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How You Spend vs. What You Spend

DESIGNING THE RIGHT SPENDING POLICY FOR YOUR SCHOOL

The chief purpose of an endowment's spending policy is to manage the tension between current and future needs. How much of your endowment should be used for immediate needs? And what portion should be invested for the future? Setting the right spending policy is critical for a school's long-term viability. However, most schools use a methodology which threatens their ability to provide consistent funding. Schools must consider whether their spending policy is aligned with their spending needs and select a methodology that maintains stable spending throughout market cycles. This will enable your school to fulfill its missions irrespective of market movements.

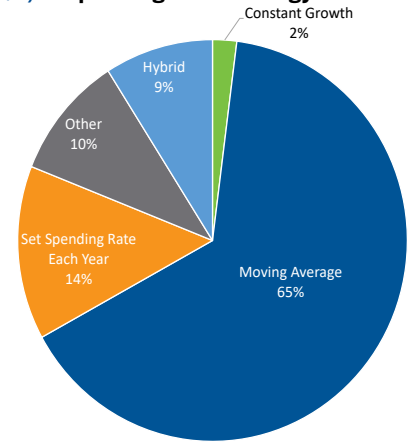
Which Spending Policy Do Most Independent Schools Use?

Most independent schools (and most nonprofits) employ the Moving Average methodology to calculate their endowment spending rate. This methodology bases spending on the average market value of the endowment over a specified time period (typically the past 3 years or trailing 12 quarters).

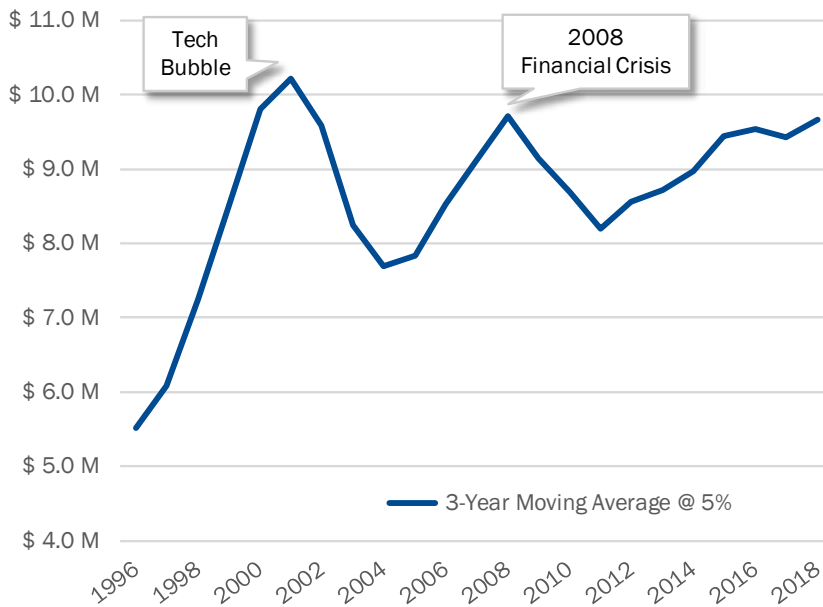
$$\text{Annual Spend} = \text{Average 3-Year Endowment Market Value} * \text{Spending Rate (\%)}$$

Using this methodology, spending will vary based on investment returns. It serves as a handbrake to reduce spending when the markets perform poorly and to increase spending after the markets have had strong returns. The perceived benefit to this approach is that in times of market stress, reduced spending can in part compensate for poor market returns and preserve the endowment for future spending needs. However, this runs contrary to a school's needs. In tough economic times, schools require more stable funding from the endowment to meet day-to-day operating expenses.

Spending Methodology



Endowment Spending



Note: Assumes \$100 million endowment, no gifts, 70/30 asset allocation using historical returns, spending at 5%.

With endowment spending levels tied to market value, the Moving Average methodology results in significant spending volatility, making it hard for schools to appropriately budget for staffing, programs and other operating needs. The chart to the left illustrates this effect on a hypothetical \$100 million school endowment. Over the past 25 years, the school's annual endowment spend would have vacillated between a low of \$5.5 million to a high of \$10.2 million. Spending would have declined by \$2.5 million following the Tech Bubble in 2001 and \$1.5 million following the 2008 Financial Crisis. After the Financial Crisis, it would have taken ten years for spending to recover to 2008 levels.

The Moving Average method does not protect the endowment from market volatility and instead exposes schools to excessive spending volatility, making it more difficult to manage the operating budget year over year. The Moving Average method also fails to provide schools with revenue diversification. During a market crisis, net tuition, annual gifts and endowment spending all decline together. With declining revenue, it is tempting to spend more from the endowment and exceed spending policy guidelines.

Which Spending Model Should Schools Use?

To minimize spending volatility and enhance revenue diversification, we advise our independent school clients to utilize the Constant Growth spending methodology. While only 2% of schools currently use this approach, we believe it is the most congruent with their needs. Endowment spending grows each year at a predetermined rate of inflation and expectations for gift flow.²

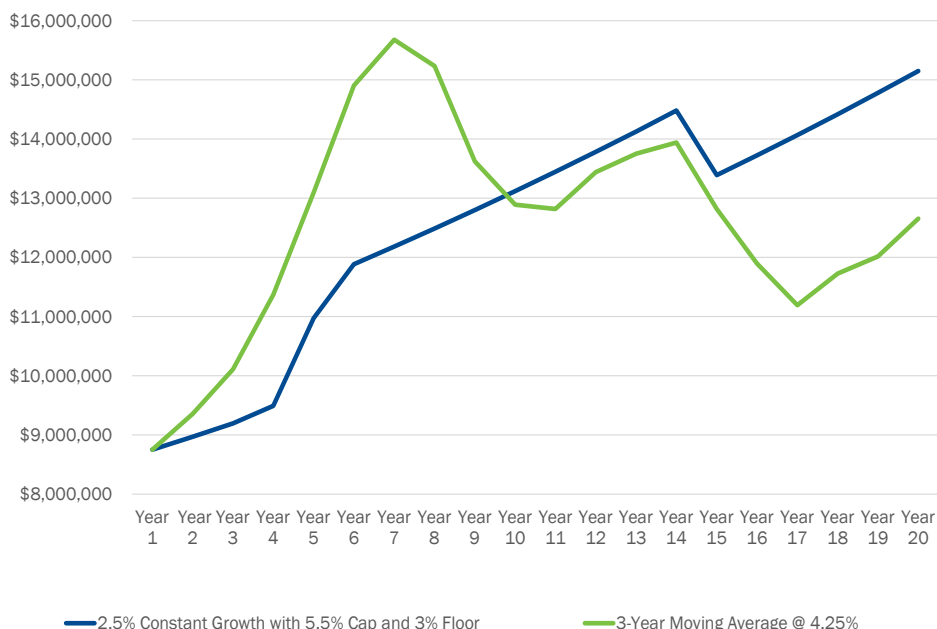
$$\text{Annual Spend} = \text{Current Endowment Spend} * [\text{Inflation Rate(\%)} + \text{Gift Growth Rate(\%)}]$$

² While there are many factors to consider when choosing the inflation rate, organizations typically use the Consumer Price Index (CPI), the Higher Education Price Index (HEPI) or a rate that is more in line with the annual increase in their operating budget.

Unlike the Percentage of Moving Average method, the Constant Growth model separates spending from normal market volatility. As a result, spending rates can be higher in times of poor market performance, when net tuition rates and gifts are under pressure, and lower in strong markets, when savings can be reinvested in the endowment and compound at a higher rate of return. The Constant Growth model also enables schools to better control spending through adjustments in the inflation factor. By lowering the inflation rate, schools can slowly reduce their spending rate over time and minimize the disruption to operations.

To prevent a disconnect between endowment spending and market value, floors and caps are often used to set an acceptable spending range. For example, a 5.5% cap means spending will not exceed 5.5% of the endowment’s market value. Similarly, a 3% floor means spending will not be less than 3% of the endowment’s market value.

Endowment Payout 20-Years



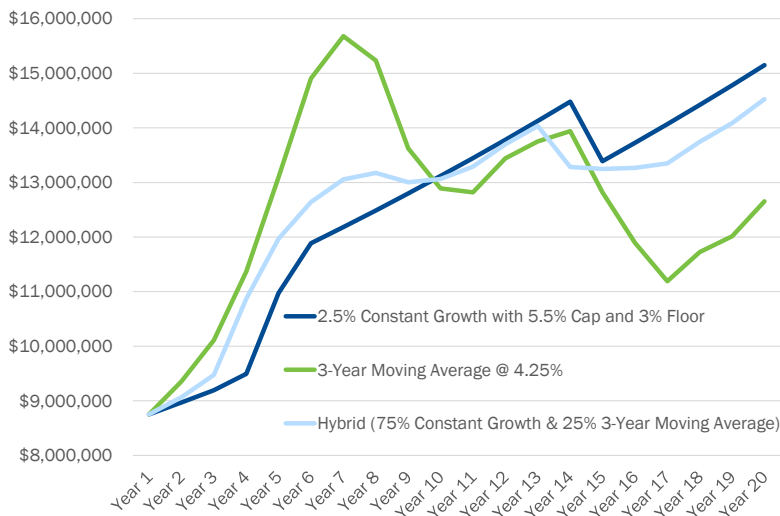
The chart above compares the spending volatility of the Constant Growth method (blue line) to the Percentage of Moving Average method (green line). Over this time frame, the Percentage of Moving Average model is much more volatile than the Constant Growth model—yet both methodologies have the same average spending rate of 4.1%. The Constant Growth methodology makes annual spending more predictable, smooths revenues and thus facilitates more consistent budgeting.

What is the Downside to the Constant Growth Model?

The most common criticism of the Constant Growth methodology is its failure to account for market value fluctuations. If the capital markets have a challenging year, the Constant Growth model allows for the previous year’s spending in dollars plus the rate of inflation to be spent. Likewise, in an environment of strong investment returns, the Constant Growth model will call for spending less than the Moving Average model would.

This criticism is actually the strength of the model. Schools often need to spend more in times of crisis and less in good economic times. Net tuition rates and annual gifts can be impacted significantly by the market cycle, making the annual endowment draw a critical source of revenue for the school. While the Constant Growth methodology is not widely used by independent schools, many of the highly endowment-dependent colleges and universities use it to calculate their spending levels.

Endowment Payout 20-Years



Is There a Middle Ground? The Hybrid Method

Some schools use a blend of the Constant Growth and Moving Average models to address the need for more market impact on endowment spending. This is referred to as the "Hybrid" methodology and used by 9% of all schools.

The Hybrid methodology leads to relatively smooth spending which has more volatility than the Constant Growth methodology, but significantly less volatility than the Moving Average methodology. The downside of the Hybrid is model is that it is more complex to implement than the other models.

$$\text{Annual Spend} = (60\% \text{ to } 80\%) * \text{Constant Growth} + (20\% \text{ to } 40\%) * \text{Moving Average}$$

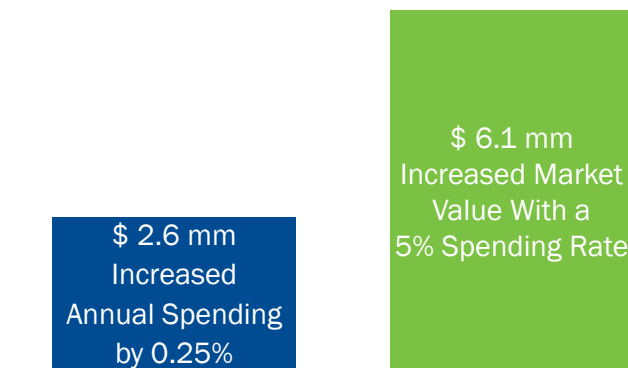
Develop a Spending Policy You Can Maintain

The Constant Growth methodology is easier to sustain year over year because spending will not decrease, which limits the probability that you will seek additional endowment funds to shore up operations. However, with the Moving Average approach, in a dramatic financial downturn, you may be required to cut spending by 15%. In this situation, institutions are far more likely to disregard the spending formula and increase spending outright. And overspending has disastrous long-term ramifications.

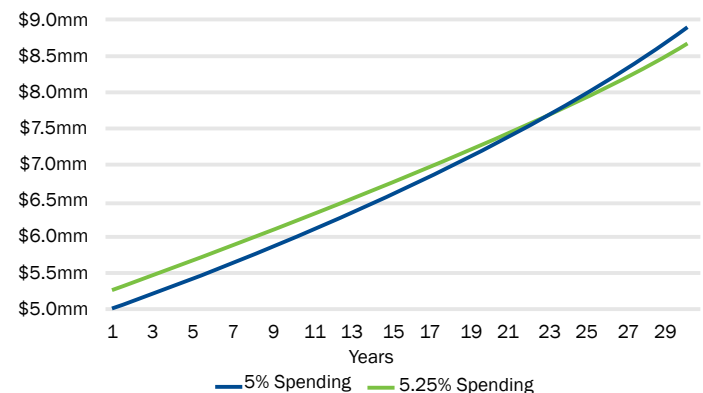
The Impact of Overspending

Increasing spending on a \$100 million endowment by \$250,000 (0.25%) may seem like the easiest way to solve an operating deficit. Indeed, over 20 years, a 5.25% spending rate produces an additional \$2.6 million of spending. However, the opportunity cost of implementing an increase in spend leads to an average portfolio value which is roughly \$6.1 million lower in market value due to compounding of investment returns. The net cost of this decision is \$3.5 million. As demonstrated in the chart below, the 5% spending policy generates more spending for the endowment after 20 years than the 5.25% spending policy. This results from the market value of the endowment with the 5% spend rate growing significantly larger due to the compounding of returns on the unspent 0.25%. For a perpetual endowment, the impact of increasing spending by 0.25% is significant.

20 Years of a 0.25% Increase in Annual Spending

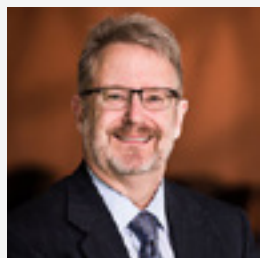


Endowment Spending



Choosing a spending methodology that meets your objectives is critical for your school's long-term health. At Hirtle Callaghan, we engage in extensive financial modeling and analysis to create a spending policy to meet your unique organizational needs. As there is no one approach that will work for all organizations, we take the time to get it right to ensure that your school will continue to thrive for generations to come.

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John is a Director and Endowment Specialist with Hirtle Callaghan.

He has over 28 years of higher education experience. From 2003 until 2014, he was the Chief Financial Officer and Treasurer of Bryn Mawr College. As the Treasurer at Bryn Mawr, he oversaw an \$850 million endowment, managed cash, issued debt and was responsible for budgeting and strategy planning. At Bryn Mawr, he assisted in modernizing and diversifying the endowment. During the latest recession, Bryn Mawr was one of only a few colleges whose debt rating was upgraded. Prior to Bryn Mawr, John spent 15 years in various financial roles at the University of New Hampshire. John started his career at Coopers & Lybrand.

He earned a Masters in Finance from Bentley University and a B.A. in Business Administration from the University of New Hampshire.

Since 1998, Hirtle Callaghan has been proudly serving families and nonprofits as their Chief Investment Officer. We design comprehensive investment programs that are diversified across a broad range of asset classes, including public and private market strategies. With approximately \$17 billion under management, we use our deep networks and purchasing power to facilitate access to world-class specialist managers and keep down costs. We always place our clients first, avoiding conflicts so every decision is in your best interest.



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