

State of Alaska
ALASKA RETIREMENT MANAGEMENT BOARD
MEETING

Location:
Dena'Ina Convention Center
600 West Seventh Avenue
Anchorage, Alaska

MINUTES OF
April 20-21, 2017

Thursday, April 20, 2017

CALL TO ORDER

CHAIR GAIL SCHUBERT called the meeting of the Alaska Retirement Management Board (ARMB) to order at 9:03 a.m.

ROLL CALL

Eight ARMB trustees were present at roll call to form a quorum.

Board Members Present

Gail Schubert, *Chair*
Robert Johnson, *Vice Chair*
Gayle Harbo, *Secretary*
Kristin Erchinger
Commissioner Sheldon Fisher
Commissioner Randall Hoffbeck - arrived late
Tom Brice
Norman West
Bob Williams

Board Members Absent

None

Investment Advisory Council Members Present

Dr. William Jennings
Dr. Jerrold Mitchell
Robert Shaw

Investment Advisory Council Members Absent

None

Department of Revenue Staff Present

Jerry Burnett, Deputy Commissioner
Bob Mitchell, Acting Chief Investment Officer
Scott Jones, State Comptroller
Zachary Hanna, State Investment Officer
Pamela Leary, Director, Treasury Division
Judy Hall, Board Liaison
Stephanie Alexander, Board Liaison

Department of Administration Staff Present

Kevin Worley, Chief Financial Officer, Division of Retirement & Benefits (DRB)
Ajay Desai, Director, DRB

Consultants, Invited Participants, and Others Present

Chris Dunne, ArrowMark Partners
Brian Schaub, ArrowMark Partners
Glenn Carlson, Brandes Investment Partners
Jeffrey Germain, Brandes Investment Partners
Lawrence Taylor, Brandes Investment Partners
Steven Center, Callan Associates, Inc.
Melissa Bissett, Conduent
David Kershner, Conduent
Larry Langer, Conduent
Stuart Goering, Department of Law, Assistant Attorney General
Leslie Thompson, Gabriel Roeder Smith
Paul Wood, Gabriel Roeder Smith
Ardra Belitz, Lazard Asset Management
Tony Dote, Lazard Asset Management
Tom Johnson, TIR
Chris Mathis, TIR
Mark Seaman, TIR
Chris Dyer, T.Rowe Price
Sudhir Nanda, T.Rowe Price
John Plowright, T.Rowe Price

PUBLIC MEETING NOTICE

JUDY HALL, Board Liaison, confirmed public meeting notice requirements had been met.

APPROVAL OF AGENDA

A motion was made to approve the agenda. The motion was seconded.

VICE-CHAIR JOHNSON corrected an error in the minutes of March 2 - 3, 2017, page 17, noting the words "Their PDA" should read "RPEA".

There was no objection to the approval of the agenda.

PUBLIC/MEMBER PARTICIPATION, COMMUNICATIONS, AND APPEARANCES

None

APPROVAL OF MINUTES: March 2 - 3, 2017

MRS. HARBO moved to approve the minutes of the March 2 - 3, 2017 meeting. MR. WILLIAMS seconded the motion.

The minutes were approved without objection.

REPORTS

1. CHAIR REPORT

CHAIR SCHUBERT congratulated MR. WILLIAMS on the recent announcement of being the first Alaskan inducted to the National Teachers' Hall of Fame.

CHAIR SCHUBERT requested Treasury Division Director PAMELA LEARY introduce the new Board Liaison. MS. LEARY informed MS. HALL will be retiring May 15th, and introduced her replacement, STEPHANIE ALEXANDER, who currently is the Special Assistant to COMMISSIONER HOFFBECK. MS. LEARY gave a description of her background and expressed gratitude for her transition into the Treasury Division.

2. COMMITTEE REPORTS

A. Actuarial Committee

MS. ERCHINGER reported the Actuarial Committee met the day before the Board meeting and focused primarily on the preparation for the upcoming experience analysis. MS. ERCHINGER noted the Committee has been in existence approximately one year and has made great progress in reducing the initial 16 pages of individual audit items down to three outstanding items.

MS. ERCHINGER acknowledged the positive collaboration efforts between the actuaries Conduent and Gabriel Roeder Smith (GRS) in resolving issues, thus enhancing the Committee's effectiveness. The Committee will be conducting a deeper review over the next year on the various actuarial assumptions, including the investment return assumption and the inflation assumption. MS. ERCHINGER informed the use of retiree healthcare proxy data has been replaced with actual retiree demographic data. MS. ERCHINGER expressed appreciation to the members of the Committee for their endeavors.

CHAIR SCHUBERT expressed appreciation to MS. ERCHINGER.

B. Evaluation Committee

None

3. TIR - PORTFOLIO UPDATE
EXECUTIVE SESSION: 9:12 a.m.

VICE-CHAIR JOHNSON moved to go into executive session to discuss matters, the identification of which would impact potential competitiveness and raise confidentiality issues regarding a potential investment. MS. ERCHINGER seconded the motion.

The motion passed unanimously.

CHAIR SCHUBERT called the meeting back to order at 11:47 a.m. and advised staff to move forward as discussed and to increase the budget for this project from \$5 million to \$6 million.

4. LAZARD ASSET MANAGEMENT

CHAIR SCHUBERT introduced Marketing Representative TONY DOTE and Portfolio Manager ARDRA BELITZ, who gave the presentation on the Emerging Income Strategy. MR. DOTE reported the strategy has been in place for 21 years and focuses on sources of return from income and currency. Prior to 2013, the strategy was very predictable, generating returns between 4% and mid-teens. MR. DOTE explained the environment changed and the currency markets sold off in 2013, 2014, and 2015. The portfolio was managed as conservatively as possible, with up to 50% of the portfolio in cash, but incurred negative returns and underperformed the benchmark during this anomalous period. MR. DOTE reviewed the 2008 since-inception audited returns of the portfolio at 31 basis points versus the Libor index at 64 basis points.

MR. DOTE noted improvement over the last five quarters and through close of business yesterday, the portfolio is up 4.7% and Libor is up 23 basis points. The portfolio is now fully invested. He believes this setting will continue because the currency markets are under-priced. The strategy is uncorrelated with global fixed income instruments, and provides return pick-up, return enhancement, liquidity, and diversification within the portfolio.

MS. BELITZ continued the presentation describing the investment process which utilizes frontier market opportunities within a 55-country universe to provide alpha and geographic diversification. Macroeconomic indicators and the balance of payment pressures are considered to allocate the capital for the highest prospective of return per unit of risk. MS. BELITZ reviewed the portfolio's holdings as of quarter-end; duration currently stands at 1.5 years, the yield is up to 6.5%, and diversification is extraordinarily broad.

MS. BELITZ is encouraged by the recovery in performance over the recent five quarters and expects the performance opportunities to continue. The portfolio is well-positioned to take advantage of the risk premia in local currency debt asset markets supported by the stabilization of the global macroeconomic data. MS. BELITZ discussed the improvements in emerging market foreign exchange reserves and the balance of payment trends.

CHAIR SCHUBERT recessed the meeting from 12:18 p.m. to 1:31 p.m.

5. PRIVATE EQUITY TACTICAL PLAN

State Investment Officer ZACHARY HANNA reported that the summary of the detailed written plan is included in the Board packet. The presentation is part of the end review and planning cycle for the ARM Board's investments in private equity. Abbott, Pathway and Callan have reviewed the plan and recommendations. MR. HANNA gave an overview of the private equity asset class, noting the private company investments are generally illiquid and long-term. Fund sponsors invest in private equity for higher returns, with diversification as a secondary factor.

MR. HANNA explained the ARM Board's return expectation is 350 basis points over the Russell 3000 Index. The asset class has delivered results in excess of the expectation over the long-term. Relative performance has been good in comparison with other partnerships and is in the middle of the second quartile. The portfolio's internal rate of return (IRR) since inception through 2016 is 10.9%, 366 basis points above the Russell 3000 at 7.45%. This is MR. HANNA noted the asset class has become more efficient over time and lower excess returns are anticipated. Going forward, staff may recommend reducing the premium return expectation to better reflect the increased efficiency and may also recommend using the Callan Composite Index to better reflect the international and small cap character of the private equity program.

MR. HANNA suggested the appeal to private equity is driven by factors including the number of opportunities, less efficient pricing, strong alignment of interest between owners and management, and the ability to focus on longer-term value. The less than positive characteristics include illiquidity, high fees, potential for high leverage, transparency evaluation issues, and incomplete benchmarks.

MR. HANNA described the private equity structure. Investments are made through limited partners (LPs) like the ARM Board. LPs often use advisors like Abbot, Pathway and Callan. General partners (GPs) provide the private investment expertise. The GPs share in the profits and have full discretion. Initially, the LP makes a commitment of capital to the partnership. The partnership makes investment in underlying portfolio companies. The GP then calls capital from the LP as investments are made. Capital is then distributed back to the LP as investments are sold. Most partnerships have a 10-year life with a possibility of extensions. The period of heaviest distributions is years three through eight.

MR. HANNA noted there are three primary private equity strategies and the ARMB portfolio target is comprised of 25% venture capital funds, 40% buyout funds, and 35% special situations funds. The portfolio is in line with the targets. Manager selection and diversification is critical for portfolio implementation. The largest source of liquidity for private equity is the M&A market. The second largest source of liquidity is the public equity market through initial public offerings. Both of these markets decreased in 2016. The remaining source of liquidity is through recapitalizations, which increased in 2016. Fundraising has been relatively stable and terms are relatively balanced. Access to top managers is becoming more challenging, with quick closes and allocation issues more

common. Investment activity has been high for three years. MR. HANNA believes liquidity will remain strong in 2017, if the bull market continues. Fundraising is expected to remain stable.

VICE-CHAIR JOHNSON asked if the private equity market now is more favorable for buyers or sellers, in terms of negotiating. MR. HANNA noted 2007 was an extreme sellers' market and once the financial crisis hit, it became a buyers' market for several years. He believes the current market is balanced and only on the margins are GPs changing their economic terms. MR. HANNA described a couple of occurrences last year when commitment levels were cut back because the investment cap had been reached.

MR. HANNA reviewed the recommended 2017 tactical plan. Staff recommends maintaining the long-term private equity target of 12%. The actual asset allocation for this year to private equity is 9%. The outlined commitment schedule gradually increases the allocation over a 10-year planning cycle to reach the 12% target. Staff recommends adoption of Resolution 2017-02 approving the 2017 annual tactical plan.

MRS. HARBO moved to adopt Resolution 2017-02 approving the 2017 annual tactical plan. MS. ERCHINGER seconded the motion.

A roll call vote was taken, and the motion passed unanimously.

6. DRB REPORT

A. Legislative Update

CHAIR SCHUBERT introduced DRB Director AJAY DESAI to present the legislative update. House Bill (HB) 5 is now following HB 23, and the next hearing is scheduled for April 19th. HB 11, regarding the retirement incentive program, is scheduled for a hearing today. HB 47, regarding municipal PERS contribution, was referred to the Ruled Committee to be placed on the calendar. HB 224 is a new bill allowing the reemployment of DRS retirees while continuing to receive retirement benefits. The first hearing is scheduled on April 18th.

7. TREASURY DIVISION REPORT

MS. LEARY reminded Board members of Alaska Statute (AS) 37.10.220 requiring a review actuary examine the results of the experience analysis and the actuarial assumptions each year. The request for proposals (RFP) went out on March 6th. The Review Actuary Committee, Chaired by MRS. HARBO, received the responses and unanimously decided on a recommendation.

MRS. HARBO, as Chair of the Review Actuary Committee, moved to issue a notice of intent to award the contract, and following the expiration of the 10-day protest period, a contract be entered into with Gabriel Roeder Smith . MR. WEST seconded the motion.

A roll call vote was taken, and the motion passed unanimously.

MS. LEARY described the second action item before the Board regarding the meeting structure and 2018 calendar. MS. LEARY stated the recommendation is based on comments from the March meeting by IAC members, Callan representatives, and Board members. The first proposed item is for managers to develop presentations that emphasize a broader focus for Trustees. Managers might participate in a panel discussion on larger economic trends. Staff will provide more frequent manager due diligence updates to the trustees.

MS. LEARY explained the second proposed item creates a consent agenda that includes the following reports; Calendar/Disclosure, DRB, Treasury Division, CIO, and Fund Financials Reports. Each report will be presented with a one-page memo and the opportunity for questions will occur.

MS. LEARY described the third proposed item is the combination of the February and April meetings into one meeting in late March in Juneau. The proposed 2018 calendar includes a Juneau meeting on March 22nd and 23rd, and Anchorage meetings on June 21st and 22nd, September, December, and an education conference in either October or November. Staff recommends the action item as set forth.

MR. WEST moved the Board approve the conceptual plan for future meeting structure and agendas as set forth above; staff will structure the next meeting agenda as outline and also provide the 2018 calendar for approval at the June meeting. COMMISSIONER HOFFBECK seconded the motion.

VICE-CHAIR JOHNSON expressed concern regarding the compression from five meetings to four meetings, particularly in regard to eliminating the ability for the Board to build appropriate records and paper trails on its very important decisions. He agreed investment manager presentations could be restructured.

MRS. HARBO agreed with the concern of compressing the meetings. She referenced past manager panel discussions were helpful and believes they would be helpful again.

MS. ERCHINGER commented the recent compression from a two-day meeting to a day-and-a-half meeting is unordinary. It is usually stressful to accomplish the work within two days. MS. ERCHINGER liked the idea of streamlining the manager presentations to allow more time for content on discussions of broader issues. She believes the consent agenda items need more consideration and would prefer to keep the CIO Report and Fund Financial Report off a consent agenda.

MR. WILLIAMS expressed his support for consent agendas because the compression frees up time in the meeting. He believes the Board needs to have a discussion about the content of the consent agenda. MR. WILLIAMS expressed excitement regarding the education conference being scheduled in October/November. He believes the Board needs to have further discussion regarding the compression of five meetings to four meetings.

MS. LEARY requested direction from the Board regarding how to proceed with each of the proposed items.

MR. WEST withdrew the motion to approve the conceptual plan for future meeting structure and agendas as set forth above; staff will structure the next meeting agenda as outline and also provide the 2018 calendar for approval at the June meeting. COMMISSIONER HOFFBECK withdrew his second to the motion.

CHAIR SCHUBERT believes the 2018 calendar meeting dates in March, June, September, and December work with all schedules. She asked for the desire of the Board regarding an additional meeting date.

MR. BRICE stated if a fifth meeting were to be scheduled, he suggests a date outside the legislative window.

MRS. HARBO commented the Board met intentionally during the legislative session the first year to have a presence. She expressed concern about eliminating the April meeting and the possible effect on the actuaries.

MS. ERCHINGER suggested additional time to coordinate the meeting dates to consider the implications to the actuary, review actuary, and Actuarial Committee. She requested MS. HALL's input. MS. HALL informed she has talked with GRS regarding the proposed schedule and the specifics of the valuation timeline, but has not spoken with Conduent. She believes the proposed schedule would work for the actuaries, assuming their work goes as smoothly and timely as it did this year.

CHAIR SCHUBERT summarized the Board member comments and believes the February/March/April timeframe is when a possible additional meeting could be scheduled, and the other proposed dates are fine. There was no objection to the summarization.

VICE-CHAIR JOHNSON suggested it may be worthwhile for investment managers to present to the Board when their performance is not doing well.

8. CIO REPORT

Acting Chief Investment Officer BOB MITCHELL presented the CIO Report. MR. MITCHELL noted he streamlined his report from 56 pages at the last meeting to 16 pages this meeting and reviewed the summary of transaction. Funds were rebalanced to equalize the asset allocations in the plans. The allocation to U.S. Treasuries and to cash was increased, in part to fund outflows for benefit payments. A \$4.5 million capital call from Crestline was funded. The internally managed smart beta strategy approved by the Board was funded.

MR. MITCHELL noted futures contracts were rolled out in the portable alpha program and cash equitization programs. He directed members' attention to the attached schedule requested by MR. WILLIAMS providing detail on the size and frequency of the cash flows

into the margin accounts for the portable alpha program. Allianz/RCM Socially Responsible Investment Fund was notified of placement on the watch list.

MR. MITCHELL referenced VICE-CHAIR JOHNSON's recommendation to hear from managers who were performing poorly, and noted the reason Lazard Asset Management, Emerging Income (LEI) presented today is because of their underperformance compared to the benchmark over the last six years. Staff recommends LEI be placed on the watch list because of the six-year underperformance.

MRS. HARBO moved to place Lazard Asset Management Emerging Income on the watch list. MR. WILLIAMS seconded the motion.

The motion passed unanimously.

MR. MITCHELL informed the detail of staff's due diligence of first quarter manager review is included in the packet. As requested by COMMISSIONER HOFFBECK, brief descriptions of each public equity managers is included in the report. MR. MITCHELL reported a change in leadership at McKinley Capital occurred, with Robert A. Gillam replacing his father Robert B. Gillam as President of the company. Robert B. Gillam will continue as Chairman and CEO for the company, and Robert A. Gillam will continue as CIO.

9. FUND FINANCIAL REPORT

State Comptroller SCOTT JONES and Chief Financial Officer of the Division of Retirement and Benefits KEVIN WORLEY presented the Fund Financial Report. MR. JONES reviewed the financial statements for the month ended February 2017, and fiscal year-to-date. The approximate numbers are: the PERS system ended with \$17 billion, the TRS system with \$8.3 billion, the JRS with \$187 million, the National Guard and Naval Militia (NGNMRS) with \$37.6 million, SBS with \$3.6 billion, and Deferred Comp with \$863 million, for a total of \$30.1 billion, of which \$24.5 billion is nonparticipant-directed assets and \$5.6 billion is participant-directed assets. All of the funds are close to targets and within the asset allocation bands.

MR. WORLEY reported on the retiree drug subsidies received for the eight months ending in February; \$11.3 million for PERS Health Fund, \$3.7 million for TRS, and \$40,000 for JRS. The pharmacy rebates from Aetna are also included in the report. Employer collections are on track and discussions are occurring with the few smaller employers who have not been contributing. MR. WORLEY informed the requested Retirement System funding for FY 18 remains in the current bill before the Legislature.

MR. WORLEY expressed appreciation to MS. HALL on behalf of the Division for her fine work and service.

10. ACTUARY REPORTS

A. 2016 Actuarial Valuation Review

**DB and DCR Plans,
Public Employees' Retirement System (PRS),
Teachers' Retirement System (TRS)**

LESLIE THOMPSON and PAUL WOOD, consulting actuaries with Gabriel Roeder Smith (GRS), presented the results of the successful actuarial audit for the Defined Benefit Plan (DB) and Defined Contribution Plan (DC) for both PERS and TRS. MS. THOMPSON expressed appreciation to the Actuarial Committee and to Conduent for their cooperation and time spent on debating and vetting actuarial issues. Because of the work from the Actuarial Committee and the monthly calls with Conduent, the list of approximately 50 issues has been reduced and resolved to approximately five issues currently, none of which have a material impact on the plan.

MR. WOOD described the process and major components of the recent clean audit and informed all of the issues were resolved in the 2016 valuation or will be implemented in the 2017 valuation. MR. WOOD outlined the recommendations for the Employer Group Waiver Program (EGWP) to include enhanced disclosure in the report regarding the large decrease in cost and the sunset of some of the federal subsidies in 2020 that may not be reauthorized, given the current political environment.

MS. THOMPSON expressed appreciation to MS. HALL for her high level of competency serving the Committee well.

**B. 2016 Actuarial Valuation
DB and DCR: PERS and TRS Plans**

LARRY LANGER, DAVID KERSHNER and MELISSA BISSET of Conduent presented the 2016 Actuarial Valuation results. MR. LANGER expressed appreciation to staff and GRS for the peaceful collaborative process during the actuarial valuation. He reviewed the estimates developed compared to the actual events that occurred which materially impacted the results. The actual events included a near flat return in 2016, less than the assumed return of 8%, a lower than anticipated Post Retirement Pension Adjustment (PRPA), lower than expected retiree medical claims, a one-time increase in liability because of improvements to medical data collection, and lower projected costs from the adoption of the DC Retired Medical Plan design.

MR. LANGER showed the slight decrease in the funded ratio for all plans, primarily due to the lower than expected investment return. He noted the outlook for the funded ratio, if all the assumptions in the valuation are realized, is anticipated to reach 100% by 2039. The current contribution rates for PERS and TRS increased because of the decrease in the funded ratio. MR. LANGER informed the results are similar for the DCR, JRS, and National Guard plans.

MR. LANGER stated the June 30, 2017 valuation will occur later this year. The selection of the actuarial assumptions to be used for the next four years will occur this year. Robust discussions have begun, particularly regarding the 8% investment return and the mortality

table. The extensive discussion and decisions will be documented by the Actuarial Committee and ultimately presented to the Board for final approval.

VICE-CHAIR JOHNSON noted the discussions in the Actuarial Committee yesterday regarding concerns of the possible change in the 8% investment return assumption and mortality assumption were focussed and robust. He believes anyone interested in reviewing considerations and deliberations should review the Actuarial Committee's discussions, as well as the discussion at the full Board level.

MS. ERCHINGER commented on part of the discussions that occurred yesterday in the Actuarial Committee regarding the importance of looking at assumptions in the aggregate, rather than pulling out individual assumptions. She pointed out the actuarial loss on healthcare costs was due to receiving better specific retiree healthcare data and the loss offset the healthcare gains in the previous year. MS. ERCHINGER believes it is important to view the state assistance contributions relative to a few years ago, when discussions occurred about a nearly billion-dollar state assistance contribution.

C. Audit Findings Recap

MS. ERCHINGER reviewed the Actuarial Committee's list of findings and recommendations included in the Board packets.

Action: Board Approval of Resolved Findings

MS. ERCHINGER, on behalf of the Actuarial Committee, moved the resolutions and findings indicated on the audit findings list dated April 20th, 2017, be accepted as resolved with no further action needed.

MS. ERCHINGER informed there are three or four outstanding items on the list, but otherwise they are considered resolved.

The motion passed unanimously.

CHAIR SCHUBERT recessed the meeting from 2:55 p.m. to 3:12 p.m.

11. Small Cap Growth Manager Search

MR. MITCHELL informed the Board directed staff in December to engage Callan to conduct a search for a small cap growth manager to replace a manager that had been fired. In March, Callan provided a list of five finalists, and after staff due diligence, the two finalists were selected and will give presentations today.

A. T.Rowe Price

T.Rowe Price's CHRIS DYER, Institutional Business Development Executive, JOHN PLOWRIGHT, Institutional Client Service, and SUDHIR NANDA, Portfolio Manager, gave

the presentation on QM U.S. Small Cap Growth Equity Strategy. MR. DYER stated he has been involved with the investment relationship between T.Rowe Price and the State of Alaska since it began in 1991. MR. DYER reported the QM Small Cap Growth Strategy's successful track record of over 10 years averaged 2.5% outperformance versus the benchmark, including the global financial crisis. This strategy provides a high level of style consistency in the small growth style box, which positively complements the Board's current small cap allocation.

MR. NANDA spoke briefly about the Quantitative Equity Group team members. The investment philosophy of the strategy is to provide steady outperformance, preserve wealth in down markets, and keep turnover low at below 20% a year. The investment process is disciplined and very structured utilizing fundamental metrics for stock selection. The bias is on valuation and quality stocks. Because of this stable process and composition MR. NANDA utilizes during stock selection, the portfolio tends to outperform in down or low-return markets, and tends to lag or keep up with the benchmark is very big up markets. MR. NANDA provided a detailed description of the metrics he uses in the ranking and selection of stocks in different sectors. MR. NANDA explained cash in the portfolio averages about a half-percent. The portfolio consists of 300 stocks and the largest position size is limited to one percent. The portfolio is indexed to the MSCI Small Cap Growth Index.

MR. SHAW inquired if the success of the alpha additions to the process have been tracked. MR. NANDA stated the model has been monitored and the data shows value has been added, especially in avoiding bad stocks that have scenarios that could cause deterioration.

STEVE CENTER, Vice President of Callan, noted the GIPS disclosure showed assets under management in the strategy have double in the last three years. He requested more information regarding closing the strategy because of capacity constraints. MR. NANDA explained small caps have tripled since the early 2000's, and the most important consideration in capacity relates to turnover and trading style. A high turnover process cannot sustain high capacity, because the capacity constraints come from the friction when trading stocks. MR. NANDA informed he monitors capacity very closely and the strategy is not open on commercial databases.

B. Arrowmark Partners

CHRIS DUNNE and BRIAN SCHAUB of ArrowMark Partners gave the presentation on the Small Cap Growth Strategy. MR. DUNNE shared the three core values of ArrowMark, 1) the belief in risk-first fundamental research, 2) the creation of an investment-centric culture predicated around people, and 3) the creation of an alignment of interest with clients. MR. DUNNE informed both investment managers, MR. SCHAUB and CHAD MEADE, invest a meaningful part of their own capital side-by-side with clients.

CHAIR SCHUBERT commented most of the partners were employed with Janus prior to breaking off in 2007. MR. DUNNE noted five of the seven partners worked together previously at Janus and have an aligned belief in the culture and fundamental research process. There are currently 60 employees and \$11.7 billion in assets under management.

MR. SCHAUB described the investment philosophy that includes value manager techniques to analyze growth company through fundamental research, thinking about risk before reward, and a long time horizon. Turnover is low at about 50% per year in dollar turnover, and 25% per year in name turnover. The portfolio contains between 80 and 120 stocks, with a weighted average market cap of \$1.5 billion. The portfolio's goal is to deliver 80% downside protection during turbulent bear market environments, and secondarily to deliver 100% or more upside participation during bull market environments.

MR. SCHAUB believes ArrowMark's unique collaborative co-portfolio manager structure provides the benefits to deliver on the portfolio's goal utilizing checks and balances, discipline, and the replacement of emotion with objective analysis to turn volatility into alpha. MR. SCHAUB and MR. MEADE have been working together for 15 years, 12 years at Janus and three years at ArrowMark, and plan to continue the relationship for at least the next 10 years. MR. SCHAUB gave a detailed explanation of the investment process and an extensive description of the categories of stocks that are selected for portfolio construction.

MR. SCHAUB discussed the three best operating environments for the portfolio include high volatility in the market, when the market is declining, and when the market is being led by high quality stocks. Lagging underperformance is expected in markets when the lowest quality stocks are outperforming and the market is driven by high momentum.

C. Board Discussion/Selection/Action

MR. MITCHELL informed the action memo in the Board packets requests hiring both presenting managers, T.Rowe Price and ArrowMark Partners, with funding up to \$100 million each, subject to successful contract and fee negotiations. MR. MITCHELL discussed the reasons and considerations for selecting two managers to replace one manager.

MR. BRICE moved to direct staff to enter into negotiations with T.Rowe Price and ArrowMark Partners to fund each initially up to \$100 million in a domestic small cap growth strategy, subject to successful contract and fee negotiations. MRS. HARBO seconded the motion.

MR. WEST commented the ArrowMark strategy has a very short track record and was curious regarding their portfolio performance at Janus. MR. MITCHELL believes the portfolio managers outperformed the index while at Janus, but does not have specific performance numbers.

VICE-CHAIR JOHNSON requested DR. JERROLD MITCHELL's opinion. He believes both presentations were very good and their value approach to small cap growth is legitimate.

A roll call was taken, and the motion passed unanimously.

RECESS FOR THE DAY

CHAIR SCHUBERT recessed the meeting at 4:25 p.m.

Friday, April 21, 2017

CALL BACK TO ORDER

CHAIR SCHUBERT reconvened the meeting at 9:03 a.m.

Trustees Brice, Erchinger, Fisher, Harbo, Hoffbeck, Johnson, West, and Williams were also present.

12. PERFORMANCE MEASUREMENT - 4th QUARTER

CHAIR SCHUBERT introduced MR. CENTER, who provided the performance measurement review for the fourth quarter 2016. MR. CENTER informed he will be absent the next Board meeting and MR. ERLENDSON, who is absent today, will be present. MR. CENTER gave a broad overview of the markets in the fourth quarter, and noted gross domestic product (GDP) came in at 1.9% trailing the 3.5% third quarter GDP. Positive economic figures within the U.S. continue and employment numbers have improved. The actual unemployment numbers came in at 4.7% in the fourth quarter. The Fed has increased the overnight rate in December from 0.5 to 0.75, resulting in negative returns across the fixed income space. Another interest rate move occurred during the first quarter. The bond market has stabilized since the election, while the equity market has performed quite well. TIPS outperformed treasuries due to expectations of rising inflation.

MR. CENTER reviewed the asset class performance for the periods as of December 31st, for 10-year, five-year, three-year, one-year, and last quarter. The Russell 2000 U.S. small cap stocks were the best performers in the fourth quarter, the one-year and the 10-year periods, and the second best performer in the three-year and five-year periods. The S&P 500 U.S. large cap stocks were the best performers in the three-year and five-year periods, and the second best performers for the quarter, the one-year and the 10-year periods. Emerging markets and developed market non-U.S. equities have struggled due to falling energy prices and the strong U.S. dollar. However, emerging markets' year-to-date return is up over 12%. MR. CENTER showed the U.S. equity returns by economic sector. Financials and industrials drove performance, while REITs and healthcare dragged performance.

MR. CENTER continued the presentation focussing on the PERS plan as a proxy for all of the plans. Asset allocation is fairly close to the long-term strategic targets, slightly overweight to equities and slightly underweight to fixed income and private equity. MR. CENTER discussed the comparison between the PERS asset allocation and Callan's public fund peer group consisting of 230 peers. PERS has a much lower allocation to fixed income, and a slightly higher allocation to non-U.S. equities and real assets.

MR. BRICE asked if the overweight to international equity should be reevaluated given today's market environment. MR. CENTER explained Callan is having the discussion regarding international equities with all clients. He does not believe non-U.S. equities should be underweighted, and the slight overweight in the portfolio is not enough to have much of an

impact versus the global economy. MR. CENTER does not believe the currency headwind over the last five years will be systematic and continue in the long-term.

MR. CENTER informed new exhibits have been added to the presentation. One of them identifies the plan's performance on a risk-adjusted basis. MR. CENTER reported on the plans relative to peers and noted the plans performed at or above median for the last three years and five years, and slightly below median over the last 10-years. Another new exhibit compares the PERS performance Sharpe ratio to the public fund database over the same time periods. The plans is very much close to the median over all time periods. Another new exhibit compares the maximum draw-down for public plans over the same time periods. Over the last three and five years, draw-downs have remained about the same, and over 10 years, the plan is near the median. The final new exhibit compares standard deviation and it is better to have a lower ranking versus peers. Over the last five and 10 years, the plan is at or below median.

MR. CENTER reviewed most of the performance is driven by the manager effect and over the last quarter, this has been positive due to strong performance in the real asset space, along with the absolute return portfolio. Over the last year, manager effect was slightly negative, primarily due to performance in global equity and private equity. However, there are no areas of concern. MR. CENTER showed long-term performance versus the asset allocation policy return and the actuarial target return. Plan performance versus the target benchmark has been very much in line over all calendar time periods shown.

MR. CENTER reviewed the asset class performance and noted the PERS domestic equity program returned 4.55%, ahead of both the S&P 500 and the Russell 3000 benchmarks. Over the last year, the plan slightly outperformed the S&P 500 and slightly trailed the Russell 3000. Performance has been very much in line with both benchmarks over longer periods of time. MR. CENTER informed fourth quarter international equity performance figures were pulled back by weaker performance in emerging markets, but long-term performance compares favorably to the MSCI ACWIxUS Index. MR. CENTER provided details regarding underlying manager performance and struggles. Overall, there are no areas of concern.

MR. CENTER described the fixed income program structure for PERS, and performance over the last year was quite solid. Performance in the real assets space was mixed, but came in at 1.6% for the quarter and 7.87% for the year. REITs struggled because they are impacted by market investment behavior that is outside real estate as a whole. REITs are more correlated to fixed income and when bonds pull back, REITs will pull back as well. Timberland was flat for the quarter, and TIPS were down for the quarter and negative for the year. MLP investments showed continued positive improvement. Energy was positive. The absolute return composite had very strong performance for the quarter at 4.3% and the last year at 3.6%, well ahead of the HFRI Fund-of-Funds Composite.

MR. CENTER gave a detailed review of the PERS DC Plan on an asset allocation basis and on an asset growth basis. The portfolio is 57% invested in asset allocation funds, with the remainder spread across the Tier II and Tier III portfolios. Asset growth has been driven primarily by contributions and market returns. Withdrawals have been negative over the last

five quarters, but not nearly enough to impact the overall size of the plan. The one investment on the active equity side on the watch list is Allianz Socially Responsible Fund. Performance continues to struggle, trailing its benchmark over last quarter, year, five, and seven-years. The remaining funds continue to perform in line with their benchmarks and there are no other areas of concern.

COMMISSIONER FISHER believes the performance measurement given by Callan should be a primary focus of the Board. He did not pause to ask questions because he felt the scope and breadth of the material goes beyond the time allotted for discussion. COMMISSIONER FISHER advocated for additional exploration and understanding of details, either by the full Board or in a subcommittee. He recommended spending less time with manager presentations and more time spent on topics in the performance measurement report. CHAIR SCHUBERT agreed a deeper dive would be helpful. MR. CENTER suggested a session occur with the Board and Callan to discuss all the various outputs included in a performance report by asset class.

MR. WILLIAMS expressed interest in receiving a plan of improvement for himself, perhaps from the Investment Advisory Committee, that lists items he should know and work on. He is impressed with the breadth and quality of the work and how much he has to learn.

MRS. HARBO repeated a previous suggestion to utilize the Advisory Committee each meeting to give a 20-minute insightful presentation on a rotating basis.

MR. BRICE found attending the three-day Callan College very educational and helpful because of its intense, focused discussion on performance measures. CHAIR SCHUBERT agreed and requested the dates for the next session. MR. CENTER informed the next Callan College is scheduled in San Francisco on July 25th and 26th, and Trustees can attend free of charge, with no registration fee. MR. CENTER requested anyone interested to contact him.

13. REVIEW: INTERNAL EQUITY MANAGEMENT

MR. MITCHELL believes it is timely to discuss internal equity management as it relates to the broader portfolio and external equity management. Over the last four years, a concerted effort has been made to bring additional assets in-house. The goal of the presentation is to provide the Board with an update on the progress of bringing assets in-house and the development of overall portfolio structure. MR. MITCHELL showed a breakdown of externally managed passive strategies, externally managed active strategies, and internally managed strategies by asset class.

MR. MITCHELL defined internal management for publically traded securities, domestic equities, international equities, fixed income, REITs and TIPS as actual management by staff on the 11th floor of the State office building. Internal management for private equity and absolute return investments is described as staff making investment decision about underlying investments, such as a fund-of-funds manager. MR. MITCHELL reviewed the progression of the amount of assets under internal management over time. The first equity-like strategy was implemented in 2004.

MR. MITCHELL gave a detailed description of each equity strategy implemented in-house totally approximately \$1.2 billion in assets. A dedicated internal management team was created about a year ago and their efforts have streamlined many processes significantly, including trading. MR. MITCHELL explained integration of internal strategies and external strategies begin with a market cap allocation of the domestic equity benchmark, with about 90% large cap and about 10% small cap. The first decision to make is determining the tracking error at the broad asset class level, which is then attenuated by varying the proportion of the passive underlying investments. The historical 25-year tracking error of the portfolio is 1.7%, but the 10-year tracking error has been more muted at .9%.

MR. MITCHELL discussed the array of strategies staff will be bringing forth and the evolution going forward. He noted staff is recommending later in the meeting to place the equity yield strategy with the domestic equity strategy. MR. MITCHELL explained historically, managers were hired because of their intent to outperform a passive benchmark. The hurdle is now higher because the manager has to achieve better risk-adjusted returns than the internal managers' structural tilts or complement the internal strategies by smoothing and improving outcomes. This is an evolving construct to deliver better returns.

MR. MITCHELL reported that over the past two years, four positions have been added, and two of those are currently vacant. Personnel changes included three people left positions, one of which moved out of Juneau, and the two others moved positions. He is excited about the quality of the new hires. MRS. HARBO expressed interest in seeing those positions filled in order to manage more money internally.

MR. MITCHELL continued the presentation discussing using individual engineered structural tilts combined with active management that are not perfectly correlated to smooth aggregate performance. Staff will be requesting the ARM Board's approval at the end of the meeting for two equal weight mandates. One is an S&P 500 equal weight strategy and the other is an international smart beta strategy. Staff believes both strategies are complementary to existing strategies. MR. MITCHELL reviewed the hypothetical relative performance of strategies and structural portfolios to show combining an array of tilts results in a smoother risk-adjusted performance compared to individual tilts over the long-term. He noted there will be shorter periods of underperformance that will certainly occur. The timing is unknown and this needs to be an accepted tolerance for outperformance over long periods of time.

MR. MITCHELL believes staff provided validating examples to capture and build an array of strategies that look like what can be achieved externally, at a lower cost, with more control over assets. This is an evolutionary strategy and it is the responsibility of staff to further improve the process within a structural framework.

CHAIR SCHUBERT recessed the meeting from 10:15 a.m. to 10:34 a.m.

14. BRANDES INVESTMENT PARTNERS

CHAIR SCHUBERT introduced GLENN CARLSON, Executive Director, JEFF GERMAIN, Director Investments Group, and LAWRENCE TAYLOR, Institutional Portfolio Manager of Brandes Investment Partners, who gave the presentation on the Brandes International Equity Fund. MR. CARLSON informed Brandes is an independent employee-owned firm with 300 employees, managing approximately \$28 billion in assets. MR. CARLSON described the management philosophy and process of estimating the value of an international company and purchasing undervalued companies when the opportunity in the market exists.

MR. TAYLOR provided an overview of current market conditions cycle. Quantitative easing has caused some risk assets to be mispriced. Indexing has driven prices up in general, and there has been a move to more quality, low volatility stocks. The value style underperformed growth style in 2015, and outperformed in 2016. Currently, the MSCI Europe Index is the least expensive it has ever been.

MR. GERMAIN expressed the importance of understanding the investment style is absolute value-based and benchmark agnostic overweighting in companies that are inexpensive and zero-weighting in expensive companies. MR. GERMAIN explained the value opportunities and reasons the portfolio currently has a high overweight in oil and gas. The portfolio currently has a zero allocation to metals and mining companies, because of their high multiples.

MR. GERMAIN discussed emerging markets and the concerns and opportunities available today. The DB portfolio has the maximum allowed investment exposure to emerging markets. Valuations remain low in emerging markets. The portfolio investment committee consists of five managers, who make the decisions regarding portfolio construction to keep in line with policy guidelines. MR. GERMAIN reviewed the portfolio's net-of-fee returns have been positive and above the benchmark for the 1-year, 3-year, 5-year, 7-year, 10-year, and 15-year time periods. The portfolio size is \$715 million, and \$343 million has been taken out.

MR. GERMAIN noted the managers' conviction in certain areas of the market, including oil and gas, UK, France, and food and retail. Values in Germany are not attractive and still are trading at premiums to fundamentals. The investment professionals are very deliberate and cautious in actions, which can be seen in the 16% low turnover last year. The portfolio contains 52 companies, of which 30% is in the top 10 companies. MR. GERMAIN expressed appreciation to the Board for being long-term loyal clients.

15. BENCHMARK REVIEW

MR. MITCHELL directed the Board's attention to the third tab in the packet. Staff conducted a review of the policy benchmarks used to evaluate performance of the portfolio versus its target asset allocation. No Board action will be asked to occur at this meeting, but feedback is requested on the recommendations presented. None of the recommendations will necessitate changes in mandates for any of the existing managers. Motivations for the changes include structural noise in private equity and absolute return compared to the target benchmark that may lower the value of the analysis.

MR. MITCHELL reported that the summary of recommendations is on page three. Staff discussed these recommendations with IAC and Callan, is characterized as a subset of those broad-ranging discussions. One evaluated recommendation is to change the international equity benchmark to a sister benchmark in the same series that includes more small cap, thus more closely aligning the structural mismatch to reflect actual investments. Another recommendation is to change the absolute return strategies benchmark to the HFRI Fund-of-Funds Composite Index, which is better correlated and will improve the quality of the evaluation. The private equity benchmark is recommended to be changed because of structural mismatches and unfair comparisons and to remove the one-quarter lag on the private equity portfolio data. Impacts to making a shift include the one time period when the change is made and the two quarters of private equity performance would not be reflected. It would be logistically difficult to restate returns historically and to mitigate the impact, the goal is to make the change either in the first quarter or the third quarter of the fiscal year, so it does not line up with the calendar or fiscal year-end.

MR. MITCHELL explained another recommendation is to increase the expected return from private equity by 150 basis points over the Callan assumptions. This is a reflection of the mature and quality of the existing private equity portfolio and the performance achieved since inception. Raising the expected return will result in taking less risk systematically to achieve a given return target.

MRS. HARBO requested more information on the strategy to exit private equity in the closed DB funds. MR. MITCHELL informed the expected private equity strategy is invested for 10 years, and the expected projections for the peak level of assets under management is 20 to 25 years from now. The issue will not have to be addressed for quite some time.

MR. MITCHELL commented the changes are not a panacea to the performance issues. Staff believes it is appropriate to address structural sources of noise that can be identified. He explained one recommended change is to retask the alternative equity asset class and call it opportunistic. Staff feels a benchmark of 60% equities and 40% fixed income presents a more general set of opportunities to implement strategies. The current benchmark is very specific to the incumbent assets held. Staff recommends moving the equity yield strategy from alternative equity to the domestic large cap portfolio because the correlation is more appropriate with large cap. Staff recommends moving the two low volatility strategies in the large cap portfolio to what will become the opportunistic asset class because the equity sensitivity is lower. The total number of asset classes will remain the same.

MR MITCHELL continued the presentation explaining staff recommendation for the real portfolio is to change the weights of the policy benchmark to align and reflect the long-term benchmark in place for real assets. All of the recommendations are for the FY18 target asset allocation.

COMMISSIONER FISHER requested to hear the Advisory Committee's view on proposed changes. MS. ERCHINGER requested feedback and comments from the IAC. MR. SHAW noted he has experience in similar moves of equities in fixed income. He gave anecdotal information of reasons the moves were made. MR. SHAW informed he has gone through a

similar exercise with fixed income to ensure the manager lineup represented the benchmarks. He believes the outline MR. MITCHELL presented makes sense.

DR. JENNINGS commented the overall recommended changes are sensible. The opportunistic label does not seem to capture all the subtleties of investments that could be placed in the class. He is comfortable with the 60/40 benchmark proposed.

DR. JERROLD MITCHELL believes the proposals are logical and are a good idea. He commented the benchmarks should be in place for an extended period of time to be useful and if the Board approves the proposal, the benchmark should remain long-term.

16. INVESTMENT ACTIONS

A. Investment Advisory Council Position

MR. BRICE moved to reappoint DR. JENNINGS to a three-year term on the IAC beginning July 1, 2017, and ending June 30th, 2020. VICE-CHAIR JOHNSON seconded the motion.

MR. BRICE commented Dr. Jennings' advice is extremely insightful, personable, and he is a valuable asset to the Board and to the public.

The motion passed unanimously.

B. Internal Mandate: Large Cap Equal Weight

MRS. HARBO moved to authorize staff to make an initial investment up to \$100 million in an internally-managed S&P 500 equal weighted portfolio. MR. WILLIAMS seconded the motion.

A roll call vote was taken, and the motion passed unanimously.

C. Internal Mandate: Scientific Beta International

MRS. HARBO moved to authorize staff to broaden its contract with Scientific Beta to receive the constituents of the Developed Ex-USA Multi-Beta Multi-Strategy Index and to initially invest up to \$200 million in an international equity strategy, reflecting this approach benchmarked against the MSCI World Index. MS. ERCHINGER seconded the motion.

VICE-CHAIR JOHNSON asked if the IAC agrees with the motion. CHAIR SCHUBERT voiced all members responded nonverbally in the affirmative.

A roll call vote was taken, and the motion passed unanimously.

D. Move Russell 2000 Value and Growth to S&P 600

MRS. HARBO moved to direct staff to move the SSGA Russell 2000 Growth Index and the SSGA Russell 2000 Value Index investments into the internally-managed S&P Small Cap 600 Index. MR. BRICE seconded the motion.

DR. JENNINGS expressed his support and commented there may be a time when it is necessary to have a two sub-funds, and making that change in the future should not be seen as a reversal.

A roll call vote was taken, and the motion passed unanimously.

UNFINISHED BUSINESS

- 1. Disclosure Reports**
- 2. Meeting Schedule**

MS. HALL stated there is nothing unusual regarding the disclosure reports; and there have been no changes to the 2017 calendar placed in Trustee packets.

3. Legal Report

MR. GOERING indicated he has no legal report. He joined in wishing MS. HALL well in her next endeavors. MR. GOERING expressed appreciation for the caliber and integrity MS. HALL has shown in her work. He looks forward to working with MS. ALEXANDER and believes making opportunities for advancements within the state helps with retention.

NEW BUSINESS

None

OTHER MATTERS TO PROPERLY COME BEFORE THE BOARD

VICE-CHAIR JOHNSON requested COMMISSIONER FISHER provide an update on the process of establishing a Health Advisory Board. COMMISSIONER FISHER reported the process is ongoing as to the appropriate way to establish the board. He will provide more information at the next meeting as the evaluation and creation moves forward.

COMMISSIONER FISHER described a request from the Legislature, signed by Co-Chairs from the House and the Senate, was received regarding forward-looking evaluations by Buck. The information was provided. The Legislature requested an update of the data, which is currently being processed. COMMISSIONER FISHER brings this to the attention of the Board and believes the Legislature is sensitive to future expectations around State assistance payments and the impact on the budget.

PUBLIC/MEMBER COMMENTS

None

INVESTMENT ADVISORY COUNCIL COMMENTS

DR. JENNINGS reflected on the number of investment organizations who have moved investment operations to financial centers outside of their operating locale. He believes the ARM Board and Alaska investment offices have taken a wiser course. DR. JENNINGS believes location can inform the strategy. The local talent in Alaska has been developed well. He suggested revisiting the bigger conversation regarding active and passive investing. DR. JENNINGS expressed appreciation to members and to MS. HALL.

TRUSTEE COMMENTS

MR. WEST expressed appreciation to MS. HALL for her service. MR. WEST believes the Board should consider investment risks also in terms of social and reputational impacts.

MS. ERCHINGER noted she did not attend the last meeting and wanted to express on the record her appreciation to MR. BADER for his service. She expressed gratitude to MS. HALL for being a backbone of the ARM Board for many years. MS. ERCHINGER welcomed MS. ALEXANDER and thanked MR. MITCHELL for his energy and involvement.

MR. WILLIAMS expressed appreciation to MS. HALL for her help and reassurance. He will be absent the next meeting because it coincides with induction to the National Teacher Hall of Fame. MR. WILLIAMS thanked staff for their dedication, and to members for their diligence and competence. He is honored to be engaged with this meaningful work.

CHAIR SCHUBERT expressed appreciation on behalf of ASPIB and ARM Board to MS. HALL for fulfilling the critically important role of her executive assistant, knowing the job inside-out and anticipating her needs. CHAIR SCHUBERT informed this made her job immensely easier to do. She wished MS. HALL the best in her retirement.

FUTURE AGENDA ITEMS

None

ADJOURNMENT

There being no objection and no further business to come before the Board, the meeting was adjourned at 12:03 p.m. on April 21, 2017, on a motion made by MRS. HARBO and seconded by MR. BRICE.

Chair of the Board of Trustees
Alaska Retirement Management Board

ATTEST:

Corporate Secretary