

Minutes

A regular meeting of the Virginia Retirement System Board of Trustees was held on October 18, 2018 in Richmond, Virginia with the following members present:

Board members present:

Mitchell L. Nason, Chair

Diana F. Cantor, Vice Chair

Hon. J. Brandon Bell, II

Wallace G. Harris

W. Brett Hayes

William H. Leighty

O'Kelly E. McWilliams, III

Joseph W. Montgomery

Troilen G. Seward

Also present were: Patricia Bishop, Ron Schmitz, John Alouf, Rory Badura, Farley Beaton, Jeanne Chenault, Michael Cooper, Harriet Covey, Sara Denson, Barry Faison, Josh Fox, Bryan Gardiner, Brian Goodman, JT Grier, KC Howell, Robert Irving, Ross Kasarda, LaShaunda King, Kristina Koutrakos, Matt Lacy, Chung Ma, Curt Mattson, Taylor Melton, Laurie Nelson, Walker Noland, Angela Payne, Andrea Peeks, Jennifer Schreck, Capri Stanley-Smith, Bob Tyldsley, Leslie Weldon, Dan Whitlock, and Cindy Wilkinson.

Guests present were: Justin Ferrell, Auditor of Public Accounts; Sarah Herzog, Senate Finance Committee; Liz Myers, Office of the Attorney General; Jennifer O'Dell, Laborers International Union of North America; Kimberly Sarte and Lauren Axselle, Joint Legislative Audit and Review Commission; Bea Snidow, Virginia Education Association; and Matt Yonz, Larry Langer, and Brad Wild of Cavanaugh Macdonald Consulting, L.L.C.

The meeting convened at 1:01 p.m.

APPROVAL OF MINUTES

Upon a motion by Mr. Harris, with a second by Mr. Montgomery, the minutes of the September 13, 2018 meeting were approved.

REPORT OF THE CHIEF INVESTMENT OFFICER

Mr. Schmitz began his report with a market overview. He then discussed asset allocation and reviewed plan performance – which continues to be strong relative to benchmarks. He also discussed fund volatility, tracking error, and information ratio – concluding that risk measures

are all within Board-approved levels. Mr. Schmitz then reviewed the New Investments and Terminations Report, the WaM Quarterly Report and the Quarterly External Investment Manager Referral Report with the Board.

Mr. Nason thanked Mr. Schmitz for his report.

**REPORT OF THE BENEFITS AND
ACTUARIAL COMMITTEE**

The Board received the Benefits and Actuarial Committee report of October 17, 2018 and placed it on file.

**2018 Actuarial Valuation Results for
Five Statewide Retirement Systems,
Group Life Insurance, Health
Insurance Credit and the Virginia
Sickness and Disability Program**

Mr. Harris reported that the 2018 Actuarial Valuation Results for the Five Statewide Retirement Systems, Group Life Insurance, Health Insurance Credit and the Virginia Sickness and Disability Program were reviewed during the last meeting. The VRS plan actuary, Cavanaugh Macdonald Consulting, L.L.C., conducted its annual actuarial valuations as of the close of the fiscal year (June 30) and presented their findings to the committee.

Mr. Harris introduced Larry Langer, from Cavanaugh Macdonald Consulting, who presented the results of the June 30, 2018 valuation. Mr. Langer began by noting that in odd-numbered years the valuations are used to establish employer contribution rates. In even-numbered years, the results are shared with the Board of Trustees and other stakeholders to inform the Board of any emerging trends or indications of the magnitude and direction of contribution rates. The results generally reflect improved funded status and contribution rates trending slightly downward compared to the prior valuation.

Following Mr. Langer's presentation, upon a motion by Mr. Harris, with a second by Ms. Seward, the Board approved the following action:

Request for Board Action: 2018-10-16
Accept the Plan Actuary's Valuations
as of June 30, 2018 for the Five
Statewide Retirement Plans, Group
Life Insurance, Health Insurance
Credit, and VSDP.

The Board accepts the June 30, 2018 Actuarial Valuation conducted by the VRS plan actuary, Cavanaugh Macdonald Consulting, L.L.C., for the Five Statewide Retirement Systems, Group Life Insurance, Health Insurance Credit and the Virginia Sickness and Disability Program.

Ms. Cantor and Mr. Leighty were absent for the vote on this matter.

Review 2018 Stress Testing and
Scenario Analysis Report

Mr. Harris continued his report by discussing the 2018 Stress Testing and Scenario Analysis Report. During the 2017 General Assembly session, legislation was passed that

codified VRS' already-existing process of conducting stress testing of its plans. As a result, however, VRS now produces a separate stress testing and scenario report. While future experience may be positive or negative, the report focuses primarily on downside risks to the plans. A draft stress testing and scenario report was presented to the committee. Once it is finalized later this year, it will be submitted to the General Assembly. The VRS Stress Test and Sensitivity Analysis based on the 2018 valuations will be developed and delivered in the spring of 2019.

Upcoming Meetings

Lastly, Mr. Harris noted that the next Benefits and Actuarial Committee meeting is scheduled for November 13, 2018 at 1:00 p.m.

Mr. Nason thanked Mr. Harris for his report.

REPORT OF THE DEFINED CONTRIBUTION PLANS ADVISORY COMMITTEE

The Board received the Defined Contribution Plans Advisory Committee of September 20, 2018 and placed it on file.

Mr. Hayes began his report by announcing two new Committee members, Ravindra Deo, Executive Director, Federal Retirement Thrift Investment Board, and Allan Carmody, Finance Director, Chesterfield County.

Annual Investments Review

Mr. Hayes advised that staff had provided its annual investments review to the committee that included a review of the total DC plans assets overseen by the Investment Department. Staff provided an overview of the DCPAC duties and responsibilities as it relates to investments, and a review of the Investment Belief Statements. In addition to the formal review package, staff shared annual investment program review highlights for both the unbundled DC plans structure and the bundled DC ORPHE structure. Staff did not have any recommended changes to the DC Plans Investment Belief Statements, the Investment Policy Statement for an Unbundled DC Plan Structure or the Investment Policy Statement for a Bundled DC Plan Structure.

Custom Target Date Evaluation Project

Mr. Hayes reported that the custom target date evaluation project continues and staff had provided a review of various trade-offs for consideration including a spectrum of custom target date options as well as anticipated costs of a custom approach. Staff shared with the Committee VRS' fiduciary responsibility as it evaluates a custom approach and provided an overview of target date portfolio allocation

differences between the supplemental 457 Plan and Hybrid DC Plan. Additionally, staff reviewed excerpts from Callan's 2018 DC Trends Survey relating to target date funds, which included reasons why peers elected to use a custom target date approach.

Administrative Reports and Communication Update

Next, Mr. Hayes provided an overview of the current Self-directed Brokerage Account requirements and monthly reports:

- The total assets and number of accounts under the management in the second quarter of 2018;
- New plan adoptions and transitions of assets for second quarter of 2018, and a historical overview of plan adoptions and transitions to the COV 457 and Cash Match Plans;
- An overview of current and upcoming Hybrid COV 457 Crossover Population initiatives related to Hybrid members missing out on the employer match or potentially exceeding contribution limits;
- A new Account Aggregation feature in Account Access for all participants with ICMA-RC, with a launch date in the third quarter of 2018;
- Review of total assets in the COV 457 and the Virginia Cash Match Plans, as well as number of accounts and average balance in the plans for the second quarter of 2018;
- An overview of COV 457 and Virginia Cash Match plans contributions, withdrawals, and net cash flow for the second quarter of 2018;
- Review of total assets in the Hybrid Retirement Plan for the second quarter of 2018, including the assets, accounts and average balance in the Hybrid 401(a) Cash Match Plan and Hybrid 457 Deferred Compensation Plan;
- An overview of cash flow from the defined contribution component of the Hybrid Retirement Plan, including contributions, withdrawals and net cash flow for the second quarter of 2018;
- An update on the Hybrid 457 voluntary contribution elections and participation rates, including the auto-escalation population and number of participants with maximum of voluntary contributions; and
- An update on the SmartStep program feature, Enhanced Active Choice Concept in Account Access and new GoHybrid webpage launched for Hybrid members in the second quarter of 2018.

- *An overview of the DC Plans goal of asset retention for the second quarter of 2018, including a review of assets across all unbundled plans, distribution types, and retention efforts.*

ORPHE Update

Mr. Hayes then discussed the ORPHE updates provided by staff:

- *Total ORPHE assets for the second quarter of 2018, and assets by plan provider (DCP, TIAA, and Fidelity);*
- *An update on the second quarter 2018 ORPHE enrollment and new provider statistics based on newly-eligible employees among the three providers;*
- *ORPHE provider updates, including opportunities to improve and customize educational materials on provider microsites with VRS, and develop beneficiary campaigns;*
- *Review of response by participants with deselected providers to annual fee disclosure statement for the second quarter of 2018;*
- *An update on employer and participant outreach initiatives, including ORPHE employer impact meetings, the ORPHE Employer Annual Update and open enrollment meetings for the third quarter of 2018.*

Proposed 2018 Meetings

Lastly, Mr. Hayes noted that the next DCPAC meeting is scheduled for December 6, 2018 at 10:30 a.m.

Mr. Nason thanked Mr. Hayes for his report.

REPORT OF THE INVESTMENT POLICY AND ADMINISTRATION AND PERSONNEL COMMITTEES

The Board received the report of the Investment Policy and Administration and Personnel Committees and placed it on file.

Continued Consideration of Investment Professionals' Pay Plan

Mr. Nason advised that based on the discussion at the September 12, 2018 Administration and Personnel Committee meeting, the VRS Board of Trustees asked McLagan to continue its review of market compensation and incentive pay practices for the Investment Professionals' Pay Plan (Pay Plan) with regard to the alternative frameworks for the absolute return adjustment.

Michael Oak from McLagan presented additional information related to various options that could be included in the Pay Plan, specifically related to the absolute return adjustment. Such options could provide guidance to the

Board with regard to incentive pay, particularly in years of negative returns.

After discussion about the various options, both committees made a motion to endorse McLagan's Option VI (as presented in McLagan's October 18, 2018 report) and requested that the Administration and Personnel Committee present it to the Board in November.

Option VI is defined as: Negative returns adjusted as is. No adjustment for returns between 0% and the assumed rate of return, currently 7%. Positive adjustment for returns in excess of the assumed rate of return.

Mr. Nason noted that the motion was unanimously approved and the Administration and Personnel Committee would review any amendments to the Pay Plan and any impact testing at its next meeting. After its review, the Administration and Personnel Committee will then bring the recommendation to the Board at the November meeting.

Asset/Liability Study Planning Overview

Lastly, Mr. Nason provided a brief overview of the upcoming Asset/Liability study process. The last formal study was performed in 2016 and the next formal study is tentatively planned for 2019. In addition, VRS staff plans to perform updates to the study in interim years, so that the Asset/Liability study process is addressed annually. The committees discussed the proposal and the various service providers available to perform the study. In conclusion, Mr. Nason noted the proposed timeline of the project and that there was overall agreement with the timeline and plan.

ANNUAL BOARD OF TRUSTEES CODE OF ETHICS AFFIRMATION

Next, Mr. Cooper presented an overview of the Board of Trustees' Annual Code of Ethics and Standards of Conduct. The VRS Board of Trustees is the fiduciary of the plans it administers and must discharge all of its duties solely in the interest of the members and beneficiaries. The Code of Ethics and Standards of Conduct was established to define ethical and behavior guidelines within which Board members are expected to conduct themselves.

Mr. Cooper noted that adherence to the Code of Ethics and Standards of Conduct allows the Board to:

- Act in accordance with its fiduciary responsibility.*
- Pursue mandates of its Governance Policy.*
- Foster harmonious relations among members.*
- Facilitate mutual respect and public confidence.*

Lastly, Mr. Cooper discussed conflicts of interest, gifts and travel, and noted two general provisions:

- *The Code of Ethics and Standards of Conduct shall not be construed as excusing any Board member from any other restrictions of state or federal law concerning conflicts of interest and fiduciary duties, nor shall it be construed as superseding such state and federal law.*
- *Any breach of the Code of Ethics and Standards of Conduct shall be referred to the Administration and Personnel Committee for investigation, with a report of its findings and a recommended course of action presented to the Board of Trustees.*

The Board members reviewed the Code of Ethics and Standards of Conduct and reaffirmed their acknowledgement of the policy by signing the certification forms which were kept on file.

Mr. Nason thanked Mr. Cooper for his presentation.

REPORT OF THE DIRECTOR

Ms. Bishop began her report by discussing an additional budget request submitted to the Department of Planning and Budget. The existing language in the Appropriation Act requires that contributions be paid timely, but does not expressly state that such payments include those other than the defined benefit contributions, which has resulted in delayed payments of defined contribution amounts by some employers. VRS staff submitted a request to the Department of Planning and Budget to include in the Governor's introduced budget to expand the definition of payments to include all required contributions and premiums.

Next, Ms. Bishop provided an overview of the VRS Roadmap for Fiscal Year 2019. The Cardinal Payroll System Implementation is in yellow status as the host agency, the Department of Accounts, continues to evaluate its revised project schedule. VRS has completed all requirements to date and will resume project activities when the new schedule is released. All other projects and operational activities are on schedule or completed, with the exception of the Modernization – Phase 4 Retirement Processing and Disbursements, which is also in yellow status.

Ms. Bishop discussed new VRS coverage for October 2018, and then introduced Taylor Melton, a new participant in the

Virginia Management Fellows Program, who will be working with VRS for the next eight months. Ms. Bishop also noted the Retiree Birthday Card Program designed by VRS staff to recognize retirees over 100 years of age.

The Board went into a brief recess beginning at 2:01 p.m. The meeting reconvened at 2:24 p.m.

Ms. Bishop continued her report and briefed the Board on VRS' presentation at the Virginia Retired Teachers Association's fall conference and VRS' celebration of Customer Service Week from October 1-5, 2018.

Ms. Bishop reported that the National Association of Government Defined Contribution Administrators (NAGDCA) presented VRS with an award for the Optional Retirement Plan Online Election Project in myVRS.

Lastly, Ms. Bishop noted that the Virginia Journal of Education featured an article on VRS' Financial Wellness Program and using the myVRS planner and tools.

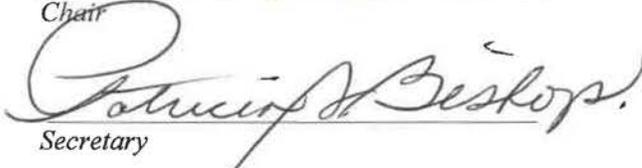
Future Meetings

Mr. Nason thanked Ms. Bishop for her report and announced the next Investment Advisory Committee meeting is scheduled for November 8, 2018, followed by the Benefits and Actuarial Committee meeting on November 13, 2018. The next Board of Trustees meeting is scheduled for November 14, 2018.

Adjournment

There being no further business, the meeting adjourned at 2:42 p.m.


Chair


Secretary

Report

The Benefits and Actuarial Committee met on October 17, 2018 and took up the following matters:

2018 Actuarial Valuation Results for Five Statewide Retirement Systems, Group Life Insurance, Health Insurance Credit and the Virginia Sickness and Disability Program

Ms. Bishop introduced representatives from the VRS plan actuary, Cavanaugh Macdonald Consulting, LLC to present the June 30, 2018 actuarial valuations for the Five Statewide Retirement Systems, Group Life Insurance, Health Insurance Credit and the Virginia Sickness and Disability Program. The VRS actuary conducts annual actuarial valuations as of the close of the fiscal year (June 30). In odd-numbered years the valuations are used to establish employer contribution rates. The results in even-numbered years are shared with the Board of Trustees to inform the Board of any emerging trends or indications of the magnitude and direction of contribution rates. The June 30, 2018 valuation results generally reflect improved funded status and contribution rates trending slightly downward compared to the prior valuation. After receiving the report and some discussion, the Committee recommends that the Board accept the valuations by approving the following action:

Request for Board Action: The Board accepts the June 30, 2018 Actuarial Valuations conducted by the VRS plan actuary, Cavanaugh Macdonald Consulting, LLC, for the Five Statewide Retirement Systems, Group Life Insurance, Health Insurance Credit and the Virginia Sickness and Disability Program.

Review 2018 VRS Stress Testing and Scenario Analysis Report

During the 2017 General Assembly session legislation was passed that codified VRS' already-existing process of conducting stress testing of its plans. As a result, however, VRS now produces a separate stress testing and scenario analysis report. While future experience may be positive or negative, the report focuses primarily on downside risks to the plans. Mr. Badura presented the draft stress testing and scenario analysis report, which will be submitted to the General Assembly later this year. The draft report, which is subject to additional editorial and content review, is on Directors Desk.

Upcoming B&A Committee Meetings

The next Committee meeting is scheduled for November 13, 2018 at 1:00 pm in the VRS Conference Room, Third Floor, 1111 E. Main Street.

Submitted to the Board of Trustees on October 18, 2018.


Wallace G. Harris, Chair
Benefits and Actuarial Committee

**REPORT OF THE
DEFINED CONTRIBUTION PLANS ADVISORY COMMITTEE
For the Committee Meeting on Friday, September 20, 2018**

The Defined Contribution Plans Advisory Committee met on Thursday, September 20th, and took up the following matters:

Welcome and Introduction:

Staff welcomed and introduced two new Committee members, Ravindra Deo, Executive Director, Federal Retirement Thrift Investment Board, and Allan Carmody, Finance Director, Chesterfield County Budget and Management, to the DCPAC.

Investments:

Annual Investments Review

Staff provided its annual investments review to the DCPAC that included a review of the total DC plans assets overseen by the Investment Department. Staff provided an overview of the DCPAC duties and responsibilities as it relates to investments, and a review of the DC Plans Investment Belief Statements. In addition to the formal review package provided to the Committee staff shared annual investment program review highlights for both the unbundled DC plans structure and the bundled DC ORPHE structure.

Staff did not have any recommended changes to the DC Plans Investment Belief Statements, the Investment Policy Statement for an Unbundled DC Plan Structure or the Investment Policy Statement for a Bundled DC Plan Structure.

Custom Target Date Evaluation Project

The custom target date evaluation project continues. Staff provided a review of various trade-offs for consideration including a spectrum of custom target date options as well as anticipated costs of a custom approach. Staff shared with the Committee VRS' fiduciary responsibility as it evaluates a custom approach and provided an overview of target date portfolio allocation differences between the supplemental 457 Plan and Hybrid DC Plan. Additionally, staff reviewed excerpts from Callan's 2018 DC Trends Survey relating to target date funds which included reasons why peers elected to use a custom target date approach.

Administration:

Administrative Reports and Communication Update

Staff provided a review of the current Self-directed Brokerage Account requirements, and an overview of monthly reports, specifically highlighting the following:

- (1) The total assets and number of accounts under management in the second quarter of 2018;
- (2) New plan adoptions and transition of assets for second quarter 2018, and a historical overview of plan adoptions and transitions to the COV 457 and Cash Match Plans;
- (3) An overview of current and upcoming Hybrid COV 457 Crossover Population initiatives related to Hybrid members missing out on the employer match or potentially exceeding contribution limits;
- (4) A new Account Aggregation feature in Account Access for all participants with ICMA-RC, with a launch date in the third quarter 2018;
- (5) Review of total assets in the COV 457 and Virginia Cash Match Plans, as well as number of accounts and average balance in the plans for the second quarter of 2018;
- (6) An overview of COV 457 and Virginia Cash Match plans contributions, withdrawals and net cash flow for the second quarter of 2018;
- (7) Review of total assets in the Hybrid Retirement Plan for the second quarter of 2018, including the assets, accounts and average balance in the Hybrid 401(a) Cash Match Plan and Hybrid 457 Deferred Compensation Plan;
- (8) An overview of cash flow from the defined contribution component of the Hybrid Retirement Plan, including contributions, withdrawals and net cash flow for the second quarter of 2018;
- (9) An update on the Hybrid 457 voluntary contribution elections and participation rates, including the auto-escalation population and number of participants with maximum of voluntary contributions; and
- (9) An update on the SmartStep program feature, Enhanced Active Choice Concept in Account Access and new GoHybrid webpage launched for Hybrid members in the second quarter of 2018

ORPHE Update

- (1) Total ORPHE assets for the second quarter 2018, and assets by plan provider (DCP, TIAA, and Fidelity);
- (2) An update on the second quarter 2018 ORPHE enrollment and new provider statistics based on newly-eligible employees among the three providers;

- (3) ORPHE provider updates, including opportunities to improve and customize educational materials on provider microsites with VRS, and develop beneficiary campaigns;
- (4) Review of response by participants with deselected providers to annual fee disclosure statement for the second quarter of 2018;
- (5) An update on employer and participant outreach initiatives, including ORPHE employer impact meetings, the ORPHE Employer Annual Update and open enrollment meetings for the third quarter of 2018; and
- (6) An overview of the DC Plans goal of asset retention for the second quarter of 2018, including a review of assets across all unbundled plans, distribution types, and retention efforts.

Other Business:

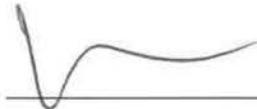
There was no other business.

Proposed 2018 Meetings:

The next meeting of the DCPAC will take place on December 6th, from 10:30 a.m. to 1:30 p.m. Also, for those who are interested, the ORPHE Annual Employer Update is scheduled for September 27, 2018, but is not a meeting of the DCPAC. The DCPAC will also poll for 2019 meeting dates.

That concludes my report to the Board.

Submitted to the Board of Trustees on October 18, 2018.



Brett Hayes, Chair
Defined Contribution Plans Advisory Committee

Report

A joint meeting of the Investment Policy Committee and the Administration and Personnel Committee met on October 18, 2018 and took up the following matters:

APPROVAL OF MINUTES

The Investment Policy Committee approved the minutes of its meetings from the following dates:

- i. September 19, 2017
- ii. October 19, 2017
- iii. December 14, 2017
- iv. February 8, 2018
- v. April 12, 2018
- vi. August 28, 2018

The Administration and Personnel Committee approved the minutes of its September 12, 2018 meeting.

Continued Consideration of Investment Professionals' Pay Plan

Based on the discussion at the September 12, 2018 Administration and Personnel Committee meeting, the VRS Board of Trustees asked McLagan to continue its review of market compensation and incentive pay practices for the Investment Professionals' Pay Plan (Pay Plan) with regard to the alternative frameworks for the absolute return adjustment.

Michael Oak from McLagan presented additional information related to various options that could be included in the Pay Plan, specifically related to the absolute return adjustment. Such options could provide guidance to the Board with regard to incentive pay, particularly in years with negative returns.

After a robust discussion about the various options, both Committees made a motion to endorse McLagan's Option VI (as presented in McLagan's October 18, 2018 report) and requested the Administration and Personnel Committee present it to the Board in November.

Option VI is defined as: Negative returns adjusted as is. No adjustment for returns between 0% and the assumed rate of return, currently 7%. Positive adjustment for returns in excess of the assumed rate of return.

The motion was unanimously approved. The Administration and Personnel Committee will review any amendments to the Pay Plan and any impact testing at its next meeting. After its review, the Administration and Personnel Committee will then bring the recommendation to the Board at the November meeting.

Asset/Liability Study Planning Overview

Mr. Schmitz provided a brief overview of the upcoming Asset/Liability Study process. Mr. Schmitz stated the last formal study was performed in 2016 and the next formal study is tentatively planned for 2019. In addition, Mr. Schmitz noted VRS staff plans to perform updates to the study in interim years, so that



**Joint Investment Policy
Committee/Administration and Personnel
Committee**
Joint Committee Report to the Board of Trustees
October 18, 2018

the Asset/Liability process is addressed annually. There was a discussion about the proposal and also the various service providers available to perform the study. Mr. Schmitz also discussed the proposed timeline for this project. There was overall agreement with this timeline and plan.

Submitted to the Board of Trustees on October 18, 2018.

A handwritten signature in black ink, appearing to read 'Mitchell L. Nason', written over a horizontal line.

Mitchell L. Nason, Chair
Investment Policy Committee
Administration and Personnel Committee