

# **PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

## **June 30, 2013 Actuarial Valuation Report**

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June 27, 2014

Mr. Francisco del Castillo Orozco  
Interim Administrator  
Puerto Rico Government Employees and  
Judiciary Retirement System Administration  
437 Ponce de León Avenue  
Hato Rey, PR 00918

Dear Mr. Castillo:

This report presents the results of the actuarial valuation of the Puerto Rico Government Employees Retirement System (PRGERS) as of June 30, 2013. Section I contains highlights of the valuation including a general discussion and comments on the various schedules included in the report. The subsequent Sections contain schedules summarizing the underlying calculations, asset information, participant data, plan benefits and actuarial assumptions and methods.

### Purpose

The main purposes of this report are:

- to provide the Annual Required Contribution, Annual Pension Cost, and Annual Other Postemployment Benefit (OPEB) Cost for the Fiscal Year ending June 30, 2014 based on relevant Statements of the Government Accounting Standards Board (GASB);
- to review the experience under the plan since the previous valuation;
- to present information pertaining to the operation of the plan for inclusion in financial statements; and
- to assess the relative funded position of the plan.

The use of this report for purposes other than those stated above may not be appropriate and should be reviewed with Milliman.

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The report was prepared solely to provide assistance to the Commonwealth of Puerto Rico Government Employees Retirement System for a specific and limited purpose. It is a complex, technical analysis that assumes a high level of knowledge concerning PRGERS' operations, and uses PRGERS' data, which Milliman has not audited. Milliman and PRGERS do not intend to benefit and assume no duty or liability to other parties who receive this report. Milliman and PRGERS recommend that any third party recipient of this report be aided by its own actuary or other qualified professional when reviewing the Milliman report. Any distribution of this report should be made in its entirety.

#### Data Reliance

In performing this analysis, we relied on the census data, asset information, and other information (both written and oral) provided by the System. This information includes, but is not limited to, plan documents (the applicable statutes) and summaries, participant data, and financial statements. As is our usual practice, we have not audited the information provided to us, but have reviewed it for general reasonableness. We found this information to be reasonably consistent and comparable with information used for other purposes. The valuation results depend on the integrity of this information. If any of this information is inaccurate or incomplete, our results may be different and our calculations may need to be revised.

#### Future Measurements

This valuation report is only an estimate of the System's financial condition as of a single date. It can neither predict the System's future condition nor guarantee future financial soundness. Actuarial valuations do not affect the ultimate cost of System benefits. While the valuation is based on an array of individually reasonable assumptions, other assumption sets may also be reasonable and valuation results based on those assumptions would be different. No one set of assumptions is uniquely correct. Determining results using alternative assumptions is outside the scope of our engagement.

Future actuarial measurements may differ significantly from the current measurements presented in this report due to factors such as the following:

- Plan experience differing from the actuarial assumptions;

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- Future changes in the actuarial assumptions;
- Increases or decreases expected as part of the natural operation of the methodology used for these measurements (such as potential additional contribution requirements due to changes in the plan's funded status); and,
- Changes in the plan provisions or accounting standards.

Due to the limited scope of our assignment, we did not perform an analysis of the potential range of such measurements.

Act 3, the comprehensive pension reform enacted on April 4, 2013, is a dynamic 50-year plan that is designed to provide enough cash for the System to be able to make full Basic System Benefit payments as they come due, to pay the new lower System Administered Benefits, and to pay debt service on the Pension Obligation Bonds. The reforms enacted through Act 3, by design, are a very long term plan, and constant monitoring will be needed to make sure the System stays on track. Actual experience may turn out better or worse than expected, thus future adjustments may be needed.

#### Certification

We hereby certify that, to the best of our knowledge, this report is complete and accurate and all costs and liabilities were determined in conformance with generally accepted actuarial principles and practices which are consistent with the Actuarial Standards of Practice promulgated by the Actuarial Standards Board and the applicable Guides to Professional Conduct, amplifying Opinions, and supporting recommendations of the American Academy of Actuaries and are based on actuarial assumptions and methods adopted by the System. All of the actuarial assumptions were developed by Milliman in consultation with PRGERS. We believe that the actuarial assumptions and methods used in this actuarial valuation are reasonable for the main purposes of this report as stated herein.

Actuarial computations presented in this report are for purposes of fulfilling financial accounting requirements under the GASB Statements 25, 27, and 45. The calculations in the enclosed report have been made on a basis consistent with our understanding of the plan provisions described in Section VIII of this report, and of the applicable GASB Statements. Determinations for purposes other than meeting these requirements may be significantly different from the results contained in this report. Accordingly, additional determinations may be needed for other purposes.

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Mr. Francisco del Castillo Orozco  
June 27, 2014  
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### Qualifications

The consultants who worked on this assignment are pension actuaries. Milliman's advice is not intended to be a substitute for qualified legal or accounting counsel.

We are members of the Society of Actuaries and meet the qualification standards of the American Academy of Actuaries to render this actuarial opinion.

Respectfully submitted,



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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### SECTION I – SUMMARY

#### A. Summary of Principal Results of June 30, 2013 Actuarial Valuation (*\$ amounts in thousands*)

	Basic System <u>Pension Benefits only</u>	System Administered <u>Pension Benefits only</u>	GASB 25 & 27 Accounting (Basic System and System Administered <u>Pension Benefits</u> )	GASB 45 Accounting (Other Postemployment <u>Benefits</u> )
Actuarial Accrued Liability <sup>1</sup>	\$21,006,208	\$2,705,873	\$23,712,081	\$1,482,879
Actuarial Value of Assets	<u>731,342</u>	<u>0</u>	<u>731,342</u>	<u>0</u>
Unfunded Actuarial Accrued Liability	20,274,866	2,705,873	22,980,739	1,482,879
Employer Normal Cost <sup>2</sup> as a percent of payroll	(33,898) (0.97)%	15,272 0.44%	(18,626) (0.53)%	0 0.00%
Annual Required Contribution (ARC) as a percent of payroll	1,590,598 45.59%	232,077 6.65%	1,822,675 52.24%	88,508 2.54%
Annual Pension / OPEB Cost <sup>3</sup> as a percent of payroll	N/A N/A	N/A N/A	1,637,204 46.92%	82,222 2.36%
Employer Contributions ( <i>estimated</i> ) as a percent of payroll	677,555 19.42%	180,300 5.17%	857,855 24.59%	111,972 3.21%
Portion of ARC not covered ( <i>estimated</i> ) as a percent of payroll	913,043 26.17%	51,777 1.48%	964,820 27.65%	N/A N/A

<sup>1</sup> A discussion of the benefits included in the respective Actuarial Accrued Liability begins on page 4 of this section. Please see page 27 for an allocation of Actuarial Accrued Liability by Pension Law and System Entity.

<sup>2</sup> Employer Normal Cost and all subsequent annual amounts are on behalf of the July 1, 2013 to June 30, 2014 fiscal year.

<sup>3</sup> Determined as if PRGERS were a single employer plan instead of a cost-sharing multiple employer plan. See page 14 for more information.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION I – SUMMARY**

	June 30, 2012 <u>Valuation</u>	June 30, 2013 <u>Valuation</u>
<b><i>GASB 25 &amp; 27 Accounting (\$ amounts in thousands)</i></b>		
Actuarial Accrued Liability	\$27,645,786	\$23,712,081
Actuarial Value of Assets	<u>1,236,873</u>	<u>731,342</u>
Unfunded Actuarial Accrued Liability	26,408,913	22,980,739
 Employer Normal Cost as a percent of payroll	 186,265 5.22%	 (18,626) (0.53)%
 Annual Required Contribution for upcoming fiscal year as a percent of payroll	 2,192,821 61.42%	 1,822,675 52.24%

***GASB 45 Accounting (\$ amounts in thousands)***

Actuarial Accrued Liability	\$2,120,970	\$1,482,879
Actuarial Value of Assets	<u>0</u>	<u>0</u>
Unfunded Actuarial Accrued Liability	2,120,970	1,482,879
 Employer Normal Cost as a percent of payroll	 32,412 0.91%	 0 0.00%
 Annual Required Contribution for upcoming fiscal year as a percent of payroll	 154,999 4.34%	 88,508 2.54%

A discussion of the benefits included in the respective Actuarial Accrued Liability begins on page 4 of this section.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

	June 30, 2012 <u>Valuation</u>	June 30, 2013 <u>Valuation</u>
<b><i>Participant Data</i></b>		
<u>Active Members</u>		
Number	134,566	125,671
Average Salary	\$26,532	\$27,764
Total Annual Salary	\$3,570,339,000	\$3,489,096,000
 <u>Retirees</u>		
Number	87,465	94,395
Average Monthly Basic System Benefit <sup>1</sup>	\$1,019	\$1,059
Average Monthly System Administered Benefit <sup>1</sup>	\$89	\$74
 <u>Disabled Members</u>		
Number	16,571	16,649
Average Monthly Basic System Benefit <sup>1</sup>	\$423	\$436
Average Monthly System Administered Benefit <sup>1</sup>	\$131	\$185
 <u>Beneficiaries</u>		
Number	13,825	13,453
Average Monthly Basic System Benefit <sup>1</sup>	\$216	\$228
Average Monthly System Administered Benefit <sup>1</sup>	\$103	\$99

Basic System Benefit and System Administered Benefit amounts shown above are for pension benefits, including minimum benefits and COLAs, and excludes benefits payable at a later date to Law 70 Section 4B retirees. Special Law "bonus" benefits are not reflected.

<sup>1</sup> Amounts as of June 30, 2013 do not reflect the increase in the minimum monthly benefit from \$400 to \$500 effective July 1, 2013 under Act 3 for current pensioners and the corresponding increase for current beneficiaries.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

### **B. General Discussion**

#### Basic System Benefits

As summarized in Section VIII, the Puerto Rico Government Employees Retirement System (PRGERS) provides benefits to members, or their beneficiaries, upon:

- Retirement
- Disability
- Vested withdrawal
- Death
- Nonvested withdrawal (return of contributions)

These benefits will be referred to as the “Basic System Benefits” throughout this report. The contributions required by statute to fund the Basic System Benefits listed above total 22.275% of payroll for the 2013-2014 fiscal year, comprising 10% from members and 12.275% from employers. These contribution rates are not actuarially determined. Statutory funding requirements in future years will increase under Law 116 (see page 11).

For members who retired prior to July 1, 2013 annuity benefits are subject to a \$500 monthly minimum. The amount in excess of \$200 and less than \$300 is a System Administered Benefit (see below) for all employees. The amount in excess of \$300 and less than \$400 is a System Administered Benefit for Public Corporation and Municipality employees.

#### System Administered Benefits

Also summarized in Section VIII are benefits granted under a series of special laws that are administered by PRGERS, including:

- Additional minimum pension benefits for members who retired prior to July 1, 2013
- Ad-hoc cost-of-living adjustments (COLAs) provided in past years
- Additional benefits due to death or disability for reasons specified in Act 127
- Medical insurance plan contribution for members who retired prior to July 1, 2013
- Christmas bonus for members who retired prior to July 1, 2013
- Medication bonus for members who retired prior to July 1, 2013

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

System 2000 participants, other than those members receiving a disability annuity or receiving benefits under Act 127, do not receive any System Administered Benefits.

These benefits are funded on a pay-as-you-go basis from the General Fund or specific entity of the Commonwealth of Puerto Rico and will be referred to as “System Administered Benefits” throughout this report. These benefits are not an obligation of the PRGERS assets.

### Other Benefits

This report does not address the guarantee insurance reserve for life insurance on loans to plan members. (Please see Notes to Basic Financial Statements on page 39 and Statements of Plan Net Assets on page 12 of the System's June 30, 2012 Basic Financial Statements.)

### Other Contributions

In addition to the payroll based contributions described under Basic System Benefits above, the System will receive Supplemental Contributions and an Additional Uniform Contribution from the General Fund, public corporations or municipalities.

The Supplemental Contribution equals \$2,000 for each pensioner (including beneficiaries receiving survivor benefits) who was previously benefitting as an Act 447 or Act 1 member while an active employee. This contribution will pay for the Medical Insurance Plan Contribution (up \$1,200 per member), the Christmas Bonus (\$200 per member), and Medication Bonus (\$100 per member) payable to members who retired prior to July 1, 2013. The excess of these Supplemental Contributions will remain in the System to pay down the unfunded actuarial accrued liability.

The System will also receive an Additional Uniform Contribution each fiscal year from 2013-2014 through 2032-2033. For the 2013-2014 fiscal year, the Additional Uniform Contribution equals \$120 million. For each subsequent fiscal year through 2032-2033, the Additional Uniform Contribution will be certified by the external actuary of the System as necessary to avoid having the projected gross assets of the System, during any subsequent fiscal year, fall below \$1 billion.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

### System Experience since Prior Valuation

The approximate rate of return since the prior valuation was 31.38% for 2012-2013. This significant asset gain decreased the System's unfunded actuarial accrued liability. This rate of return is determined on a net asset basis. Because of the significant amount of Pension Obligation Bond proceeds that are currently invested (approximately \$3 billion), the net asset return is significant larger than the return on a gross asset basis.

Our analysis of System experience from June 30, 2012 to June 30, 2013 resulted in a liability loss of \$0.3 billion for Basic System Benefits (e.g. – the original June 30, 2012 liability of \$24.5 billion was expected to increase to \$25.1 billion as of June 30, 2013, and instead increased to \$25.4 billion prior to the changes in assumptions made as of June 30, 2013 and the Act 3 changes).

Major sources of gains and losses from the June 30, 2012 valuation to the June 30, 2013 valuation are as follows:

1. \$120 million loss on new entrants.
2. \$230 million loss on roughly 1,960 "pop-up" retirees who were not in the June 30, 2012 census data.
3. \$70 million gain on retiree and beneficiary mortality.
4. \$80 million loss on retiree and beneficiary data changes.
5. \$100 million gain on roughly 8,700 active members who retired during the one-year period.
6. \$260 million loss on continuing active members due to salary increases more than anticipated.
7. \$140 million gain from active members terminating employment.

Further discussion is warranted on Items 2, 5 and 6.

For Item 2, the entire \$230 million is not a loss to the extent that these new retirees were included in the deferred vested liability on June 30, 2012. However, we cannot determine what portion of the 1,960 retirees emerged from deferred vested status since deferred vested census data is not complete and the deferred vested liability is developed by placing a loading assumption on the Act 447 and Act 1 liabilities to account for deferred vested members.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

For Item 5, the retirement gain is the net result of the employers paying the pension benefits directly to Law 70 Section 4B retirees for a temporary period and actual benefits less than anticipated for some retirees, which more than offsets the significant liability loss due to more retirements than anticipated, the enhanced benefits granted to Law 70 Section 4B retirees, and actual benefits more than anticipated for other retirees. Please also see Accounting Issues under Law 70 on page 12 for further discussion.

For Item 6, compensation was assumed to increase 3% per year from Fiscal Year 2011-2012 to Fiscal Year 2012-2013. Total compensation increased by 6.44% for continuing active members who were included in both the 2012 and the 2013 actuarial valuations. Note that although active members experienced a larger than expected increase in compensation during the past fiscal year, there had been virtually no compensation increases from Fiscal Year 2008-2009 through Fiscal Year 2011-2012.

### Change in Interest Rate Assumption since Prior Valuation

This valuation reflects an increase in the interest rate assumption for GASB 25 & 27 purposes from 6.0% per year to 6.4% per year. The 6.4% assumption reflects the asset allocation for the non-loan portion of the portfolio that was adopted by the Board during December 2013 as shown below and Milliman's capital market assumptions as of June 30, 2013. In addition, the assumption reflects that loans to members comprise approximately 20% of the portfolio and, as provided by the System, have an approximate return of 10.0%.

Asset Class	Target Allocation
Domestic Equity	25%
International Equity	10%
Fixed Income	64%
Cash	1%

Please note that this new interest rate assumption of 6.4% per year is less than the debt service on some of the Pension Obligation Bonds (about 30% based on the outstanding balance of \$3 billion as of June 30, 2013). The debt service on the Pension Obligation Bonds ranges from 5.85% to 6.55%.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

This valuation also reflects an increase in the interest rate assumption for GASB 45 purposes from 3.2% per year to 3.25% per year. The 3.25% assumption reflects Milliman's capital market assumptions as of June 30, 2013 and assumes that the Commonwealth's General Fund (the assets used to pay the GASB 45 benefits) is invested approximately in 50% cash and 50% short-term bonds.

The increase in the interest rate assumption decreased the Actuarial Accrued Liability as of June 30, 2013 for Basic System Benefits by \$1.14 billion, from \$25.42 billion to \$24.28 billion, or by 4.5%. The decrease in the ARC for Basic System Benefits was \$50.0 million or 2.4%.

For GASB 25 and 27 accounting, the increase in the interest rate assumption decreased the Actuarial Accrued Liability as of June 30, 2013 by \$1.29 billion, from \$28.72 billion to \$27.43 billion, or by 4.5%. The decrease in the ARC was \$54.9 million or 2.4%.

For GASB 45 accounting, the increase in the interest rate assumption decreased the Actuarial Accrued Liability as of June 30, 2013 by \$0.02 billion, from \$2.16 billion to \$2.14 billion, or by 0.6%. The decrease in the ARC was \$0.5 million or 0.3%.

### Changes in Plan Provisions since Prior Valuation

#### *Act 3 and Act 32 Overview*

Act 3, enacted on April 4, 2013, is a broad ranging dynamic 50-year plan with several significant changes that will eventually result in all active and retired members participating in a member funded hybrid plan. The focus of Act 3 is on cash flow for roughly the first half of the period, followed by a "catch-up" period for the second half. During the first half of the 50-year period, the combination of benefit changes and additional funding are designed to provide enough cash such that the System is expected to be able to pay full benefits and Pension Obligation Bond ("POB") debt service on schedule. During this time the System is expected to have gross assets on hand that are less than the outstanding POB liability. During the second half of the 50-year period, continued high employer contribution rates will be used to "catch up" and fill in member notional accounts with real assets. Following below is a summary of the components of Act 3 and a brief description of their contribution to the cash-flow solution.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

- Hybrid plan – The existing defined benefit tiers of Act 447 and Act 1 have a finite time frame, but as of the present time make up the vast majority of the System’s liability and cash outflow. Ceasing future defined benefit accruals under Act 447 and Act 1 and converting to a member-funded hybrid plan will result in lower benefit payments as these tiers wind down, and will make all future employer contributions available to pay benefits and POB debt service.
- Retirement age – The retirement ages for the frozen accrued benefits of Act 447 are increased, which results in a delay in cash outflow and thus lower cumulative future benefit payments to these members. Reduced early retirement was eliminated for Act 1, which results in a delay in cash outflow. The retirement age was also increased for System 2000 general members as well as all future members, which results in a delay in cash outflow.
- Member contributions – The prior member contribution rate of 8.275% (varying for some members) is increased to 10% of pay. While this will result in higher hybrid plan benefits in the future, it will provide more assets in the near term that can support current benefit payments and POB debt service.
- Mandated annuitization – System 2000 notional accounts were available as lump sum payments at termination/retirement. With a full cohort of active System 2000 members completing careers at roughly the same time that POB principal payments begin, lump sum payments would have had a deleterious effect on System assets. Act 3 hybrid accounts, which include the System 2000 accounts, are subject to mandatory annuitization, which will benefit the System on a cash flow basis by stretching out payments over time, thus providing the System “catch-up” time. The PRGERS Board has the authority for determining the annuitization factors and for updating the factors in future years.
- Survivor benefits – Act 447 and Act 1 offered survivor benefits at no cost to the retiree. For future retirees, the defined benefit portion of the Act 447 or Act 1 frozen annuity and the hybrid plan Act 3 annuity will be subject to an actuarially determined reduction if the member elects an annuity with a survivor benefit, resulting in lower future cash outflow.
- The occupational death benefit and the one year of salary death benefit were eliminated for Act 447 and Act 1 members, resulting in lower future cash outflow.
- Disability benefits, other than those provided under Law 127, were eliminated, resulting in lower future cash outflow. (A member who becomes disabled may

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

receive their Defined Contribution Hybrid Contribution Account balance, and their accrued benefit if applicable under Act 447 or Act 1.)

- Special law benefits – Special law benefits are reduced for current retirees and eliminated for future retirees. The employers (Central Government, Public Corporations and Municipalities) will continue making contributions to the System as if all special law benefits were still in place for current and future Act 447 and Act 1 retirees, which will result in additional cash that can be applied to benefit payments and POB debt service.
- Minimum benefits – The minimum pension payable was increased from \$400 to \$500 per month for current retirees only.
- Act 32 - In addition to all of the Act 3 components discussed above, a separate law was passed, Act 32 as amended, which requires an additional annual contribution from the Commonwealth for 20 years. The initial additional annual contribution is defined as \$120 million, and with subsequent amounts adjusted as necessary for the System's gross assets to remain above \$1 billion.

Please refer to Section VIII for a summary of plan provisions under Act 3. Because retirement eligibility age changed, revisions were made to the termination and retirement rates. Other assumptions were also revised. Please refer to Section IX for a summary of the actuarial assumptions used in this valuation.

### *Impact of Act 3*

The Act 3 reform decreased the Actuarial Accrued Liability as of June 30, 2013 for Basic System Benefits by \$3.27 billion, from \$24.28 billion to \$21.01 billion, or by 13.5%. The decrease in the ARC for Basic System Benefits was \$0.41 billion or 20.7%.

For GASB 25 and 27 accounting, the Act 3 reform decreased the Actuarial Accrued Liability as of June 30, 2013 by \$3.76 billion, from \$27.43 billion to \$23.67 billion, or by 13.7%. The decrease in the ARC was \$0.46 billion or 20.3%.

As a result of the Act 3 reforms, prospective benefits to active members will mainly be derived from the accumulation of the members' hybrid plan accounts. This benefit design, combined with interest crediting on member contributions that is less than the interest rate assumption, results in an employer normal cost that is less than \$0.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

For GASB 45 accounting, the Act 3 reform decreased the Actuarial Accrued Liability as of June 30, 2013 by \$0.66 billion, from \$2.14 billion to \$1.48 billion, or by 30.8%. The decrease in the ARC was \$68 million or 43.3%.

### *Law 127 Death Benefit Change*

This valuation reflects updated information provided by the System that the High-Risk Death Benefit percentage under Act 127 is 50%, instead of 40%, for Act 1 and System 2000 members. There is no impact on the results for Basic System Benefits. Under GASB 25 and 27 accounting, which includes System Administered Benefits, this revision increased the Actuarial Accrued Liability as of June 30, 2013 \$0.04 billion, from \$23.67 billion to \$23.71 billion, or by 0.2%. The increase in the ARC was \$5 million or 0.3%.

### Law 116

During the 2010-2011 fiscal year, Law 116 was enacted which increased employer contributions from the prior 9.275% of compensation to 10.275% of compensation effective July 1, 2011. For the next four fiscal years effective July 1, employer contributions will increase annually by 1%. For the next five fiscal years, employer contributions will increase annually by 1.25%, reaching an employer contribution rate of 20.525% effective July 1, 2020.

### Law 70

During the 2010-2011 fiscal year, Law 70 provided for an early retirement incentive. Additional window periods occurred through December 31, 2012. The Law provided benefits to retirees under the three sections discussed below.

### *Section 4A*

Under Section 4A of Law 70, active members could terminate employment immediately and receive a bonus equal to one, three, or six months of salary (paid by the Commonwealth).

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

### *Section 4B*

Under Section 4B of Law 70, active members who had at least 15 years of service, but less than 30 years of service, were able to retire immediately with an enhanced benefit ranging from 37.5% to 50% of salary. This enhanced benefit is paid by the General Fund for government employees and Public Corporations for their employees until the member reaches the later of age 55 or the date the member would have completed 30 years of service had the member continued working. The System will pay the benefit after this time period. While the General Fund / Public Corporation is paying the pension benefit directly to the member or any surviving beneficiary, the General Fund / Public Corporation will also pay a contribution equal to the employer contribution rate (11.275% for the 2012-2013 fiscal year, with future increases under Law 116) of final salary to the System. Public Corporations also pay the 8.275% employee contribution rate to the System.

### *Section 4C*

Under Section 4C of Law 70, active members who had at least 30 years of service could retire immediately and receive a bonus equal to six-months of salary (paid by the Commonwealth). For any active employee who retired under Section 4C, the Public Corporation will pay a contribution equal to the employer contribution rate (11.275% for the 2012-2013 fiscal year, with future increases under Law 116) plus the 8.275% employee contribution rate of final salary to the System for five years after retirement.

### *Accounting Issues*

For Law 70 Section 4B retirees, this valuation reflects that the System will be responsible for paying pension benefits at a specified future date for each retiree. Because the employers are temporarily making pension payments directly to the Section 4B retirees and the payments are not passing through the System, these temporary payments are not considered System Administered Benefits and thus are not included in this valuation.

The appropriate accounting for these temporary benefits is on the financial statements of each employer who is making payments directly to Law 70 Section 4B retirees during the temporary period. The accounting requirements are set forth in GASB 47, the standard that relates to Termination Benefits. If the employer is already preparing a

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

GASB 45 valuation for other postemployment benefits, the termination benefits can be included in that valuation and consolidated with the underlying GASB 45 results.

### Early Retirement Incentive Contributions

The early retirement incentive contributions are reflected in the System's financial statements in the year of the incentive even though these contributions are typically scheduled to be paid by the employer to the System over many years. As directed by the System, the actual employer contributions for GASB 25 & 27 accounting reflect early retirement incentive contributions on an accrual basis to match the amounts shown in the System's financial statements.

### GASB Accounting Information

Basic System Benefits and System Administered Benefits have been valued under Governmental Accounting Standards Board Statement No. 25, "*Financial Reporting for Defined Benefit Pension Plans and Note Disclosures for Defined Contribution Plans*" (GASB 25) and Statement No. 27, "*Accounting for Pensions by State and Local Governmental Employers*" (GASB 27). The Medical Insurance Plan Contribution has been valued under Governmental Accounting Standards Board Statement No. 45, "*Accounting and Financial Reporting by Employers for Postemployment Benefits Other Than Pensions*" (GASB 45).

Accounting results under GASB 25, 27, and 45 are presented in Sections IV, V and VI of this report and are discussed below.

GASB has issued Statements 67 and 68 which will be replacing GASB Statements 25 and 27. The effective date of Statement 67 (which applies to financial reporting on a plan basis) is the fiscal year ending June 30, 2014. The effective date of Statement 68 (which applies to financial reporting by contributing employers) is the fiscal year ending June 30, 2015, although earlier adoption is permissible. Accordingly, this 2013 valuation will be the last performed under GASB 25 and 27.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

### Net Pension/OPEB Obligation and Annual Pension/OPEB Cost

As requested, this report includes the determination of the Net Pension Obligation under GASB 25 and 27 and the Net Other Postemployment Benefit (OPEB) Obligation under GASB 45 as of June 30, 2013. We have also determined the Annual Pension Cost and the Annual OPEB Cost for the 2013-2014 fiscal year. These amounts were determined as if PRGERS were a single employer plan instead of a cost sharing multiple employer plan.

We note that as a cost-sharing multiple employer plan, PRGERS is not required to report a Net Pension Obligation nor a Net OPEB Obligation. In accordance with paragraph 19 of GASB 27 and paragraph 23 of GASB 45, the employers that participate in the plan should recognize annual pension/OPEB expenditures/expense equal to their contractually required contributions to the plan. The employers do not have an Annual Required Contribution (ARC), a Net Pension Obligation or a Net OPEB Obligation. (PRGERS reports an ARC for the system as a whole, not separate ARCs for the individual employers.) Any difference between contributions required and contributions made would produce a pension/OPEB liability or asset at the employer level.

### Re-classification of Prior Years' Employer Contributions

As requested by the System and its auditors, this valuation reflects a re-classification in the employer contributions for the fiscal years 2007-2008 through 2011-2012 between GASB 25/27 and GASB 45. While the total employer contributions did not change, the GASB 45 employer contributions were set equal to the actual medical insurance plan continuation benefits paid during the respective fiscal year. As a result of the re-classification of employer contributions and the reflection of a prior revision in the 2007-2008 employer contribution, the Net Pension Obligation and Net OPEB Obligation as of June 30, 2012 and the Annual Pension Cost and Annual OPEB Cost for the 2012-2013 fiscal year have been revised from the amounts shown in the June 30, 2012 Actuarial Valuation dated July 31, 2013.

### Basic System Benefits Information

We have performed a June 30, 2013 actuarial valuation of the Basic System Benefits alone and have prepared accounting results for them based on GASB 25 and 27 rules.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

The FY 2013-2014 Annual Required Contribution (ARC) for the Basic System Benefits only based on GASB 25 and 27 rules would be \$1.591 billion. The ARC is comprised of the normal cost (the value of benefits accruing to active members each year) and an amortization payment toward the unfunded liability. The ARC represents the portion of the cost of PRGERS' Basic System Benefits that employers should pay in order for PRGERS to be actuarially funded; i.e. the ARC has been reduced to reflect that active members contribute 10% of pay to the system. The actual employer contributions are based on the statutory funding requirement, which is 12.275% of payroll for the 2013-2014 fiscal year and which is not actuarially determined. Contributions for early retirement incentive programs, including Law 70, are also included. Employer contributions for Basic System Benefits are estimated to be \$677.6 million for FY 2013-2014, which is less than the ARC by \$913.0 million.

As shown in Subsection C of Section IV, PRGERS has Unfunded Actuarial Accrued Liabilities (UAAL) of \$20.3 billion on behalf of Basic System Benefits.

### GASB 25 and 27 Accounting Information

We have performed a June 30, 2013 actuarial valuation of the Basic System Benefits and the System Administered Benefits (excluding the Medical Insurance Plan Contribution, which will be discussed separately under GASB 45 below) and have prepared accounting results under GASB 25 for the financial statements of the System and under GASB 27 for the Commonwealth of Puerto Rico's financial statements. The System Administered Benefits are financed on a pay-as-you-go basis from the General Fund of the Commonwealth of Puerto Rico and contributions from municipalities and public corporations.

The FY 2013-2014 employer ARC under GASB 25 and 27 for these combined benefits is \$1.823 billion. The estimated FY 2013-2014 combined employer contributions are only \$857.9 million, which is \$964.8 million less than the ARC. This includes the Basic System Benefits and the System Administered Benefits (excluding the Medical Insurance Plan Contribution). The FY 2013-2014 Annual Pension Cost under GASB 27 is \$1.637 billion.

As shown in Subsection B of Section V, the Unfunded Actuarial Accrued Liability for these combined benefits is \$23.0 billion.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

### GASB 45 Accounting Information

We have performed a June 30, 2013 actuarial valuation of the Medical Insurance Plan Contribution and have prepared accounting results for the Commonwealth of Puerto Rico's financial statements under GASB 45. (Note that the Medication Bonus has been included in the GASB 25 and 27 results as a Pension Benefit because members can receive the bonus without submitting documentation to substantiate medication expenses.)

The FY 2013-2014 ARC for the Medical Insurance Plan Contribution under GASB 45 is \$88.5 million.

There are no member or employer contributions on behalf of the Medical Insurance Plan Contribution. This benefit is financed on a pay-as-you-go basis from the General Fund of the Commonwealth of Puerto Rico. Since this is an Other Postemployment Benefit that is not funded in advance, the ARC for this benefit has been calculated based on an assumed investment return rate of 3.25%, instead of the 6.4% rate used for the Pension Benefits. As shown in Subsection B of Section VI, the Unfunded Actuarial Accrued Liability on a GASB 45 basis for this benefit is \$1.5 billion.

### Allocation of Actuarial Accrued Liability

Subsection A of Section III shows the Actuarial Accrued Liability as of June 30, 2013 by Pension Law (Act 447, Act 1, and System 2000) within each System Entity (Government, Public Corporation, and Municipality).

### Simplified Cash Flow Projection for Basic System Benefits

PRGERS is a mature retirement system with a significant retiree population. Based on the statutory funding requirements prior to Act 3, the annual benefit payments and administrative expenses paid by the system were significantly larger than the member and employer contributions made to the system. Thus investment income must have been used to cover this negative cash flow and assets were projected to become exhausted by the end of this decade. Act 3, enacted on April 4, 2013, provided for significant pension reforms and additional contributions to the System to counter the imminent expected asset exhaustion.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

The table shown in Subsection C of Section III provides a simplified illustration of the expected net cash flows over the next 10 years. Annual payroll growth of 2.5% is assumed, as future members are assumed to replace current members who terminate or retire. (Note, we did not attempt to include in the expected benefit payments any benefit payments attributable to new members in preparing this table. Members who join PRGERS in the future will generate some cash outflow during the next 10 years due to refunds of their contributions, death and disability benefits, and immediate annuities due to service purchases, etc. We expect that these amounts will be relatively modest and they have not been included in the results shown. Doing so would increase the expected negative net cash flow.)

For purposes of this illustration, the net Supplemental Contributions were based on 124,497 pensioners and beneficiaries from Act 447 and Act 1 throughout the ten year period and were assumed to be paid mid-year. The Additional Uniform Contribution was assumed to be paid at the end of each fiscal year. As shown on the table in Subsection C of Section III, the Additional Uniform Contribution is \$120 million for the 2013-2014 fiscal year and was assumed to remain \$120 million throughout the projection period.

Because the projection in Subsection C in Section III is a simple projection and only covers 10 years, this projection does not constitute the external actuary certification of the Additional Uniform Contribution for the 2014-2015 or any later fiscal year. Such a certification would be based on a full cash flow projection model that incorporates new entrants, reflects the impact of expected demographic changes in the development of the Supplemental Contributions, and covers a 50-year period.

As discussed earlier, Act 3 is a dynamic 50-year plan that is designed to provide enough cash for PRGERS to be able to make full Basic System Benefit payments as they come due, to pay the new lower System Administered Benefits, and to pay debt service on the POB's. The reforms enacted through Act 3, by design, is a very long term plan, and constant monitoring will be needed to make sure the System stays on track. Actual experience may turn out better or worse than expected, thus future adjustments may be needed.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

### **C. Discussion of Supporting Exhibits**

#### System Assets

Section II summarizes the plan assets taken into account in the preparation of the GASB 27 Employer Accounting results for PRGERS.

Subsection A summarizes the Market Value of Assets as of June 30, 2013, including the additional amounts due to the contribution receivables, if any.

Subsection B summarizes the reconciliation of the Market Value of Assets from June 30, 2012 to June 30, 2013.

Subsection C summarizes the development of the Actuarial Value of Assets as of June 30, 2013. The Actuarial Value of Assets is equal to the Market Value of Assets.

Subsection D develops an estimated rate of return on plan assets for the previous plan year. The estimated rate of return from June 30, 2012 to June 30, 2013 was 31.38% on the Market Value of Assets. This rate of return is determined on a net asset basis. Because of the significant amount of Pension Obligation Bond proceeds that are currently invested (approximately \$3 billion), the net asset return is significant larger than the return on a gross asset basis. This exhibit also develops an estimated rate of return on a gross asset basis (e.g. net assets plus the liability for Pension Obligation Bond proceeds).

Subsection E summarizes the historical estimated rates of return on plan assets on a market value basis on both gross and net asset bases. Prior year returns were calculated by Milliman using the methodology in Subsection D, based on the asset amounts and cash flows shown in PRGERS audited financial statements.

The asset information used for the valuation was taken from unaudited financial statements provided by PRGERS as of June 30, 2013 and is subject to change upon audit.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

### Management Information

Section III presents additional information that has been derived from the valuation process.

Subsection A shows the allocation of Actuarial Accrued Liability as of June 30, 2013 for Basic System Benefits by Pension Law (Act 447, Act 1, and System 2000) within each System Entity (Government, Public Corporation, and Municipality).

Subsection B shows the allocation of the Accumulated Member Contributions with interest for active members as of June 30, 2013 by Pension Law (Act 447, Act 1, and System 2000) within each System Entity (Government, Public Corporation, and Municipality).

Subsection C shows a projected cash flow for the current fiscal year and the next ten fiscal years for Basic System Benefits. Please see Subsection B of Section I for a description of this projection.

### Basic System Benefits Information

Section IV summarizes the Actuarial Accrued Liability and the development of the Annual Required Contribution for just the Basic System Benefits under GASB 25 and 27 for the fiscal year ending June 30, 2014 (please see Subsection B of Section I for a description of the benefits included in this valuation).

Subsection A summarizes the development of the Actuarial Accrued Liability as of June 30, 2013.

Subsection B summarizes the development of the Employer Normal Cost. The Employer Normal Cost is the total normal cost under the Projected Unit Credit Actuarial Cost Method adjusted for interest to mid-year, increased by expected administrative expenses paid from the fund, and reduced by expected member contributions.

Subsection C summarizes the development of the amortization payment of the Unfunded Actuarial Accrued liability. The amortization period used to calculate the ARC is 30 years from June 30, 2007, with level annual payments. 24 years remain as of June 30, 2013.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

Subsection D summarizes the development of the Annual Required Contribution (ARC). The ARC is the sum of the employer normal cost and the amortization payments, adjusted to mid-year to reflect that payments are made throughout the year.

### GASB 25 and 27 Accounting Information

Section V summarizes the Actuarial Accrued Liability and the development of the Annual Required Contribution and Annual Pension Cost under GASB 25 and 27 for the fiscal year ending June 30, 2014 (please see Subsection B of Section I for a description of the benefits included in these valuation results). Results are shown in total for GASB 25 and 27, with the Actuarial Accrued Liability and Employer Normal Cost presented for the underlying Basic System Benefits and for the underlying System Administered Benefits that are included in this valuation.

Subsection A summarizes the development of the Actuarial Accrued Liability as of June 30, 2013 and Employer Normal Cost as of December 31, 2013.

Subsection B summarizes the development of the amortization payment of the Unfunded Actuarial Accrued liability. The amortization period used to calculate the ARC is 30 years from June 30, 2007 with level annual payments each year. 24 years remain as of June 30, 2013.

Subsection C summarizes the development of the Annual Required Contribution (ARC). The ARC is the sum of the employer normal cost and the amortization payments, adjusted to mid-year to reflect that payments are made throughout the year.

Subsection D summarizes the development of the Net Pension Obligation (NPO) as of June 30, 2013 as if PRGERS were a single employer plan instead of a cost sharing multiple employer plan. The NPO is defined as the cumulative difference between the Annual Pension Cost (APC) and the employer's contribution to the plan, including any pension liability (asset) at transition.

Subsection E summarizes the development of the APC for the fiscal year ending June 30, 2014 as if PRGERS were a single employer plan instead of a cost sharing multiple employer plan. The APC is the amount recognized in the employer's financial statements as the cost of the pension plan and is determined in accordance with GASB

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

Statement No. 27. The APC is equal to the ARC plus interest on the NPO, if any, as of June 30, 2013 less an amortization of this NPO.

Subsection F shows a seven-year history of the ARC and the percentage contributed. This schedule is required by GASB Statements No. 25 and 27. The FY 2013-2014 contribution percentage assumes that the employer contributions for Basic System Benefits will be at the statutory level of 12.275% of payroll and include anticipated early retirement incentive contributions and that employer contributions for the applicable System Administered Benefits will be the anticipated pay-as-you-go payments. The estimated FY 2013-2014 employer contributions also reflect the estimated additional contributions due to the Supplemental Contribution and the Additional Uniform Contribution.

Subsection G shows a six-year history of the funding progress of the plan. This schedule is required by GASB Statements No. 25 and 27.

Schedule H summarizes information used to determine the Annual Required Contribution for the fiscal year ending June 30, 2014.

### GASB 45 Accounting Information

Section VI summarizes the Actuarial Accrued Liability and the development of the Annual Required Contribution for the fiscal year ending June 30, 2014 for the Medical Insurance Plan Contribution.

Subsection A summarizes the development of the Actuarial Accrued Liability as of June 30, 2013 and Employer Normal Cost as of December 31, 2013.

Subsection B summarizes the development of the amortization payment of the Unfunded Actuarial Accrued liability. The amortization period used to calculate the ARC is 30 years from June 30, 2007 with level annual payments each year. 24 years remain as of June 30, 2013.

Subsection C summarizes the development of the Annual Required Contribution (ARC). The ARC is the sum of the employer normal cost and the amortization payments, adjusted to mid-year to reflect that payments are made throughout the year.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

Subsection D summarizes the development of the Net OPEB Obligation (NOO) as of June 30, 2013 as if PRGERS were a single employer plan instead of a cost sharing multiple employer plan. The NOO is defined as the cumulative difference between the Annual OPEB Cost (AOC) and the employer's contribution to the plan since the adoption of GASB 45.

Subsection E summarizes the development of the AOC for the fiscal year ending June 30, 2014 as if PRGERS were a single employer plan instead of a cost sharing multiple employer plan. The AOC is the amount recognized in the employer's financial statements as the cost of other postemployment benefits and is determined in accordance with GASB Statement No. 45. The AOC is equal to the ARC plus interest on the NOO, if any, as of June 30, 2013 less an amortization of this NOO.

Subsection F shows a seven-year history of the ARC and the percentage contributed. This schedule is required by GASB Statements No. 45. The FY 2013-2014 contribution percentage assumes that employer contributions for the Medical Insurance Plan Contribution will be the anticipated pay-as-you-go payments.

Subsection G shows a six-year history of the funding progress of the plan. This schedule is required by GASB Statements No. 45.

Schedule H summarizes information used to determine the Annual Required Contribution for the fiscal year ending June 30, 2014.

### Census Data

Section VII summarizes the census data provided by the System and utilized in the preparation of the actuarial valuation. Subsection A provides a profile of active and inactive participants, summarized by pension law. Special data adjustments are discussed in Section IX.

### Summary of Principal Plan Provisions

Section VIII summarizes the principal plan provisions as of the valuation date and denotes any changes from the previous valuation.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION I – SUMMARY

### Actuarial Assumptions and Methods

Sections IX and X summarize the actuarial assumptions and methods that were utilized in the preparation of this actuarial valuation and denote any changes from the previous valuation.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION II - SYSTEM ASSETS

### A. Market Value of Assets as of June 30, 2013

1. Assets		
Cash	\$	539,478,000
COFINA Investment		229,819,000
Bonds		1,314,404,000
Stocks		860,585,000
Alternative / Private Equity Investments		55,067,000
Total Loans to Plan Members		791,161,000
Accounts Receivable		161,554,000
Capital Assets		8,594,000
Other Assets		5,261,000
Prepaid Bond Cost		<u>29,981,000</u>
Total	\$	3,995,904,000
2. Total Liabilities		
Bonds Payable	\$	3,065,065,000
Other Liabilities		<u>199,497,000</u>
Total	\$	3,264,562,000
3. Market Value of Assets as of June 30, 2013: (1) - (2)	\$	731,342,000

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION II - SYSTEM ASSETS**

**B. Reconciliation of Market Value of Assets from June 30, 2012 to June 30, 2013**

1. Market Value of Assets as of June 30, 2012 in prior report	\$	1,236,873,000
2. Adjustment to match audited assets as of June 30, 2012		659,000
3. Audited Market Value of Assets as of June 30, 2012		1,237,532,000
4. Additions		
a. Contributions		
Employer Contributions	\$	426,867,000
Member Contributions		320,365,000
Early Retirement Programs		2,201,000
Appropriations for Special Laws		<u>190,724,000</u>
Total Contributions	\$	940,157,000
b. Investment Income		
Interest Income	\$	127,377,000
Dividend Income		242,000
Net Appreciation of Investments		136,475,000
COFINA Investment		(15,519,000)
Other Income		22,035,000
Investment Related Expenses		<u>(3,553,000)</u>
Net Investment Income	\$	267,057,000
Total Additions	\$	1,207,214,000
5. Decreases		
Refund of Contributions	\$	52,306,000
Annuities and Death Benefits		1,228,970,000
Special Law Benefits		190,724,000
Law 70		3,772,000
Administrative Expenses		29,306,000
Other Expenses		16,096,000
Cost of Bonds		<u>192,230,000</u>
Total	\$	1,713,404,000
6. Net Increase (Decrease) in Market Value of Assets	\$	(506,190,000)
7. Market Value of Assets as of June 30, 2013	\$	731,342,000

**C. Development of Actuarial Value of Assets as of June 30, 2013**

The Actuarial Value of Assets as of June 30, 2013 is equal to the Market Value of Assets as of June 30, 2013 of \$731,342,000.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION II - SYSTEM ASSETS**

**D. Estimated Annual Rate of Return for year ending June 30, 2013**

	<u>Gross</u> <u>Asset Basis</u>	<u>Net</u> <u>Asset Basis</u>
1. Value of Assets as of June 30, 2012	\$ 4,264,125,000	\$ 1,237,532,000
2. Total Contributions	940,157,000	940,157,000
3. Benefit Payments and Expenses	1,713,404,000	1,713,404,000
4. Value of Assets as of June 30, 2013	3,796,407,000	731,342,000
5. Non-Investment Increment: (2) - (3)	(773,247,000)	(773,247,000)
6. Investment Increment: (4) - (1) - (5)	305,529,000	267,057,000
7. Time Weighted Value: (1) +.5 * (5)	3,877,501,500	850,908,500
8. Estimated Annual Rate of Return: (6) / (7)	7.88%	31.38%

**E. Estimated Historical Rates of Return**

<u>Plan Year Ending</u>	<u>Gross</u> <u>Asset Basis</u>	<u>Net</u> <u>Asset Basis</u>
June 30, 2013	7.88%	31.38%
June 30, 2012	7.39%	22.31%
June 30, 2011	16.55%	51.55%
June 30, 2010	10.01%	27.87%
June 30, 2009	-5.57%	-13.23%
5-year Compounded Annual Return	7.00%	21.99%

*Prior year returns were calculated by Milliman using the methodology in Section D above, based on asset amounts and cash flows shown in prior valuation reports.*

*The rates of return determined on a gross asset basis are for illustrative purposes only and assume non-investment cash flows are the same as that determined on a net asset basis. Because of the significant amount of Pension Obligation Bond proceeds that are currently invested (approximately \$3 billion), the net asset returns are significantly larger than the returns on a gross asset basis.*

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION III - MANAGEMENT INFORMATION**

**A. Allocation of Actuarial Accrued Liability by Pension Law and System Entity**

	<u>Basic System Benefits</u>	<u>System Administered Benefits</u>	<u>Basic System and System Administered Benefits</u>	<u>GASB 45 Benefits</u>
<b>Government</b>				
Act 447	10,906,287,000	1,365,571,000	12,271,858,000	901,973,000
Act 1	1,421,218,000	276,458,000	1,697,676,000	90,892,000
System 2000	<u>603,604,000</u>	<u>288,536,000</u>	<u>892,140,000</u>	<u>429,000</u>
	12,931,109,000	1,930,566,000	14,861,675,000	993,294,000
<b>Public Corporations</b>				
Act 447	5,076,427,000	469,556,000	5,545,983,000	271,243,000
Act 1	506,639,000	28,530,000	535,169,000	24,896,000
System 2000	<u>214,398,000</u>	<u>2,535,000</u>	<u>216,933,000</u>	<u>151,000</u>
	5,797,464,000	500,621,000	6,298,085,000	296,290,000
<b>Municipalities</b>				
Act 447	1,671,503,000	192,632,000	1,864,135,000	167,602,000
Act 1	398,521,000	46,342,000	444,863,000	25,616,000
System 2000	<u>207,612,000</u>	<u>35,714,000</u>	<u>243,326,000</u>	<u>77,000</u>
	2,277,635,000	274,688,000	2,552,323,000	193,295,000
<b>Total</b>				
Act 447	17,654,217,000	2,027,759,000	19,681,976,000	1,340,818,000
Act 1	2,326,377,000	351,330,000	2,677,707,000	141,404,000
System 2000	<u>1,025,614,000</u>	<u>326,784,000</u>	<u>1,352,398,000</u>	<u>657,000</u>
	21,006,208,000	2,705,873,000	23,712,081,000	1,482,879,000

*(Numbers shown may not add due to rounding.)*

System Administered Benefits for System 2000 members are enhanced death and disability benefits for hazardous duty employees covered by Act 127 and the related bonus benefits for these members.

GASB 45 benefits are the medical insurance plan contributions for these members.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION III - MANAGEMENT INFORMATION

### B. Accumulated Member Contributions for Active Members as of June 30, 2013

	Contribution Account <u>Balances</u>
Government	
Act 447	546,669,000
Act 1	987,751,000
System 2000	<u>512,637,000</u>
	2,047,057,000
Public Corporations	
Act 447	222,068,000
Act 1	286,775,000
System 2000	<u>192,294,000</u>
	701,137,000
Municipalities	
Act 447	95,392,000
Act 1	233,672,000
System 2000	<u>192,682,000</u>
	521,746,000
Total	
Act 447	864,129,000
Act 1	1,508,198,000
System 2000	<u>897,613,000</u>
	3,269,940,000
Market Value of Assets as of June 30, 2013	731,342,000

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION III - MANAGEMENT INFORMATION**

**C. Projected Cash Flows for Basic System Benefits (Simplified Illustration)**

*(Amounts in Millions)*

<u>Plan Year Ending</u>	<u>Estimated Payroll</u>	<u>Estimated Member and Employer Payroll Based Contributions</u>	<u>Estimated Net Supplemental Contributions</u>	<u>Estimated Additional Uniform Contribution</u>	<u>Estimated Benefit Payments and Administrative Expenses</u>	<u>Pension Obligation Bond Debt Service</u>	<u>Net Cash Flow</u>	<u>Estimated Net Plan Assets at Year-End</u>	<u>Estimated Gross Plan Assets at Year-End</u>
06/30/2014	3,489	807	100	120	1,477	167	(617)	310	3,399
06/30/2015	3,576	864	103	120	1,488	167	(568)	(88)	3,028
06/30/2016	3,665	922	106	120	1,495	167	(514)	(455)	2,688
06/30/2017	3,757	992	110	120	1,499	167	(444)	(773)	2,399
06/30/2018	3,851	1,064	114	120	1,503	167	(372)	(1,039)	2,165
06/30/2019	3,947	1,139	117	120	1,507	167	(298)	(1,244)	1,993
06/30/2020	4,046	1,216	121	120	1,517	167	(227)	(1,389)	1,884
06/30/2021	4,147	1,297	125	120	1,529	167	(154)	(1,468)	1,842
06/30/2022	4,251	1,326	129	120	1,544	217	(186)	(1,534)	1,765
06/30/2023	4,357	1,356	133	120	1,562	234	(187)	(1,587)	1,681
06/30/2024	4,466	1,387	137	120	1,583	239	(178)	(1,630)	1,601

**Notes:**

- Estimated Net and Gross Plan Assets at Year-End assume that the investment return assumption of 6.4% is met.
- Estimated Payroll is assumed to grow 2.5% annually.
- Member Contributions were estimated to be 10% of Estimated Payroll each year.
- Employer Contributions were estimated to be 12.275% of Estimated Payroll for FYE 2014, increasing to 20.525% of Estimated Payroll for FYE 2021 and later in accordance with Law 116. Employer contributions include expected payroll-based contributions received by the the System on behalf of certain Law 70 retirees during the temporary period when the employers are directly paying the retiree's benefits.
- The Net Supplemental Contributions were estimated assuming the number of pensioners (and beneficiaries) remained at the current level throughout the projection period and reflects that certain amounts are paid out immediately to members who retired prior to July 1, 2013.
- The Additional Uniform Contribution was assumed to remain \$120 million throughout the projection period. The actual amount is subject to change each year based on actual past experience and the results of the actuarial projections required under Act 32.
- The Estimated Benefit Payments do not include amounts expected to be made to future participants, such as refunds of contributions to terminated nonvested participants, disability benefits, death benefits, and retirement benefits, and thus are slightly understated.
- Administrative Expenses are assumed to grow 2.5% annually.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION IV - BASIC SYSTEM BENEFITS INFORMATION**

**A. Development of Actuarial Accrued Liability as of June 30, 2013**

1. Projected Benefits Payable to Retirees and Beneficiaries	
Retirees	\$ 13,684,678,000
Disabled Members	999,020,000
Beneficiaries	<u>378,147,000</u>
Total	\$ 15,061,845,000
2. Projected Benefits for Vested Terminated Members	\$ 951,457,000
3. Actuarial Accrued Liability for Active Members	\$ 4,885,523,000
4. Return of Contributions due to former Members	\$ 107,383,000
5. Total Actuarial Accrued Liability: (1) + (2) + (3) + (4)	\$ 21,006,208,000

The above liabilities are for Basic System Benefits. See Section I for more information.

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### SECTION IV - BASIC SYSTEM BENEFITS INFORMATION

#### **B. Development of Employer Normal Cost Payable as of December 31, 2013**

1. Total Normal Cost as of June 30, 2013	\$ 270,779,000
2. Expected Member Contributions	\$ 342,208,000
3. Load for Administrative Expenses:	\$ 29,000,000
4. Total Employer Normal Cost as of December 31, 2013: (1) * ( 1.064 ^ 0.5 ) - (2) + (3)	\$ (33,898,000)

The above liabilities are for Basic System Benefits. See Section I for more information.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION IV - BASIC SYSTEM BENEFITS INFORMATION**

**C. Development of Unfunded Actuarial Accrued Liability and Amortization Payment Payable as of December 31, 2013**

1. Actuarial Accrued Liability as of June 30, 2013	\$ 21,006,208,000
2. Actuarial Value of Assets as of June 30, 2013	\$ 731,342,000
3. Unfunded Actuarial Accrued Liability as of June 30, 2013: (1) - (2)	\$ 20,274,866,000
4. Amortization Period in years	24
5. Amortization Factor at beginning of year	12.8739
6. Amortization Amount Payable as of December 31, 2013: [ (3) / (5) ] * ( 1.064 ^ 0.5 )	\$ 1,624,496,000

**D. Development of Annual Required Contribution**

1. Total Employer Normal Cost as of December 31, 2013	\$ (33,898,000)
2. Amortization Payment as of December 31, 2013	\$ 1,624,496,000
3. Annual Required Contribution*: (1) + (2)	\$ 1,590,598,000

\* Assumes payments made throughout the year.

The above liabilities are for Basic System Benefits. See Section I for more information.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION V - GASB 25 AND 27 ACCOUNTING INFORMATION**

**A. Benefit Obligations**

	<u>Basic System Benefits</u>	<u>System Administered Benefits</u>	<u>Total</u>
1. Projected Benefits Payable to Retirees and Beneficiaries:			
Retirees	\$ 13,684,678,000	\$ 1,285,963,000	\$ 14,970,641,000
Disabled Members	999,020,000	527,572,000	1,526,592,000
Beneficiaries	<u>378,147,000</u>	<u>162,665,000</u>	<u>540,812,000</u>
Total	\$ 15,061,845,000	\$ 1,976,200,000	\$ 17,038,045,000
2. Projected Benefits Payable to Vested Terminated Members:	\$ 951,457,000	\$ 93,790,000	\$ 1,045,247,000
3. Actuarial Accrued Liability for Active Members	\$ 4,885,523,000	\$ 635,883,000	\$ 5,521,406,000
4. Return of Contributions due to former Members	\$ 107,383,000	\$ 0	\$ 107,383,000
5. Actuarial Accrued Liability as of June 30, 2013: (1) + (2) + (3) + (4)	\$ 21,006,208,000	\$ 2,705,873,000	\$ 23,712,081,000
6. Gross Normal Cost as of December 31, 2013:	\$ 279,310,000	\$ 15,272,000	\$ 294,582,000
7. Expected Member Contributions	\$ 342,208,000	\$ 0	\$ 342,208,000
8. Administrative Expenses	\$ 29,000,000	\$ 0	\$ 29,000,000
9. Net Employer Normal Cost as of December 31, 2013: (6) - (7) + (8)	\$ (33,898,000)	\$ 15,272,000	\$ (18,626,000)

The above liabilities are for Basic System Benefits and selected System Administered Benefits. See Section I for more

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION V - GASB 25 AND 27 ACCOUNTING INFORMATION**

**B. Development of Unfunded Actuarial Accrued Liability and Amortization Payment Payable as of December 31, 2013**

1. Actuarial Accrued Liability as of June 30, 2013	\$ 23,712,081,000
2. Actuarial Value of Assets as of June 30, 2013	\$ 731,342,000
3. Unfunded Actuarial Accrued Liability as of June 30, 2013: (1) - (2)	\$ 22,980,739,000
4. Amortization Period in years	24
5. Amortization Factor at beginning of year	12.8739
6. Amortization Amount Payable as of December 31, 2013: [ (3) / (5) ] * ( 1.064 ^ 0.5 )	\$ 1,841,301,000

**C. Development of Annual Required Contribution**

1. Total Employer Normal Cost as of December 31, 2013	\$ (18,626,000)
2. Amortization Payment as of December 31, 2013	\$ 1,841,301,000
3. Annual Required Contribution*: (1) + (2)	\$ 1,822,675,000

\* Assumes payments made throughout the year.

The above liabilities are for Basic System Benefits and selected System Administered Benefits. See Section I for more information.

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### SECTION V - GASB 25 AND 27 ACCOUNTING INFORMATION

#### **D. Development of Net Pension Obligation as of June 30, 2013**

1. Net Pension Obligation as of June 30, 2012	\$	8,546,509,000
2. Annual Pension Cost for Fiscal Year 2012 - 2013	\$	2,037,049,000
3. Fiscal Year 2012 - 2013 Employer Contribution	\$	637,576,000
4. Net Pension Obligation as of June 30, 2013: (1) + (2) - (3)	\$	9,945,982,000

#### **E. Development of Fiscal Year 2013 - 2014 Annual Pension Cost**

1. Annual Required Contribution	\$	1,822,675,000
2. Interest on Net Pension Obligation as of June 30, 2013	\$	636,543,000
3. Adjustment to the Annual Required Contribution	\$	822,014,000
4. Fiscal Year 2013 - 2014 Annual Pension Cost: (1) + (2) - (3)	\$	1,637,204,000

The above liabilities are for Basic System Benefits and selected System Administered Benefits. See Section I for more information.

The above Net Pension Obligation and Annual Pension Cost are determined as if PRGERS was a single employer plan instead of a cost-sharing multiple employer plan. See Section I for more information.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION V - GASB 25 AND 27 ACCOUNTING INFORMATION**

**F. Schedule of Employer Contributions**

<u>Year Ended June 30</u>	<u>Actual Employer Contribution</u>	<u>Annual Required Contribution</u>	<u>Percent Contributed</u>
2014 *	\$857,855,000	\$1,822,675,000	47.07%
2013	637,576,000	2,192,821,000	29.08
2012	589,767,000	2,019,467,000	29.20
2011	701,399,000	1,734,979,000	40.43
2010	531,136,000	1,459,774,000	36.38
2009	595,863,000	1,258,695,000	47.34
2008 **	662,275,000	1,191,275,000	55.59

- \* Actual Employer Contribution for the year ended June 30, 2014 assumes:
- contribution of 12.275% of expected payroll for the Basic System Benefits, plus
  - contribution of \$120.0 million due to the Additional Uniform Contribution, plus
  - contribution of \$137.0 million due to the Supplemental Contribution, plus
  - contribution of \$142.9 million for Special Law pension benefits, plus
  - contribution of \$0.0 million for early retirement incentives.
  - contribution of \$29.7 million for Law 70 payroll based contributions.

- \*\* In the development of the Fiscal Year 2007-2008 Annual Required Contribution the System has adopted a level dollar amortization method with a 30-year period to reflect the closing of the defined benefit plan to new entrants under System 2000 (the Retirement Savings Account Program).

The above liabilities are for Basic System Benefits and selected System Administered Benefits. See Section I for more information.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION V - GASB 25 AND 27 ACCOUNTING INFORMATION**

**G. Schedule of Funding Progress**

	(a)	(b)	(c)=(b)-(a)	(d)=(a)/(b)	(e)	(f)=(c)/(e)
Actuarial Valuation <u>Date</u>	Actuarial Value of <u>Assets</u>	Accrued <u>Liability</u>	Unfunded <u>Liability</u>	Funded <u>Ratio</u>	Annual <u>Salary</u>	Unfunded Liability as a % of Annual <u>Salary</u>
06/30/2013	\$731,342,000	\$23,712,081,000	\$22,980,739,000	3.1%	\$3,489,096,000	658.6%
06/30/2012	1,236,873,000	27,645,786,000	26,408,913,000	4.5%	3,570,339,000	739.7%
06/30/2011	1,723,811,000	25,457,354,000	23,733,543,000	6.8%	3,666,402,000	647.3%
06/30/2010	1,667,358,000	21,370,006,000	19,702,648,000	7.8%	3,818,332,000	516.0%
06/30/2009	1,851,223,000	18,943,586,000	17,092,363,000	9.8%	4,292,552,000	398.2%
06/30/2008	2,607,086,000	-----not determined-----				

The above liabilities are for Basic System Benefits and selected System Administered Benefits. See Section I for more information.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION V - GASB 25 AND 27 ACCOUNTING INFORMATION

### H. Additional Information

The following information was used to determine the Annual Required Contribution for the fiscal year ending June 30, 2014. The ARC is for the Basic System Benefits and selected System Administered Benefits. See Section I for more information.

Valuation Date:	June 30, 2013
Actuarial Cost Method:	Projected unit credit cost method
Amortization method:	30 years closed, level dollar
Remaining Amortization Period:	24 years
Asset valuation method:	Market Value of Assets
Assumptions:	
Investment rate of return	6.4%
Projected Salary Increases	3.0%
Projected Payroll Growth	2.5%
Inflation	2.5%
Cost of Living Adjustments	3% triennial increases (statutory COLA rate) for members covered under Act 127 who become disabled or die in the line of duty.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION VI - GASB 45 ACCOUNTING INFORMATION**

**A. Benefit Obligations**

1. Projected Benefits Payable to Retirees and Beneficiaries:		
Retirees	\$	1,284,359,000
Disabled Members		198,520,000
Beneficiaries		<u>0</u>
Total	\$	1,482,879,000
2. Projected Benefits Payable to Vested Terminated Members:	\$	0
3. Actuarial Accrued Liability for Active Members	\$	0
4. Total Actuarial Accrued Liability as of June 30, 2013:	\$	1,482,879,000
5. Total Employer Normal Cost as of December 31, 2013:	\$	0

The above liabilities are for the Medical Insurance Plan Contribution portion of the System Administered Benefits. See Section I for more information.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION VI - GASB 45 ACCOUNTING INFORMATION**

**B. Development of Unfunded Actuarial Accrued Liability and Amortization Payment Payable as of December 31, 2013:**

1. Actuarial Accrued Liability as of June 30, 2013:	\$ 1,482,879,000
2. Actuarial Value of Assets as of June 30, 2013:	\$ 0
3. Unfunded Actuarial Accrued Liability as of June 30, 2013: (1) - (2)	\$ 1,482,879,000
4. Amortization Period in years	24
5. Amortization Factor at beginning of year	17.0242
6. Amortization Amount Payable as of December 31, 2013: [ (3) / (5) ] * ( 1.0325 ^ 0.5 )	\$ 88,508,000

**C. Development of Annual Required Contribution**

1. Total Employer Normal Cost as of December 31, 2013:	\$ 0
2. Amortization Payment as of December 31, 2013:	\$ 88,508,000
3. Annual Required Contribution*: (1) + (2)	\$ 88,508,000

\* Assumes payments made throughout the year.

The above liabilities are for the Medical Insurance Plan Contribution portion of the System Administered Benefits. See Section I for more information.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION VI - GASB 45 ACCOUNTING INFORMATION**

**D. Development of Net OPEB Obligation as of June 30, 2013**

1. Net OPEB Obligation as of June 30, 2012	\$	164,537,000
2. Annual OPEB Cost for Fiscal Year 2012 - 2013	\$	150,603,000
3. Fiscal Year 2012 - 2013 Employer Contribution	\$	91,823,000
4. Net OPEB Obligation as of June 30, 2013: (1) + (2) - (3)	\$	223,317,000

**E. Development of Fiscal Year 2013 - 2014 Annual OPEB Cost**

1. Annual Required Contribution	\$	88,508,000
2. Interest on Net OPEB Obligation as of June 30, 2013	\$	7,258,000
3. Adjustment to the Annual Required Contribution	\$	13,544,000
4. Fiscal Year 2013 - 2014 Annual OPEB Cost: (1) + (2) - (3)	\$	82,222,000

The above liabilities are for the Medical Insurance Plan Contribution portion of the System Administered Benefits. See Section I for more information.

The above Net OPEB Obligation and Annual OPEB Cost are determined as if PRGERS was a single employer plan instead of a cost-sharing multiple employer plan. See Section I for more information.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION VI - GASB 45 ACCOUNTING INFORMATION**

**F. Schedule of Employer Contributions**

<u>Year Ended June 30</u>	<u>Actual Employer Contribution</u>	<u>Annual Required Contribution</u>	<u>Percent Contributed</u>
2014 *	\$111,972,000	\$88,508,000	126.51%
2013	91,823,000	154,999,000	59.24
2012	94,664,000	133,654,000	70.83
2011	93,851,000	129,395,000	72.53
2010	88,599,000	128,294,000	69.06
2009	85,385,000	111,683,000	76.45
2008	80,019,000	110,650,000	72.32

- \* Actual Employer Contribution for the year ended June 30, 2014 assumes:  
- contribution of \$111.972 million for Special Law OPEB benefits.

The above liabilities are for the Medical Insurance Plan Contribution portion of the System Administered Benefits. See Section I for more information.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION VI - GASB 45 ACCOUNTING INFORMATION**

**G. Schedule of Funding Progress**

	(a)	(b)	(c)=(b)-(a)	(d)=(a)/(b)	(e)	(f)=(c)/(e)	
Actuarial Valuation <u>Date</u>	Actuarial Value of <u>Assets</u>	Accrued <u>Liability</u>	Unfunded <u>Liability</u>	Funded <u>Ratio</u>	Annual <u>Salary</u>	Unfunded Liability as a % of Annual <u>Salary</u>	
06/30/2013	\$0	\$1,482,879,000	\$1,482,879,000	0.0%	\$3,489,096,000	42.5%	
06/30/2012	0	2,120,970,000	2,120,970,000	0.0%	3,570,339,000	59.4%	
06/30/2011	0	1,758,389,000	1,758,389,000	0.0%	3,666,402,000	48.0%	
06/30/2010	0	1,699,373,000	1,699,373,000	0.0%	3,818,332,000	44.5%	
06/30/2009	0	1,633,159,000	1,633,159,000	0.0%	4,292,552,000	38.0%	
06/30/2008	0	-----not determined-----					

The above liabilities are for the Medical Insurance Plan Contribution portion of the System Administered Benefits. See Section I for more information.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## SECTION VI - GASB 45 ACCOUNTING INFORMATION

### H. Additional Information

The following information was used to determine the Annual Required Contribution for the fiscal year ending June 30, 2014. The ARC is for the Basic System Benefits and selected System Administered Benefits. See Section I for more information.

Valuation Date:	June 30, 2013
Actuarial Cost Method:	Projected unit credit cost method
Amortization method:	30 years closed, level dollar
Remaining Amortization Period:	24 years
Asset valuation method:	not applicable
Assumptions:	
Investment rate of return	3.25%
Projected Salary Increases	not applicable
Projected Payroll Growth	not applicable
Inflation	not applicable
Cost of Living Adjustments	not applicable

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION VII - CENSUS DATA**

**A. Summary of Member Data as of June 30, 2013:**

	<b>Act 447</b>	<b>Act 1</b>	<b>System 2000</b>	<b>Total</b>
<b>Active Members</b>				
Count	19,281	42,882	63,508	125,671
Average Age	53.9	48.7	41.5	45.9
Average Salary	\$33,106	\$29,871	\$24,719	\$27,764
Average Creditable Service	26.6	18.4	7.7	14.3
<b>Retired Members</b>				
Count	86,925	7,470	N/A	94,395
Average Age	68.8	62.2	N/A	68.3
Average Monthly Basic System Benefit	\$1,119	\$361	N/A	\$1,059
Average Monthly System Administered Benefit	\$75	\$56	N/A	\$74
<b>Disabled Members</b>				
Count	14,933	1,680	36	16,649
Average Age	69.0	63.9	52.1	68.4
Average Monthly Basic System Benefit	\$434	\$447	\$559	\$436
Average Monthly System Administered Benefit	\$199	\$66	\$2	\$185
<b>Beneficiaries in payment</b>				
Count	13,362	91	N/A	13,453
Average Age	73.1	65.7	N/A	73.0
Average Monthly Basic System Benefit	\$227	\$309	N/A	\$228
Average Monthly System Administered Benefit	\$98	\$139	N/A	\$99

Basic System Benefit and System Administered Benefit amounts shown above are for pension benefits, including minimum benefits up to \$400 per month and COLAs, and excludes benefits payable at a later date to Law 70 Section 4B retirees. Special Law "bonus" benefits are not reflected. In addition, the increases in the minimum benefit to \$500 per month under Act 3 are not reflected.

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# PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

## **SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS** **AS OF JUNE 30, 2013**

This summary of plan provisions is intended only to describe the essential features of the plan for valuation purposes. All eligibility requirements and benefit amounts shall be determined in strict accordance with the plan document itself.

Act 3 of 2013, in conjunction with other recent funding and design changes, provided for a comprehensive pension redesign of PRGERS. This summary details the provisions under Act 3. For the summary of plan provisions prior to Act 3, please refer to Milliman's June 30, 2012 valuation report dated July 31, 2013.

Certain provisions are different for the three groups of members who entered PRGERS prior to July 1, 2013 as described below.

- Act 447 members are generally those members hired before April 1, 1990.
- Act 1 members are generally those members hired on or after April 1, 1990 and on or before December 31, 1999.
- System 2000 members are generally those members hired on or after January 1, 2000 and on or before June 30, 2013.

### 1. Type of Plan

The System is a contributory, hybrid defined benefit plan.

### 2. Effective Date

The System was established in 1951 by Act 447 to be effective January 1, 1952. The plan was last amended under Act 3, approved April 4, 2013.

### 3. Eligibility for Membership

Members of the Employees Retirement System of the Government of Puerto Rico and its Instrumentalities include all regular full-time employees who are not contributing to other Retirement Systems (Articles 1-104 and 1-105). Employees include those in the following categories:

- Police of Puerto Rico,
- Firefighters of Puerto Rico,

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### **SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS** **AS OF JUNE 30, 2013**

- Elective officers of the People of Puerto Rico and the employees of the Legislature,
- Officers and employees of the Government of Puerto Rico,
- Officers and employees of public enterprises,
- Officers and employees, including mayors, of the municipalities, and
- Irregular personnel fulfilling the requirements of regular employee.

Membership is mandatory, except for the Governor of Puerto Rico, Government Secretaries, heads of public agencies and instrumentalities, the Governor's aides, gubernatorial appointees of commissions and boards, members of the Legislature, the Controller of Puerto Rico, the employees of the Agricultural Extension Service of the U.P.R., the Ombudsman and the Commonwealth Election Board employees (Article 1-105). In addition, membership is optional for eligible employees while working and residing outside the territorial limits of the Commonwealth of Puerto Rico (Act 112 of 2004).

#### 4. Definitions

- a. Fiscal Year: A Fiscal Year is a 12-month period beginning on July 1 and ending on June 30 (Article 1-104).
- b. General Fund: The General Expenses Budget of the Government of the Commonwealth of Puerto Rico.
- c. Government of Puerto Rico or Government: The Government of the Commonwealth of Puerto Rico, its departments, divisions, bureaus, offices, agencies and dependencies (Article 1-104).
- d. Public Enterprise: Any government instrumentality of the People of Puerto Rico (Article 1-104).
- e. Municipality: The Municipality of San Juan (Article 1-104).
- f. Employer: The Government of Puerto Rico, any public enterprise that has elected to participate in the System, or any municipality that has elected to participate in the System (Articles 1-104 and 1-110).

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS**  
**AS OF JUNE 30, 2013**

- g. Employee: Any officer or employee of the Employer regularly employed on a full time basis (Article 1-104).
- h. Creditable Service for Act 447 members: The years and months of plan participation, during which contributions have been made, beginning on the later of date of hire or January 1, 1952 and ending on date of separation from service. For purposes of calculating Creditable Service, the following schedule shall apply:

Service During a Fiscal Year	Creditable Service Earned
15 days during the same month	1 month
2 months and 15 days to 5 months and 14 days	½ year
5 months and 15 days to 8 months and 14 days	¾ year
8 months and 15 days to 12 months	1 year

*Note: All of the days have to be during the same month.*

Months in which less than 15 days of service are rendered do not count towards Creditable Service. (Article 1-106)

In general, Creditable Service may be earned for any period of employment during which no contributions were made if Accumulated Contributions for such periods are paid to the System. The same rules hold for rehired employees who previously received a refund of Accumulated Contributions at separation. (Article 1-106)

Creditable Service also includes purchased service, if any (Article 1-106).

- i. Creditable Service for Act 1 members: The years and completed months of plan participation, during which contributions have been made, beginning on date of hire and ending on date of separation from service. (Articles 1-106 and 2-109)

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS**  
**AS OF JUNE 30, 2013**

For purposes of calculating Creditable Service, the following schedule shall apply:

Service During a Fiscal Year	Creditable Service Earned
Less than 3 months	None
3 to 5 months	½ year
6 to 8 months	¾ year
9 months or more	1 year

In general, Creditable Service may be earned for any period of employment during which no contributions were made if Accumulated Contributions for such periods are paid to the System. The same rules hold for rehired employees who previously received a refund of Accumulated Contributions at separation. (Article 1-106)

Creditable Service also includes purchased service, if any (Article 1-106).

- j. Compensation: The gross cash compensation, excluding bonuses and overtime, upon which contributions by a Member to the Fund are based (Article 1-104).
- k. Average Compensation for Act 447 members: The average of the 3 highest years (36 highest months) of compensation that the participant has received for Creditable Service (Article 1-104).
- l. Average Compensation for Act 1 members: The average of the last 5 years of compensation that the participant has received for Creditable Service. If annual compensation in the averaging period exceeds by more than 10% the annual compensation in the immediately preceding year, the compensation in excess of said 10% shall not be included in the calculation of Average Compensation. (Article 2-108)
- m. Contributions: The amount deducted from the compensation of a Member and the employer (Section 781).
- n. Regular Interest: The interest rate as prescribed by the Board of Trustees (Article 1-104). The rate of 2.50% has always been in effect.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS**  
**AS OF JUNE 30, 2013**

- o. Accumulated Contributions: The sum of all amounts deducted from the compensation of a Member prior to July 1, 2013 with Regular Interest (Article 1-104).
- p. Actuarial Equivalent: Equality in value such that the present value of the amount under any form of payment is essentially the same as the present value of the amount under the normal form of annuity payment for single participants. Actuarially Equivalent factors are determined based on annuity and mortality tables adopted by the Board of Trustees based on the system’s experience and in accordance with the recommendations of the actuary.

For purposes of converting the Defined Contribution Hybrid Contribution Account to a lifetime annuity, the current factors adopted by the Board are the single life annuity factors using an interest rate of 4% and the RP-2000 Healthy Annuitant Mortality Table for ages 50 and over and the RP-2000 Employee Mortality Table for ages under 50, projected to 2025 using Scale AA and blended 50% male / 50% female.

- q. Public Officers in High-Risk Positions: The Commonwealth of Puerto Rico Police, the Municipal Police, the Commonwealth Firefighter Corps, the Municipal Firefighter Corps, and the Custody Officers Corps.
- r. Social Security Retirement Age (SSRA): The Social Security Retirement Age varies based on the year of birth as indicated in the table below.

Year of Birth	Social Security Retirement Age
1937 or earlier	65 years
1938	65 years and 2 months
1939	65 years and 4 months
1940	65 years and 6 months
1941	65 years and 8 months
1942	65 years and 10 months
1943 to 1954	66 years
1955	66 years and 2 months
1956	66 years and 4 months

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS**  
**AS OF JUNE 30, 2013**

1957	66 years and 6 months
1958	66 years and 8 months
1959	66 years and 10 months
1960 and later	67 years

- s. Retirement Savings Account: The individual retirement account established for each member of System 2000 (Article 1-104). Each member has a nonforfeitable right to the value of his Retirement Savings Account (Article 3-107).
- t. Credits to Retirement Savings Account: The credits to the retirement savings account include (1) any initial transfer balance for transferred participants, (2) contributions of the members to System 2000, and (3) the investment yield for each semester of the fiscal year based on the investment alternatives elected by the member (Article 3-107).
- u. Investment Alternatives for Retirement Savings Account: System 2000 members could choose to allocate their Retirement Savings Account, in multiples of 10%, to the following investment options prior to July 1, 2013. Changes in allocation could have been made annually, effective each July 1.
  - i. Fixed income – The yield is equal to the average monthly yield of the Two-Year Constant Maturity Treasuries during each semester of the fiscal year.
  - ii. System’s investment portfolio – The yield is equal to 90% (75% prior to July 1, 2004) of the investment portfolio yield of the System during each semester of each fiscal year minus management fees such as fees payable to administrators of the portfolio.
  - iii. Other alternatives adopted by the Board of the System.
- v. Defined Contribution Hybrid Contribution Account: The individual account established for each active member as of July 1, 2013 and for each future member thereafter. Each member has a nonforfeitable right to their contributions to the Defined Contribution Hybrid Contribution Account and, for the System 2000 members, the initial transfer of their Retirement Savings Account as of June 30, 2013.

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS AS OF JUNE 30, 2013

- w. Credits to Defined Contribution Hybrid Contribution Account: The credits to the retirement savings account include (1) the Retirement Savings Account as of June 30, 2013 for System 2000 members, (2) contributions by all members after June 30, 2013 to PRGERS, and (3) the investment yield for each semester of the fiscal year as determined by the Board. The investment yield determined by the Board shall never be less than 80% of the investment portfolio yield of the System during each semester of each fiscal year minus management fees such as, but not limited to, fees payable to administrator of the portfolio, safekeeping of securities and investment counseling.
5. Coordination with Social Security for Act 447 members: Except for police, mayors and employees of the Agricultural Extension Service of the U.P.R., participants may elect to coordinate coverage under the System with Federal Social Security by selecting the lower of two contribution options. Those participants selecting Option (1), the Coordination Plan, are subject to a benefit recalculation upon attainment of Social Security Retirement Age. Those participants selecting Option (2), the Supplementation Plan, will continue to receive the same benefits for life, without any adjustments at SSRA. At any time up to retirement, participants may change from Option (1) to Option (2) by making a contribution including interest to the System, retroactive to the later of July 1, 1968 or the date of plan entry, that will bring their career Accumulated Contributions to the Option (2) level. All police, mayors and employees of the Agricultural Extension Service of the U.P.R. are covered under Option (2), the Supplementation Plan.
6. Retirement Benefits
- a. Eligibility for Act 447 members: Act 447 members who were eligible to retire as of June 30, 2013 would continue to be eligible to retire at any time. Prior to July 1, 2013, Act 447 members could retire upon (1) attainment of age 55 with 25 years of Creditable Service, (2) attainment of age 58 with 10 years of Credited Service, (3) any age with 30 years of Creditable Service, (4) for Public Officers in High Risk Positions, attainment of age 50 with 25 years of Creditable Service, and (5), for Mayors, attainment of age 50 with 8 years of Creditable Service as a Mayor. In addition, Act 447 members who would attain 30 years of Creditable Service by December 31, 2013 would be eligible to retire at any time.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

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Act 447 members who were not eligible to retire as of June 30, 2013 and did not attain 30 years of Creditable Service by December 31, 2013 would be eligible to retire upon attainment of the retirement eligibility age shown in the table below with 10 years of Creditable Service.

Date of Birth	Attained Age as of June 30, 2013	Retirement Eligibility Age
July 1, 1957 or later	55 or less	61
July 1, 1956 to June 30, 1957	56	60
Before July 1, 1956	57 and up	59

In addition to the requirements in the table above, Act 447 Public Officers in High Risk Positions who were not eligible to retire as of June 30, 2013 and did not attain 30 years of Creditable Service by December 31, 2013 are eligible to retire directly from active service upon the attainment of age 55 with 30 years of Creditable Service.

- b. Eligibility for Act 1 members: Act 1 members who were eligible to retire as of June 30, 2013 would continue to be eligible to retire at any time. Prior to July 1, 2013, Act 1 members could retire upon (1) attainment of age 55 with 25 years of Creditable Service, (2) attainment of age 65 with 10 years of Credited Service, (3) for Public Officers in High Risk Positions, any age with 30 years of Creditable Service, and (4) for Mayors, attainment of age 50 with 8 years of Creditable Service as a Mayor.

Act 1 members who were not eligible to retire as of June 30, 2013 would be eligible to retire upon attainment of age 65 with 10 years of Creditable Service. In addition, Act 1 Public Officers in High Risk Positions who were not eligible to retire as of June 30, 2013 are eligible to retire directly from active service upon the attainment of age 55 with 30 years of Creditable Service.

- c. Eligibility for System 2000 members: System 2000 members who were eligible to retire as of June 30, 2013 would continue to be eligible to retire at any time. Prior to July 1, 2013, System 2000 members could retire upon attainment of age 55 for Public Officers in High Risk Positions and attainment of age 60 otherwise.

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS AS OF JUNE 30, 2013

System 2000 members who were not eligible to retire as of June 30, 2013 would be eligible to retire upon attainment of age 55 for Public Officers in High Risk Positions and upon attainment of the retirement eligibility age shown in the table below otherwise.

Date of Birth	Attained Age as of June 30, 2013	Retirement Eligibility Age
July 1, 1957 or later	55 or less	65
July 1, 1956 to June 30, 1957	56	64
July 1, 1955 to June 30, 1956	57	63
July 1, 1954 to June 30, 1955	58	62
Before July 1, 1954	59 and up	61

- d. Eligibility for members hired after June 30, 2013: Attainment of age 58 if a Public Officer in a High Risk Position and attainment of age 67 otherwise.
- e. Benefit: An annuity payable for the lifetime of the member equal to the annuitized value of the balance in the Defined Contribution Hybrid Contribution Account at the time of retirement, plus, for Act 447 and Act 1 members, the Accrued Benefit determined as of June 30, 2013. If the balance in the Defined Contribution Hybrid Contribution Account is \$10,000 or less, the balance in the Defined Contribution Hybrid Contribution Account shall be paid as a lump sum instead of as an annuity.
- f. Accrued Benefit as of June 30, 2013 for Act 447 members: The accrued benefit as of June 30, 2013 shall be determined based on the Average Compensation for Act 447 members, the years of Creditable Service, and the attained age of the member all as of June 30, 2013. For Act 447 Mayors, the Highest Compensation as a Mayor is determined as of June 30, 2013.

If the Act 447 member had at least 30 years of Creditable Service as of June 30, 2013, the accrued benefit equals 65% of Average Compensation if the member was under age 55 as of June 30, 2013 or 75% of Average Compensation if the member was at least age 55 as of June 30, 2013. For participants selecting the Coordination Plan, the benefit is re-calculated at SSRA as 1.5% of Average Compensation up to \$6,600 multiplied by years of Creditable Service, up to 30

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## **PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

### **SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS** **AS OF JUNE 30, 2013**

years, plus 65% (75% if member was at least age 55 as of June 30, 2013) of Average Compensation in excess of \$6,600.

If the Act 447 member had less than 30 years of Creditable Service as of June 30, 2013, and attains 30 years of Creditable Service by December 31, 2013, the accrued benefit equals 55% of Average Compensation if the member was under age 55 as of June 30, 2013 or 60% of Average Compensation if the member was at least age 55 as of June 30, 2013. For participants selecting the Coordination Plan, the benefit is re-calculated at SSRA as 1.5% of Average Compensation up to \$6,600 multiplied by years of Creditable Service, up to 30 years, plus 55% (60% if member was at least age 55 as of June 30, 2013) of Average Compensation in excess of \$6,600. Member contributions received from Act 447 members eligible for this transitory benefit during the period beginning July 1, 2013 and ending upon the attainment of 30 years of Creditable Service are considered pre-July 1, 2013 contributions; the contributions to the Defined Contribution Hybrid Contribution Account begin after the member attains 30 years of Creditable Service.

If the Act 447 member had less than 30 years of Creditable Service as of December 31, 2013, the accrued benefit equals 1.5% of Average Compensation multiplied by years of Creditable Service up to 20 years, plus 2% of Average Compensation multiplied by years of Creditable Service in excess of 20 years. Maximum benefit is 75% of Average Compensation. Except for Commonwealth Police and Commonwealth Firefighters, the benefit is actuarially reduced for each year payment commences prior to age 58. For participants selecting the Coordination Plan, the basic benefit is re-calculated at SSRA as 1% of Average Compensation up to \$6,600 multiplied by years of Creditable Service up to 20 years, plus 1.5% of Average Compensation up to \$6,600 multiplied by years of Creditable Service in excess of 20 years, plus 1.5% of Average Compensation in excess of \$6,600 multiplied by years of Creditable Service up to 20 years, plus 2.0% of Average Compensation in excess of \$6,600 multiplied by years of Creditable Service in excess of 20 years. Except for Police and Firefighters, the benefit is actuarially reduced for each year payment commences prior to age 58.

For Act 447 Mayors with at least 8 years of Creditable Service as a mayor, the accrued benefit will not be less than 5% of Highest Compensation as a Mayor for each year of Creditable Service as a Mayor up to 10 years, plus 1.5% of Highest

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### **SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS** **AS OF JUNE 30, 2013**

Compensation as Mayor for each year of non-Mayoral Creditable Service up to 20 years, plus 2.0% of Highest Compensation as Mayor for each year of non-Mayoral Creditable Service in excess of 20 years. Non-Mayoral Creditable Service includes service earned as a Mayor in excess of 10 years. Maximum benefit is 90% of Highest Compensation as a Mayor.

- g. Accrued Benefit as of June 30, 2013 for Act 1 members: The accrued benefit as of June 30, 2013 shall be determined based on the Average Compensation for Act 1 members, the years of Creditable Service, and the attained age of the member all as of June 30, 2013. For Act 1 Mayors, the Highest Compensation as a Mayor is determined as of June 30, 2013.

If the Act 1 Commonwealth Police or Commonwealth Firefighter had at least 30 years of Creditable Service as of June 30, 2013, the accrued benefit equals 65% of Average Compensation if the member was under age 55 as of June 30, 2013 or 75% of Average Compensation if the member was at least age 55 as of June 30, 2013.

For all other Act 1 members, the accrued benefit equals 1.5% of Average Compensation multiplied by years of Creditable Service. The benefit is actuarially reduced for each year payment commences prior to age 65.

For Act 1 Mayors with at least 8 years of Creditable Service as a mayor, the accrued benefit will not be less than 5% of Highest Compensation as a Mayor for each year of Creditable Service as a Mayor up to 10 years, plus 1.5% of Highest Compensation as Mayor for each year of non-Mayoral Creditable Service up to 20 years, plus 2.0% of Highest Compensation as Mayor for each year of non-Mayoral Creditable Service in excess of 20 years. Non-Mayoral Creditable Service includes service earned as a Mayor in excess of 10 years. Maximum benefit is 90% of Highest Compensation as a Mayor.

- h. Compulsory Retirement: All Act 447 and Act 1 Public Officers in High Risk Positions must retire upon attainment of age 58 and 30 years of creditable service. A two year extension may be requested by the member from the Superintendent of the Puerto Rico Police, the Chief of the Firefighter Corps, or supervising authority as applicable.

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS AS OF JUNE 30, 2013

#### 7. Termination Benefits

##### a. Lump Sum Withdrawal

Eligibility: A Member is eligible upon termination of service prior to 5 years of service or if the balance in the Defined Contribution Hybrid Contribution Account is \$10,000 or less.

Benefit: The benefit equals a lump sum payment of the balance in the Defined Contribution Hybrid Contribution Account as of the date of the permanent separation of service.

##### b. Deferred Retirement

Eligibility: A Member is eligible upon termination of service with 5 or more years of service (10 years of Creditable Service for Act 447 and Act 1 members) prior to the applicable retirement eligibility, provided the member has not taken a lump sum withdrawal of the Accumulated Contributions and the Defined Contribution Hybrid Contribution Account.

Benefit: An annuity payable for the lifetime of the member commencing at the applicable retirement eligibility age equal to the annuitized value of the balance in the Defined Contribution Hybrid Contribution Account at the time of retirement, plus, for Act 447 and Act 1 members, the Accrued Benefit determined as of June 30, 2013.

#### 8. Death Benefits

##### a. Pre-retirement Death Benefit

Eligibility: Any current non-retired member is eligible.

Benefit: A refund of the Defined Contribution Hybrid Contribution Account, plus the Accumulated Contributions for Act 447 and Act 1 members.

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### SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS AS OF JUNE 30, 2013

#### b. High-Risk Death Benefit under Act 127

Eligibility: Police, firefighters, and other employees in specified high-risk positions who die in the line of work due to reasons specified in Act 127 of 1958 (as amended).

Spouse's Benefit: 50% of the participant's Compensation at date of death, payable as an annuity until death or remarriage (Act 127 of 1958 as amended).

Children's Benefit: 50% of the participant's Compensation at date of death, payable as an annuity, allocated pro-rata among eligible children. The annuity is payable for life for a disabled child, until age 18 for a non-disabled child not pursuing studies, and until age 25 for a non-disabled child who is pursuing studies. (Act 127 of 1958 as amended)

Benefit if no spouse or children: The parents of the member shall each receive 50% of the participant's Compensation at date of death, payable as an annuity for life. (Act 127 of 1958 as amended)

Post-death increases: Effective July 1, 1996 and subsequently every three years, the above death benefits are increased by 3% provided that the beneficiary(ies) had been receiving payments for at least three years. (Act 127 of 1958 as amended)

The cost of these benefits is paid by the General Fund (Act 127 of 1958 as amended).

#### c. Post-retirement Death Benefit for Members who retired prior to July 1, 2013

Eligibility: Any retiree or disabled member receiving a monthly benefit who has not elected a reversionary annuity and whose benefits commenced prior to July 1, 2013.

Benefit: The benefit is as follows (Law 105 as amended by Law 4):

- (i) For those married or with dependent children at the time of death, the annual income to a widow, or widower or dependent children is equal to 60% (50% if

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### **SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS** **AS OF JUNE 30, 2013**

in the Coordination Plan - 30% prior to January 1, 2004) of the retirement benefit payable for life for a surviving spouse and/or disabled children and payable until age 18 (age 25 if pursuing studies) for non-disabled children. If in the Coordination Plan, the benefit to the surviving spouse does not begin until the spouse's attainment of age 60 and the surviving spouse must have been married to the member for at least 10 years to be eligible for this benefit. The increase in the percentage from 30% to 50% if in the Coordination Plan is paid by the General Fund for former government employees or by the public enterprise or municipality for their former employees (Act 158 of 2003).

- (ii) The benefit, when there is no relation as stated above, is equal to the remaining balance of Accumulated Contributions at the time of retirement after the deduction of lifetime annual income paid and is payable to a beneficiary or to the Member's estate. In no case shall the benefit be less than \$1,000. Either the General Fund for former government employees or the public enterprise or municipality for their former employees pays the difference, up to \$250, between (1) the Accumulated Contributions less the lifetime annual income paid and (2) \$1,000. The System pays for the rest. (Article 2-113 and Act 524 of 2004)

#### d. Post-retirement Death Benefit for Members who retired after June 30, 2013

**Eligibility:** Any retiree or disabled member who began receiving a monthly benefit after June 30, 2013.

**Benefit:** If the member elected at the time of retirement to transfer a portion of the annuity to a beneficiary by selecting an actuarially equivalent optional form of payment, the applicable survivor benefit.

For all members, the excess, if any, of the Defined Contribution Hybrid Contribution Account, plus the Accumulated Contributions for Act 447 and Act 1 members, at the time of retirement over the total annuity payments paid to the member and any beneficiary per the terms of the optional form of payment shall be payable to a beneficiary or the Member's estate.

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### SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS AS OF JUNE 30, 2013

- e. Beneficiaries receiving occupational death benefits as of June 30, 2013 continue to be eligible to receive such benefits.

#### 9. Disability Benefits

##### a. Disability

Eligibility: All members are eligible upon the occurrence of disability.

Benefit: The balance of the Defined Contribution Hybrid Contribution Account payable as lump sum distribution, an immediate annuity or a deferred annuity at the election of the participant. Act 447 and Act 1 members remain eligible to receive the accrued benefit as of June 30, 2013 commencing at the applicable retirement eligibility age.

##### b. High Risk Disability under Act 127

Eligibility: Police, firefighters, and other employees in specified high-risk positions who are disabled in the line of work due to reasons specified in Act 127 of 1958 (as amended).

Benefit: 80% (100% for Act 447 members) of Compensation as of date of disability, payable as an annuity. If the member dies while still disabled, this annuity benefit continues to his beneficiaries. Beneficiaries include the surviving spouse and/or disabled children (for life), non-disabled children until age 18 (age 25 if pursuing studies), and the parents if no other beneficiaries. Effective July 1, 1996 and subsequently every three years, the disability benefit is increased by 3% provided that the member (or beneficiary) had been receiving payments for at least three years. (Act 127 of 1958 as amended) The cost of these benefits is paid by the General Fund.

- c. Members who qualified for occupational or non-occupational disability benefits as of June 30, 2013 continue to be eligible to receive such benefits.

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#### 10. Minimum Benefits

- a. Past Ad hoc Increases: The legislature, from time to time, increases pensions for certain retirees as described in Act 124 approved on June 8, 1973 and Act 23 approved on September 23, 1983. The benefits are paid 50% by the General Fund and 50% by the System.
- b. Minimum Benefit for members who retired before July 1, 2013: The minimum monthly lifetime income for members who retired or become disabled before July 1, 2013 is \$500 per month effective July 1, 2013 (\$400 per month effective July 1, 2007 and \$300 per month up to June 30, 2007). The increase in the minimum monthly benefit from \$200 per month to \$300 per month is paid by the General Fund for former government employees or by the public enterprise or municipality for their former employees. The increase in the minimum monthly benefit from \$300 per month to \$400 per month is to be paid by the System for former government employees or by the public enterprise or municipality for their former employees. (Act 156 of 2003, Act 35 of 2007, and Act 3 of 2013.)
- c. Coordination Plan Minimum Benefit: A minimum monthly benefit is payable upon attainment of SSRA such that the benefit, when added to the Social Security Benefit, is not less than the benefit payable prior to SSRA.

11. Cost-of-Living Adjustments (COLA) to Pension Benefits: The legislature, from time to time, increases pensions by 3% for retired and disabled members. Beneficiaries are not entitled to COLAs granted after the retiree's death. The first increase was granted by Act 10 of 1992. Subsequent 3% increases have been granted every third year since 1992, with the latest 3% increase established on April 24, 2007 and effective July 1, 2007 (retroactive to January 1, 2007) for retired and disabled members that were receiving a monthly benefit on or before January 1, 2004 (Act 35). In addition, effective July 1, 2008, any retired or disabled member that was receiving a monthly annuity on or before January 1, 2004 less than \$1,250 per month received an increase of up to 3% without exceeding the limit of \$1,250 per month (Act 35). The COLAs granted in 1992 to all retirees and in 1998 to retirees who are former government or municipal employees shall be paid by the System. All other COLAs granted in 1995 and later shall be paid by the General Fund for former government employees or by the public enterprise or municipality for their former employees. (Various Acts)

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12. Medical Insurance Plan Contribution: A payment of up to \$100 per month to the eligible medical insurance plan selected by the retiree or disabled member provided the member retired prior to July 1, 2013. This benefit is paid from the Supplemental Contributions (see item 14c) received from the General Fund for former government employees or by the public corporation or municipality for their former employees. (Act 483 as amended by Act 3)

13. Special “Bonus” Benefits:

- a. Christmas Bonus: An annual bonus of \$200 for each retiree, beneficiary, and disabled member paid in December provided the member retired prior to July 1, 2013. This benefit is paid from the Supplemental Contributions (see item 14c) received from the General Fund for former government employees or by the public corporation or municipality for their former employees. (Act 144 as amended by Act 3)
- b. Medication Bonus: An annual bonus of \$100 for each retiree, beneficiary, and disabled member to cover health costs paid in July provided the member retired prior to July 1, 2013. Evidence of coverage is not required. The amount is prorated if there are multiple beneficiaries. This benefit is paid from the Supplemental Contributions (see 14c) received from the General Fund for former government employees or by the public corporation or municipality for their former employees. (Act 155 as amended by Act 3)

14. Contributions

- a. Member Contributions: Effective July 1, 2013, contributions by members are 10% of Compensation. However, for Act 447 Members who selected the Coordination Plan, the member contributions are 7% of Compensation up to \$6,600 plus 10% of Compensation in excess of \$6,600 during the 2013-2014 fiscal year and 8.5% of Compensation up to \$6,600 plus 10% of Compensation in excess of \$6,600 during the 2014-2015 fiscal year. Members may voluntarily make additional contributions to their Defined Contribution Hybrid Contribution Account.

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Prior to July 1, 2013, contributions by Act 447 Members selecting the Coordination Plan were 5.775% of Compensation up to \$6,600 plus 8.275% of Compensation in excess of \$6,600. Contributions by all other Members were 8.275% of Compensation. System 2000 members may also have made voluntary contributions of up to 1.725% of compensation prior to July 1, 2013.

- b. Employer Contributions: Prior to July 1, 2011, employer contributions were 9.275% of Compensation. Effective July 1, 2011, employer contributions are 10.275% of Compensation. For the next four fiscal years effective July 1, employer contributions will increase annually by 1% of Compensation. For the next five fiscal years, employer contributions will increase annually by 1.25% of Compensation, reaching an employer contribution rate of 20.525% of Compensation effective July 1, 2020. (Article 2-116 as amended by Law 116 of 2010 and Act 3 of 2013).
  - c. Supplemental Contributions from the General Fund, Public Corporations, and Municipalities: Effective July 1, 2013, the System will receive a supplemental contribution of \$2,000 each fiscal year for each pensioner (including beneficiaries receiving survivor benefits) who was previously benefitting as an Act 447 or Act 1 member while an active employee. This supplemental contribution will be paid by the General Fund for former government employees or by the public corporation or municipality for their former employees. (Act 3 of 2013)
  - d. Additional Uniform Contribution: During the 2013-2014 fiscal year, the System will receive an Additional Uniform Contribution of \$120 million. During each fiscal year from 2014-2015 through 2032-2033, the System will receive an Additional Uniform Contribution certified by the external actuary of the System as necessary to avoid having the projected gross assets of the System, during any subsequent fiscal year, to fall below \$1 billion. The Additional Uniform Contribution will be paid by the General Fund, public corporations, and municipalities. (Act 32 of 2013 as amended)
15. Service Purchase: Prior to July 1, 2013, active members with eligible service from prior employment may elect to purchase service in PRGERS. The cost of the purchase is calculated by applying the PRGERS statutory contribution rates to the member's salary during the years of service at the former employer. The amount due to member contributions is accumulated at 9.5% per year (6% prior to April 4,

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### **SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS** **AS OF JUNE 30, 2013**

2013) until 6 months after the time of the service purchase request. Any amount not covered by asset transfers from the member's prior pension fund is payable by the member (Law 10 of 1992, Law 14 of 1981, Law 122 of 2000, Laws 203 and 33 of 2007). Effective July 1, 2013, only veterans may purchase service for time spent under military leave prior to June 30, 2013. In addition, public employees in active military service are permitted to make voluntary contributions to the Defined Contribution Hybrid Contribution Account during the years of military leave.

16. Law 70 Retirement Incentive: During the 2010-2011 fiscal year, Law 70 provided for an early retirement incentive. Additional window periods occurred through December 31, 2012. Under Section 4A of Law 70, active members could terminate employment immediately and receive a bonus equal to one, three, or six months of salary (paid by the Commonwealth). Under Section 4B of Law 70, active members who had at least 15 years of service, but less than 30 years of service, were able to retire immediately with an enhanced benefit ranging from 37.5% to 50% of salary. This enhanced benefit is paid by the General Fund for government employees and Public Corporations for their employees until the member reaches the later of age 55 or the date the member would have completed 30 years of service had the member continued working. The System will pay the benefit after this time period. While the General Fund / Public Corporation is paying the pension benefit to the member or any surviving beneficiary, the General Fund / Public Corporation will also pay a contribution equal to the employer contribution rate (12.275% for the 2013-2014 fiscal year plus the 8.275% employee contribution rate for Public Corporations) of final salary to the System. The employer contribution rate applied to final salary increases as under Law 116 to a rate of 20.525% of payroll in 2020-2021 and thereafter. Under Section 4C of Law 70, active members who had at least 30 years of service could retire immediately and receive a bonus equal to six months of salary (paid by the Commonwealth). For any active employee who retired under Section 4C, the Public Corporation will pay a contribution equal to the employer contribution rate (12.275% for the 2013-2014 fiscal year, increasing to 20.525% in 2020-2021 and thereafter) plus the 8.275% employee contribution rate of final salary to the System for five years after retirement.

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## **PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

### **SECTION VIII – SUMMARY OF PRINCIPAL PLAN PROVISIONS** **AS OF JUNE 30, 2013**

#### **17. Changes in Plan Provisions since Prior Valuation**

Act 3 enacted on April 4, 2013 provided for a comprehensive pension redesign of PRGERS effective July 1, 2013. The major changes include the following.

- Accrued benefits for Act 447 and Act 1 members were frozen as of June 30, 2013 and future benefits will be determined under the Defined Contribution Hybrid plan effective July 1, 2013.
- Mandated annuitization of Retirement Savings Account for System 2000 members and the Defined Contribution Hybrid Contribution Account for all members at retirement instead of lump sum distributions at termination of employment.
- In general, the retirement ages were increased for members not eligible to retire as of June 30, 2013.
- Member contributions increased to 10% of compensation.
- Municipal police, municipal firefighters and custody officers now have the same retirement eligibility provisions as the Commonwealth police and firefighters.
- System-funded post-retirement death benefits were eliminated for members retiring after June 30, 2013. If a member elects an optional form of annuity with a survivor benefit, the member's benefit will be actuarially reduced to reflect the cost of the survivor benefit.
- Act 447 members attaining 30 years of Creditable Service between July 1, 2013 and December 31, 2013 received an enhanced benefit payable at retirement.
- The occupational death benefit and the one year of salary death benefit were eliminated.
- Disability benefits, other than those provided under Law 127, were eliminated. (A member who becomes disabled may receive their Defined Contribution Hybrid Contribution Account balance, and their accrued benefit if applicable under Act 447 or Act 1.)
- The minimum monthly benefit was increased from \$400 to \$500 per month for current pensioners as of June 30, 2013.
- The Christmas Bonus was reduced from \$600 to \$200, and the Summer Bonus of \$100 was eliminated for members in pay status as of June 30, 2013.
- All Special Law bonus benefits (Christmas Bonus, Medication Bonus, and Medical Insurance Plan Contribution) were eliminated for members retiring after June 30, 2013.

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- The Supplemental Contributions and the Additional Uniform Contribution were established.

This valuation also reflects updated information provided by the System that the High-Risk Death Benefit percentage under Act 127 is 50%, instead of 40%, for Act 1 and System 2000 members.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION IX – SUMMARY OF ACTUARIAL ASSUMPTIONS AS OF JUNE 30, 2013**

Interest: 6.40% per annum, net of investment expenses, for GASB 25 and 27. (7.50% prior to June 30, 2011, 6.40% as of June 30, 2011, and 6.00% as of June 30, 2012)  
 3.25% per annum for GASB 45 (4.00% prior to June 30, 2012 and 3.20% as of June 30, 2012).

Compensation Increases: 3.0% per year.

Defined Contribution Hybrid Contribution Account: Member contributions to the Defined Contribution Hybrid Contribution Account are assumed to be 10.0% of Compensation. Defined Contribution Hybrid Contribution Accounts are assumed to grow using a 5.12% annual investment return (80% of the net investment return assumption).

Termination: Withdrawal rates vary by employment category, age, and service.

Employment Category	Annual Rate of Termination
Act 447 General Employees under age 58 or less than 10 years of service	2.0%
Act 447 General Employees at least age 58 with at least 10 years of service	0.0
Act 447 Public Officers in High Risk Positions under age 50 or less than 10 years of service	1.6
Act 447 Public Officers in High Risk Positions ages 50 to 57 with less than 25 years of service	1.6
Act 447 Public Officers in High Risk Positions at least age 58 with at least 10 years of service or at least age 50 with at least 25 years of service	0.0
Act 1 General Employees	2.0
Act 1 Public Officers in High Risk Positions	1.6
System 2000 General Employees	2.0
System 2000 Public Officers in High Risk Positions	1.6

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Commencement of benefits for terminated vested members: Future terminated members with a vested benefit are assumed to retire at the ages shown below, or at the attained age on the valuation date if later.

Employment Category	Act 447	Act 1	System 2000
General Employees	61	65	65
Public Officers in High Risk Positions	61	65	55

Retirement: Rates of retirement vary by employment category, Act, age and years of Creditable Service, and whether the member was eligible to retire as of June 30, 2013.

Act 447 General Employees who were eligible to retire as of June 30, 2013 or attained 30 years of Creditable Service by December 31, 2013			
	Service condition		
Age	10 years	25 years	30 years
45 to 49			10.0%
50 to 53			15.0
54			20.0
55 to 57		10.0%	20.0
58	5.0%	10.0	20.0
59 to 64	10.0	15.0	20.0
65 to 69	15.0	15.0	20.0
70	100.0	100.0	100.0

Act 447 General Employees who were not eligible to retire as of June 30, 2013 and did not attain 30 years of Creditable Service by December 31, 2013		
	Year of Retirement Eligibility	
Age	First	Second and Later
59	20.0%	15.0%
60	25.0	15.0
61 to 69	30.0	15.0
70	100.0	100.0

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Act 447 Public Officers in High Risk Positions who were eligible to retire as of June 30, 2013			
Age	Service condition		
	10 years	25 years	30 years
45 to 48			10.0%
49			15.0
50		7.0%	15.0
51 to 56		15.0	20.0
57		20.0	30.0
58	2.5%	20.0	100.0
59 to 64	10.0	25.0	100.0
65 to 69	10.0	30.0	100.0
70	100.0	100.0	100.0

Act 447 Public Officers in High Risk Positions who were not eligible to retire as of June 30, 2013		
Age	Service condition	
	10 years	30 years
55		50.0%
56		15.0
57		15.0
58		100.0
59 to 64	25.0%	100.0
65	100.0	100.0

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Act 1 General Employees who were eligible to retire as of June 30, 2013		
Age	Service condition	
	10 years	25 years
55 to 57		4.5%
58		4.5
59		8.0
60		9.0
61		10.0
62		13.0
63 to 64		14.0
65	15.0%	50.0
66	15.0	15.0
67	100.0	100.0

Act 1 General Employees who were not eligible to retire as of June 30, 2013	
Age	Any Service
65	50.0%
66	20.0
67	100.0

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Act 1 Public Officers in High Risk Positions who were eligible to retire as of June 30, 2013			
Age	Service condition		
	10 years	25 years	30 years
45 to 48			10.0%
49 to 50			15.0
51 to 54			20.0
55 to 56		5.0%	20.0
57		5.0	30.0
58		5.0	100.0
59 to 60		5.0	
61 to 64		10.0	
65	10.0%	50.0	
66 to 69	10.0	10.0	
70	100.0	100.0	

Act 1 Public Officers in High Risk Positions who were not eligible to retire as of June 30, 2013		
Age	Service condition	
	10 years	30 years
55		40.0%
56		15.0
57		15.0
58 to 64		100.0
65	100.0	100.0

System 2000 General Employees		
Age	Eligible to Retire as of June 30, 2013	Not Eligible to Retire as of June 30, 2013
60	15.0%	
61 to 64	15.0	10.0%
65	15.0	40.0
66	15.0	20.0
67	100.0	100.0

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System 2000 Public Officers in High Risk Positions	
Age	Any Service
55	25.0%
56 to 64	20.0
65 to 66	25.0
67	100.0

**Disability:** Rates are based on the six month elimination period rates in the 1987 Commissioners Group Disability Table, adjusted as set forth in the table below.

Act	Adjustment to 1987 CGDT	
	Members Covered under Act 127	Other Members
447	100%	75%
1	100%	75%
2000	<ul style="list-style-type: none"> <li>• 100% if more than 10 years from retirement eligibility</li> <li>• 300% if at or past retirement eligibility</li> <li>• Interpolated from 100% to 300% in the 10 years leading up to retirement eligibility</li> </ul>	75%

100% of disabilities occurring while in active service are assumed to be occupational for members covered under Act 127.

**Pre-retirement Mortality:** For general employees not covered under Act 127, RP-2000 Employee Mortality Rates for males and females projected on a generational basis using Scale AA. For members covered under Act 127, RP-2000 Employee Mortality Rates with blue collar adjustments for males and females, projected on a generational basis using Scale AA. As generational tables, they reflect mortality improvements both before and after the measurement date.

100% of deaths while in active service are assumed to be occupational for members covered under Act 127.

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### **SECTION IX – SUMMARY OF ACTUARIAL ASSUMPTIONS AS OF JUNE 30, 2013**

Post-retirement Healthy Mortality: Rates which vary by gender are assumed for healthy retirees and beneficiaries based on a study of plan's experience from 2007 to 2012 equal to 92% of the rates from the UP-1994 Mortality Table for Males and 95% of the rates from the UP-1994 Mortality Table for Females. The rates are projected on a generational basis starting in 1994 using Scale AA. As a generational table, it reflects mortality improvements both before and after the measurement date.

Post-retirement Disabled Mortality: Rates which vary by gender are assumed for disabled retirees based on a study of plan's experience from 2007 to 2012 equal to 105% of the rates from the UP-1994 Mortality Table for Males and 115% of the rates from the UP-1994 Mortality Table for Females. No provision was made for future mortality improvement for disabled retirees.

Marriage: 100% of current active members covered under Act 127 who die in service or become disabled are assumed to have qualifying beneficiaries receiving the maximum benefits possible, which are approximated by a spouse with males 4 years older than females.

Form of Payment: For members retiring after June 30, 2013 (other than under Law 127), upon disability an immediate lump sum distribution of the Defined Contribution Hybrid Contribution Account plus, for Act 447 and Act 1 members, a modified cash refund of the accrued benefit as of June 30, 2013 commencing at retirement eligibility; otherwise, a modified cash refund.

For members retiring after June 30, 2013 under Law 127, a Joint & 100% Survivor benefit of the Law 127 Disability benefit.

Marital status was provided for current retired and disabled members who retired prior to July 1, 2013. For those indicated as married, a joint and survivor annuity was assumed (as shown in the table below), with an adjustment for the probability the spouse has pre-deceased the retiree as of the valuation date. Those not married were assumed to have a modified cash refund (as shown in the table below). The spouse's date of birth was imputed based on an assumed age difference of 4 years with males older than females.

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**PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM**

**SECTION IX – SUMMARY OF ACTUARIAL ASSUMPTIONS AS OF JUNE 30, 2013**

Assumed Form of Payment for Members retired before July 1, 2013		
Act	Marital Status	Form of Payment
447	Married at retirement	Joint and 60% survivor benefit – Supplementation Joint and 50% survivor benefit – Coordinated (30% is Basic System Benefit) (20% is System Administered Benefit)
447	Not married at retirement	Modified cash refund (approximated by single life annuity with 3 years certain)
1	Married at retirement	Joint and 60% survivor benefit
1	Not married at retirement	Modified cash refund (approximated by single life annuity with 3 years certain for Mayors, Police & Fire and 5 years certain for other members)
305 (System 2000) - Disabled	Married at retirement	Joint and 60% survivor benefit
305 (System 2000) - Disabled	Not married at retirement	Modified cash refund (approximated by single life annuity with 5 years certain)

All Act 127 retirees were assumed to have a joint and 100% survivor benefit regardless of marital status. The survivor was approximated by a spouse with an assumed age difference of 4 years with males older than females. An adjustment was made for the probability the survivor has pre-deceased the retiree as of the valuation date.

Members who terminate employment with a vested benefit are assumed to elect to receive a deferred pension benefit in lieu of a refund of contributions.

No future dependent children were assumed to become beneficiaries.

No surviving spouse is assumed to become re-married.

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### SECTION IX – SUMMARY OF ACTUARIAL ASSUMPTIONS AS OF JUNE 30, 2013

Medical Insurance Plan Contribution: 85% of current service and disability retirees who retired before July 1, 2013 are assumed to receive a monthly medical insurance continuation benefit of \$100 per month.

Deferred Vested Participants: Complete census data on deferred vested participants was not available. The actuarial accrued liabilities for Act 447 and Act 1 members have been increased by 5% to approximate the value of the liability on behalf of deferred vested participants.

Service Purchase and Data Reporting Issues: Active liabilities for benefits earned prior to June 30, 2013 are increased by 20% for members of Act 447 to approximate the value of service purchases not yet reflected in the census data, and also data reporting issues, including members who have higher past salaries than provided in the valuation census data, and members who are reported as participating in Act 1 or System 2000 while active but who retire under Act 447.

Municipal Police, Municipal Firefighters and Custody Officials: For municipal police, municipal firefighters, and custody officials as of June 30, 2013, the classification as a Public Officer in a High Risk Position was assumed to occur prior to the changes in retirement eligibility requirements such that any member who became eligible to retire solely due to the re-classification as Public Officer in a High Risk Position remained eligible to retire after the Act 3 retirement eligibility changes.

Administrative Expenses: Average of past two year's administrative expense, rounded up to the nearest \$250,000, is added to the normal cost. For the 2013-2014 plan year, this amount is \$29,000,000.

Special Data Adjustments: Upon review of the June 30, 2013 census data submitted by PRGERS, we observed several areas where data was missing, inconsistent, or invalid. We reviewed each issue and presented an analysis to PRGERS that consisted of a description of the data issue, a proposed solution, and a brief rationale supporting the proposed solution. The recommendations were reviewed by PRGERS staff, revised as applicable, and applied to the census data in order to prepare it for use in the valuation. The majority of the data edits and assumptions were applied to the following data items:

- Date of birth
- Date of hire
- Allocation of Basic System Benefits and System Administered Benefits

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### SECTION IX – SUMMARY OF ACTUARIAL ASSUMPTIONS AS OF JUNE 30, 2013

- Accumulated Employee Contributions
- Employment Category Code (Police / Fire Code)
- Plan Code (Coordinated / Supplementation option)
- Form of payment
- Retirement Law
- Entity Class

Credited service is based on the greater of “Years Worked” reported in the valuation census data and the elapsed time from date of hire to the valuation date.

Accrued benefits as of June 30, 2013 were estimated for Act 447 and Act 1 active members based on the data submitted for the June 30, 2013 and earlier valuations.

The census data provided for the participants in pay status as of June 30, 2013 did not reflect the increase in the minimum benefit to \$500 per month under Act 3. Pension benefits were increased as necessary to bring the total pension benefits for retirees and disabled retirees as of June 30, 2013 to \$500 per month and the total pension benefits for beneficiaries as of June 30, 2013 to \$250 per month. The increase was assumed to be a Basic System Benefit.

For current disabled retirees and beneficiaries receiving benefits under Act 127, the pension benefits paid by System assets (e.g. the Basic System Benefit) was assumed to be 30% of the total reported pension benefit.

Benefits for current beneficiaries who are under age 23 as of the valuation date were assumed to cease at age 23. Benefits for current beneficiaries who are age 23 or older as of the valuation data were assumed to be payable for life. In addition, the current level of benefit for all beneficiaries was assumed to remain constant.

Benefits not valued: The minimum post-retirement death benefit of \$1,000 for retirees without surviving beneficiaries who retired prior to July 1, 2013 is not explicitly valued. The additional liability associated with this benefit is expected to be de minimis.

The special mayor retirement age for Act 447 and Act 1 mayors is not valued. The additional liability due to this reduced retirement age is expected to be de minimis.

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### SECTION IX – SUMMARY OF ACTUARIAL ASSUMPTIONS AS OF JUNE 30, 2013

Moreover, this report does not address the guarantee insurance reserve for life insurance on loans to plan members. (Please see Notes to Basic Financial Statements on page 39 and Statements of Plan Net Assets on page 12 of the System's June 30, 2012 Basic Financial Statements.)

Basis for demographic assumptions: The post-retirement healthy and disabled mortality assumptions used in this valuation are based on a study of plan's experience from 2007 to 2012. Most other demographic assumptions used in this valuation are based on a 2009 experience study using data as of June 30, 2003, June 30, 2005, and June 30, 2007. Certain demographic assumptions (e.g. termination and retirement) were impacted by the Act 3 pension reforms and were revised based on the new retirement eligibility and expected future experience. All assumptions were reviewed with PRGERS staff for reasonableness and are documented above.

Changes in actuarial assumptions since the prior valuation: The interest rate assumption for GASB 25 & 27 accounting purposes was increased from 6.0% to 6.4%. The interest rate assumption for GASB 45 accounting purposes was increased from 3.2% to 3.25%.

With the enactment of Act 3 of 2013, the termination, retirement and disability rates were revised along with the form of payment assumption. Please refer to the June 30, 2012 valuation for the actuarial assumptions used prior to Act 3.

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## PUERTO RICO GOVERNMENT EMPLOYEES RETIREMENT SYSTEM

### SECTION X – SUMMARY OF ACTUARIAL METHODS AS OF JUNE 30, 2013

The ultimate cost of a pension plan is the excess of actual benefits and administrative expenses paid over actual net investment return on plan assets during the plan's existence until the last payment has been made to the last participant. The plan's "actuarial cost method" determines the expected incidence of actuarial costs by allocating portions of the ultimate cost to each plan year. The cost method is thus a budgeting tool to help to ensure that the plan will be adequately and systematically funded and accounted for. There are several commonly-used cost methods which differ in how much of the ultimate cost is assigned to each prior and future year. Therefore, the pattern of annual contributions and accounting expense varies with the choice of cost method. Annual contributions and accounting expense are also affected by the "asset valuation method" (as well as the plan provisions, actuarial assumptions, and actual plan demographic and investment experience each year).

#### Actuarial Cost Method

The plan's actuarial cost method is the projected unit credit method. Under this method, a projected benefit is determined at each active participant's assumed retirement age assuming future compensation increases. The projected benefit is attributed to each year of service using straight proration based on projected service to each assumed retirement age. For current Act 447 and Act 1 active members, the accrued benefit as of June 30, 2013 is fully accrued and benefits earned after June 30, 2013 are recognized over service since July 1, 2013. The plan's normal cost is the sum of the present value of the portion of each active participant's projected benefit attributable to the current year of service. The plan's accrued liability is the sum of (a) the present value of the portion of each active participant's projected benefit attributable to all prior years of service plus (b) the present value of each inactive participant's future benefits.

#### Asset Valuation Method

The Actuarial Value of Assets is equal to the Market Value of Assets.

#### Changes in actuarial methods since the prior valuation

The actuarial cost method was slightly revised due to the Act 3 pension reform.

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