South Carolina Retirement System Investment Commission
Meeting Minutes

November 17, 2016
9:30 a.m.
Capitol Center
1201 Main Street, 15th Floor
Columbia, South Carolina 29201
Meeting Location: Presentation Center

Commissioners Present:
Dr. Rebecca Gunnlaugsson, Chair
Dr. Ronald Wilder, Vice Chair
Ms. Peggy Boykin, PEBA Executive Director
Mr. Allen Gillespie
Mr. Edward Giobbe (via telephone)
Mr. Curtis Loftis, State Treasurer
Mr. Reynolds Williams

Others present for all or a portion of the meeting on November 17, 2016: Ashli Aslin, Geoff Berg, Betsy Burn, Andrew Chernick, Lily Cogdill, Derek Connor, Dori Ditty, John Farmer, Robert Feinstein, Scott Forrest, Joshua Greene, Michael Hitchcock, Adam Jordan, Lynn Lesueur, Steve Marino, Bryan Moore, Tricia Miller, Weiyi Ning, Brian Wheeler, and Justin Young from the South Carolina Retirement System Investment Commission ("RSIC"); Clarissa Adams and Bert Cassell from the State Treasurer's Office; Ben Burriss, J.B. Collins, Gaines Halford, Jared Nobles, and Steve Younts from SC ETV; Suzanne Bernard and Jeanna Cullins from Aon Hewitt Investment Consulting; Tammy Nichols and Faith Wright from the South Carolina Public Employee Benefit Authority ("PEBA"); Wayne Bell and Wayne Pruitt from the State Retirees' Association of South Carolina; Christine Cortright from Cola City Reporting; and Carlton Washington from the South Carolina State Employees' Association.

I. CALL TO ORDER AND CONSENT AGENDA

Chair Rebecca Gunnlaugsson called the meeting of the South Carolina Retirement System Investment Commission ("Commission") to order at 9:30 a.m. Mr. Edward Giobbe made a motion to approve the proposed agenda as presented. Dr. Ronald Wilder seconded the motion, which was unanimously approved.

Chair Gunnlaugsson referred to the draft minutes from the September 21 and 22, 2016 Commission meetings and asked whether there was a motion to approve the minutes. Mr. Giobbe made a motion to approve the minutes for the September 21 and 22, 2016 Commission meetings as presented. Dr. Wilder seconded the motion, which passed unanimously.

II. CHAIR'S REPORT

Chair Gunnlaugsson reminded the Commissioners that the Commission had authorized RSIC Staff ("Staff") to issue a Request for Proposals ("RFP") for general investment consulting services at the previous meeting. Chair Gunnlaugsson stated that the RFP had been issued and responses are due no later than December 1, 2016. She also reminded the Commissioners that the RFP Response Evaluation Committee ("RFP Committee") includes Mr. Curtis Loftis, Mr. Allen Gillespie, and herself. She explained that the RFP Committee will be reviewing the responses with the goal of providing a recommendation to the Commission at its meeting in April of 2017.

III. AUDIT COMMITTEE REPORT

The Chair recognized Mr. Gillespie for the Audit Committee's report. Mr. Gillespie stated that the Audit Committee met on November 3, 2016. He noted that the annual compliance questionnaire process for investment managers and consultants had been completed. He added that the process is a collaborative effort requiring assistance from members of Staff from several departments. He noted that all of the responses from RSIC's service providers had been received and reviewed. He also noted that the process will continue to be refined to reflect any potential improvements discovered following this year's review.

Mr. Gillespie then turned to a discussion of the Audit Plan for the 2016-17 Fiscal Year. He noted that, due to staffing constraints, the Audit Committee had approved an Interim Audit Plan and explained that two of the three items on the Interim Audit Plan had been completed. Next, Mr. Gillespie turned the discussion to a recent review of RSIC's Human Resources ("HR") processes and procedures by the Division of State Human Resources ("DSHR"). He explained that DSHR reviewed RSIC's processes and procedures relating to recruitment and general HR practices. The review resulted in two recommendations for minor modifications to language in certain onboarding documents. The recommendations were immediately implemented. Mr. Gillespie emphasized that DSHR's review was not an audit.

Next, Mr. Gillespie discussed the agreed upon procedures review of due diligence processes and valuation methods that was recently completed by RSIC's consultant, CliftonLarsonAllen LLP ("CliftonLarsonAllen"). Mr. Gillespie stated that Thomas Rey, the audit partner who conducted the review, noted that the RSIC is considered far ahead in terms of due diligence and valuation processes as compared with other U.S. public pension plans. Mr. Rey commended RSIC's efforts in these areas and the improvements made during the last several years. Mr. Gillespie noted that there was one finding. A review of three sets of financial statements was conducted three days outside the required guideline. Mr. Gillespie explained that the delay in the review was due to a miscalculation in the deadline date. Typically, deadlines are calculated based on month-end rather than the exact number of days from the beginning of the review deadline. He stated that Staff will eliminate any confusion for calendaring reviews in the future. Mr. Gillespie then noted that a review of RSIC's fixed income processes will begin shortly.

Mr. Gillespie began a discussion of a recommendation by the Audit Committee to seek Commission approval for certain amendments to the Audit Committee's Charter ("Audit Charter"). He explained that the requested changes include (i) changing the name of the Audit Committee to the "Audit and Enterprise Risk Management Committee", as recommended by the fiduciary audit conducted by Funston Advisory Services LLC; (ii) internally staffing the audit and compliance functions with one internal staff member who would coordinate external vendors; and (iii) clarifying the roles included in the Audit Charter. In response to the recommendation, Chair Gunnlaugsson called for a vote to approve the

Audit Committee's recommendation that the Audit Committee Charter be adopted as amended. The Commission then unanimously approved the recommendation.

IV. CEO'S REPORT

Mr. Michael Hitchcock, Chief Executive Officer ("CEO"), began his report by referencing the proposed schedule for the Commission's 2017 meetings. He stated that the proposed schedule had been updated to accommodate some of the Commissioners' scheduling conflicts. Mr. Giobbe then made a motion to approve the 2017 meeting schedule as presented. Mr. Loftis seconded the motion, which passed unanimously. The approved meeting dates for 2017 are Thursday, February 23, 2017; Thursday, April 27, 2017; Thursday and Friday, June 22-23, 2017 (Possible Retreat); Thursday, September 28, 2017; and Thursday, December 7, 2017.

Next, Mr. Hitchcock introduced Mr. Derek Connor, Investment Officer, as a new member of Staff. Mr. Hitchcock explained that Mr. Connor will be focusing on the private equity asset class. Mr. Connor was previously employed by the California Public Employees' Retirement System ("CalPERS") and has also served as a consultant with State Street Corporation. He has a finance degree from Northeastern University and is currently a candidate for Level III of the Certified Financial Analyst and Level II of the Chartered Alternative Investment Analyst certifications.

Mr. Hitchcock then provided an update on the progress of the General Assembly's Joint Committee on Pension Systems Review ("Joint Committee"). He reminded the Commissioners that the Joint Committee is composed of members of the South Carolina Senate and the House of Representatives and was formed to review the state of the South Carolina Retirement Systems Group Trust ("Group Trust"). The Joint Committee will ultimately recommend avenues of reform for the Group Trust. Mr. Hitchcock discussed the presentations that had been made before the Joint Committee, including historical analysis of the unfunded liability and the challenges to be overcome to improve the actuarial valuations of the Group Trust.

V. CIO'S REPORT

Following the conclusion of Mr. Hitchcock's report, the Chair recognized Mr. Geoff Berg, Chief Investment Officer ("CIO"), to provide the CIO's report. Mr. Berg began his report by explaining that, based on a request from Dr. Ronald Wilder, he would be discussing the economic implications of the new presidential administration. Mr. Berg provided insights on potential shifts in national policy that could impact the markets. He also highlighted new challenges for investors. Mr. Berg then updated the Commission on the Plan's investments in two equity options strategies, which had recently been added to the Portfolio ("Portfolio"). He noted that there had been some articles in the national and trade press about the strategies, but pointed out that the performance of the strategies had been smoother than the S&P 500 during the past few months. He reminded the Commissioners that this element of the strategies' design was one of the primary reasons why the equity options strategies were added to the Portfolio.

Mr. Berg then introduced Mr. Joshua Greene, Reporting Officer, to provide an update on the Portfolio's performance. Mr. Greene began by explaining to the Commissioners that, because there had only been three months during the current performance period and the data for returns had been received only a few days prior to the meeting, a more in-depth analysis would be provided to the Commissioners at a later time. He then provided a snapshot of performance for the first quarter of the 2016-17 Fiscal Year. He noted that the Plan's performance for the first quarter was 3.49 percent against a policy benchmark return of 3.33 percent, while the Plan's return compared to the policy benchmark yielded underperformance in the one- and three-year periods and about 50 basis points of outperformance for the last five and ten years. Mr. Greene noted that, on the report shown, only the trailing five-year time period had a return that exceeded the 7.5 percent assumed rate of return. In the first quarter of the fiscal year, Mr. Greene noted that, the Plan made approximately $305 million in net benefit payments and investment performance added $970 million to the Plan. Mr. Greene provided detailed information related to specific asset classes and noted that the only negative performance during the first quarter occurred in the public real estate and opportunistic strategies. After an opportunity for questions from the Commissioners, Mr. Greene concluded his presentation.

Ms. Suzanne Bernard of Aon Hewitt Investment Consulting ("Aon Hewitt") was then recognized to provide a third quarter investment performance update. Ms. Bernard began by explaining that she would focus her presentation on performance from the third quarter of the 2015-16 Fiscal Year to the current quarter, and proceeded to summarize returns from various strategies. She noted the marked contrast between the third quarter's performance with the current quarter's performance. Ms. Bernard explained the impact of the recent presidential election on the markets and highlighted the challenges faced by investors in the current economic environment. Ms. Bernard explained that monitoring developments on free trade is very important because economic experts connect free trade with positive global growth. However, she noted that growth in the U.S. economy may neutralize a reduction in global growth prospects. Ms. Bernard also provided insights regarding a potential change in the administration of the Federal Reserve System and other macroeconomic factors.

Ms. Bernard then turned to investment performance and confirmed that the Portfolio's asset allocation remained in compliance with all target ranges during the first quarter of the 2016-17 Fiscal Year. She noted that performance in most asset classes had been positive during the first quarter of the 2016-17 Fiscal Year, but indicated that a few asset classes had diminished performance, including opportunistic strategies. In response to a question from Dr. Wilder about the impact of the election on Aon Hewitt's long-term market projections, Ms. Bernard stated that Aon Hewitt's team would be reporting a slight increase in the inflation expectation for its next quarterly capital markets report. Following further discussion with the Commissioners, Ms. Bernard concluded her remarks.

Next, Mr. Berg began a discussion of the asset allocation review Staff and Aon Hewitt had commenced work on for the Commission's consideration next winter and spring. He stated that the asset allocation approved in February 2016 would take a few years to fully implement, but Staff and Aon Hewitt were nevertheless reviewing the changing investment environment and researching potential minor revisions. He requested input from the Commissioners over the next three months about asset allocation scenarios they would like to have researched. Mr. Gillespie began a discussion about economic conditions and historic market events that he would like to have included in the asset allocation research, including hyperinflation and low interest rates while inflation rates increased. Mr. Loftis suggested that, even if a risk event cannot be modeled, Staff and Aon Hewitt be sensitive to the potential of a major risk event.

Ms. Bernard responded that the potential for extreme events would be reviewed, and Staff and Aon Hewitt would consider how best to protect against those risks.

Mr. Berg then introduced three informational topics that Staff would present: infrastructure, insurance linked strategies, and alternative beta. Mr. Berg introduced Ms. Ashli Aslin, Investment Officer, to provide an overview of the infrastructure asset class. Ms. Aslin outlined the segments of the asset class, which include transportation, regulated utilities, communications, and energy. She also discussed the characteristics that make the asset class attractive. Infrastructure contracts are heavily regulated, longer-term, and often tied to inflation, which makes them a good hedge against inflation. Infrastructure investments also provide consistent cash flow and diversification due to their low correlation to more commonly held assets. Ms. Aslin also indicated that the asset class would likely provide a return that would exceed the Plan's assumed return rate of return, and then identified three ways in which Staff planned to gain exposure to infrastructure. The first way – already implemented – was through listed infrastructure (public markets). The other two potential ways of accessing infrastructure identified by Ms. Aslin were open-end funds that consist primarily of core assets, and closed-end funds that may source core and non-core assets.

In response to a question from Dr. Wilder regarding the Portfolio's current allocation to infrastructure, Ms. Aslin noted that the current fiscal's target allocation is 1 percent of the Portfolio's value or approximately $280 million. Mr. Berg added that the long-term target for the asset class is 3 percent of Plan assets. Ms. Bernard provided some considerations for investing in infrastructure. She noted that closed-end infrastructure funds may have longer lives than private equity, and may last between ten and thirty-five years. Infrastructure investing also carries regulatory and political risk. For example, some efforts to privatize assets have led to public backlash. Ms. Bernard also opined that the advent of a new presidential administration could introduce a measure of uncertainty to the marketplace, offering as an example certain strategic decisions required to invest in infrastructure, such as deciding whether to deploy capital regionally or globally. She concluded by stating that there is high demand for investment in infrastructure, and institutional investors are uniquely poised to provide capital. The Commissioners then discussed how the dynamics of infrastructure could change in the coming decades.

Mr. Berg introduced Mr. Justin Young, Investment Officer, to present information regarding insurance linked strategies. Mr. Young provided an overview of insurance linked strategies and explained how investments in reinsurance could fit within the "Other Opportunistic strategies" component of the Plan's Opportunistic allocation. He explained that insurance companies use reinsurance to hedge their loss exposure where they determine risk levels to be excessive. Insurance companies plan to make payouts for a statistically determined number of claims, but if a major disaster occurs, insurance companies may have large, coincident losses. Reinsurance helps insurance companies spread out the cost of potential claims by creating an additional source of funds for the most extreme outcomes. Mr. Young highlighted examples of extreme outcomes, including Hurricane Katrina and the Fukushima nuclear disaster in Japan. Mr. Young outlined some of the considerations inherent in investing in reinsurance. He explained that insurance linked strategies still constitute a relatively small market, which can make it challenging to invest meaningful amounts and achieve desired levels of diversification. Mr. Young also noted that these strategies are not easily accessed through the public markets.

Mr. Williams asked Mr. Young to explain the concept of a catastrophe bond. Mr. Young responded that a catastrophe bond is another way for the issuer (typically an insurance or reinsurance company) to transfer a specific set of risks (typically, events such as natural disaster risks) to investors. The investors take on the risks of a specified catastrophe or event occurring in return for obtaining attractive rates of investment. Should a qualifying event occur, the investors lose the principal they invested, with the issuer obtaining that money to cover its losses. Ms. Bernard stated that Aon Hewitt believes reinsurance investments are attractive because their performance has nothing to do with other assets. She explained that a very meaningful allocation was not possible. However, there was the potential for return streams in the seven to nine percent range. Mr. Williams asked who would do the risk analysis work required with these types of investments. Ms. Bernard responded that any investment manager recommended to the Commission would have a very good actuarial underwriting staff.

Mr. Berg introduced Ms. Weiyi Ning, Director, to make a presentation on Alternative Beta Strategies. Before Ms. Ning began her remarks, Mr. Berg reminded the Commission that alternative beta strategies are a systematic, rules-based way of investing that is designed to resemble certain hedge fund strategies. He stated that alternative beta strategies show that what has historically been regarded as alpha from hedge funds could actually be considered beta, which would mean that some fund managers should be charging lower fees. Ms. Ning began by stating that the goal of the alternative beta research is to find a way to deliver attractive hedge fund-style returns at a reasonable level of risk and at a lower cost. She explained that, during the financial crisis, investors realized hedge fund investing was not pure alpha and that market beta had a meaningful impact on hedge fund returns. Ms. Ning viewed the potential benefits of implementing such strategies in the Portfolio. She explained that alternative beta could provide scalable exposure but at a lower cost than traditional hedge fund investing. Ms. Ning noted that from a risk control perspective, alternative beta should also provide more transparency regarding holdings compared to many hedge funds. She stated that alternative beta strategies should also provide better liquidity than traditional hedge funds, which could be very important during down markets.

Ms. Ning also noted some considerations. She stated that, when investing in alternative beta, investors need to evaluate whether the strategies are truly market neutral. She indicated that Staff would continue to research alternative beta strategies so as to gain a better understanding of how they can avoid strategies that become too crowded, which can, in turn, lead to diminished returns. She also noted that the appropriate investment structure must be chosen in order to maximize returns. Ms. Bernard echoed Ms. Ning's comments that alternative beta is an attractive area for investment. However, she cautioned the Commission that one of the biggest challenges of investing in this space was hiring managers with the advanced technology required to make these trades. She explained that Aon Hewitt was beginning to see good products in the market but added that many products have a very short track record. Ms. Bernard concluded by stating that she believed there was a place in the Portfolio for alternative beta strategies, but locating suitable managers may prove difficult.

VI. FIDUCIARY TRAINING

Chair Gunnlaugsson recognized Ms. Jeanna Cullins of Aon Hewitt to provide an educational presentation concerning fiduciary responsibilities. Ms. Cullins overviewed the sources of the

Commission's fiduciary obligations and explained how these sources define and relate to the Commissioners. Ms. Cullins then explained each of the standards required of fiduciaries and provided examples of why each is important. She emphasized that the Commission's enabling act requires that the Commissioners comport with a prudent expert standard rather than simply a prudent man standard. Ms. Cullins explained that being a prudent expert does not mean choosing the least expensive method of investing, but rather, investments must be reasonable. She provided additional information by comparing the requirements under South Carolina law with other states' laws and under the standards of the Employee Retirement Income Security Act of 1974 ("ERISA"). Ms. Cullins noted that the concept of fiduciary duties may evolve over time, and the Commissioners should consult with legal counsel when questions related to their duties and responsibilities arise. She also highlighted some ways to mitigate the risks of violating fiduciary obligations. Ms. Cullins then took questions from the Commissioners.

VII. EXECUTIVE SESSION

Mr. Loftis made a motion that the Commission recede into Executive Session to discuss investment matters pursuant to S.C. Code Sections 9-16-80 and 9-16-320; to discuss personnel matters pursuant to S.C. Code Section 30-4-70(a)(1); and to receive advice from legal counsel pursuant to S.C. Code Section 30-4-70(a)(2). Mr. Williams seconded the motion, which passed unanimously. The Commission receded into closed session at 1:15 p.m.

VIII. POTENTIAL ACTION RESULTING FROM EXECUTIVE SESSION

The Commission reconvened in open session at 2:15 p.m. Mr. Hitchcock reported that the Commission did not take any reportable action while in Executive Session. Any action that did occur while in Executive Session pursuant to S.C. Code Ann. Sections 9-16-80 and 9-16-320 will be publicized when doing so would not jeopardize the Commission's ability to achieve its investment objectives or implement a portion of the annual investment plan.

IX. ADJOURNMENT

There being no further business, upon a motion made by Mr. Loftis and seconded by Mr. GIllespie, the Commission voted unanimously to adjourn. The meeting adjourned at 2:17 p.m.

[Staff Note: In compliance with S.C. Code Ann. Section 30-4-80, public notice of and the agenda for this meeting were delivered to the press and to parties who requested notice and were posted at the entrance, in the lobbies, and near the 15th Floor Presentation Center at 1201 Main Street, Columbia, S.C., at 5:12 p.m. on November 14, 2016.]