



SWIB Update

David Stein, Board of Trustees Chairman

Edwin Denson, Executive Director/Chief Investment Officer

May 17, 2021

Agenda

- Introductions
- Governance
- Performance
- Cost Effectiveness
- Asset Allocation & Peer Performance Comparison
- Market Outlook
- Questions

David Stein

SWIB Board of Trustees Chair

- Appointed to SWIB's Board of Trustees in 2014
- Appointed chairman in 2016
- Executive vice president and head of consumer and business banking for Associated Bank
- Over 34 years of financial and leadership experience



Governance

9 Member Independent Board of Trustees

- Fiduciary duty requires Board to act solely in the best interest of the funds under management
- Approve asset allocation, performance benchmarks, investment policy, and incentive compensation
- Monitor investment performance and provide oversight on management's execution of investment strategies and projects
- Delegate specific investment decisions to the professionals at SWIB
- Appoint the Executive Director/CIO and Internal Audit Director

ED/CIO Search

- Board engaged in succession planning for many years
- Evaluated the deep talented bench of senior leadership team throughout 2020
- Trustees were immersed in a two-month long search meeting about 10 times in the process
- Selecting an internal candidate allowed to us take advantage of continued momentum, build on ongoing success, support the current culture, and continue key strategic priorities

David Villa's Legacy: Building a Strong Team



Edwin Denson
Executive Director/
Chief Investment Officer



Management Council



Rochelle Klaskin
Deputy Executive Director/
Chief Administrative Officer



Mike Jacobs
Agency Business Director



Brian Hellmer
Global Public Market Strategies
Chief Investment Officer



Anne-Marie Fink
Private Markets & Funds Alpha
Chief Investment Officer

Edwin Denson

Executive Director/Chief Investment Officer

- Joined SWIB in 2018 as managing director of asset and risk allocation (ARA)
- More than doubled the ARA staff to build out innovative investment strategies for the WRS
- Over 27 years of asset management experience

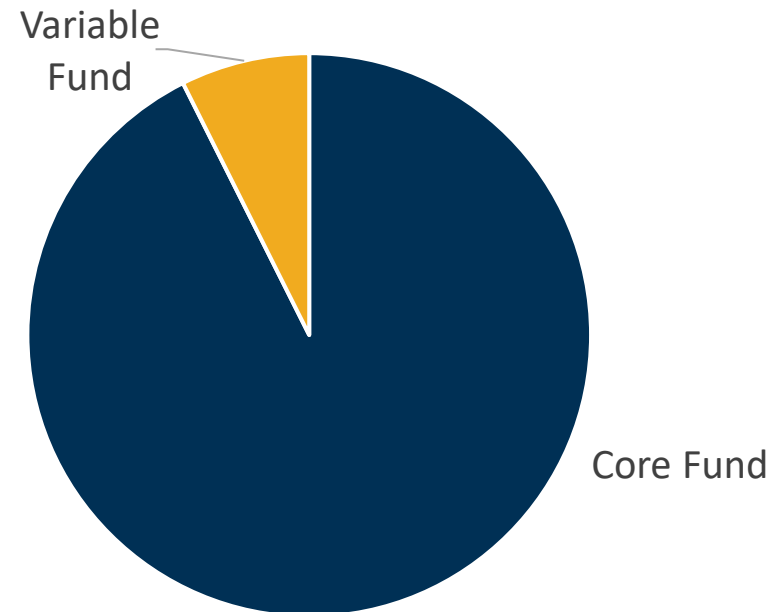


Performance

WRS Assets Under Management (AUM)

As of Dec. 31, 2020

Fund	12/31/2020 AUM (in millions)
Total WRS	\$129.8
Core Fund	\$120.2
Variable Fund	\$9.6



AUM is the gross market value of assets that an investment company or financial institution manages on behalf of investors.

2020 Investment Returns

As of Dec. 31, 2020

SWIB's investment management has added more than **\$1.9 billion** above benchmark returns over the last five years to the WRS.

Core Fund	1-Year	5-Year	10-Year	20-Year	30-Year
Performance	15.21%	10.74%	8.51%	6.94%	8.83%
Benchmark	14.15%	10.27%	8.10%	6.62%	8.51%
	1.06%	0.47%	0.41%	0.32%	0.32%
Variable Fund					
Performance	17.51%	13.65%	11.35%	7.08%	9.78%
Benchmark	17.90%	13.62%	11.22%	6.94%	9.61%
	(0.39%)	0.03%	0.13%	0.14%	0.17%

One-year returns are net of all fees. Five-, 10-, 20-, and 30-year returns are net of external manager fees. Thirty-year benchmark returns are presented gross of fees.

2021 Q1 Year-to-Date Performance

As of March 31, 2021

Core Fund

Performance: 2.77%

Benchmark: 2.73%

0.04%

Variable Fund

Performance: 5.45%

Benchmark: 5.52%

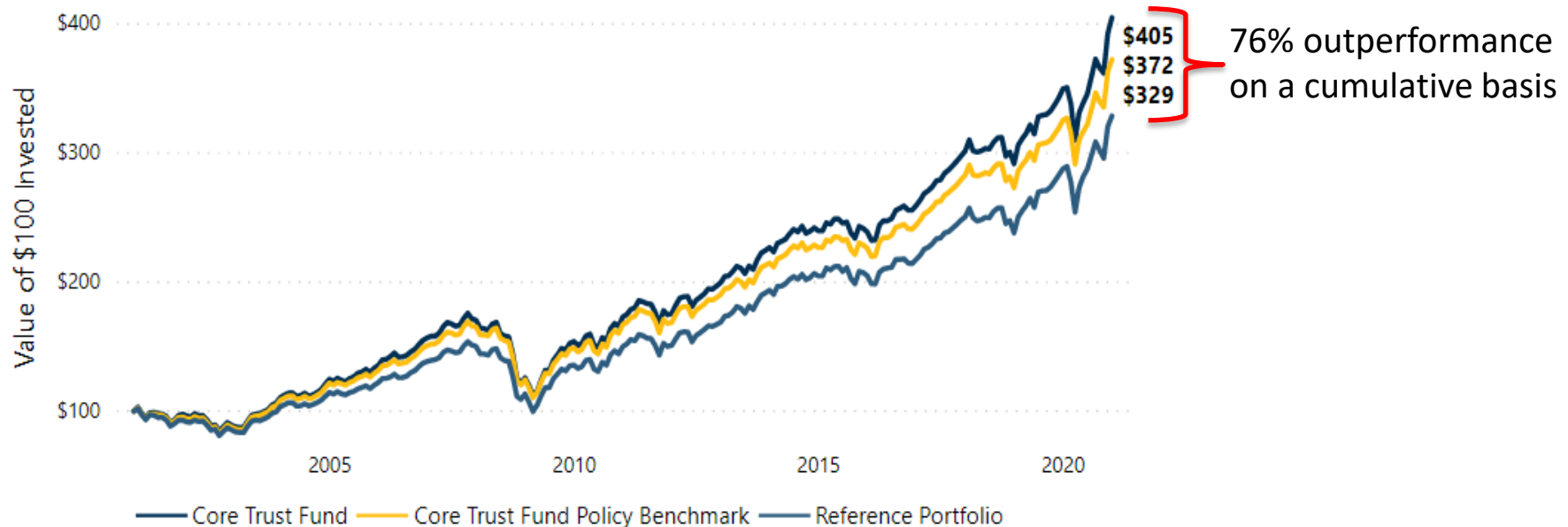
(0.07%)

Returns are net of all fees. Benchmark returns are subject to final valuation and adjustments that may occur during the calendar year.

CTF Performance vs. 60/40 Reference Portfolio*

January 2001 to December 2020

Benefit of SWIB's Asset Allocation & Active Management Over Time



\$34.4bn total

Reference Portfolio Ending Value	Additional Policy Portfolio Return Above Reference*	Additional Active Portfolio Return	CTF Ending Value**
\$85.7bn	+\$20.9bn	+\$13.5bn	=\$120.2bn

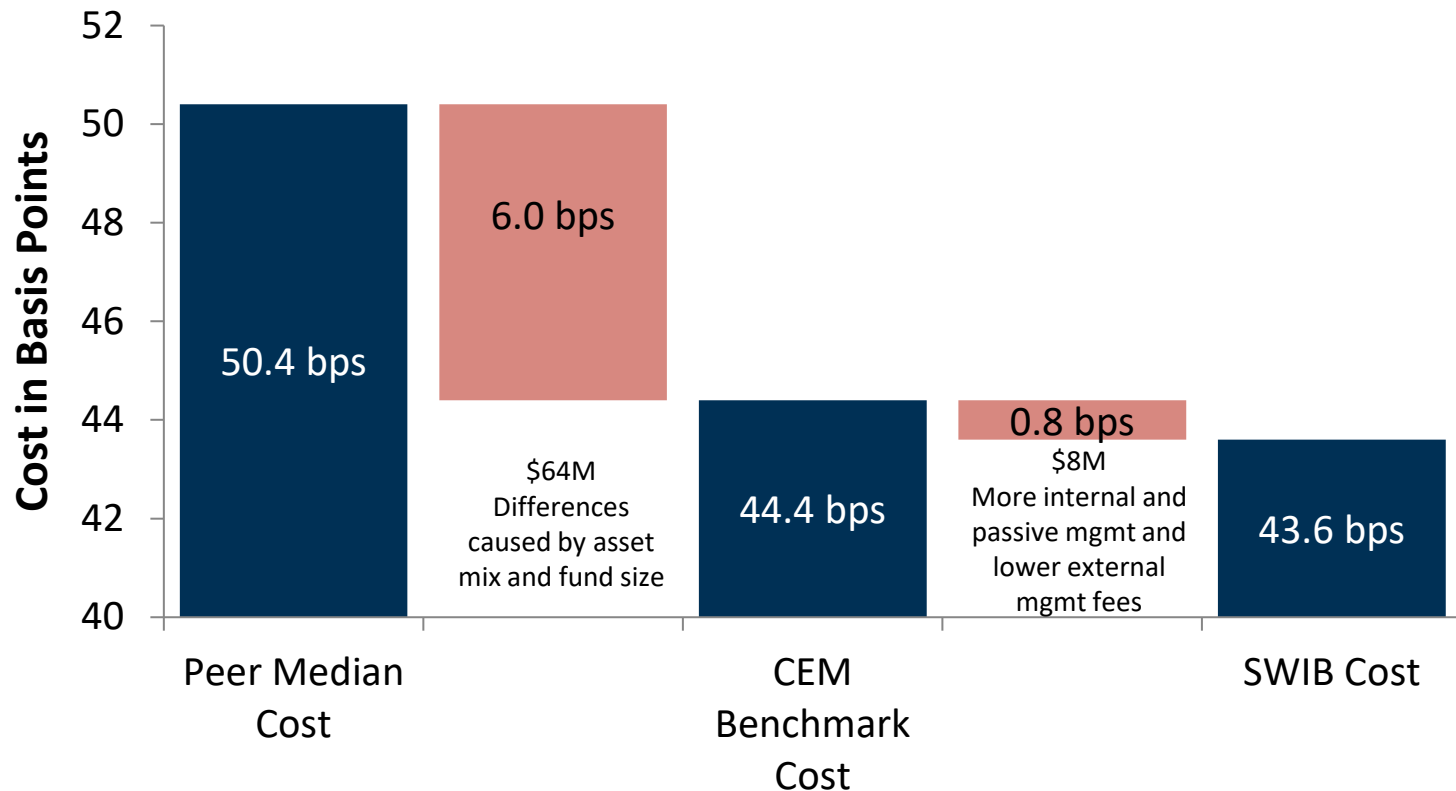
*The reference portfolio is 60% MSCI World and 40% Bloomberg Barclays Gov't/Credit (domestic)(rebalanced monthly). Core Trust Fund outperformance is calculated using gross returns.

**CTF beginning market value, as of January 1, 2001, was \$54.8 billion.

Cost Effectiveness

SWIB Saved Approximately \$72 Million In 2019

*SWIB's costs are 13.5% lower than its peers in 2019
Over the last 10 years, SWIB has saved \$1.3 billion compared to peers**

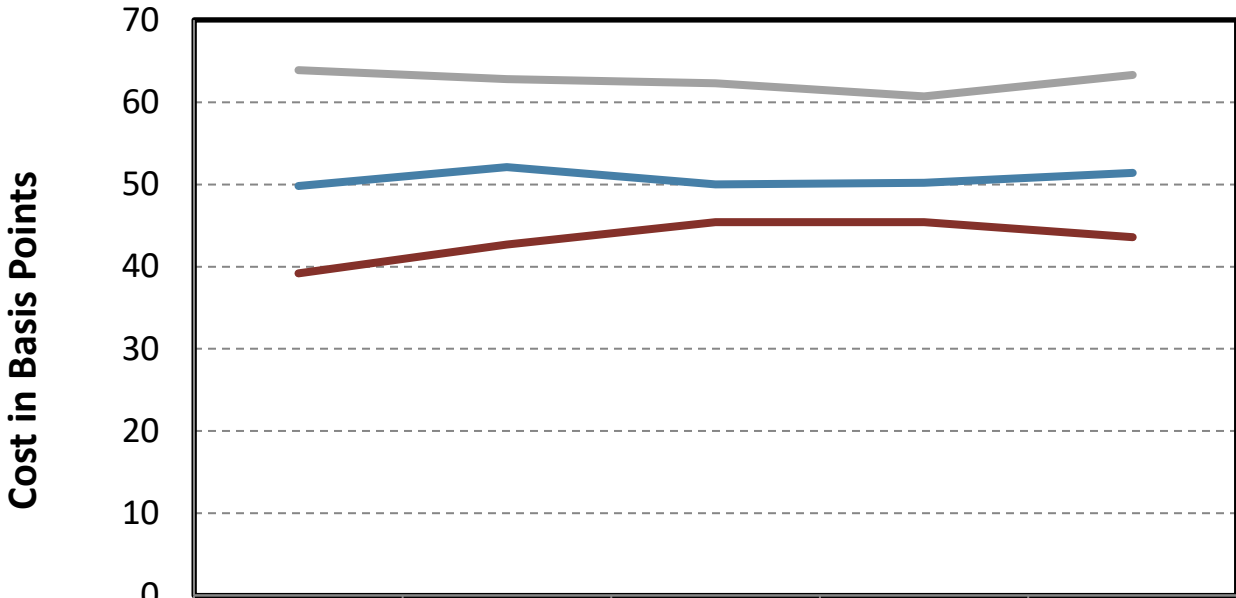


*This analysis compares SWIB's savings vs. the peer group median costs for every \$100 under management and multiplies that average savings by SWIB's median assets under management.

Data source: CEM Benchmarking, Inc. 2019 Report

SWIB's Internal Management Provides a Cost Advantage Over Peers

SWIB's total costs have remained materially lower than peers due in part to levels of internal management.



	2015	2016	2017	2018	2019
— SWIB	39.2	42.7	45.4	45.4	43.6
— Peer Average	49.8	52.1	50	50.2	51.4
— US Public Avg	63.9	62.8	62.3	60.7	63.3

Internal Management Benefits the WRS

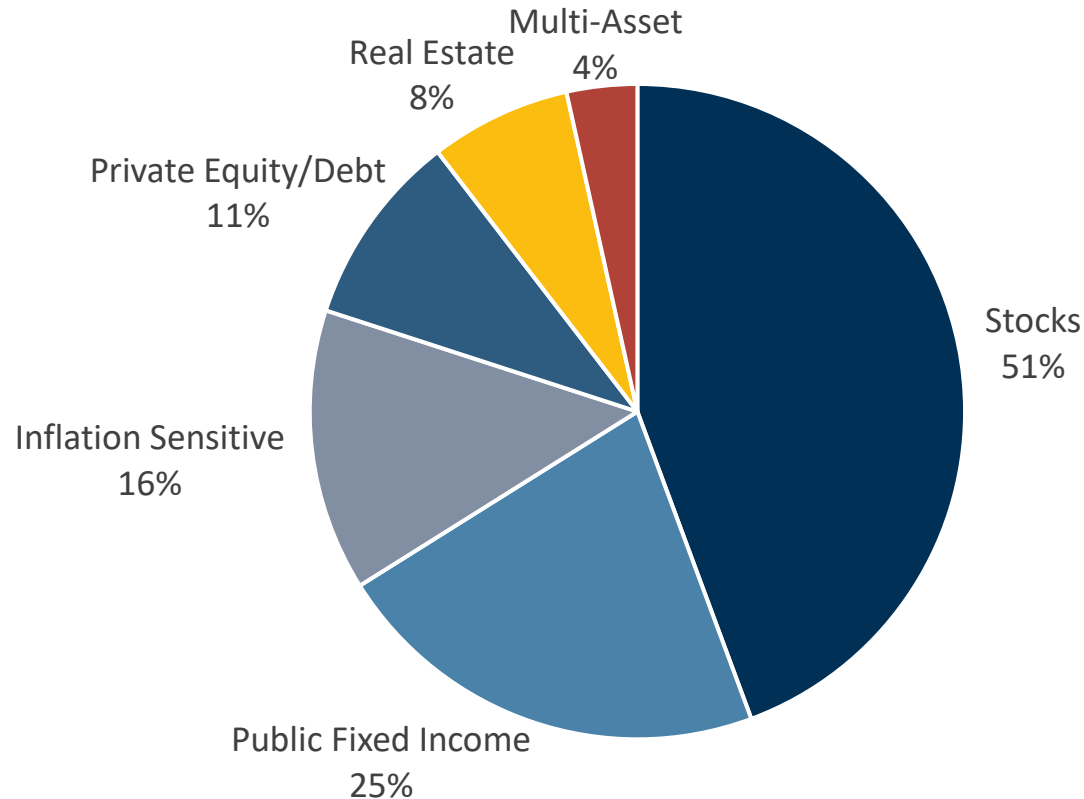
Average peer cost for external asset management is multiples higher than SWIB's internal management costs for the same asset classes.

Portfolio	Average External Manager Costs Over SWIB Internal Management
Active Management	
Global Large Cap Equity	2.1x
U.S. Small Cap Equity	4.0x
U.S. Fixed Income	1.5x
Passive Management	
U.S. Large Cap Equity	2.0x
International (EAFE) Equity	2.4x
Fixed Income – Inflation Indexed	2.0x

Data source: CEM Benchmarking, Inc.

Asset Allocation & Peer Performance Comparison

Core Trust Fund Asset Allocation Targets

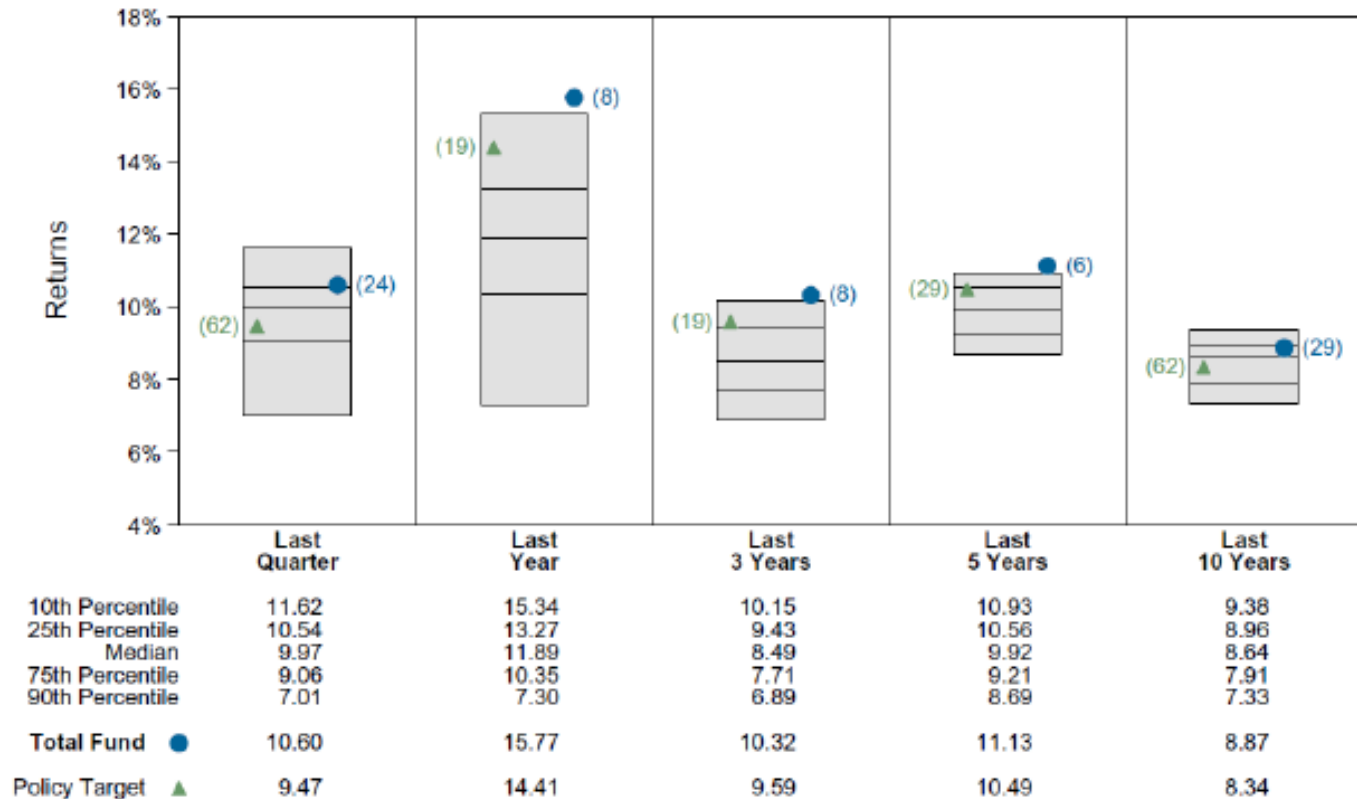


Totals exceed 100% due to SWIB's overall leverage of Core Fund assets. SWIB's actual asset allocation may vary from the targets listed within range limits approved by the Board of Trustees.

Total Fund Ranking-Unadjusted Ranking

Gross of Fees as of Dec. 31, 2020

Callan Public Fund Spons- V Lg DB (>10B)



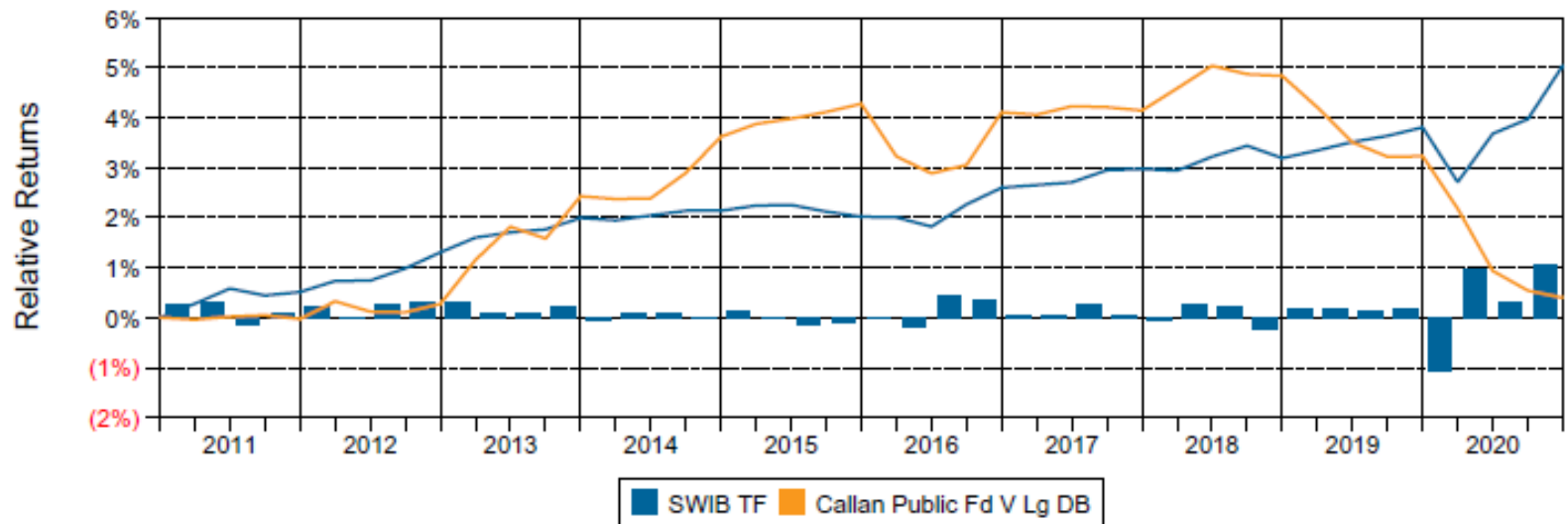
- Total fund unadjusted rankings are in the top quartile of peers for Q4, the top decile of peers for the 1-, 3-, and 5-year periods, and the top half of peers for the 10-year period.
- Recent market volatility benefitted SWIB's risk-balance approach vs. peers.

Source: Callan Investment Measurement Service Quarterly Review, December 2020

10-Year Return Consistency vs. Target

2011 to 2020 (Gross, 12/31/20)

Cumulative and Quarterly Relative Return vs Target



SWIB's risk control and consistency led to a relatively smooth ride over the last 10 years.

Market Outlook

SWIB Competitive Advantages

- The scale of the asset base helps reduce the return impact of costs necessary to execute active management and allows us to diversify effectively into all major asset classes.
- The stability of our capital and long-term investment horizon allow us to take advantage of market dislocations that other investors struggle with due to short-term focus.
- Our mission helps us recruit and retain talented people.

Low Return Environment Magnifies Value of Excess Returns

- Interest rates remain near all-time lows, creating low expected bond returns and challenges to investors for all asset classes
- With absolute returns under pressure, the value of producing additional return via active management is magnified.
- Internal active management is typically more cost effective, but requires investments in people and platforms.

Current Market Environment

- Vaccination progress has led to significant optimism about the economy, further extending the initial recovery in U.S. stocks after initial COVID-19 related declines. Current price levels incorporate optimism about the next 12 months, which create some risks.
- U.S. stock performance has been much better than international stocks – it appears likely that this may be an opportunity for investors as we see the pace of vaccinations pick up internationally.
- Inflation remains under control for now, as government policy moves that would normally generate concern are outweighed by ongoing deflationary forces. This will likely change as demand picks up over the summer – the big debate is how long it will last.
- Absolute yields have been increasing in the bond market.