FY2020 Q4 Investment Reports

BACKGROUND

The Oregon State University (university) investment reports for the fourth quarter (Q4, April 1 – June 30, 2020) of fiscal year (FY) 2020 are presented in the following four sections:

- **FY2020 Q4 Public University Fund Investment Report** – This section includes a report on the investments of the Public University Fund (PUF) for the fourth quarter of FY2020. The PUF is an investment pool that is administered by the university on behalf of all Oregon public university participants, pursuant to legislation adopted by the 2014 Legislature. The PUF holds assets of the following participating Oregon public universities: Eastern Oregon University, Oregon Institute of Technology, Oregon State University, Portland State University, Southern Oregon University, and Western Oregon University.

- **FY2020 Q4 Oregon State University Investment Report** – This section includes a report on the investments of the operating and endowment assets of the university. This report reflects the university's operating assets that are invested in the PUF, the university's endowment and quasi-endowment investments managed by the Oregon State University Foundation, the land held as separately invested endowments, and the land grant endowment that is invested in the PUF.

- **FY2020 Q4 Oregon State University Report on Unspent General Revenue Bond Proceeds –** This section provides a summary of unspent revenue bond proceeds as of June 30, 2020.

- **FY2020 Q4 Market Background** – This section provides a general discussion of the investment markets and related performance information during the fourth quarter of FY2020.

FY2020 Q4 PUBLIC UNIVERSITY FUND INVESTMENT REPORT

(Prepared by the Public University Fund Administrator)

Performance

The PUF gained 1.1% for the quarter and 4.2% for the fiscal year through June 30, 2020. The PUF's three-year and five-year average returns were 3.3% and 2.7%, respectively.

The Oregon Short-Term Fund (OSTF) returned 0.4% for the quarter and 1.6% for the fiscal year, outperforming its benchmark by 40 basis points for the quarter and in line for the fiscal year. The Core Bond Fund returned 1.9% for the quarter and 6.5% for the fiscal year, underperforming its benchmark for the quarter and fiscal year by 30 and 50 basis points, respectively. The investment yield on the PUF portfolio was 3.1% for the fiscal year.

In July, Oregon State Treasury fixed income investment officers, Will Hampson and John Lutkehaus, conducted a quarterly performance review with university staff. The pandemic induced economic shutdown drove the U.S. economy into its first recession in more than a decade, as GDP fell by an annualized 5% during the first calendar quarter of the year, while the unemployment rate registered 11.1% in June. Despite the economic malaise, high-quality fixed income sectors performed well during the quarter, particularly driven by the Fed's backstop for corporate notes and mortgage-backed securities, propelling the Bloomberg Barclay's U.S. Aggregate Bond Index higher by 2.9% during the quarter.

The Core Bond Fund's 30 basis point benchmark underperformance was primarily due to a higher than normal cash position to meet the Administrator's request to raise $126.7M during the quarter. The proceeds were invested in the Oregon Short-Term Fund to provide an ample liquidity cushion for university participants during fiscal year 2021. The sales generated $6.1 million in realized gains and will be distributed proportionally to university participants through the quarterly earnings distribution, aiding university participant's cash flow management during a challenging financial environment.

Despite the temporary, yet significant, liquidity challenges across the fixed income markets during the fiscal year, the PUF's focus on high-quality and short-to-intermediate duration securities resulted in a respectable 4.2% total return on invested assets during fiscal year 2020.

Public University Fund Performance

	Quarter Ended 06-30-20	**Current Fiscal YTD**	**Prior Fiscal YTD**	**3-Year Avg.**	**5-Year Avg.**	**Market Value**	**Asset Allocation**	**Policy**
Oregon Short–Term Fund	0.4%	1.6%	2.6%	2.2%	1.6%	$388,802,696	66.9%	$100 million target [1]
Benchmark - 91-day T-Bill	*0.0%*	*1.6%*	*2.3%*	*1.8%*	*1.2%*			
PUF Core Bond Fund	1.9%	6.5%	6.3%	4.1%	N/A	$192,395,981	33.1%	
Blended Benchmark [2]	2.2%	7.0%	6.7%	*4.3%*	*3.6%*			
PUF Total Return	*1.1%*	*4.2%*	*5.0%*	3.3%	2.7%	$581,198,677	**100.0%**	
PUF Investment Yield	*1.0%*	*3.1%*	*2.7%*	*2.7%*	*2.7%*			

[1] The PUF policy guidelines define investment allocation targets based upon total participant dollars committed. Core balances in excess of liquidity requirements for the participants are available for investment in the Core Bond Fund. Maximum core investment allocations are determined based upon anticipated average cash balances for all participants during the fiscal year.

[2] The Blended Benchmark comprises the Bloomberg Barclay's Aggregate 3-5 Years Index (75%) and the Bloomberg Barclay's Aggregate 5-7 Years Index (25%).

A description of each investment pool's portfolio characteristics and market exposures is included in Attachment 1 of this report.

Investment Income and Participant Ownership

During the quarter, investment earnings distributed to the participants totaled $6,240,943.

	Earnings Distribution [1]	Market Value as of 06/30/20	% Ownership
Oregon State University [2]	$ 2,523,276	$ 258,880,838	44.5%
Portland State University	2,408,736	218,162,514	37.5%
Western Oregon University	428,212	35,455,777	6.1%
Oregon Institute of Technology	343,225	25,335,509	4.4%
Eastern Oregon University	281,024	24,500,231	4.2%
Southern Oregon University	256,470	18,863,808	3.3%
Grand Total	$ 6,240,943	$ 581,198,677	100.0%

[1] The earnings available for distribution to participants were earned during the months of March 2020 through May 2020 and distributed to participants in June 2020. Earnings are distributed to participants based upon average cash and investment balances on deposit during the same period, which differs from the total market value at the end of the quarter.

[2] As of June 30, 2020, Oregon State University's total PUF market value consisted of operating assets, valued at $258,547,656, and the land grant endowment, valued at $333,182.

FY2020 Q4 OREGON STATE UNIVERSITY INVESTMENT REPORT

The schedule of Oregon State University's investments is shown in the following investment summary.

Public University Fund Performance

Oregon State University's operating assets and the land grant endowment are invested in the Public University Fund (PUF). The report on the investment performance of the PUF, provided in the separate section above, shows the PUF gained 1.1% for the fourth fiscal quarter and 4.2% for the fiscal year.

OSU Endowment Asset Performance

The OSU Endowment Assets, including those managed by the OSU Foundation, increased 10.8% for the quarter and 2.2% for the fiscal year. The three-year average return was 6.6%. The total market value of the OSU endowment assets as of June 30, 2020, was $53,663,592.

The OSU Foundation, pursuant to an investment management contract, is managing the majority of the university's endowment assets. The OSU Foundation's Endowment Pool increased 11.5% and 1.6% for the quarter and fiscal year, underperforming its benchmark by 440 and 120 basis points, respectively. The three-year average return was 5.9%, underperforming its benchmark by 30 basis points.

Oregon State University

Investment Summary

as of June 30, 2020

(Net of Fees)

	Quarter Ended 6/30/2020	Current Fiscal YTD	Prior Fiscal YTD	3 Yr Avg	5 Yr Avg	10 Yr Avg	Market Value	Actual Asset Allocation	Policy Allocation Range
OSU Operating Assets									
Assets Invested in the Public University Fund									
Oregon Short - Term Fund	0.4%	1.6%	2.6%	2.2%	1.6%	1.1%	$ 172,959,832	66.9%	[1]
Benchmark - 91 day T-Bill	0.0%	1.6%	2.3%	1.8%	1.2%	0.6%			
PUF Core Bond Fund	1.9%	6.5%	6.3%	4.1%	N/A	N/A	85,587,824	33.1%	[1]
Blended Benchmark [2]	2.2%	7.0%	6.7%	4.3%	3.6%	N/A			
Public University Fund Total Return	1.1%	4.2%	5.0%	3.3%	2.7%		258,547,656	100.0%	
Public University Fund Investment Yield	1.0%	3.1%	2.7%	2.7%	2.2%				
OSU Unspent Bond Proceeds									
Oregon Short - Term Fund	0.4%	1.6%	0.4%				123,583,684		
Benchmark - 91 day T-Bill	0.0%	1.6%	0.4%						
OSU Other Cash[4]							4,429,978		
Total Operating Assets							$ 386,561,318		
OSU Endowment Assets									
OSU Endowment Assets Invested in the OSUF Endowment Pool									
Total Global Equity	20.9%	4.3%	6.0%				$ 25,000,623	53.8%	50.0%
Benchmark - MSCI All Country World Index	19.2%	2.1%	5.7%						
Total Global Fixed Income	6.9%	-0.4%	6.4%				2,947,266	6.3%	5.0%
Benchmark - Bloomberg Barclays Global Agg. Bond Index	3.3%	4.2%	5.8%						
Total Absolute Return	9.8%	4.4%	-2.1%				4,871,821	10.5%	10.0%
Benchmark - HFRI Fund of Funds Index	7.5%	0.1%	1.4%						
Total Real Assets	-0.4%	-15.5%	1.2%				3,551,594	7.6%	10.0%
Benchmark - Real Assets Custom [3]	6.6%	-7.7%	2.2%						
Total Private Capital	-2.7%	7.4%	21.9%				7,447,192	16.1%	25.0%
Benchmark - No benchmark provided									
Total Cash	0.0%	0.0%	0.0%				2,668,345	5.7%	0.0%
Total OSU Endowment Assets Invested in OSUF Endow. Pool [5]	11.5%	1.6%	5.9%	5.6%			46,486,841	100.0%	100.0%
Benchmark-80% MSCI ACWI/20% BBG Barclays Global Agg.[6]	15.9%	2.8%	6.0%	5.9%					
Other OSU Endowment Assets									
Land Held as Separately Invested Endowment Funds[7]	6.5%	6.5%	-1.9%	14.9%			6,843,569		
Other Endowment Assets Invested in the PUF	1.1%	4.2%	5.0%	3.4%			333,182		
Total Other OSU Endowment Assets							7,176,751		
Total OSU Endowment Assets	10.8%	2.2%	4.8%	6.6%			$ 53,663,592		

(continued on next page)

Oregon State University

Investment Summary

as of June 30, 2020

1 The Public University Fund (PUF) policy guidelines define investment allocation targets based upon total participant dollars committed. Core balances in excess of liquidity requirements for the participants are available for investment in the Core Bond Fund. Maximum core investment allocations are determined based upon anticipated average cash balances for all participants during the fiscal year.

2 Blended Benchmark Composition: 75% Bloomberg Barclay's Aggregate 3-5 Years Index, 25% Bloomberg Barclay's Aggregate 5-7 Years Index.

3 Real Assets Custom Benchmark: 1/3 Financial Times Stock Exchange European Public Real Estate Association/National Association Real Estate Investment Trust Developed Index, 1/3 Bloomberg Commodity Index, 1/3 Bloomberg Barclays U.S. Treasury Inflation Protected Securities.

4 OSU Other Cash includes account balances held at JP Morgan Chase and US Bank for operations.

5 Investment returns are reported net of investment manager fees; gross of the Foundation's administrative fees.

6 The Endowed Pool benchmark consists of 80% of the MSCI ACWI and 20% of the Barclays Global Aggregate. During the portfolio transition period (July 2016), as agreed with OSUF, the benchmark return was equal to the actual return of the portfolio. Prior to 7/1/16, the benchmark consisted of 15% S&P 500 / 4% Russell 1000 Growth / 17% MSCI EAFE / 6% MSCI Emerging Markets / 6.5% Barclays Aggregate / 6.5% Citi WGBI / 3% Principal Diversified Real Assets Custom Blend / 18% HFRI Fund of Funds Composite Index / 3% S&P North American Natural Resources Sector Index / 3% Alerian MLP Index / 5% NCREIF Townsend Blended Index / 10% Burgiss Global Private Equity Index / 2% 91 Day T-Bills / 1% Mercer Illiquid Natural Resources Index.

7 Physical appraisals completed every five years. Valuations in interim years provided by faculty. Investment returns updated annually during the fiscal fourth quarter. Land held as separately invested endowments may not be sold, with the exception of the Matteson property, beginning 2/25/2035. Land use is restricted to teaching and research. Partial harvests, consistent with good forestry management practices are allowed, with specified uses for ongoing funding for scholarships and an endowed chair.

Note: Outlined returns underperformed their benchmark.

FY2020 Q4 REPORT ON UNSPENT GENERAL REVENUE BOND PROCEEDS

The schedule of the university's unspent revenue bond proceeds as of June 30, 2020, is shown in the summary below.

Unspent Revenue Bond Proceeds

Issuance Year	**2015** [1]	**2016** [2]	**2017** [3,4]	**2019** [4]	**Total**
Unspent Revenue Bond Proceeds	$480,143	$1,840,237	$55,178,416	$93,840,580	$151,339,376
Allocated [5]	$480,143	$1,840,237	$55,178,416	$64,177,408	$121,676,204
Unallocated [6]	$ -	$ -	$ -	$29,663,172	$ 29,663,172

[1] Space Improvement Projects are forecasted to be fully expended in FY2021.

[2] Primarily taxable funds allocated to IT Systems Infrastructure project (Link Oregon).

[3] Proceeds use approved June 2017.

[4] Balance represents unspent 2017 and 2019 revenue bond proceeds as of June 30, 2020, including $25,435,312 of proceeds invested in the PUF.

[5] Allocated proceeds are proceeds committed to specific projects that have Stage Gate 2 approval by the Board.

[6] Unallocated proceeds have not yet been committed to specific capital projects approved by the Board.

FY2020 Q4 MARKET BACKGROUND

(Prepared by Callan Associates, consultants to the Oregon Investment Council)

Macroeconomic Environment

Main Street vs. Wall Street

The S&P 500 Index notched its best quarter since 1998 with a 20.5% return, nearly erasing its first calendar quarter loss. Developed and emerging market equity indices posted returns approaching 20%. High yield bond and emerging market debt markets were up over 10%. Oil prices doubled, closing at roughly $40 a barrel (West Texas Intermediate). However, calendar year-to-date returns across these market segments remain negative, and some in red double-digits. The Russell 1000 Growth Index, up nearly 10% calendar year to date due to its heavy weight in highflying technology stocks, is a lone exception.

While Wall Street was in celebration mode, much of Main Street continued to suffer. Against the backdrop of stellar asset price performance, rising cases of the COVID-19 virus in the U.S. tempered optimism going into quarter-end. Some cities have reversed their re-openings as new cases have mounted. While certain economic data have surprised on the upside (from very depressed levels), much uncertainty remains. "The path forward for the economy is extraordinarily uncertain and will depend in large part on our success in containing the virus," said Fed Chair Jerome Powell at a recent meeting. "A full recovery is unlikely until people are confident that it is safe to reengage in a broad range of activities."

Officially, the U.S. economy entered a recession in February 2020, according to the National Bureau of Economic Research. Some estimate that we emerged in May, which would make this the shortest recession ever. A number of promising statistics point to a rebound—but it should be noted that they have yet to recoup the losses incurred in March/April. Retail sales grew a record 18% (-6% calendar year-over-year) in May. Durable goods orders also delivered on the upside; up 16% in May (-18% calendar year-over-year). And housing received a boost from relatively low mortgage rates. Pending home sales were up 44% in May but remain down 5% calendar year-over-year. Personal spending rose 8% in May, a monthly record, but is down 9% calendar year-over-year. Further, certain segments of the economy have not participated in this recovery and are likely to be impacted for some time. Hotels, restaurants, airlines, and many small businesses have been among the hardest hit.

Not all the economic data have been good. While roughly 5 million jobs returned in May and June, 19 million were lost in April. Unemployment (11.1% in June) remains elevated, and while jobless claims have decelerated, they continue to hover around 1.5 million per week, with those receiving state benefits at roughly 18 million.

Further evidence of the ongoing stress is reflected in downgrades and defaults. According to data from J.P. Morgan, defaults across bonds and loans totaled $100 billion thus far in calendar 2020, the most since the entire year of 2009, and defaults in U.S. high yield bonds reached a 10-year high of 6.2%. As for equities, a recent Wall Street Journal article noted that “more than 40% of the companies in the S&P 500 have pulled their guidance as the coronavirus pandemic has doused U.S. corporations in uncertainty.”

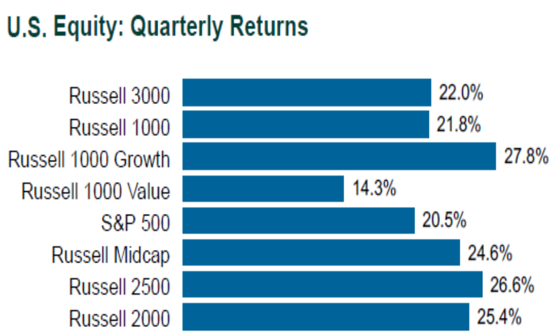
First calendar quarter GDP contracted 5.0%, but the second calendar quarter is expected to be far worse, with estimates spanning a wide range (-30% to -40% annualized) and changing by the day. For 2020, the median expectation from the Fed is for a decline of 6.5%, but the range among Federal Open Market Committee members is -10.0% to -4.2%. Fed forecasts for 2021 are similarly disparate, with a median 5.0% gain and a range of -1.0% to 7.0%.

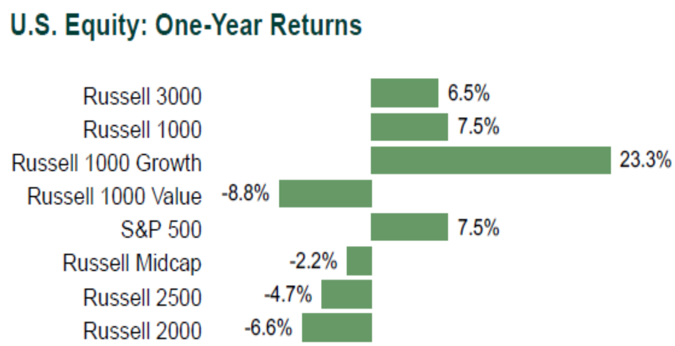
A tsunami of central bank support and fiscal stimulus fueled confidence and pumped liquidity into the markets. The Fed not only left rates at close to 0%, but it also announced that it would likely leave them there until at least calendar 2022. Fiscal stimulus in a multitude of flavors approaches $3 trillion, nearly 14% of Gross Domestic Product (GDP), and globally the figure is a stunning $8 trillion, or 9% of global GDP, according to Natixis Portfolio Research and Consulting Group and the International Monetary Fund. While some of these programs have been controversial, collectively they have been incredibly effective in restoring liquidity and confidence. In some cases, a mere announcement had a significant impact on markets before the program was implemented.

Overseas, a similar story unfolded. Central bank support and rate cuts have bolstered confidence and liquidity; some economic indicators seem to indicate the worst is over. However, it is worth noting that virus-related statistics are far more favorable in Europe and Asia than in the U.S. And emerging markets have not seen their “virus curves” flatten, especially in Latin America, India, and Russia. Far from rosy, the Organization for Economic Co-operation and Development recently released its global calendar 2020 real GDP forecast: -6.0%—and this assumes no “second wave” for the virus.

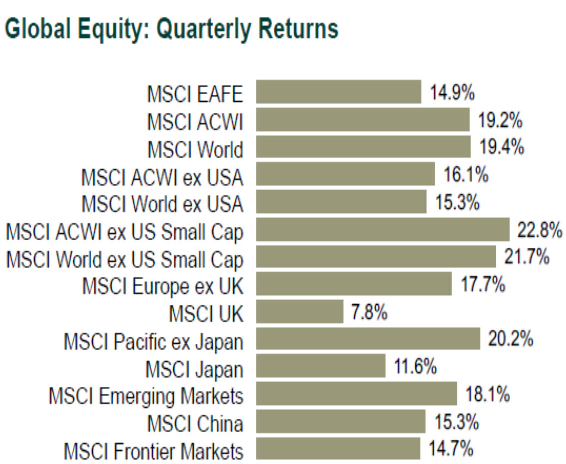
Equity Markets

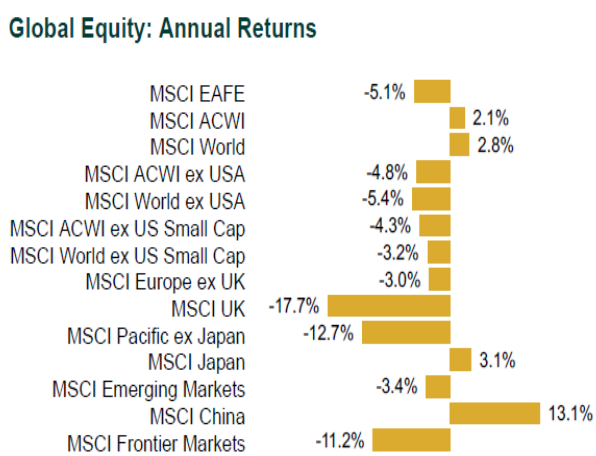
U.S. stock markets posted double-digit returns in the second calendar quarter, with some segments erasing all of the first calendar quarter's sharp losses. Growth, benefiting from its 44% exposure to Technology, sharply outperformed value (Russell 1000 Growth: +27.8%; Russell 1000 Value: +14.3%) and the spread is even larger on a calendar year-to-date basis (Russell 1000 Growth: +9.8%; Russell 1000 Value: -16.3%). Small caps outperformed large (Russell Microcap +38.8%; Russell 2000: +25.4%; Russell 1000: +21.8%). Within the S&P 500 (+20.5%), several sectors posted returns over 30% (Energy, Consumer Discretionary, Technology) while Utilities (+2.7%) fared the worst. It is worth nothing that the "FAAMG" (Facebook, Amazon, Apple Microsoft, Google) stocks accounted for nearly 30% of the return for the S&P 500; collectively the group was up 35% for the quarter.





Outside of the U.S., double-digit returns were broad-based across developed and emerging markets (Morgan Stanley Capital International (MSCI) All Countries World Index ex-USA: +16.1%; MSCI Emerging Markets: +18.1%) but both remain down roughly 10% over the six-month period. As in the U.S., growth outperformed value.

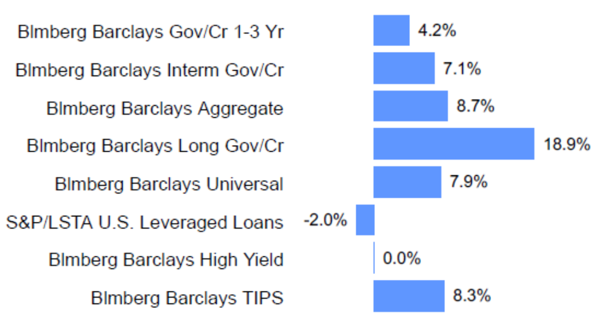




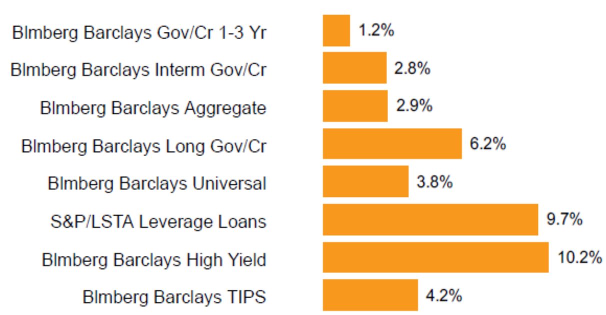
Fixed Income Markets

U.S. Treasury yields were range-bound in the second calendar quarter; the 10-year U.S. Treasury yield closed the quarter at 0.66%; down 4 bps from March 31 and down sharply from the calendar year-end level of 1.92%. As a result, the Bloomberg Barclays U.S. Treasury Index was up a modest 0.5% for the quarter. Other sectors recovered from sharp underperformance in the first calendar quarter as investor confidence improved. For the quarter, the Bloomberg Barclays U.S. Aggregate Bond Index gained 2.9%, with non-Treasury sectors faring the best. This is a stark contrast to the first calendar quarter, when U.S. Treasuries were virtually the lone sector to post a positive return. The Bloomberg Barclays U.S. Corporate Bond Index rose 9.0% in the second calendar quarter but has underperformed like-duration U.S. Treasuries by 540 bps calendar year-to-date. The Bloomberg Barclays High Yield Bond Index posted a double-digit return (+10.2%) in calendar Q2 but remains down 3.8% calendar year-to-date.

U.S. Fixed Income: Annual Returns



U.S. Fixed Income: Quarterly Returns



Rates were lower overseas, fueled by rate cuts across a broad swath of countries and strong performance from corporates. The Bloomberg Barclays Global Aggregate ex-U.S. Bond Index rose 3.4% (unhedged). Emerging market debt indices posted lofty results (Emerging Market Bond Index Global Diversified: +12.3%; Global Bond Index-Emerging Market Global Diversified: +9.8%) but remain down single digits from calendar year-end. Municipal bonds also rebounded from relatively poor performance in the first calendar quarter; the Bloomberg Barclays Municipal Bond Index rose 2.7% in the second calendar quarter but is up only 2.1% calendar year-to-date.

Closing Thoughts

It is no exaggeration to say that we are living in unprecedented times, and we face a vast array of social, geopolitical, financial, and health challenges. Uncertainty remains high across these arenas, and yet markets have recovered swiftly from the wreckage of the first calendar quarter. While there are some indications of light at the end of the tunnel, the ultimate impact of the pandemic on the economy remains unclear. Wall Street prices reflect a relatively optimistic viewpoint that has yet to be proven by fundamental data. While central bank intervention has been swift and heavy, helping to restore confidence and liquidity, investors should be mindful that we remain in uncharted territory. The oft-cited economic recovery alphabet descriptors (V, W, L, U) do little to describe the pace of the recovery or the ultimate repercussions for the economy and society. Amid this uncertainty, social justice, environmental awareness, and wealth inequality are issues that seem to have gained some momentum and perhaps have drawn strength from these challenging times, during which we have had to adapt to new rules in a swift fashion.

While the economic picture remains fluid and uncertain, Callan's advice to investors remains clear and consistent: We recommend adherence to a disciplined investment process that includes a well-defined long-term asset allocation policy.

RECOMMENDATION

Staff recommend the Finance & Administration Committee accept the FY2020 Q4 Public University Fund Investment Report and the FY2020 Q4 Oregon State University Investment Report.

Oregon Short Term Fund

June 30, 2020

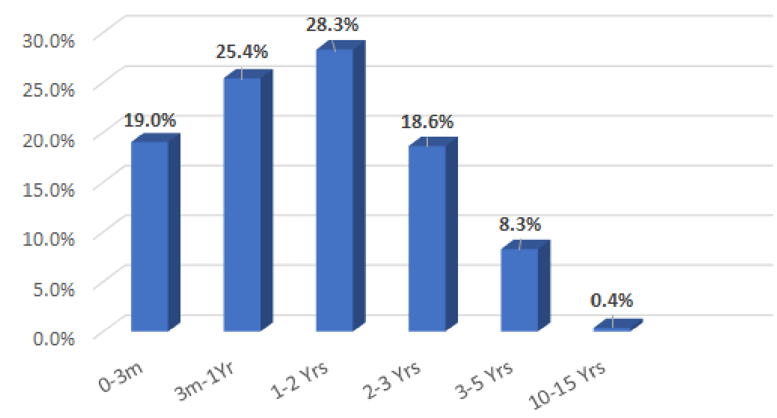
Portfolio Characteristics

Market Value 06/30/2020	$ 388,802,696
Weighted Average Credit Quality	AA
Book Yield (%)	1.15
Weighted Average Maturity (years)	1.06
Duration (years)	0.56
Spread Duration (rate)	0.84

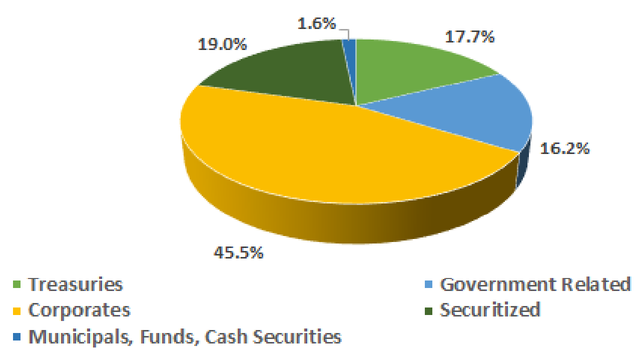
Top 10 Issuers

United States Treasury	17.5%
Wells Fargo & Company	3.4%
Caterpillar Incorporated	3.4%
Toyota Motor Corporation	2.9%
Citigroup Incorporated	2.7%
Federal Farm Credit Banks Funding Corporation	2.4%
Royal Bank of Canada	2.1%
Federal Home Loan Banks	1.9%
Morgan Stanley	1.9%
Sweden (Kingdom of)	1.7%
Total	**39.9%**

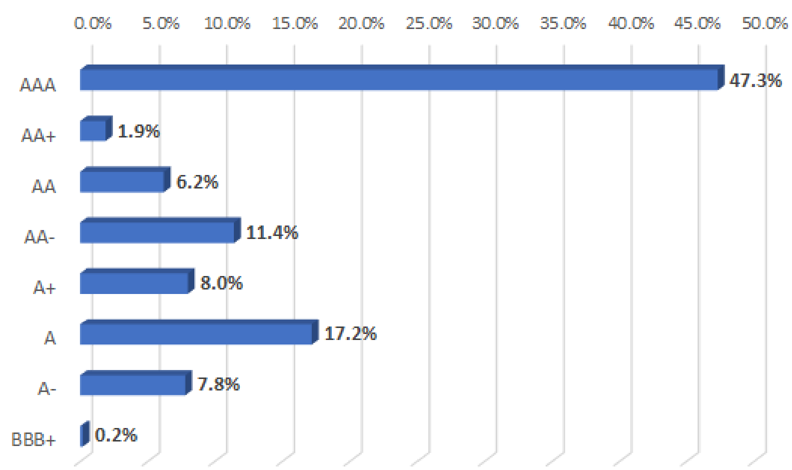
Maturity Breakdown



Sector Allocations



Credit Quality Distribution



Source: Oregon State Treasury

Core Bond Fund

June 30, 2020

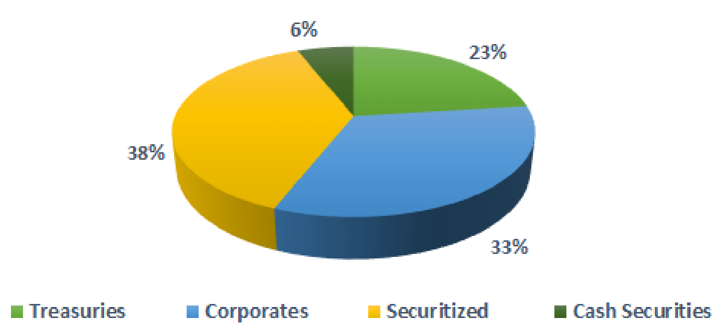
Portfolio Characteristics

Market Value 06/30/2020	$ 192,395,981
Weighted Average Credit Quality	AA-
Book Yield (%)	2.01%
Weighted Average Maturity (years)	4.20
Duration (years)	3.53
Spread Duration (rate)	2.83

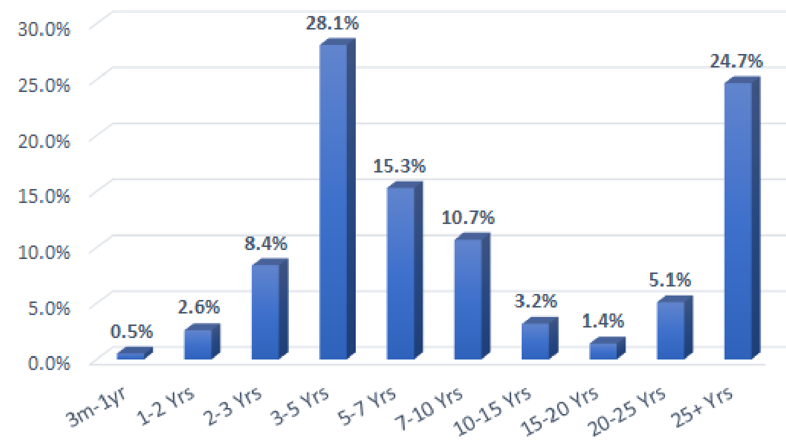
Top 10 Issuers

United States Treasury	29.7%
Federal National Mortgage Association	9.3%
Oregon State Treasury (Oregon Short-Term Fund)	5.9%
TC Energy Corporation	3.0%
Williams Companices Incorporated	2.5%
Kinder Morgan Incorporated	2.4%
Molson Coors Beverage Company	2.4%
Fannie Mae ACES 17-M5	2.2%
Dupont De Nemours Incorporated	2.0%
Cheniere Energy Incorporated	1.7%
Total	**61.1%**

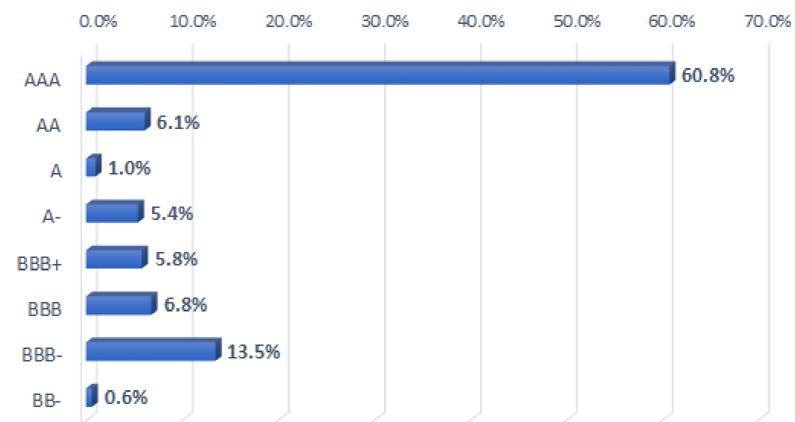
Sector Allocations



Maturity Breakdown



Credit Quality Distribution



Source: Oregon State Treasury