HAVERFORD
COLLEGE

Haverford College
Investment Office
370 Lancaster Avenue
Haverford, PA 19041

November 15, 2018

We are pleased to present our annual letter on Haverford's endowment to the College community. The Haverford endowment returned 7.2%, net of fees, for the fiscal year ended June 30, 2018. The College's endowment ended the fiscal year at approximately $519 million, which is an increase of $17 million from the prior year and is the aggregation of investment returns of approximately $37 million (net of expenses), new gifts of $5.4 million, and a withdrawal in support of the College's academic mission, scholarship and operations of more than $25 million. Looking over a longer period of time, the endowment has generated investment gains of $300 million since the depths of the 2008-2009 Global Financial Crisis; received new gift inflows of approximately $81 million; and paid out $200 million to the College.

Beneath the headline performance for this fiscal year, the endowment portfolio continues to make significant progress towards our targeted long-term allocation. This year's letter will focus on this progress, from an asset allocation, governance, and performance standpoint. Furthermore, in the course of this commentary, we'll reflect on the year in the markets, many of which were primarily driven by large-cap technology stocks, and the relationship between broad market characteristics and the nature of investments in the endowment portfolio.

The endowment has generated investment gains of $300 million since the depths of the 2008-2009 Global Financial Crisis; received new gift inflows of approximately $81 million; and paid out $200 million to the College.

Particularly of note during the year, we undertook a comprehensive endowment strategic planning exercise, re-examining our governance structure and resources, asset allocation, and investment policies. We noted in last year's letter that we would be having such discussions during the year, to explore how the investment management process at Haverford should continue to evolve. The last time a strategic planning exercise was performed for the endowment investment management approach at Haverford was in the wake of the Global Financial Crisis, when there were significant changes made to endowment management practices to create governance policies and practices aligned with the perpetual time horizon of the endowment. The goals identified by that plan have been achieved in recent years, and the portfolio is in a significantly improved position than in the post-crisis years, so it was natural timing for an in-depth formal review to determine any areas for further improvement.

The recent planning included benchmarking our approach against similar institutions, and as a result of this exercise, we reconfirmed the shared governance approach between the Investment Committee of the Board of Managers and the internal Investment Office. Furthermore, we developed goals to build upon the structures and processes that we follow and adopted a revised asset allocation structure for the portfolio. The work supporting this evolution was in process throughout the year, and following an in-depth discussion with the Investment Committee during our summer retreat, we recently transitioned to a new strategic asset allocation structure. While we don't expect the new structure to have major implications at the investment manager level, nor cause significant turnover in the portfolio, we feel it provides significant benefits for managing the portfolio.

Below, we discuss the continued evolution of our asset allocation and selection of investment managers within the context of the momentum-driven markets, given the implications and relation to our long-term investment approach.

Asset Allocation

The asset allocation policy in place through the end of last fiscal year was defined in 2009-2010, immediately after the Global Financial Crisis, and was formally reviewed every few years since then. At the time the policy was adopted, we required extensive granularity and guidelines to move to a process-driven allocation and to ensure significant endowment oversight in the wake of difficulties during the crisis. While the current allocation has worked well, the endowment has evolved significantly since that time and we felt that there were areas for policy improvement. In performing this review, we felt that any adjustments to the policy should provide balance among policy guidelines, diversification, and flexibility in investment decisions, while better categorizing the role of different assets in the portfolio.

As a result of our analysis and discussions, we condensed the previous nine allocation categories into four broad functional categories: Growth Assets, Diversifying and Hybrid Assets, Real Estate, and Low Volatility and Liquidity. These functional categories are actually nothing new – we've looked at the portfolio this way for years, alongside the policy allocation guidelines, and functional classifications are common in the industry. (In prior letters we referred to this structure as capital growth, capital preservation, inflation-sensitivity and diversification benefits). We see significant benefits in aligning the policy with this perspective. These broader functional categories will enable us to ensure that similar assets compete for endowment capital, to consider strategies that are not easily classified into the prior granular buckets, and to ensure that overly-specific allocation guidelines across multiple categories do not result in forced allocations to less attractive assets.

We also want to provide the Haverford community some additional background on these classifications. To achieve a long-term required rate of return in excess of spending, inflation, and expenses, a significant portion of endowment assets needs to be invested in equity and equity-like assets, representing the Growth Assets category. In addition, to ensure the near term operating needs of the College, a portion of the endowment should be invested in high quality, low volatility, liquid assets - the Low Volatility and Liquidity category. We view Real Estate as an inefficient asset class with attractive long-term risk/return characteristics similar to equity, with opportunity for active management to generate alpha, lower long term correlation to equity, and with the possibility for inflation protection as a secondary benefit. Lastly, the Diversifying and Hybrid category is included for additional diversification, opportunistic investments, and investments with attractive risk/return profiles that may not fit neatly into the other categories. This category will include strategies such as lower quality credit and hedge funds.

Bringing this all together, the figure below shows the policy and actual allocation as of September 30, 2018. We note that the official adoption of the policy occurred after the fiscal year-end, approved by the Investment Committee in August and adopted by the Board of Managers at their meeting in October.

Category	**As of September 30, 2018**	**Policy Target**	**Minimum**	**Maximum**
Growth Assets	64.5%	64%	60%	68%
Diversifying and Hybrid Assets	10.5%	15%	10%	20%
Real Estate	8.7%	6%	4%	8%
Low Volatility and Liquidity	15.4%	15%	12%	18%
Total	100%	100%		

As you can see from the allocation table, the portfolio is basically in line with the new policy, although some minor rebalancing may be required in certain areas. One key advantage we see with the new policy includes the grouping of public and private equity into the growth category, allowing us to ensure a targeted level of growth assets as we continue to build up our private equity allocation, while maintaining illiquidity limitations across the entire portfolio. In recent years, we hit limits on public equity exposure as a result of these categories having separate targets and ranges, while the private equity allocation slowly increased towards its target.

Overall, we feel the new allocation enables us to ensure the endowment maintains the desired long-term exposures, while maintaining the same best practices of oversight, processes and procedures that we have followed for years in our shared governance approach. We also note that the portfolio will continue to be managed in the best way for Haverford, given the College's specific risk and financial profile, and institutional needs.

Market and Performance Review

The equity markets during the 2017-18 fiscal year were characterized by an environment in which performance was driven by relatively few momentum-oriented stocks, while the traditional investment concept of "value" was once again relegated to the background. If you follow the markets, this likely is not the first time you've heard this story, as recent years' performance of large-cap technology stocks such as Amazon, Apple, Facebook, Google, and Netflix has been well documented in the investment media. A similar story was apparent in international and emerging markets, with stocks such as Alibaba, Baidu, JD.com and Tencent leading markets in recent years and through much of 2018. For those of us who experienced the investment environment of the late 1990s, leading to the early 2000s tech wreck, the recent market environment has similar undertones. We note that, as of the writing of this letter, many of these momentum stocks, in the U.S. and around the world, have experienced significant declines along with the broad markets, since the end of our fiscal year.

The endowment has exposure to the broad market, including large-cap technology companies, through our indexed exposure to global markets and less so through our current active management allocations in public equity. Our active managers tend to tilt towards value, as we seek long-term relationships with managers that perform deep fundamental analysis, adhere to a concept of a margin of safety, and who we expect will compound capital strongly in up and down markets over the long term. In shorter periods of significant momentum, this approach can trail the broad markets, which are currently heavily weighted to the largest growth stocks. That is not to say that our value-oriented active managers will not own any of these stocks, but tend to do so in lower amounts than the indexes if they do. While value-oriented approaches have been more recently out-of-favor and could continue to be for some time longer, we believe that value stocks will eventually revert to their longer-term average performance and are likely to outperform more growth-oriented stocks as they do so.

The portfolio return of 7.2% was approximately 70 basis points behind our benchmark for the year. We are not satisfied with this return, although we see significant improvement in several areas of the portfolio beneath the headline figure for the year. The seven-year annualized return of the portfolio, which approximates the time since the restructuring of the portfolio post-crisis, is 6.8%, approximately 80 basis points above our internal market benchmark. There were several positive aspects of performance this year, including outperforming private equity and real estate funds, low duration fixed income in a rising rate environment, and overweights to public equity; while detractors from performance included value-oriented non-U.S. active equity managers, legacy energy-related private funds, the hedge fund allocation, and an underweight to private equity.

Most importantly, the private equity portfolio outperformed its benchmark for the first time in many years. As we've discussed in prior letters, we've managed through a significant allocation remaining to legacy private equity commitments made prior to 2009, resulting in few commitments from 2009-2013, while we began a focused, methodical effort to build a long-term allocation to leading funds in 2014. Private equity portfolios do not turn on a dime – existing allocations take time to come down and new allocations take time to build up, as capital is called over multiple years. Almost five years into building the portfolio, we are beginning to see the fruits of our labor, as the private equity allocation has shifted significantly from the legacy positions to the current, active relationships, with positive performance as a result. The legacy private equity allocation has been the largest drag on performance in recent years, so this shift is welcome and the resulting performance is a positive sign. However, our portfolio remains relatively young, will still take time to reach our targeted allocation, and can still be impacted some by legacy positions. Given that we are below our strategic targets as the allocation increases, and that private equity was one of the top performing sectors in the market this past year, our under-allocation was a drag on performance, even as individual funds performed well.

Our real assets allocation (real estate and energy-related funds) tells a similar story for the year. Real estate funds meaningfully outperformed their benchmark during the year, while legacy energy-related exposure in several pre-2009 private funds significantly underperformed the broad energy and natural resource markets during the year. Again, we view this dynamic as a positive moving forward, given that we've been actively investing in the real estate markets, whereas the energy funds' decline was related solely to legacy positions.

On the negative side for the year, after multiple years of adding significant value versus the benchmark, our active non-U.S. equity managers trailed the markets as a group during the year. This dynamic relates to the nature of the markets we already described – our fundamental, value-oriented active managers trailed in the momentum driven market. Given that these funds are generally the same funds that have added significant value in recent years; there have been no significant changes in these managers' approaches to portfolio management; and they did not suddenly lose the skill they have demonstrated over many years, we maintain confidence in these active fund managers. The performance of the markets during the year and since June 30th demonstrate the extent of the value/momentum bifurcation in the markets and how quickly things can change. Consider the two funds shown in the table below, which underperformed their respective benchmarks during the year. In the four months since the end of the fiscal year, which have been characterized by volatile, declining markets, and a break in the momentum stocks, these two funds have both recovered more than half of the relative value lost during the prior year. Furthermore, both funds are actually now leading their benchmarks for the trailing one-year as of the end of October 2018. Long-term, these funds maintain successful records and we expect them to continue that success in the future.

	Trailing One-Year as of June 30, 2018	July 2018 – October 2018	Trailing One-Year as of October 31, 2018
Non-U.S. Equity Fund #1	-1.3%	-4.1%	-8.9%
Benchmark	9.6%	-11.5%	-12.1%
Over/Under	*-10.9%*	*+7.4%*	*+3.2%*
Non-U.S. Equity Fund #2	-1.3%	-5.3	-11.0%
Benchmark	8.3%	-10.4	-13.1%
Over/Under	*-9.6%*	*+5.1%*	*+1.9%*

The information in the table above is a cautionary tale of allowing short term performance to be a driver of investment decisions. We understand our managers' investment approaches and performance tendencies, which is why we can be patient and confident during times of somewhat extreme market performance.

We understand our managers' investment approaches and performance tendencies, which is why we can be patient and confident during times of somewhat extreme market performance.

<u>The College's Commitment to Diversity</u>

We recently met with a well-known venture capital firm and during the course of our discussion, we asked how they think about diversity, given recent coverage of the lack of diversity in the venture capital industry and Haverford's commitment to diversity and inclusion. We were impressed with their level of commitment to diversity, which, in addition to our discussion, was evidenced by their website, materials, conferences, and fund documentation. Interestingly, they told us that we were the only limited partner, prospective or existing, who asked them about diversity. We all agreed that if more institutions would simply ask the question, maybe positive change would occur faster. This topic, similar to our consideration of sustainability within the investment process, aligns with the College's mission and is one of many different factors we explore with prospective investment managers.

As presented on the College website, the Strategic Plan for Diversity and Inclusion builds upon the College's foundations in Quaker-rooted commitments to peace, justice, equality, and community, seeking to add momentum and means for our becoming fully a place where all constituents thrive in the spirit of mutual respect, trust, and care. Relating to the College's investment policies, the Board of Managers approved a revision to the Investment Policy Statement that codifies our inclusion of diversity as a factor for review with investment managers during our due diligence process. This inclusion can be thought of similarly to sustainability – one factor among many different factors we review when researching endowment investments. Investment decisions are not made based solely on these factors, but by explicitly including them in our process, we can make investment managers aware of their importance to us, and in turn, help make progress on these fronts. The full Investment Policy Statement can be accessed here.

When we come across a fund such as the venture capital fund we described above – a highly attractive and successful investment approach, and a commitment to sustainability and/or diversity – it is a win-win, and in this case, we committed capital to the fund.

Our Continued Thanks

We continue to be grateful for the ongoing commitment and engagement of the College's Investment Committee. In Haverford's case, members of the Investment Committee contribute much more than just broad oversight; they are actively engaged in the sourcing of investments, the research process, and decision-making on the portfolio and commit an extensive amount of time to this engagement. Last fiscal year, we held 14 official Committee or Subcommittee meetings or conference calls, while also having numerous discussions, calls, and emails with various committee members regarding specific areas of the portfolio in which they bring expertise. It is an ongoing, iterative process and we'd like to thank the entire Committee for another year of dedicated work.

We also have been able to leverage other Haverford alumni for additional investment expertise and for access to capacity-constrained funds. During this past year, we re-upped to an existing private fund that was originally introduced to us by an alumnus. We were well-positioned to continue our relationship with the manager, even as they were oversubscribed and accepted few, if any, new client relationships. We also committed capital to a new private fund that is highly access-constrained. In this case, we simply would not have been able to access the fund if it weren't for the introduction by another alumnus. Not every case, nor every introduction, will turn out like these two examples, as we maintain a highly selective investment process and need to evaluate the portfolio fit of each fund we consider. And regardless of how funds are sourced, all go through the extensive Investment Office-led due diligence to ensure that every fund meets our requirements and is free of conflicts of interest. But it is important to note that even though the Haverford alumni network in the investment industry is somewhat small, it can be very powerful and very helpful. We appreciate the help and support.

We also want to note that our Investment Office Student Internship Program has expanded by 100% this year, as we've grown from one to two student interns! Building on the successful launch last spring, we welcomed back our student intern from last year and hired an additional student intern. They have been very helpful in providing summarized fund information, doing research projects, and supporting other aspects of the office's workflow. We are grateful for both their work and the opportunity to provide them with a somewhat unique experience here at Haverford. We look forward to continuing to the program in future years.

And finally, as always, we also thank all of the people of the Haverford community, who make Haverford an extraordinary place.

With appreciation for your continued support,

Michael H. Casel, CFA, CAIA
Chief Investment Officer
Haverford College

Investment Committee of the Board of Managers

Steve Begleiter '84
Managing Director
Flexpoint Ford

Seth Bernstein '84
Chief Executive Officer
AllianceBernstein LP

Jackie Brady '89
Executive Director
PGIM Real Estate
MA, Johns Hopkins University

Bruce Gorchow '80
President
PPM America Capital Partners
MBA, Wharton School, Univ. of Penn.

Roger Kafker '84 (Committee Chair)
Managing Director
TA Associates
MBA, Harvard Business School

Joshua Miller '96
Director, Absolute Return
Georgetown University Investment Office
MBA, Wharton School, Univ. of Penn.

Narv Narvekar '84
Chief Executive Officer
Harvard Investment Management Company
MBA, Wharton School, Univ. of Penn.

Rick White '81 (Chair of Board of Managers)
Managing Partner
Minot Capital, LLC

Haverford College Investment Office

Mike Casel, CFA, CAIA
Chief Investment Officer

Drew Dinger, CFA, CAIA
Investment Officer

Juliana Gonzalez '20
Student Intern

Oscar Melendez '21
Student Intern