

MONTANA PUBLIC RETIREMENT PLANS INVESTMENT POLICY

**Approved April 5, 2017
Revised April 3, 2018**

Table of Contents

Page

1. Introduction.....	3
2. Purpose.....	3
3. Legal and Constitutional Authority.....	3
4. Strategic Investment Objectives.....	4
5. Time Horizon	4
6. Performance Measurement	4
7. Roles and Responsibilities	5
8. Strategic Asset Allocation.....	6
9. Rebalancing	6
10. Risk Management.....	6
a. Monitoring Public Market Investment Managers	6
b. Private Investments Evaluation Policy.....	7
c. Liquidity	7
d. Monitoring/Reporting – Transparency.....	7
e. Leverage	8
11. Securities Lending.....	8
12. Exercise of Shareholder Rights	8
a. Proxy Voting.....	8
b. Class Action Litigation.....	9
13. Investment Policy Review.....	9
Appendixes	
a. Appendix I: Montana Public Retirement Plans Asset Allocation Ranges.....	10
b. Appendix II: Investment Objectives and Guidelines	11
i. Schedule II-A – Domestic Equities Asset Class.....	11
ii. Schedule II-B – International Equities Asset Class.....	13
iii. Schedule II-C – Private Equity Asset Class	15
iv. Schedule II-D – Natural Resources Asset Class.....	18
v. Schedule II-E – Real Estate Asset Class.....	21
vi. Schedule II-F – TIPS Asset Class	24
vii. Schedule II-G – Broad Fixed Income Class.....	26
viii. Schedule II-H – US Treasury/Agency Fixed Income Asset Class	28
ix. Schedule II-I – Investment Grade Credit Asset Class	30
x. Schedule II-J – Agency Mortgage Backed Securities Asset Class.....	32
xi. Schedule II-K – High Yield Asset Class.....	34
xii. Schedule II-L – Cash Asset Class	36
xiii. Schedule II-M – Diversifying Strategies Asset Class.....	37

1. Introduction:

Montana Public Retirement Plan assets are commingled for investment purposes into a Consolidated Asset Pension Pool (CAPP) created by the Board. The use of a commingled pool allows for simplified investing and accounting, broader diversification and thus less risk than would otherwise be available for the smaller Plans and provides additional opportunities for fee savings. The Consolidated Asset Pension Pool invests directly in the underlying Asset Classes. Each Asset Class has an underlying set of investment objectives and investment guidelines. Each of the nine Plans, CAPP, and each of the Asset Classes are separately identified for accounting and record keeping purposes.

This policy is effective upon adoption and supersedes all previous Investment Policies related to the investment management of the Montana Public Retirement Plans.

2. Purpose:

The purpose of this policy statement is to provide a broad strategic framework for the Montana Public Retirement Plans' investments under the guidance of the Board of Investments.

3. Legal and Constitutional Authority:

The Montana Constitution, Article VIII, Section 13, requires that the Legislature provide for a Unified Investment Program for public funds. Section 17-6-201, MCA, established the Unified Investment Program, created the Montana Board of Investments (the "Board") and gave the Board sole authority to invest state funds, including the public retirement plans (Plans) in accordance with state law and the state constitution.

The Unified Investment program for public funds must be administered by the Board of Investments in accordance with the "prudent expert principle," defined as:

- 1) discharging its duties with the care, skill, prudence, and diligence, under the circumstances then prevailing, that a prudent person acting in a like capacity with the same resources and familiar with like matters exercises in the conduct of an enterprise of like character with like aims;
- 2) diversifying the holdings of each fund to minimize the risk of loss and maximize the rate of return, unless under the circumstances it is clearly prudent not to do so; and
- 3) discharging its duties solely in the interest of and for the beneficiaries of the funds managed.

MCA section 17-6-201 (2) (a) states... "Retirement funds may be invested in common stocks of any corporation."

MCA section 17-6-201 (3) (b) states... "The Board is urged under the prudent expert principle to invest up to three percent (3%) of retirement funds in Venture Capital companies. Whenever possible, preferences should be given to investments in those Venture Capital companies which demonstrate an interest in making investments in Montana."

MCA section 17-6-201 (3) (c) states... “In discharging its duties, the board shall consider the preservation of purchasing power of capital during periods of high monetary inflation.”

The Board, as the investment fiduciary of the Plans, is responsible for establishing the investment parameters for the Plans. The Board has the authority to allocate portfolios to any previously board-approved asset class in the proportions it considers prudent, under the prudent expert rule. There are currently no statutory or constitutional restrictions on the investment of the Plans. Asset allocation decisions made by the Board must be made in a public meeting.

4. Strategic Investment Objectives

The Board’s overall objective is to achieve the highest level of investment performance that is compatible with its risk tolerance and prudent investment practices. Because of the long-term nature of the state’s various pension liabilities, the Board maintains a long-term perspective in formulating and implementing its investment policies, and in evaluating its investment performance.

5. Time Horizon

The Board expects to meet or exceed these objectives over a long-term investment horizon. Over shorter periods, the anticipated market volatility and specific actions, including risk mitigation efforts of the Board, may lead to unfavorable, but expected, deviation from these objectives.

6. Performance Measurement

Investment performance is measured by three integrated long-term return objectives:

- a) The **actuarial target rate of return** is the key actuarial assumption affecting future funding rates and liabilities. Investment performance that exceeds or underperforms the target rate may materially impact future funding rates and liabilities. The Board seeks to generate long-term investment performance that will exceed the actuarial annual target rate of return of 7.75%, as determined by the governing boards of the public retirement systems, net of all investment and administrative expenses. There may be years, or a period of years, when the Plans do not achieve this goal followed by years when the goal is exceeded. But over a long period, the Board seeks to achieve an average net rate of return of 7.75%, as determined by the governing boards of the public retirement systems, at risk levels (measured by expected volatility) broadly consistent with other public fund peers.
- b) The **investment policy benchmark** for the Retirement Plans is calculated by applying the investment performance of the benchmarks for CAPP, STIP, and direct exposure to any of the underlying asset classes to the Plans’ actual allocation to these investments during the measurement period. The investment policy benchmark represents the return that would be achieved if the Plan implemented a passively managed portfolio. Deviations from the policy benchmark measure the contribution of active management, rebalancing policy and its execution, and investment implementation generally.
- c) The Board also compares each Plan’s total performance, before all fees, to appropriate **public plan sponsor universes**. This process permits the Board to compare its total performance to

other public pension plans. While the Board seeks to rank consistently in the top half of comparable public pension plans, the Board recognizes that other plans may have investment objectives and risk tolerances that differ substantially from the Board's.

7. Roles and Responsibilities

- a) **Board of Investments** – The Board is responsible for approving the Investment Policy Statement for the Montana Public Retirement Plans and has the authority to allocate portfolios to CAPP, STIP, and any asset class in the proportions it considers prudent, subject to such limitations as contained in law and the Constitution. The Board reviews this document periodically and, as needed, approves any changes to the policy.

As described in the Board of Investments Governance Manual, the Board delegates authority to the Executive Director, Chief Investment Officer, and other Staff to execute the day to day duties required to carry out the Board's mission.

- b) **Executive Director** – The Executive Director is empowered by the Board to sign all documents required to conduct Board business, unless there are specific written policies or instructions from the Board to the contrary. The Executive Director and the Chief Investment Officer are authorized jointly to contract for investment manager services and if deemed appropriate, terminate them.
- c) **Chief Investment Officer** – The Chief Investment Officer (CIO) is empowered by the Board to serve as the principal staff person responsible for overseeing the investment activities under the Board's jurisdiction in compliance with the Board's policies. The CIO, with the support of other staff, is responsible for recommending investment policy changes for Board approval.
- d) **Staff** – The staff is responsible for:
- I. Managing day-to-day operations and delegating work to external resources as appropriate;
 - II. Monitoring allocations and overseeing all investment manager due diligence activities and recommending changes to the CIO;
 - III. Monitoring and reporting to the Board the performance of each asset class and the individual managers' performance;
 - IV. Informing the Board of any new managers or terminations; and
 - V. Reporting any deviations from this Investment Policy to the Board.
- e) **Investment Consultant** – The investment consultant assists the CIO and staff with policy recommendations and provides advice to the Board. The investment consultant also assists staff in monitoring all external managers and reports to the Board independently.
- f) **External Managers** – Managers are responsible for all aspects of portfolio management as set forth in the contract specific to each manager. Managers must communicate with staff as needed, regarding investment strategies and results. Managers must also cooperate fully with staff regarding administrative, accounting, and reconciliation issues as well as any requests from the investment consultant and the master custodian.

8. Strategic Asset Allocation

The Board finds that it is in the best interest of the state's nine retirement Plans to set out investment policies for the Plans in one comprehensive document.

Nine Public Retirement Plans:

Public Employees Retirement System

Teachers Retirement System

Police Officers Retirement

Firefighters Retirement

Sheriffs Retirement

Highway Patrol Retirement

Game Wardens Retirement

Judges Retirement

Volunteer Firefighters Retirement

The current asset allocation ranges for the Plans are in **Appendix I**. The asset allocation ranges are subject to change as modifications are adopted by the Board, at which time **Appendix I** will be revised to reflect these changes. The Board will formally affirm or revise the asset allocation ranges for the Plans at least annually.

9. Rebalancing

The actual asset allocation mix may deviate from time to time from the approved asset allocation ranges due to financial market performance, cash flows, and manager performance. Material deviations from the asset allocation ranges can alter the expected return and risk of the Plans. Rebalancing the Plans' assets to remain within the Board-approved allocation ranges is delegated to the Chief Investment Officer (CIO), in consultation with the Executive Director. Any necessary rebalancing will be made in a timely manner and will take into consideration associated costs and current market conditions. In addition to maintaining actual allocations within the ranges, the CIO will also consider contractual investment commitments to private investments, the liquidity necessary to meet benefit payments and administrative costs for the Plans, and current market conditions. This may prompt asset rebalancing when asset allocations fall within the established ranges. The CIO shall inform the Board of rebalancing activity at the Board's next regularly scheduled quarterly meeting.

10. Risk Management

a) **Evaluation of Investment Managers**

The Investment Manager Evaluation Policy is a distinct policy that is regularly reviewed and updated separate from the Retirement Plans Investment Policy because staff utilizes the Investment Manager Evaluation Policy to oversee and manage other assets in addition to the retirement plan assets.

b) Liquidity

Based on the percentage of total plan assets necessary for ongoing benefit payments and other plan expenses, the liquidity needs for the Retirement Plans are generally low and participant capital is not expected to change dramatically on short notice. However, illiquidity risk still needs to be monitored and managed by staff on a regular basis to ensure that assets are not required to be sold too quickly, or at an unfavorable time, and potentially at a discount to fair value to meet the cash needs of the Retirement Plans.

A significant percentage of the investments in the Real Estate, Natural Resources and Private Equity Asset Classes are considered illiquid. Due to the limited liquidity of these assets, it will typically be impractical to fund plan cash needs or correct deviations from policy ranges through the purchase or sale of these assets.

The investments held in the Domestic Equity, International Equity, TIPS, Broad Fixed Income, US Treasury/Agency Fixed Income, Investment Grade Credit, Agency Mortgage-Backed Securities, and High Yield Asset Classes are categorized as publicly traded securities. In “normal market” conditions many of the underlying assets from these Asset Classes can be liquidated in a relatively short period to accommodate both expected and unexpected withdrawals as well as any repositioning of the asset allocation to stay within approved ranges.

To improve liquidity and manage both the expected and unexpected Retirement Plans need for cash, this Investment Policy specifies a strategic allocation to the Cash Asset Class, which invests in approved investments including the Short-Term Investment Pool (STIP).

c) Monitoring/Reporting – Transparency

Managers shall submit periodic reports to facilitate Staff’s monitoring of the Managers’ conformance to investment restrictions and performance objectives.

Staff shall provide regular reporting to the Board regarding the asset allocation and performance of the pension plans as well as the characteristics and performance of the Asset Classes to confirm these items are known and adhere to all Investment Policy requirements and expectations.

Staff will discuss and communicate any key information discovered due to the ongoing Manager monitoring process that might assist the Board in understanding the underlying investment manager structure or risks embedded in the investment characteristics of the Retirement Plan asset allocations.

d) Leverage

Leverage is a significant risk factor. Investment managers may utilize leverage only when permitted in the manager’s investment guidelines approved by Staff. Staff shall monitor the use of leverage and its impact on risk and return.

The use of derivative securities can generate additional leverage even if the derivative is being used to reduce the risk in other investments. Investment managers may only use derivatives when permitted in the manager’s investment guidelines approved by Staff.

e) **Cash Investments**

Cash investments held at the Retirement Plan, CAPP level, or any managed account within it, entail an element of credit risk. Thus, only approved cash investment vehicles are permitted. These include the custodian's STIF vehicle, STIP, or any SEC-registered money market fund approved by the CIO, all of which specifically address credit risk in their respective investment guidelines.

11. Securities Lending

Section 17-1-113, MCA, authorizes the Board to lend securities held by the state. The Board may lend its publicly traded securities through an agent, to other market participants in return for compensation. Currently, through an explicit contract, State Street Bank and Trust, the state's custodial bank, manages the state's securities lending program. The Board seeks to assess counterparty and reinvestment risk, associated with each aspect of its securities lending program. The Board requires borrowers to maintain collateral at 102 percent for domestic securities and 105 percent for international securities. To ensure that the collateral ratio is maintained, securities on loan are marked to market daily and the borrower must provide additional collateral if the value of the collateral falls below the agreed-upon ratio of over-collateralization. In addition to the strict collateral requirements imposed by the Board, the credit quality of approved borrowers is monitored continuously by the contractor. From time to time, Staff or the investment manager may restrict a security from the loan program upon notification to State Street Bank. Staff will monitor the securities lending program, and the CIO will periodically report to the Board on the status of the program. The Board's participation in securities lending may change over time given Plan activity, market conditions and the agent agreement.

12. Exercise of Shareholder Rights

The Board recognizes that publicly traded securities and other assets of the Plans include certain ancillary rights, such as the right to vote on shareholder resolutions at companies' annual shareholders' meetings, and the right to assert claims in securities class action lawsuits or other litigation. The Board will prudently manage these assets of the Plans for the exclusive purpose of enhancing the value of the Plans for its participating systems' members and beneficiaries through such means as adopting and implementing a proxy voting policy and undertaking productive, cost-effective action to exercise its rights as shareholders or claimants in litigation.

a) **Proxy Voting**

Active voting of proxies is an important part of the Board's investment program. Under the contractual arrangements between the Board and its investment managers, the responsibility for voting proxies on the investments is delegated to the managers. Managers are contractually required to establish a proxy voting program in coordination with Board Staff and are required to vote proxies, excluding shares on loan under the Board's securities lending program, in the interest of the Plans' beneficiaries. Records of proxy votes shall be maintained by the Managers, and/or its third-party designee, and submitted to Staff and/or an external service provider annually.

Staff will monitor the proxy voting practices of the Board's external investment managers. External service providers may be retained by either the Board or the Managers to assist in

monitoring efforts. This monitoring will be coordinated with each manager to reasonably assure the Staff that Managers are fulfilling their fiduciary responsibilities with respect to proxy voting.

b) Class Action Litigation

Claims under state and federal securities laws arising out of losses on securities under the Board's management are assets subject to the Board's fiduciary duty of prudent management. The Board shall take reasonable, cost effective steps to identify, pursue and collect upon claims under securities laws for losses suffered by the Board on its investment. Accordingly, the Board maintains a detailed litigation policy, including process steps, outlined in the Montana Board of Investments Governance Manual, Appendix F.

13. Investment Policy Review

The Board intends to keep this Policy updated as it modifies or amends the underlying contents. As stated in the Governance Policy, "the Board shall review this Investment Policy at least annually or more frequently at the request of Board staff. Statements may only be revised in a public meeting. All Statements shall be posted on the Board's web site for review by the public."

Appendix I: Montana Public Retirement Plans Asset Allocation Ranges

Permitted Ranges:

Approved November 14, 2017

All Nine Retirement Plans' Allocations		
Pools	Range Low	Range High
STIP	1%	4%
CAPP	96%	99%

CAPP Asset Class Allocations		
Asset Class	Range Low	Range High
Domestic Equities	24	38
International Equities	12	24
Private Equity	9	15
Natural Resources	0	6
Real Estate	4	12
TIPS	0	4
Broad Fixed Income ¹	0	3
US Treasury/Agency Fixed Income ¹	5	14
Investment Grade Credit ¹	2	6
Agency Mortgage-Backed Securities ¹	2	8
High Yield ¹	1	5
Diversifying Strategies	0	4
Cash	1	6
Total		
<p>¹ Related fixed income asset classes may not go below a minimum of 15 percent of the portfolio.</p> <p>² CAPP shall have no greater than 5% of its Net Asset Value managed by any one external manager using an active investment strategy.</p>		

Appendix II: Investment Objectives and Guidelines

Schedule II-A: Investment Objectives and Guidelines Domestic Equities Asset Class

Effective Date of Schedule: by May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for Domestic Equities.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the Asset Class; and
2. Provide diversified exposure to the domestic equity market in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the Domestic Equities Asset Class is to attain the highest possible total return within the parameters of the Investment Guidelines set forth below.

Performance:

Success in achieving this objective will be measured by comparing the risk and after-fee return of the Domestic Equity Asset Class to the **MSCI USA Investable Market Index** (the “Benchmark”). Performance results will be monitored and evaluated quarterly. However, the success in achieving the objective will be measured on a three-year, five-year, and ten-year annualized basis.

Investment Guidelines:

Staff will have full discretion to manage this Asset Class consistent with the investment guidelines stated below. Compliance with the following guidelines for permitted investments and other restrictions is the sole responsibility of the Staff. Any exceptions or compliance violations are to be reported to the Board of Investments at the next scheduled quarterly Board meeting.

Most of the Domestic Equity investments will be managed by external investment managers. The Domestic Equities Asset Class may utilize public long-only and long/short strategies.

It is expected that Domestic Equities Asset Class shall invest in public market investments that provide liquidity and meaningful transparency to portfolio characteristics and risk exposures.

Permitted Investments:

The Domestic Equities Asset Class may invest only in the following:

1. Securities and derivatives held in separate accounts, commingled funds, limited partnerships, or limited liability companies managed by external investment managers and governed by their respective investment management contracts and investment guidelines;
2. Exchange-Traded Funds (ETFs) based on a domestic equity index that is approved by the Chief Investment Officer and purchased and monitored by Staff; and
3. Cash – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

Other Restrictions:

1. The Domestic Equities Asset Class percentage of Net Asset Value invested in “small-cap” equities shall not exceed +10% above the Benchmark weight in “small cap”;
2. The Domestic Equities Asset Class percentage of Net Asset Value invested in passive/index strategies shall be greater than 45%; and
3. Cash held at the Domestic Equities Asset Class level (not including cash held by external managers in separate accounts or commingled funds) is limited to 5% of the Domestic Equities Asset Class Net Asset Value.

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, while considering current market conditions and the associated costs of rebalancing. At the Board’s next regularly scheduled quarterly meeting, the CIO shall inform the Board of any cases that the Domestic Equity Asset Class allocations were outside of the limits and either inform the Board of the actions that were taken to return the Domestic Equities Asset Class back within guidelines or a plan to do so.

**Schedule II-B:
Investment Objectives and Guidelines
International Equities Asset Class**

Effective Date of Schedule: May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for International Equities.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the Asset Class; and
2. Provide diversified exposure to the international and global equity markets in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the International Equities Asset Class is to attain the highest possible total return within the parameters of the Investment Guidelines set forth below.

Performance:

Success in achieving this objective will be measured by comparing the risk and after-fee return of the International Equities Asset Class to the **MSCI All Country World ex-US Investable Market Index** (the “Benchmark”). Performance results will be monitored and evaluated quarterly. However, the success in achieving the objective will be measured on a three-year, five-year, and ten-year annualized basis.

Investment Guidelines:

Staff will have full discretion to manage the International Equities Asset Class consistent with the investment guidelines stated below. Compliance with the following guidelines for permitted investments and other restrictions is the sole responsibility of the Staff. Any exceptions or compliance violations are to be reported to the Board of Investments at the next scheduled quarterly Board meeting.

Most of the International Equities Asset Class investments will be managed by external investment managers.

The International Equities Asset Class may utilize public long-only and long/short strategies.

It is expected that the International Equities Asset Class shall invest in public market investments that provide liquidity and meaningful transparency to portfolio characteristics and risk exposures.

Permitted Investments:

The International Equities Asset Class may invest only in the following:

1. Securities and derivatives held in separate accounts, commingled funds, limited partnerships, or limited liability companies managed by external investment managers and governed by their respective investment management contracts and investment guidelines;
2. Exchange-Traded Funds (ETFs) based on an international equity index that is approved by the Chief Investment Officer and purchased and monitored by Staff; and
3. Cash – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

Other Restrictions:

1. The International Equities Asset Class percentage of Net Asset Value invested in “small-cap” equities shall not exceed +10% above the Benchmark weight in “small cap”;
2. The International Equities Asset Class percentage of Net Asset Value invested in passive/index strategies shall be greater than 42%;
3. The International Equities Asset Class percentage of Net Asset Value invested in Emerging Market securities shall not exceed +10% above the Benchmark weight in Emerging Market securities; and
4. Cash held at the International Equities Asset Class level (not including cash held by external managers in separate accounts or commingled funds) is limited to 5% of the International Equities Asset Class Net Asset Value.

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, considering current market conditions and the associated costs of rebalancing. At the Board’s next regularly scheduled quarterly meeting, the CIO shall inform the Board of any cases that the International Equities Asset Class allocations were outside of the limits and either inform the Board of the actions that were taken to return the International Equities Asset Class back within guidelines or a plan to do so.

**Schedule II-C:
Investment Objectives and Guidelines
Private Equity Asset Class**

Effective Date of Schedule: May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for Private Equity.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the Asset Class; and
2. Provide diversified exposure to the Private Investment markets in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the Private Equity Asset Class is to attain the highest possible return within the parameters of the Investment Guidelines set forth below.

Performance:

There is no generally accepted benchmark index for private equity performance comparisons. Characteristically, private equity partnership investments are impacted by the “J-curve” effect, in which fees and transaction costs create negative returns during the initial investment years before distributions are realized. Private equity investing requires a long-time horizon to realize the value provided by the creation or restructuring of private companies.

The performance objective for the Private Equity Asset Class is the achievement of long-term net returns (after management fees and general partner’s carried interest) above a benchmark reflecting public equity market returns.

Success in achieving this objective will be measured by comparing the net return of the Private Equity Asset Class to the **MSCI USA Small Cap Index** (the “Benchmark”) on an annualized basis. Performance results will be monitored quarterly. However, the success in achieving the objective will be measured on a five-year and ten-year annualized basis.

Investment Guidelines:

Staff will have full discretion to manage the Private Equity Asset Class consistent with the investment guidelines stated below. Compliance with the following guidelines for permitted investments and other restrictions is the sole responsibility of the Staff. Any exceptions or compliance violations are to be reported to the Board of Investments at the next scheduled quarterly Board meeting.

Most of the Private Equity Asset Class investments will be managed by external investment managers via a partnership structure in which the Montana Board of Investments will have a limited partnership interest.

Permitted Investments:

The Private Equity Asset Class may invest only in the following:

1. Private Investment partnership interests. These private partnerships may be direct limited partnerships, limited liability companies, or vehicles that primarily invest in partnerships, including Fund-of-Funds and Secondary Funds;
2. Investments held in separate accounts or commingled funds managed by external investment managers and governed by their respective investment management contracts and investment guidelines;
3. The Private Equity Asset Class may co-invest with private investment managers in transactions that are suitable for inclusion into a private investment partnership;
4. Individual public or private securities received as distributions from funds;
5. Exchange-Traded Funds (ETFs) based on a public equity index that is approved by the Chief Investment Officer and purchased and monitored by Staff; and
6. Cash – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

Other Restrictions

1. No more than 7.5% of the aggregate of the Private Equity Asset Class net asset value plus uncalled committed capital should be in a single Direct Limited Partnership;
2. No more than 30% of the aggregate of the Private Equity Asset Class net asset value plus uncalled committed capital should be considered “Non-U.S.” exposure based on the primary objective of the Fund, Partnership, Separate Account, or Index;
3. No more than 10% of the aggregate of the Private Equity Asset Class net asset value shall be invested in direct co-investments;
4. Cash held at the Private Equity Asset Class level (not including cash held in the underlying partnership interests/funds) is limited to 5% of the Private Equity Asset Class Net Asset Value; and
5. Individual public securities received as distributions will be liquidated over a reasonable time-period dependent on market conditions.

The following table provides a guideline range with respect to Private Equity strategy diversification. It is important to note that these ranges reference the sum of the Private Equity Asset Class net asset value and uncalled commitments.

<u>Strategy</u>	<u>Policy Range</u>
Buyout and all other private equity related strategies not related to Venture Capital or Debt-Related	50% - 100%
Venture Capital	0% - 25%
Debt-related	0% - 25%

For the purpose of the ranges provided above, funds will be classified in the category that is most reflective of the underlying investments in the funds.

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, while considering current market conditions and the associated costs of rebalancing. At the Board's next regularly scheduled quarterly meeting, the CIO shall inform the Board of any cases that the Private Equity Asset Class allocations were outside of the limits and either inform the Board of the actions that were taken to return the Private Equity Asset Class back within guidelines or a plan to do so.

**Schedule II-D:
Investment Objectives and Guidelines
Natural Resources Asset Class**

Effective Date of Schedule: May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for Natural Resources.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the Natural Resources Asset Class; and
2. Provide diversified exposure to the Natural Resources markets in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the Natural Resources Asset Class is to attain the highest possible return within the parameters of the Investment Guidelines set forth below.

Performance:

There is no generally accepted performance comparisons benchmark index for private partnership investments in Natural Resources. Characteristically, private partnership investments are impacted by the “J-curve” effect, in which fees and transaction costs create negative returns during the initial investment years before distributions are realized. Private investments usually require a long-time horizon to realize the value provided by the creation or restructuring of private companies.

The performance objective for the Natural Resources Asset Class is the achievement of long-term net returns (after management fees and general partner’s carried interest) above a benchmark reflecting public equity Natural Resource market returns.

Success in achieving this objective will be measured by comparing the net return of the Natural Resources Asset Class to the **MSCI ACWI Commodity Producers Index** (the “Benchmark”) on an annualized basis. Performance results will be monitored quarterly. However, the success in achieving the objective will be measured on a five-year and ten-year annualized basis.

Investment Guidelines:

Staff will have full discretion to manage the Natural Resources Asset Class consistent with the investment guidelines stated below. Compliance with the following guidelines for permitted investments and other restrictions is the sole responsibility of the Staff. Any exceptions or compliance violations are to be reported to the Board of Investments at the next scheduled quarterly Board meeting.

The Natural Resources Asset Class may utilize public long-only and long/short strategies.

Permitted Investments:

The Natural Resources Asset Class (for the purpose of these guidelines, “Natural Resources” includes investments in Timber, Energy, Agriculture, Water, and other Commodities) may invest only in the following:

1. Private Investment partnership interests in Natural Resources. These private partnerships may be direct limited partnerships, limited liability companies, or vehicles that primarily invest in partnerships, including Fund-of-Funds and Secondary Funds;
2. The Natural Resources Asset Class may co-invest with private investment managers in transactions that are suitable for inclusion into a Natural Resources investment partnership;
3. Individual public or private securities received as distributions from funds;
4. Separate Accounts, Open-Ended Funds, Closed-Ended Funds, Exchange-Traded Funds (ETFs), or Master Limited Partnerships (MLPs) managing publicly traded Natural Resources related investments, where the investments are approved by the Chief Investment Officer and purchased and monitored by Staff; and
5. Cash – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

Other Restrictions

1. The CAPP (Consolidated Asset Pension Pool) percentage of Net Asset Value invested in Timber investments shall be no greater than 2%;
2. The CAPP (Consolidated Asset Pension Pool) percentage of Net Asset Value invested in a single investment within Natural Resources Asset Class shall be no greater than 1.0%;
3. No more than 30% of the aggregate of the Natural Resources Asset Class net asset value plus uncalled committed capital should be considered “Non-U.S.” exposure based on the primary objective of the Fund, Partnership, Separate Account, or Index;
4. No more than 10% of the aggregate of the Natural Resources Asset Class net asset value shall be invested in direct co-investments;
5. Cash held at the Natural Resources Asset Class level (not including cash held in the underlying partnership interests, funds, or accounts, or cash that is equitized) is limited to 5% of the Natural Resources Asset Class Net Asset Value; and
6. Individual public securities received as distributions will be liquidated over a reasonable time- period dependent on market condition.

For funds with exposure across categories, the fund will be classified in the category that is most reflective of the underlying investments in the funds.

Timber Fund Leverage

Leverage is a significant risk factor. On an individual fund basis, the leverage level can range up to 30.0 percent. Leverage consists of the combined borrowing at the property level and the fund level. On a select basis, the leverage may exceed 30.0 percent for a given investment, if it is determined to be reasonable to do so, particularly in the early stages of the fund investment cycle when a fund level

credit facility is utilized to finance early fund investments on a short-term basis prior to committed capital being drawn. Leverage shall be monitored on an individual fund level and new investments shall be made with the intention that the total timber fund investment leverage shall not exceed 30%.

Strategy
Timber Fund Investments

Leverage Policy Range
0% - 30%

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, while considering current market conditions and the associated costs of rebalancing. At the Board's next regularly scheduled quarterly meeting, the CIO shall inform the Board of any cases that the Natural Resources allocations were outside of the limits and either inform the Board of the actions that were taken to return the Pool back within guidelines or a plan to do so.

**Schedule II-E:
Investment Objectives and Guidelines
Real Estate Asset Class**

Effective Date of Schedule: May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for Real Estate.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the Real Estate Asset Class; and
2. Provide diversified exposure to Real Estate in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the Real Estate Asset Class is to attain the highest possible return within the parameters of the Investment Guidelines set forth below.

Performance:

Success in achieving this objective will be measured by comparing the risk and after-fee return of the Real Estate Asset Class to the **MSCI US REIT Index** (the “Benchmark”). Performance results will be monitored and evaluated quarterly. However, the success in achieving the objective will be measured on a five-year, and ten-year annualized basis.

Investment Guidelines:

Staff will have full discretion to manage the Real Estate Asset Class consistent with the investment guidelines stated below. Compliance with the following guidelines for permitted investments and other restrictions is the sole responsibility of the Staff. Any exceptions or compliance violations are to be reported to the Board of Investments at the next scheduled quarterly Board meeting.

Most of the Real Estate Asset Class investments will be managed by external investment managers.

The Real Estate Asset Class may utilize public long-only and long/short strategies.

Permitted Investments:

The Real Estate Asset Class may invest only in the following:

1. Separate Accounts, Open-Ended Funds, Closed-Ended Funds, Exchange-Traded Funds (ETFs), Real Estate Investment Trusts (REITs), or Master Limited Partnerships (MLPs) managing publicly traded Real Estate, where the investments are approved by the Chief Investment Officer and purchased and monitored by Staff;

2. Private Investment partnership interests. These private partnerships may be direct limited partnerships, limited liability companies, or vehicles that primarily invest in partnerships, including Fund-of-Funds and Secondary Funds.
3. The Real Estate Asset Class may co-invest with private investment managers in transactions that are suitable for inclusion into a private Real Estate investment partnership;
4. Individual public or private securities received as distributions from funds are also permitted to be held in the Real Estate Asset Class; and
5. Cash – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

Other Restrictions

1. No less than 30% of the aggregate of the Real Estate Asset Class net asset value plus capital shall be invested in “Core” Real Estate. Real Estate is classified as “Core” if it is an investment in operating, substantially leased, and positively cash flowing institutional quality real estate across property types, geographies and markets;
2. No more than 7.5% of the aggregate of the Real Estate Asset Class net asset value plus uncalled committed capital should be in a single “Non-Core” Fund, Partnership, or Separate Account;
3. Separate Accounts, Open-Ended Funds, Closed-Ended Funds, Exchange-Traded Funds (ETFs), or Master Limited Partnerships (MLPs) managing publicly traded Real Estate or Timberland related investments may not exceed 20% of the aggregate of the Real Estate Asset Class net asset value plus uncalled committed capital;
4. No more than 30% of the aggregate of the Real Estate Asset Class net asset value plus uncalled committed capital should be considered “Non-U.S.” exposure based on the primary objective of the Fund, Partnership, Separate Account, or Index;
5. No more than 10% of the aggregate of the Real Estate Asset Class net asset value shall be invested in direct co-investments;
6. Cash held at the Real Estate Asset Class level (not including cash held in the underlying partnership interests, funds, or accounts) is limited to 5% of the Real Estate Asset Class Net Asset Value; and
7. Individual public securities received as distributions will be liquidated over a reasonable time-period dependent on market conditions.

For funds with exposure across these categories, the fund will be classified in the category that is most reflective of the underlying investments in the funds.

Leverage

Leverage is a significant risk factor. On an individual fund basis, the leverage level can range up to 75.0 percent. Leverage consists of the combined borrowing at the property level and the fund level. On a select basis, the leverage may exceed 75.0 percent for a given investment, if it is determined to be reasonable to do so, particularly in the early stages of the fund investment cycle when a fund level credit facility is utilized to finance early fund investments on a short-term basis prior to committed capital being drawn. Leverage shall be monitored on an individual fund level and new investments shall be made with the intention that the total Real Estate Asset Class leverage shall not exceed 60%.

<u>Strategy</u>	<u>Leverage Policy Range</u>
Core Real Estate Investments	0% - 50%
Non-Core Real Estate Investments	0% - 75%

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, while considering current market conditions and the associated costs of rebalancing. At the Board's next regularly scheduled quarterly meeting, the CIO shall inform the Board of any cases that the Real Estate Asset Class allocations were outside of the limits and either inform the Board of the actions that were taken to return the Real Estate Asset Class back within guidelines or a plan to do so.

While no formal diversification ranges are set forth for property type diversification or regional diversification within the United States, it is expected that the Real Estate Asset Class shall remain diversified across these factors. These and other factors shall be monitored and reported to the Board at least annually.

**Schedule II-F:
Investment Objectives and Guidelines
TIPS Asset Class**

Effective Date of Schedule: May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for the TIPS Asset Class.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the TIPS Asset Class; and
2. Provide diversified exposure to the TIPS Fixed Income markets in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the TIPS Asset Class is to attain the highest possible total return within the parameters of the Investment Guidelines set forth below.

Performance:

Success in achieving this objective will be measured by comparing the risk and after-fee return of TIPS Asset Class to the **Bloomberg Barclays Intermediate US Treasury Inflation-Protected Securities Index** (the “Benchmark”). Performance results will be monitored and evaluated quarterly. However, the success in achieving the objective will be measured on a three-year, five-year, and ten-year annualized basis.

Investment Guidelines:

Staff will have full discretion to manage the TIPS Asset Class consistent with the investment guidelines stated below. Compliance with the following guidelines for permitted investments and other restrictions is the sole responsibility of the Staff. Any exceptions or compliance violations are to be reported to the Board of Investments at the next scheduled quarterly Board meeting.

Permitted Investments:

The TIPS Asset Class may invest only in the following:

1. Fixed Income U.S. Treasury Inflation-Protected Securities (“TIPS”);
2. Fixed Income U.S. Treasury Securities; and
3. Cash – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

Other Restrictions

1. The average duration of the TIPS Asset Class will be maintained in a range of + or – 20% of the Benchmark duration; and
2. Cash held at the TIPS Asset Class level (not including cash held in the underlying accounts) is limited to 5% of the TIPS Asset Class Net Asset Value.

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, while considering current market conditions and the associated costs of rebalancing. At the Board's next regularly scheduled quarterly meeting, the CIO shall inform the Board of any cases that the TIPS Asset Class allocations were outside of the limits and either inform the Board of the actions that were taken to return the TIPS Asset Class back within guidelines or a plan to do so.

**Schedule II-G:
Investment Objectives and Guidelines
Broad Fixed Income Asset Class**

Effective Date of Schedule: May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for the Broad Fixed Income Asset Class.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the Broad Fixed Income Asset Class; and
2. Provide diversified exposure to the Fixed Income markets in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the Broad Fixed Income Asset Class is to attain the highest possible total return within the parameters of the Investment Guidelines set forth below.

Performance:

Success in achieving this objective will be measured by comparing the risk and after-fee return of the Broad Fixed Income Asset Class to the **Bloomberg Barclays US Aggregate Bond Index** (the "Benchmark"). Performance results will be monitored and evaluated quarterly. However, the success in achieving the objective will be measured on a three-year, five-year, and ten-year annualized basis.

Investment Guidelines:

Staff will have full discretion to manage the Broad Fixed Income Asset Class consistent with the investment guidelines stated below. Compliance with the following guidelines for permitted investments and other restrictions is the sole responsibility of the Staff. Any exceptions or compliance violations are to be reported to the Board of Investments at the next scheduled quarterly Board meeting.

Permitted Investments:

The Broad Fixed Income Asset Class may invest only in the following:

1. Fixed income securities and derivatives held in separate accounts, commingled funds, limited partnerships, or limited liability companies managed by internal or external investment managers and governed by their respective investment management contracts and investment guidelines;

2. Individual fixed income securities that are approved for purchase by the Chief Investment Officer and purchased and monitored by Staff; and
3. Cash – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

Other Restrictions

1. The average duration of the Broad Fixed Income Asset Class will be maintained in a range of + or – 25% of the index duration;
2. A maximum of 15% of the Net Asset Value of the Broad Fixed Income Asset Class shall be invested in fixed income securities either non-rated or rated lower than Baa3 by Moody’s or BBB- by S&P or Fitch. (In the case of split rated securities, the lowest rating will apply.);
3. A maximum of 5% of the Net Asset Value of the Broad Fixed Income Asset Class shall be invested in Emerging Market securities; and
4. A maximum of 5% of the Net Asset Value of the Broad Fixed Income Asset Class shall be invested in Cash held at the Asset Class level (not including cash held by internal or external managers in separate accounts or commingled funds).

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, while considering current market conditions and the associated costs of rebalancing. At the Board’s next regularly scheduled quarterly meeting, the CIO shall inform the Board of any cases that the Broad Fixed Income Asset Class allocations were outside of the limits and either inform the Board of the actions that were taken to return the Broad Fixed Income Asset Class back within guidelines or a plan to do so.

**Schedule II-H:
Investment Objectives and Guidelines
US Treasury/Agency Fixed Income Asset Class**

Effective Date of Schedule: May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for US Treasury/Agency Asset Class.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the US Treasury/Agency Asset Class; and
2. Provide diversified exposure to the US Treasury/Agency markets in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the US Treasury/Agency Asset Class is to attain the highest possible total return within the parameters of the Investment Guidelines set forth below.

Performance:

Success in achieving this objective will be measured by comparing the risk and after-fee return of US Treasury/Agency Asset Class to the **Bloomberg Barclays US Intermediate Treasury Index** (the "Benchmark"). Performance results will be monitored and evaluated quarterly. However, the success in achieving the objective will be measured on a three-year, five-year, and ten-year annualized basis.

Investment Guidelines:

Staff will have full discretion to manage the US Treasury/Agency Asset Class consistent with the investment guidelines stated below. Compliance with the following guidelines for permitted investments and other restrictions is the sole responsibility of the Staff. Any exceptions or compliance violations are to be reported to the Board of Investments at the next scheduled quarterly Board meeting.

Permitted Investments:

The US Treasury/Agency Asset Class may invest only in the following:

1. Fixed Income securities and derivatives held in separate accounts, commingled funds, limited partnerships, or limited liability companies managed by internal or external investment managers and governed by their respective investment management contracts and investment guidelines;
2. Individual Fixed income securities issued and guaranteed by the U.S. Government that are approved for purchase by the Chief Investment Officer and purchased and monitored by Staff; and
3. Cash – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

Other Restrictions

1. The average duration of the US Treasury/Agency Asset Class will be maintained in a range of + or – 20% of the Benchmark duration;
2. A minimum of 70% of the Net Asset Value of the US Treasury/Agency Asset Class shall be held in U.S. Treasury securities;
3. A maximum of 20% of the Net Asset Value of the US Treasury/Agency Asset Class shall be held in U.S. TIPS (Treasury Inflation-Protected Securities);
4. A maximum of 30% of the Net Asset Value of the US Treasury/Agency Asset Class shall be held in U.S. Agency Fixed Income securities;
5. A maximum of 10% of the Net Asset Value of the US Treasury/Agency Asset Class shall be held in U.S. Agency CMBS securities;
6. The maximum maturity for individual securities held in the US Treasury/Agency Asset Class shall be 12 years; and
7. A maximum of 10% of the Net Asset Value of the US Treasury/Agency Asset Class shall be invested in Cash held at the Asset Class level (not including cash held by internal or external managers in separate accounts or commingled funds).

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, while considering current market conditions and the associated costs of rebalancing. At the Board’s next regularly scheduled quarterly meeting, the CIO shall inform the Board of any cases that the US Treasury/Agency Asset Class allocations were outside of the limits and either inform the Board of the actions that were taken to return the Asset Class back within guidelines or a plan to do so.

**Schedule II-I:
Investment Objectives and Guidelines
Investment Grade Credit Asset Class**

Effective Date of Schedule: May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for Investment-Grade Credit Asset Class.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the Investment Grade Credit Asset Class; and
2. Provide diversified exposure to the Fixed Income Investment Grade Credit markets in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the Investment Grade Credit Asset Class is to attain the highest possible total return within the parameters of the Investment Guidelines set forth below.

Performance:

Success in achieving this objective will be measured by comparing the risk and after-fee return of Investment Grade Credit Asset Class to the **Bloomberg Barclays US Intermediate Corporate Index** (the “Benchmark”). Performance results will be monitored and evaluated quarterly. However, the success in achieving the objective will be measured on a three-year, five-year, and ten-year annualized basis.

Investment Guidelines:

Staff will have full discretion to manage the Investment Grade Credit Asset Class consistent with the investment guidelines stated below. Compliance with the following guidelines for permitted investments and other restrictions is the sole responsibility of the Staff. Any exceptions or compliance violations are to be reported to the Board of Investments at the next scheduled quarterly Board meeting.

Permitted Investments:

The Investment Grade Credit Asset Class may invest only in the following:

1. Fixed income securities and derivatives held in separate accounts, commingled funds, limited partnerships, or limited liability companies managed by internal or external investment managers and governed by their respective investment management contracts and investment guidelines;

2. Individual fixed income securities that are approved for purchase by the Chief Investment Officer and purchased and monitored by Staff; and
3. Cash – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

Other Restrictions

1. At the time of purchase, corporate securities must be rated investment-grade (Baa3/BBB-/BBB- or higher) by Moody’s, S&P, and Fitch. In the case of split-rated securities, the lower rating is used;
2. Securities that drop below investment-grade as defined above may be held to maturity, however the Investment Grade Credit Asset Class may not hold more than 5% of its Net Asset Value in securities rated below investment-grade;
3. A maximum of 10% of the Net Asset Value of the Investment Grade Credit Asset Class shall be held in Non-U.S. securities in a foreign currency;
4. The average duration of the Investment Grade Credit Asset Class will be maintained in a range of + or – 20% of the Benchmark duration;
5. The maximum maturity for individual securities held in the Investment Grade Credit Asset Class will be 12 years; and
6. A maximum of 5% of the Net Asset Value of the Investment Grade Credit Asset Class shall be invested in Cash held at the Asset Class level (not including cash held by internal or external managers in separate accounts or commingled funds).

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, while considering current market conditions and the associated costs of rebalancing. At the Board’s next regularly scheduled quarterly meeting, the CIO shall inform the Board of any cases that the Investment Grade Credit Asset Class allocations were outside of the limits and either inform the Board of the actions that were taken to return the Investment Grade Credit Asset Class back within guidelines or a plan to do so.

**Schedule II-J:
Investment Objectives and Guidelines
Agency Mortgage-Backed Securities Asset
Class**

Effective Date of Schedule: May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for Agency Mortgage-Backed Securities.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the Agency Mortgage-Backed Securities Asset Class; and
2. Provide diversified exposure to the Mortgage-Backed markets in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the Agency Mortgage-Backed Asset Class is to attain the highest possible total return within the parameters of the Investment Guidelines set forth below.

Performance:

Success in achieving this objective will be measured by comparing the risk and after-fee return of Agency Mortgage-Backed Asset Class to the **Bloomberg Barclays US MBS Index** (the “Benchmark”). Performance results will be monitored and evaluated quarterly. However, the success in achieving the objective will be measured on a three-year, five-year, and ten-year annualized basis.

Investment Guidelines:

Staff will have full discretion to manage the Agency Mortgage-Backed Asset Class consistent with the investment guidelines stated below. Compliance with the following guidelines for permitted investments and other restrictions is the sole responsibility of the Staff. Any exceptions or compliance violations are to be reported to the Board of Investments at the next scheduled quarterly Board meeting.

Permitted Investments:

The Agency Mortgage-Backed Asset Class may invest only in the following:

1. Securities and derivatives held in separate accounts, commingled funds, limited partnerships, or limited liability companies managed by internal or external investment managers and governed by their respective investment management contracts and investment guidelines;
2. Individual securities that are approved for purchase by the Chief Investment Officer and purchased and monitored by Staff; and

3. Cash – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

Other Restrictions:

1. A maximum of 20% of the Net Asset Value of the Agency Mortgage-Backed Asset Class may be held in U.S. Treasury/Agency securities;
2. A maximum of 10% of the Net Asset Value of the Agency Mortgage-Backed Asset Class shall be held in Non-U.S. securities whether they are denominated in U.S. dollars or a foreign currency;
3. A maximum of 10% of the Net Asset Value of the Agency Mortgage-Backed Asset Class shall be held in U.S. residential Non-Agency Mortgage-Backed Securities (MBS & CMO);
4. A maximum of 10% of the Net Asset Value of the Agency Mortgage-Backed Asset Class shall be held in asset backed securities (ABS);
5. A maximum of 10% of the Net Asset Value of the Agency Mortgage-Backed Asset Class shall be held in commercial mortgage backed securities (CMBS);
6. The average duration of the Agency Mortgage-Backed Asset Class will be maintained in a range of + or – 20% of the index duration;
7. A maximum of 10% of the Net Asset Value of the Agency Mortgage-Backed Asset Class shall be invested in fixed income securities either non-rated or rated lower than Aaa by Moody’s or AAA by S&P or Fitch. (In the case of split rated securities, the lowest rating will apply.); and
8. A maximum of 5% of the Net Asset Value of the Agency Mortgage-Backed Asset Class shall be invested in Cash held at the Agency Mortgage-Backed Asset Class level (not including cash held by internal or external managers in separate accounts or commingled funds).

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, while considering current market conditions and the associated costs of rebalancing. At the Board’s next regularly scheduled quarterly meeting, the CIO shall inform the Board of any cases that the Agency Mortgage-Backed Asset Class allocations were outside of the limits and either inform the Board of the actions that were taken to return the Asset Class back within guidelines or a plan to do so.

**Schedule II-K:
Investment Objectives and Guidelines
High Yield Asset Class**

Effective Date of Schedule: May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for High Yield.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the High Yield Asset Class; and
2. Provide diversified exposure to the High Yield markets in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the High Yield Asset Class is to attain the highest possible total return within the parameters of the Investment Guidelines set forth below.

Performance:

Success in achieving this objective will be measured by comparing the risk and after-fee return of the High Yield Asset Class to the **Bloomberg Barclays US High Yield - 2% Issuer Cap Index** (the "Benchmark"). Performance results will be monitored and evaluated quarterly. However, the success in achieving the objective will be measured on a three-year, five-year, and ten-year annualized basis.

Investment Guidelines:

Staff will have full discretion to manage the High Yield Asset Class consistent with the investment guidelines stated below. Compliance with the following guidelines for permitted investments and other restrictions is the sole responsibility of the Staff. Any exceptions or compliance violations are to be reported to the Board of Investments at the next scheduled quarterly Board meeting.

Permitted Investments:

The High Yield Asset Class may invest only in the following:

1. Securities and derivatives held in separate accounts, commingled funds, limited partnerships, or limited liability companies managed by internal or external investment managers and governed by their respective investment management contracts and investment guidelines;
2. Individual fixed income securities that are approved for purchase by the Chief Investment Officer and purchased and monitored by Staff; and

3. Cash – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

Other Restrictions

1. A maximum of 10% of the Net Asset Value of the High Yield Asset Class shall be held in Non-U.S. securities if they are denominated in a foreign currency;
2. The average duration of the High Yield Asset Class will be maintained in a range of + or – 25% of the index duration;
3. A maximum of 10% of the Net Asset Value of the High Yield Asset Class shall be invested in Emerging Market Debt securities; and
4. A maximum of 5% of the Net Asset Value of the High Yield Asset Class shall be invested in Cash held at the Asset Class level (not including cash held by internal or external managers in separate accounts or commingled funds).

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, while considering current market conditions and the associated costs of rebalancing. At the Board’s next regularly scheduled quarterly meeting, the CIO shall inform the Board of any cases that the High Yield Asset Class allocations were outside of the limits and either inform the Board of the actions that were taken to return the High Yield Asset Class back within guidelines or a plan to do so.

**Schedule II-L:
Investment Objectives and Guidelines
Cash Asset Class**

Effective Date of Schedule: May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for the Cash Asset Class that is part of the Consolidated Asset Pension Pool.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the Cash Asset Class; and
2. Provide exposure to the cash-equivalent markets in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the Cash Asset Class is to attain the highest possible total return within the parameters of the Investment Guidelines set forth below.

Performance:

Success in achieving this objective will be measured by comparing the risk and after-fee return of the Cash Asset Class to the **Federal Reserve US Treasury Constant Maturity 1-Month Index** (the “Benchmark”). Performance results will be monitored and evaluated quarterly. However, the success in achieving the objective will be measured on a three-year, five-year, and ten-year annualized basis.

Investment Guidelines:

Staff will have full discretion to manage the Cash Asset Class consistent with the investment guidelines stated below. Compliance with the following guidelines for permitted investments and other restrictions is the sole responsibility of the Staff. Any exceptions or compliance violations are to be reported to the Board of Investments at the next scheduled quarterly Board meeting.

Permitted Investments:

The Cash Asset Class may invest only in the following:

1. Cash and Cash Equivalents – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, while considering current market conditions and the associated costs of rebalancing. At the Board’s next regularly scheduled quarterly meeting, the CIO shall inform the Board of any cases that the Cash Asset Class allocations were outside of the limits and either inform the Board of the actions that were taken to return the Cash Asset Class back within guidelines or a plan to do so.

**Schedule II-M:
Investment Objectives and Guidelines
Diversifying Strategies Asset Class**

Effective Date of Schedule: May 1, 2018

This Schedule is effective upon adoption by the Board of Investments and supersedes all previous Investment Objectives and Guidelines for Diversifying Strategies.

Statement of Purpose:

The purpose of these objectives and guidelines is to:

1. Establish the investment objectives and performance standards of the Asset Class.
2. Provide diversified exposure to CAPP (Consolidated Asset Pension Pool) in a prudent and cost-effective manner.

Investment Objective:

Strategic:

The objective of the Diversifying Strategies Asset Class is to provide additional diversification to the Retirement Plans beyond the diversification derived from the other asset classes and to assist in achieving the long-term expected returns for the Retirement Plans.

These objectives are expected to be achieved over a long-period of time by:

1. Reducing the impact of negative investment performance for the Retirement Plans during periods of significant decline in the Public Equity markets.
2. Helping to complement the other asset classes in targeting investment strategies that are expected to produce investment returns greater than the level provided by cash or a short U.S. Treasury investment.

Performance and Risk:

Success in achieving this objective will be measured by comparing the risk and after-fee return of Diversifying Strategies Asset Class to the **Bloomberg Barclays US Intermediate Treasury Index** (the "Benchmark"). Performance results will be monitored and evaluated quarterly. However, the success in achieving the objective will be measured on a three-year, five-year, and ten-year annualized basis.

Investment Guidelines:

The Diversifying Strategies Asset Class shall invest in a wide spectrum of global public securities investment types (including, but not limited to, equities, commodities, currencies, preferred stocks, convertible bonds, fixed income, and cash equivalents).

It is expected that Diversifying Strategies shall invest in public market investments that provide liquidity and meaningful transparency to portfolio characteristics and risk exposures.

The Diversifying Strategies Asset Class may invest in both single-asset class strategies and multi-asset class strategies.

Diversifying Strategies will utilize long-only, short-only, and long/short strategies.

Permitted Investments:

The Diversifying Strategies Asset Class may invest in the following:

1. Securities and derivatives held in separate accounts, open-ended funds, closed-ended funds, commingled funds, limited partnerships, or limited liability companies managed by external investment managers and governed by their respective investment management contracts and investment guidelines;
2. Individual public or private securities received as distributions from funds listed above;
3. Exchange-Traded Funds (ETFs) based on a public market index that is approved by the Chief Investment Officer and purchased and monitored by Staff;
4. Fixed Income Portfolios including longer-maturity U.S. Treasury fixed income securities that are approved for purchase by the Chief Investment Officer and purchased and monitored by Staff; and
5. Cash – either an investment in the Short-Term Investment Pool (STIP), a vehicle available through the Custodian, or an SEC registered money market fund that is considered a “US Treasury” or “US Government” money market fund per the SEC regulations.

Other Restrictions:

1. Cash held at the Diversifying Strategies Asset Class level (not including cash held by external managers in separate accounts or commingled funds) is limited to 5% of the Diversifying Strategies Asset Class Net Asset Value;
2. The Diversifying Strategies Asset Class shall not invest in single-asset class dedicated mandates where the investment strategy is considered consistent with one of the other CAPP Asset Classes;
3. Individual public or private securities received as distributions will be liquidated over a reasonable time-period dependent on market conditions; and
4. The CAPP percentage of Net Asset Value invested with a single external investment manager or General Partner within the Diversifying Strategies Asset Class shall be no greater than 1%.

If at any time, due to market fluctuations or any other circumstances, any of the guidelines are not maintained, Staff will use its best efforts to conform to these limits in a timely manner, considering current market conditions and the associated costs of rebalancing. At the Board’s next regularly scheduled quarterly meeting, the Chief Investment Officer shall inform the Board of any cases that the Diversifying Strategies Asset Class allocations were outside of the limits and either inform the Board of the actions that were taken to return the Diversifying Strategies Asset Class back within guidelines or provide a plan to do so.