ Gold
Morningstar Pillars		
Process	•	Positive
Performance	0	Neutral
People	•	Positive
Parent	•	Positive
Price	•	Positive

Morningstar Analyst Rating

Morningstar evaluates mutual funds based on five key pillars, which its analysts believe lead to funds that are more likely to outperform over the long term on a risk-adjusted basis.

Bronze

Neutral

Negative

Analyst Rating Spectrum

℧ Silver

Gold 😯

Fund Performance		
	Total Return %	+/- Category
YTD	0.75	0.33
2017	27.55	2.43
2016	4.67	3.89
2015	-4.26	-2.67
2014	-4.17	0.81



Vanguard Total International Stock Index Fund Admiral Shares \sqrt{T}

Analysis

egory average. Stocks from the financial services sector represent the fund's largest sector weighting, accounting for 22% of the portfolio. Country and regional allocations are notably different. This fund has a higher allocation to stocks from emerging-markets countries, and it makes up for some of this difference by underweighting stocks from the United Kingdom. Like many of its peers, stocks from Japan represent the largest country weight, at 18% of assets.

Investment in foreign stocks carries an additional layer of risk due to fluctuations in foreign exchange rates. Like most of its peers this fund does not hedge this currency risk, which can make it more volatile than most broad U.S. market funds.

Performance Pillar: • Neutral

This fund's performance hasn't stood out, so it earns a Neutral Performance Pillar rating. Its total return lagged the foreign large blend category average by 0.26% over the trailing five years through July 2017, ranking in the middle of the category. Its risk-adjusted performance over this period was also near the category midpoint.

This fund's mediocre category relative performance is a consequence of several factors. Its price/book ratio has been lower than the category average, indicating that many of its peers have a modest growth tilt. This has aided their performance over the past several years has provided better returns than this fund's benchmark index. Additionally, its higher allocation to emerging market stocks hurt performance as well. Stocks from these regions also underperformed the category norm.

The fund has managed to slightly outperform its index over the trailing three-years through July 2017. Securities lending has played a big role by offsetting most of the fund's expenses. An additional contributor was Vanguard's fair value pricing methodology, which updates stale prices on foreign securities after the markets they are listed in have markets have closed.

People Pillar: O Positive

The fund is comanaged by Michael Perre and Michelle Louie. As members of Vanguard's Equity Index Group they can leverage Vanguard's global footprint and portfolio management technology. The managers are compensated with a bonus that factors in the gross, pre-tax performance of the fund relative to its benchmark index over the prior 12 months. These characteristics align the interests of the managers and investors, and support a Positive People Pillar rating.

This fund's management team not only oversees the portfolio, but also executes trades on a day-today basis. Vanguard's portfolio management team typically consists of two comanagers on each fund, and these managers rotate to different funds every few years to improve their breadth and depth of expertise. They also have access to Vanguard's trading desks around the world that enable them to make the most efficient transactions in various global markets. Perre is a principal in the Vanquard Equity Index Group and has been with the firm since 1990. Louie was promoted to portfolio manager from equity trader in 2016 at which point she became a named manager on this fund. She has been with Vanguard since 2010. Neither of these managers own shares in this fund.

Parent Pillar: O Positive

Vanguard has one of the mutual fund industry's strongest corporate cultures and earns a Positive Parent rating. Its consistent messages to investors to keep costs low, diversify, and stay the course are reflected in the firm's own behavior. Vanguard's U.S. fundholders own the firm through small investments by each mutual fund, mitigating potential conflicts of interest that can exist at other firms that are serving two masters. Fund performance is strong overall: Over the past three-, five-, and 10-year periods, its Morningstar Success Ratios are greater than 70%--high among large, diversified fund families.

Over the past year, the firm has collected more than USD 200 billion in net inflows, thanks in large part to investors' interest in passive investing. The firm's indexing and ETF prowess, low costs, and success in penetrating the financial-advisor sales channel all have fueled growth. Total assets under management now exceed USD 3.3 trillion, giving Vanguard a significant more-than-20% market share across U.S. mutual funds.

Vanguard has been a global player for years but has only more recently turned its focus to growing internationally. The firm is a large player in Australia, where it has the most history, but doesn't yet have the brand recognition and trust it enjoys in the United States in other parts of the world. While non-U.S. funds don't participate in the ownership of Vanguard, the firm's investorcentric culture extends globally.

Price Pillar: O Positive

Vanguard charges a 0.18% expense ratio for the fund's Investor shares and 0.11% for the Admiral shares. It also offers an ETF share class of this fund, which charges 0.11%. These fees are among the lowest expense ratios in the foreign large blend Morningstar category, and support a positive price pillar rating. Investment minimums are \$3,000 for Investor shares and \$10,000 for Admiral shares. This fund's holdings are weighted by market capitalization, which keeps turnover and the associated transaction costs in check. The last reported turnover ratio landed in the bottom decile of the category. This fund also engages in securities lending, and the profits from this activity can help offset the fund's expenses.

