FINANCIAL RATING OF LOCAL GOVERNMENT
DEFINED BENEFIT PENSION PLANS

REPORT TO
THE GOVERNOR, CHIEF FINANCIAL OFFICER,
PRESIDENT OF THE SENATE, AND
SPEAKER OF THE HOUSE OF REPRESENTATIVES
JANUARY 25, 2012
January 25, 2012

The Honorable Rick Scott
Governor of Florida
Plaza Level 05, The Capitol
400 South Monroe Street
Tallahassee, Florida 32399-0001

The Honorable Jeff Atwater
Chief Financial Officer of Florida
Plaza Level 11, The Capitol
400 South Monroe Street
Tallahassee, Florida 32399-0300

The Honorable Mike Haridopolos, President
The Florida Senate
409, The Capitol
404 South Monroe Street
Tallahassee, Florida 32399-1100

The Honorable Dean Cannon, Speaker
Florida House of Representatives
420, The Capitol
402 South Monroe Street
Tallahassee, Florida 32399-1300

Dear Sirs:

Chapter 2011-216, Laws of Florida, requires the Department of Management Services to develop a plan for creating standardized ratings for classifying the financial strength of all local government defined benefit pension plans, and to submit that plan, plus any related findings and recommendations, to the Governor, the Chief Financial Officer, the President of the Senate, and the Speaker of the House of Representatives. The rating system should improve the transparency of evaluating the financial health of Florida’s local government retirement systems.

If you have any questions, please feel free to contact Sarabeth Snuggs, State Retirement Director, at (850) 487-4133 or by e-mail at Sarabeth.Snuggs@dms.myflorida.com.

Sincerely,

John P. Miles
Secretary

Enclosure
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Background

In 1975, in response to prior poor funding practices, the citizens of Florida passed a constitutional amendment requiring that governmental units sponsoring pension plans funded in whole or in part by public money cannot increase plan benefits without first making provisions to fund them on a sound actuarial basis. In 1978, the legislature implemented the provisions of section 14, Article X of the State Constitution in Part VII of Chapter 112, Florida Statutes, the “Florida Protection of Public Employee Retirement Benefits Act”.

This part requires that each retirement system be “managed, administered, operated, and funded … to maximize the protection of public employee retirement benefits” and also “prohibit[s] the use of any procedure, methodology, or assumptions the effect of which is to transfer to future taxpayers any portion of the costs which may reasonably have been expected to be paid by the current taxpayers.” The Department of Management Services (the department) currently reviews each local government pension plan at least triennially to ensure that it is being funded in an actuarially sound manner, without unfairly deferring such costs to future generations.

As of September 30, 2011, the department monitors 492 local government pension plans for compliance with applicable statute and rules, provides comments and technical assistance, and maintains an actuarial database of all plans to prepare an annual report for the legislature on the bureau’s activities, findings, and recommendations.

The department monitors pension plans that safeguard the benefits of 115,154 active participants and 70,795 retirees. Plan assets totaled approximately $24 billion as of September 30, 2011.

During the 2011 session, the legislature took measures to improve the long-term sustainability and transparency of Florida’s local government pension plans. Among other changes, Chapter 2011-216, Laws of Florida, amended the definition of pensionable compensation for all local plans, established sponsor contribution minimums, required additional disclosures by local plans, and required the department to prepare one-page summary fact sheets for each plan. Chapter 2011-216, Laws of Florida, also mandated that the department develop a plan to create a standard rating system for use in classifying the financial strength of all local government pension plans, which is the subject of this report.

Chapter 2011-216, Laws of Florida, includes the following requirement:

Section 12. Financial rating of local pension plans.—The Department of Management Services shall develop a plan for creating standardized ratings for classifying the financial strength of all local government defined benefit pension plans.

(1) In developing the plan, the department shall consider, without limitation:

   (a) The plan’s current and future unfunded liabilities.

   (b) The plan’s net asset value, managed returns, and funded ratio.

   (c) Metrics related to the sustainability of the plan, including, but not limited to, the percentage that the annual contribution is of the participating employee payroll.
(d) Municipal bond ratings for the local government, if applicable.
(e) Whether the local government has reduced contribution rates to the plan when the plan has an actuarial surplus.
(f) Whether the local government uses any actuarial surplus in the plan for obligations outside the plan.

(2) The department may obtain data, information, and assistance from state agencies, local governments, or political subdivisions thereof, which shall provide the department with all relevant information and assistance on any matter within their knowledge or control.

(3) The department shall submit the plan, plus any related findings and recommendations, to the Governor, the Chief Financial Officer, the President of the Senate, and the Speaker of the House of Representatives by January 1, 2012. The report must also include specific recommendations for legislative action during the 2012 Regular Session of the Legislature.

Acknowledgements

The department sought the input of several subject matter experts in the field of public pensions, with particular experience in Florida, and therefore particular knowledge of the requirements in Part VII of Chapter 112, Florida Statutes, Chapters 175 & 185, Florida Statutes, and Chapter 60T, Florida Administrative Code. The contents of this report incorporate many of their ideas for how to develop the financial rating system to improve the transparency of evaluating the financial health of Florida’s local government retirement plans. The report also includes additions and comments from the staff actuaries in the Division of Retirement.

The department is sincerely appreciative of the assistance provided by Gabriel Roeder Smith & Company, Milliman, Inc., and the LeRoy Collins Institute, for volunteering their services to participate in this important endeavor. Their contributions were instrumental in the development of this report.

Standardization

A primary obstacle to developing a standard rating system is determining how to establish a level of comparability between the plans. Since Florida law does not prescribe which actuarial assumptions and funding methods are to be used in preparing actuarial reports, each plan board of trustees, with input from the plan actuary and other advisors, determines these variables on a plan specific basis. These variations make it very challenging to make direct comparisons between plans or to any kind of established benchmark.

One of the most recognized means of determining a plan’s financial health is the funded ratio, which is a ratio of the plan’s assets to its liabilities. The funded ratio can be heavily influenced by the choice of assumptions and methods. This is only a snapshot of the plan’s health at a given point in time and does not reflect a longer term view of whether the plan’s position is improving or declining. Since the funded ratio is so dependent on the choice of assumptions and methods, a benchmark cannot necessarily be universally applied to all plans.

To help standardize the calculations between all the local plans, some of the rating metrics are recommended to be disclosed using a prescribed set of assumptions and methods, to be enumerated in statute. There are a few common assumptions and methods that have the most significant impact on the comparability of funded ratios.
between plans; therefore the following standards are proposed for use when determining the rating metrics (see metrics below indicated with [STANDARD ASSUMPTIONS]):

- **Actuarial funding method** – Entry Age Normal (EAN)
- **Assumed rate of return** – We recommend that the Legislature establish a standard rate after having evaluated the issue with feedback from interested parties.
  
  (NOTE: As of September 30, 2011, based on actuarial data compiled from the 492 local government pension plans being monitored, the average (mean) rate of return assumption is 7.78% and the median rate of return assumption is 8.00%.)
- **Mortality table** – Same as the mortality tables used for the FRS, without adjustment, currently as follows:
  - Pre-retirement Mortality – RP-2000 Employee Mortality tables for males and females.
  - Post-retirement Mortality – RP-2000 Healthy White Collar tables for males and females, as projected from the year 2000 to the valuation year using Projection Scale AA.
- **Asset valuation method** – Market value, less DROP accounts.
- **All other assumptions and methods** – Plan specific.

NOTE: The use of standardized interest and mortality assumptions along with the entry age normal cost method is suggested to facilitate the comparison between plans. We are not recommending the use of any particular assumptions and/or methods for funding purposes.

Requiring the plan actuaries to compute the necessary disclosure using the prescribed assumptions and methods will require additional actuarial work that will increase the administrative expenses for the local government pension plans, unless a plan already uses these same variables.

Based on estimates received from one of the subject matter experts that were consulted in the preparation of this report, it was estimated that the cost of compliance could range anywhere from $1,000 to $5,000 per plan, per year. This amount would be dependent on many factors such as size of the plan and complexity of calculations. We have no basis to independently verify or support this estimate.

**Submission requirements**

The financial disclosures will be submitted to the department annually and will be based on the same plan year end as the actuarial valuation reports. The department will develop a standard electronic spreadsheet to be used for the submission of the required information and specify the additional supporting documentation required to be submitted. Each financial disclosure must be prepared by an Enrolled Actuary and be accompanied by a statement of the Enrolled Actuary, in the form of a certification, signed and dated by the actuary, as follows:

“This actuarial/financial disclosure was prepared and completed by me or under my direct supervision, and I acknowledge responsibility for the results. To the best of my knowledge, the results are complete and accurate,
and in my opinion, the techniques and assumptions used are reasonable and meet the requirements and intent of the statutory requirements.”

Signature __________________________________________
Date ________________
Enrollment # ________________

Results

The department will maintain a computerized database of the financial rating disclosures submitted in accordance with this report and compile a score for each plan annually. These scores will be posted on the department’s website each year no later than March 15.

In addition to the financial rating system, Chapter 2011-216, Laws of Florida, established a new requirement that the department provide fact sheets for each local government defined benefit pension plan to summarize the plan’s actuarial status. These fact sheets provide a summary of the plan’s most current actuarial data, minimum funding requirements as a percent of pay, and a five-year history of funded ratios. The fact sheet also includes a brief explanation of each element presented to maximize the transparency of the local government plans. These fact sheets are posted on the department’s website and each plan sponsor is required to include a link to the department’s website on its own website.

Metrics not included

There were three factors identified in Chapter 2011-216, Laws of Florida, for the department to consider when developing this plan, that were not included in the final recommended structure defined below:

- Municipal bond ratings for the local government, if applicable – After discussions with the State Board of Administration, Division of Bond Finance, it was concluded that a valid bond rating may not be definitely determinable as an evaluation metric in the financial rating system. There are at least three major rating agencies of municipal bonds and there are many different types of bonds that municipalities can issue. Each issue is often rated separately by one or more of the various bond rating agencies, leading to a myriad of ratings for each municipality. It is unclear which rating, if any, would be the most relevant to the health of the pension plans. In addition, it is likely that many of the factors included in the financial rating plan are already included in the bond rating scores, such as the unfunded actuarial liability or funded ratios of the plans, so that some of the measures would have been weighted twice. For these reasons, the department did not include this factor in its recommended structure below.

- Whether the local government has reduced contribution rates to the plan when the plan has an actuarial surplus – Effective July 1, 2011, with the implementation of Chapter 2011-216, Laws of Florida, section 112.66(13), Florida Statutes, was created to say, “A local government sponsor of a retirement system or plan may not reduce contributions required to fund the normal cost...” Since this new language prevents plan sponsors from offsetting normal cost contributions using actuarial surpluses, the metric was not included. For this purpose, actuarial surplus is assumed to mean that the plan has a negative unfunded liability.
Whether the local government uses any actuarial surplus in the plan for obligations outside the plan – Effective July 1, 2011, with the implementation of Chapter 2011-216, Laws of Florida, section 112.66(12), Florida Statutes, was created to say, “An actuarial or cash surplus in any system or plan may not be used for any expenses outside the plan.” Since this new language prevents plan sponsors from using actuarial surpluses for outside obligations, the metric was not included.
## Recommended structure

<table>
<thead>
<tr>
<th>Rating metric</th>
<th>Maximum Weight</th>
</tr>
</thead>
</table>
| **1. Long-term funded ratio**  
[STANDARD ASSUMPTIONS] | 30% |

To be calculated in a similar manner as the Governmental Accounting Standards Board (GASB) Statement 25 calculation (actuarial value of assets divided by actuarial accrued liability), but using the prescribed assumptions and methods, including the market value of plan assets.

This is a common metric used to evaluate the health of pension plans. It measures the value of assets that have accumulated to pay plan benefits (using a smoothing method to mitigate temporary fluctuations in the market), compared to the actuarial accrued liability of the plan as an ongoing concern. However, since this method uses smoothed asset values and projections of actuarial liability into the future, it is impacted by the selection of actuarial assumptions and methods. Standardizing certain key factors in the calculation helps to make the resulting ratio more comparable between plans and to objective benchmarks.

In order to account for plan trends in this measure, it is recommended that the long-term funded ratio be averaged over the preceding five years with maximum weights, as follows:

- Current year ratio: 18.0%
- One year prior ratio: 7.5%
- Two years’ prior ratio: 1.5%
- Three years’ prior ratio: 1.5%
- Four years’ prior ratio: 1.5%

**NOTE:** This metric will not be applied retroactively. Initial submissions will only be required to be recalculated for the current year’s ratio. Prior years’ ratios will be calculated by the department using existing data. Over the next five years, the history will be accumulated using standardized assumptions and methods.
2. **Amortization period of standardized Unfunded Accrued Liability (UAL)**  
   **[STANDARD ASSUMPTIONS]**

This measure will determine the number of years required to amortize the outstanding UAL (calculated using standard assumptions and methods); based on expected cash contributions, as calculated in the plan’s most recent actuarial valuation, net of the standardized Normal Cost (NC) and administrative (non-investment related) expenses.

The result will provide a similar basis upon which to compare UAL amortization periods between plans. A 30-year amortization period resulting from this calculation would be considered standard, with shorter durations being better.

1) Determine outstanding UAL using standard assumptions and methods.

2) Determine net contribution to amortize the UAL. This is equal to:
   
   \[(\text{Valuation cash contribution} - \text{standardized NC} - \text{administrative expenses})\]

3) Determine amortization period using standardized interest to pay outstanding UAL calculated in 1).

Using a conventional 30-year amortization period as the benchmark, the following scoring schedule is recommended:

| < 10 years | 25% |
| 10 – 14.99 years | 20% |
| 15 – 24.99 years | 15% |
| 25 – 34.99 years | 10% |
| 35 – 40 years | 5% |
| > 40 years | 0% |
3. **Current funded ratio**  
**[STANDARD ASSUMPTIONS]**

To be calculated in a similar manner as the Financial Accounting Standards Board (FASB) Statement 35 calculation (market value of assets divided by the present value of accrued benefits), but using the prescribed assumptions and methods.

Similar to the Long-term funded ratio above, this is another common metric used to evaluate the health of pension plans. It measures the value of assets that have accumulated to pay plan benefits (on a market value basis as of the valuation date), compared to the present value of accrued benefits (PVAB) as of the valuation date. Our recommendation is that this ratio be calculated using the prescribed variables to promote comparability of results.

In order to account for plan trends in this measure, it is recommended that the current funded ratio be averaged over the preceding five years with maximum weights, as follows:

- Current year ratio: 12%
- One year prior ratio: 5%
- Two years’ prior ratio: 1%
- Three years’ prior ratio: 1%
- Four years’ prior ratio: 1%

**NOTE:** This metric will not be applied retroactively. Initial submissions will only be required to be recalculated for the current year’s ratio. Prior years’ ratios will be calculated by the department using existing data. Over the next five years, the history will be accumulated using standardized assumptions and methods.
4. **Sponsor contribution as a percentage of valuation payroll**

This measure will indicate the degree of financial burden on the plan sponsor relative to the valuation payroll. Higher contribution percentages can often be indicative of generous benefits, poor actuarial experience, or aggressive practices that generate a larger financial burden on the plan sponsor.

<table>
<thead>
<tr>
<th>Required contributions from all sources, excluding employees</th>
<th>Valuation payroll, excluding DROP participants</th>
</tr>
</thead>
</table>

The following scoring schedule is recommended:

- < 10% 5%
- 10 – 19.99% 3%
- 20 – 39.99% 1%
- >= 40% 0%
5. **Rate of return on plan assets compared to actuarial assumption**

Rate of return on plan assets is a primary component in the determination of plan liability, which affects both the size and pattern of required sponsor contributions. Plans that consistently fail to meet this actuarial assumption jeopardize the long-term ability of the fund to meet benefit payment obligations.

This measure will take the actual five-year average market-value investment return (geometric average, net of investment expenses), divided by the current plan interest assumption to derive a ratio to be scored as follows:

<table>
<thead>
<tr>
<th>Ratio</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>&gt; = 1.00</td>
<td>5%</td>
</tr>
<tr>
<td>0.75 – 0.99</td>
<td>3%</td>
</tr>
<tr>
<td>0.50 – 0.74</td>
<td>1%</td>
</tr>
<tr>
<td>&lt; 0.50</td>
<td>0%</td>
</tr>
</tbody>
</table>
6. **Salary increases compared to actuarial assumption**

Salary increase experience is another important factor in the determination of plan liability, which affects both the size and pattern of required sponsor contributions. Plans that consistently exceed this actuarial assumption jeopardize the long-term ability of the fund to meet benefit payment obligations.

This measure will take the actual five-year average salary increase experience, divided by the current plan salary increase assumption, to derive a ratio to be scored as follows:

<table>
<thead>
<tr>
<th>Ratio</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>(&lt; 1.00)</td>
<td>5%</td>
</tr>
<tr>
<td>1.01 – 1.33</td>
<td>3%</td>
</tr>
<tr>
<td>1.34 – 1.66</td>
<td>1%</td>
</tr>
<tr>
<td>(&gt; = 1.67)</td>
<td>0%</td>
</tr>
<tr>
<td>7.</td>
<td><strong>Amortization period of Unfunded Accrued Liability (UAL) using plan specific assumptions and methods</strong></td>
</tr>
<tr>
<td>----</td>
<td>---------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td></td>
<td>Longer amortization periods have the effect of deferring sponsor contributions into a pension plan, lowering the plan’s funded ratio, and increasing the risk of the plan defaulting on its benefit payment obligations.</td>
</tr>
<tr>
<td></td>
<td>This measure will collapse all the outstanding amortization bases into one single equivalent amortization period and award credit based on the following recommended scoring scale:</td>
</tr>
<tr>
<td></td>
<td>`&lt; 20 years</td>
</tr>
<tr>
<td></td>
<td>20.01 – 25 years</td>
</tr>
<tr>
<td></td>
<td>25.01 – 30 years</td>
</tr>
<tr>
<td></td>
<td>&gt; 30 years</td>
</tr>
</tbody>
</table>
### Timing of required sponsor contributions

[STANDARD ASSUMPTIONS]

One indication of possible pension plan funding problems can be found in the deposit dates of required contributions. Section 112.64(1), Florida Statutes, requires the quarterly deposit of employer contributions.

Under this timing measurement, the plan’s required contribution would be adjusted for interest assuming payment at the middle of the plan year. This would be compared to the actual contributions paid adjusted for interest from the date of payment to the middle of the plan year. The standardized interest rate would be used for all adjustments. This ratio would be determined based on the current year contribution requirements.

<table>
<thead>
<tr>
<th>Actual contributions adjusted to mid-year</th>
<th>Required contributions at mid-year</th>
</tr>
</thead>
<tbody>
<tr>
<td>The following scoring scale is recommended:</td>
<td></td>
</tr>
<tr>
<td>Ratio $\geq$ 102%</td>
<td>3%</td>
</tr>
<tr>
<td>100% – 101.99%</td>
<td>2%</td>
</tr>
<tr>
<td>95% – 99.99%</td>
<td>1%</td>
</tr>
<tr>
<td>&lt; 95%</td>
<td>0%</td>
</tr>
</tbody>
</table>
9. **Fund assets compared to cash flow requirements**

This measure will demonstrate how many years’ worth of benefit payments the plan currently has accumulated in assets. It is expected that healthy plans would have a minimum of ten years’ worth of benefit payments in assets. Fewer years of benefit payments could indicate a potential future cash flow problem.

<table>
<thead>
<tr>
<th>Market Value of Assets less DROP Accounts</th>
<th>Benefit pymts (excluding DROP) + employee contrib. refunds + administrative expenses</th>
</tr>
</thead>
</table>

The following scoring scale is recommended:

- > 15 years: 2%
- 5 – 15 years: 1%
- < 5 years: 0%

**TOTAL Maximum Score**: 100%

**NOTE**: Each local government pension plan is reviewed at least triennially for compliance with Part VII of Chapter 112, Florida Statutes, to ensure actuarially sound funding. The results of the financial rating system are contingent on the state acceptance of the plan for compliance with those requirements.

Plans that are “not state accepted” will receive a score of 0.
Recommendation for Legislative action during the 2012 session

To implement a financial rating system, the department recommends the legislature consider adopting the following language:

(1) Effective July 1, 2012, and for all plan years completed on or after January 1, 2012, each local government defined benefit pension or retirement plan shall electronically report to the Department of Management Services the following information, in a format and methodology to be established by the department:
   (a) Long-term funded ratio;
   (b) Amortization period of standardized Unfunded Accrued Liability (UAL);
   (c) Current funded ratio;
   (d) Sponsor contribution as a percentage of valuation payroll;
   (e) Rate of return on plan assets compared to actuarial assumption;
   (f) Salary increases compared to actuarial assumption;
   (g) Amortization period of UAL using plan specific assumptions and methods;
   (h) Timing of required sponsor contributions; and
   (i) Fund assets compared to cash flow requirements.

The actuarial assumptions and methods to be used to produce this information shall be consistent with the assumptions and methods proposed by the Department of Management Services in its report to the legislature required by section 12 of chapter 2011-216, Laws of Florida. For purposes of this section, actuarial surplus shall mean an unfunded liability less than zero.

(2) The information required by subsection (1) must be provided to the department no later than 90 days after the close of the plan year, with appropriate signed actuarial certification as established by the department. For those plan years ending between January 1, 2012, and July 1, 2012, the due date for the submission of information shall be October 1, 2012.

(3) A plan established under either chapter 175 or chapter 185 that fails to submit the information on a timely basis shall be deemed to be not in compliance with chapters 175 and 185, as applicable.

(4) Any local government defined benefit pension plan that fails to submit the information on a timely basis shall be deemed to be not in compliance with part VII of chapter 112.

(5) Based on the information submitted by the local governments, the Department of Management Services shall develop a financial rating score for each plan based on the recommendations contained in its report to the Legislature required by section 12 of chapter 2011-216, Laws of Florida. Such scores shall be available to the public on the department’s website no later than March 15, 2013.