

Actuarial Valuation Data

Public Employees Police and Fire Fund

(PERA-P&F)

	2011	2010	2009	2008	2007*	2007**	2006
<b>Membership</b>							
Active Members	10,880	11,002	11,035	10,961	10,720	10,720	10,591
Service Retirees	5,549	5,354	5,213	5,079	4,938	4,938	4,756
Disabilitants	864	859	838	824	803	803	765
Survivors	1,435	1,413	1,380	1,291	1,291	1,291	1,280
Deferred Retirees	1,335	1,315	1,280	1,242	1,200	1,200	999
Nonvested Former Members	<u>870</u>	<u>930</u>	<u>911</u>	<u>879</u>	<u>814</u>	<u>814</u>	<u>757</u>
Total Membership	20,933	20,873	20,657	20,276	19,766	19,766	19,148
<b>Funded Status</b>							
Accrued Liability	\$6,363,546,000	\$5,963,672,000	\$6,296,274,000	\$5,918,061,000	\$5,669,346,646	\$5,669,346,646	\$5,260,564,020
Current Assets	<u>\$5,274,602,000</u>	<u>\$5,188,339,000</u>	<u>\$5,239,855,000</u>	<u>\$5,233,015,000</u>	<u>\$5,198,921,940</u>	<u>\$5,382,707,345</u>	<u>\$5,017,950,719</u>
Unfunded Accrued Liability	\$1,088,944,000	\$775,333,000	\$1,056,419,000	\$685,046,000	\$470,424,706	\$286,639,301	\$242,613,301
Funding Ratio	82.89%	87.00%	83.22%	88.42%	91.70%	94.94%	95.39%
<b>Financing Requirements</b>							
Covered Payroll	\$796,689,000	\$795,171,000	\$786,887,000	\$746,743,000	\$699,841,244	\$699,841,244	\$668,088,065
Benefits Payable	\$342,219,000	\$326,041,000	\$310,099,000	\$295,994,000	\$280,266,868	\$280,266,868	\$264,601,229
Normal Cost	19.77% \$157,490,000	19.65% \$156,244,000	22.07% \$173,703,000	23.07% \$172,273,000	22.19% \$155,328,501	22.19% \$155,328,501	22.32% \$149,097,708
Administrative Expenses	<u>0.10%</u> <u>\$797,000</u>	<u>0.10%</u> <u>\$795,000</u>	<u>0.13%</u> <u>\$1,023,000</u>	<u>0.11%</u> <u>\$821,000</u>	<u>0.10%</u> <u>\$699,841</u>	<u>0.10%</u> <u>\$699,841</u>	<u>0.11%</u> <u>\$734,897</u>
Normal Cost & Expense	19.87% \$158,287,000	19.75% \$157,039,000	22.20% \$174,726,000	23.18% \$173,094,000	22.29% \$156,028,342	22.29% \$156,028,342	22.43% \$149,832,605
Normal Cost & Expense	19.87% \$158,287,000	19.75% \$157,039,000	22.20% \$174,726,000	23.18% \$173,094,000	22.29% \$156,028,342	22.29% \$156,028,342	22.43% \$149,832,605
Amortization	<u>8.91%</u> <u>\$70,985,000</u>	<u>5.77%</u> <u>\$45,881,000</u>	<u>7.79%</u> <u>\$61,298,000</u>	<u>5.23%</u> <u>\$39,055,000</u>	<u>6.19%</u> <u>\$43,320,173</u>	<u>3.77%</u> <u>\$26,384,015</u>	<u>3.14%</u> <u>\$20,977,965</u>
Total Requirements	28.78% \$229,272,000	25.52% \$202,920,000	29.99% \$236,024,000	28.41% \$212,149,000	28.48% \$199,348,515	26.06% \$182,412,357	25.57% \$170,810,570
Employee Contributions	9.60% \$76,482,000	9.50% \$75,541,000	9.40% \$73,967,000	9.00% \$67,207,000	8.20% \$57,386,982	8.20% \$57,386,982	7.40% \$49,438,517
Employer Contributions	14.40% \$114,723,000	14.25% \$113,312,000	14.10% \$110,951,000	13.50% \$100,810,000	12.30% \$86,080,473	12.30% \$86,080,473	11.10% \$74,157,775
Employer Add'l Cont.	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Direct State Funding	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Other Govt. Funding	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Administrative Assessment	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>
Total Contributions	24.00% \$191,205,000	23.75% \$188,853,000	23.50% \$184,918,000	22.50% \$168,017,000	20.50% \$143,467,455	20.50% \$143,467,455	18.50% \$123,596,292
Total Requirements	28.78% \$229,272,000	25.52% \$202,920,000	29.99% \$236,024,000	28.41% \$212,149,000	28.48% \$199,348,515	26.06% \$182,412,357	25.57% \$170,810,570
Total Contributions	<u>24.00%</u> <u>\$191,205,000</u>	<u>23.75%</u> <u>\$188,853,000</u>	<u>23.50%</u> <u>\$184,918,000</u>	<u>22.50%</u> <u>\$168,017,000</u>	<u>20.50%</u> <u>\$143,467,455</u>	<u>20.50%</u> <u>\$143,467,455</u>	<u>18.50%</u> <u>\$123,596,292</u>
Deficiency (Surplus)	4.78% \$38,067,000	1.77% \$14,067,000	6.49% \$51,106,000	5.91% \$44,132,000	7.98% \$55,881,060	5.56% \$38,944,902	7.07% \$47,214,278
Amortization Target Date	2038	2038	2038	2038	2020	2020	2020
Actuary	Mercer	Mercer	Mercer	Mercer	Segal	Segal	Segal

\*\* Current Assets and Amortization results do not reflect the

Actuarial Valuation Data

Public Employees Police and Fire Fund

(PERA-P&F)

	2005		2004		2003		2002		2001		2000		1999	
<b>Membership</b>														
Active Members		10,235		10,055		9,948		9,940		9,858		9,627		9,477
Service Retirees		4,668		4,547		4,381		4,191		4,188		3,991		3,674
Disabilitants		686		700		614		574		543		482		412
Survivors		1,261		1,385		1,213		1,206		1,267		1,205		1,173
Deferred Retirees		927		878		758		637		554		470		368
Nonvested Former Members		<u>729</u>		<u>750</u>		<u>740</u>		<u>663</u>		<u>610</u>		<u>626</u>		<u>195</u>
Total Membership		18,506		18,315		17,654		17,211		17,020		16,401		15,299
<b>Funded Status</b>														
Accrued Liability		\$4,956,339,899		\$4,692,190,387		\$4,390,953,000		\$3,886,311,000		\$3,712,360,000		\$3,383,187,000		\$3,004,637,000
Current Assets		<u>\$4,814,961,076</u>		<u>\$4,746,834,494</u>		<u>\$4,713,606,000</u>		<u>\$4,707,255,000</u>		<u>\$4,510,134,000</u>		<u>\$4,145,351,000</u>		<u>\$3,679,551,000</u>
Unfunded Accrued Liability		\$141,378,823		(\$54,644,107)		(\$322,653,000)		(\$820,944,000)		(\$797,774,000)		(\$762,164,000)		(\$674,914,000)
Funding Ratio	97.15%		101.16%		107.35%		121.12%		121.49%		122.53%		122.46%	
<b>Financing Requirements</b>														
Covered Payroll		\$625,806,943		\$593,944,656		\$582,688,000		\$541,250,000		\$528,942,000		\$494,134,000		\$474,245,000
Benefits Payable		\$251,428,946		\$237,442,200		\$225,434,000		\$212,405,000		\$192,245,000		\$165,719,000		\$68,672,000
Normal Cost	22.28%	\$139,384,787	22.37%	\$132,886,767	22.05%	\$128,469,000	20.22%	\$109,474,000	20.21%	\$106,905,000	19.93%	\$98,462,000	20.30%	\$96,225,000
Administrative Expenses	<u>0.12%</u>	<u>\$750,968</u>	<u>0.12%</u>	<u>\$712,734</u>	<u>0.12%</u>	<u>\$699,000</u>	<u>0.12%</u>	<u>\$650,000</u>	<u>0.13%</u>	<u>\$688,000</u>	<u>0.14%</u>	<u>\$692,000</u>	<u>0.23%</u>	<u>\$1,091,000</u>
Normal Cost & Expense	22.40%	\$140,135,755	22.49%	\$133,599,501	22.17%	\$129,168,000	20.34%	\$110,124,000	20.34%	\$107,593,000	20.07%	\$99,154,000	20.53%	\$97,316,000
Normal Cost & Expense	22.40%	\$140,135,755	22.49%	\$133,599,501	22.17%	\$129,168,000	20.34%	\$110,124,000	20.34%	\$107,593,000	20.07%	\$99,154,000	20.53%	\$97,316,000
Amortization	<u>1.84%</u>	<u>\$11,514,848</u>	<u>(0.44%)</u>	<u>(\$2,613,356)</u>	<u>(2.65%)</u>	<u>(\$15,441,000)</u>	<u>(7.26%)</u>	<u>(\$39,295,000)</u>	<u>(7.22%)</u>	<u>(\$38,190,000)</u>	<u>(7.38%)</u>	<u>(\$36,467,000)</u>	<u>(8.85%)</u>	<u>(\$41,971,000)</u>
Total Requirements	24.24%	\$151,650,603	22.05%	\$130,986,145	19.52%	\$113,727,000	13.08%	\$70,829,000	13.12%	\$69,403,000	12.68%	\$62,687,000	11.68%	\$55,345,000
Employee Contributions	6.60%	\$41,303,258	6.20%	\$36,824,569	6.20%	\$36,127,000	6.20%	\$33,558,000	6.20%	\$32,793,000	6.20%	\$30,636,000	6.20%	\$29,403,000
Employer Contributions	9.90%	\$61,954,887	9.30%	\$55,236,853	9.30%	\$54,190,000	9.30%	\$50,336,000	9.30%	\$49,189,000	9.30%	\$45,954,000	9.30%	\$44,105,000
Employer Add'l Cont.	0.00%	\$0	0.00%	\$0	0.00%	\$0	0.00%	\$0	0.00%	\$0	0.00%	\$0	0.00%	\$0
Direct State Funding	0.00%	\$0	0.00%	\$0	0.00%	\$0	0.00%	\$0	0.00%	\$0	0.00%	\$0	0.00%	\$0
Other Govt. Funding	0.00%	\$0	0.00%	\$0	0.00%	\$0	0.00%	\$0	0.00%	\$0	0.00%	\$0	0.00%	\$0
Administrative Assessment	<u>0.00%</u>	<u>\$0</u>	<u>0.00%</u>	<u>\$0</u>	<u>0.00%</u>	<u>\$0</u>	<u>0.00%</u>	<u>\$0</u>	<u>0.00%</u>	<u>\$0</u>	<u>0.00%</u>	<u>\$0</u>	<u>0.00%</u>	<u>\$0</u>
Total Contributions	16.50%	\$103,258,145	15.50%	\$92,061,422	15.50%	\$90,317,000	15.50%	\$83,894,000	15.50%	\$81,982,000	15.50%	\$76,590,000	15.50%	\$73,508,000
Total Requirements	24.24%	\$151,650,603	22.05%	\$130,986,145	19.52%	\$113,727,000	13.08%	\$70,829,000	13.12%	\$69,403,000	12.68%	\$62,687,000	11.68%	\$55,345,000
Total Contributions	<u>16.50%</u>	<u>\$103,258,145</u>	<u>15.50%</u>	<u>\$92,061,422</u>	<u>15.50%</u>	<u>\$90,317,000</u>	<u>15.50%</u>	<u>\$83,894,000</u>	<u>15.50%</u>	<u>\$81,982,000</u>	<u>15.50%</u>	<u>\$76,590,000</u>	<u>15.50%</u>	<u>\$73,508,000</u>
Deficiency (Surplus)	7.74%	\$48,392,458	6.55%	\$38,924,723	4.02%	\$23,410,000	(2.42%)	(\$13,065,000)	(2.38%)	(\$12,579,000)	(2.82%)	(\$13,903,000)	(3.82%)	(\$18,163,000)
Amortization Target Date	2020		2034		2033		2032		2031		2030		2020	
Actuary	Segal		Segal		Milliman USA		Milliman USA		Milliman USA		Milliman & Robertson		Milliman & Robertson	

2007 Asset Valuation Method change

Actuarial Valuation Data

Public Employees Police and Fire Fund

(PERA-P&F)

	1998	1997	1996	1995	1994	1993	1992
<b>Membership</b>							
Active Members	8,499	8,079	7,680	7,380	7,043	6,785	6,521
Service Retirees	1,781	1,608	1,524	1,435	1,347	1,250	1,191
Disabilitants	251	215	184	146	116	94	93
Survivors	492	471	447	426	411	394	379
Deferred Retirees	292	292	267	250	234	215	187
Nonvested Former Members	<u>201</u>	<u>201</u>	<u>162</u>	<u>141</u>	<u>140</u>	<u>121</u>	<u>120</u>
Total Membership	11,516	10,866	10,264	9,778	9,291	8,859	8,491
<b>Funded Status</b>							
Accrued Liability	\$1,741,344,000	\$1,556,483,000	\$1,334,202,000	\$1,196,795,000	\$1,099,221,000	\$1,009,226,000	\$888,826,000
Current Assets	<u>\$2,337,313,000</u>	<u>\$1,974,635,000</u>	<u>\$1,633,010,000</u>	<u>\$1,385,901,000</u>	<u>\$1,234,959,000</u>	<u>\$1,118,342,000</u>	<u>\$979,981,000</u>
Unfunded Accrued Liability	(\$595,969,000)	(\$418,152,000)	(\$298,808,000)	(\$189,106,000)	(\$135,738,000)	(\$109,116,000)	(\$91,155,000)
Funding Ratio	134.22%	126.87%	122.40%	115.80%	112.35%	110.81%	110.26%
<b>Financing Requirements</b>							
Covered Payroll	\$399,499,000	\$369,503,000	\$336,779,000	\$313,885,000	\$294,339,000	\$270,813,000	\$255,270,000
Benefits Payable	\$56,034,000	\$43,045,000	\$37,132,000	\$32,152,000	\$28,127,000	\$24,619,000	\$22,165,000
Normal Cost	20.21% \$80,719,000	21.65% \$80,020,000	19.73% \$66,446,497	19.49% \$61,176,187	19.47% \$57,307,803	19.26% \$52,158,584	18.05% \$46,076,235
Administrative Expenses	<u>0.14%</u> <u>\$559,000</u>	<u>0.13%</u> <u>\$480,000</u>	<u>0.13%</u> <u>\$437,813</u>	<u>0.12%</u> <u>\$376,662</u>	<u>0.12%</u> <u>\$353,207</u>	<u>0.11%</u> <u>\$297,894</u>	<u>0.55%</u> <u>\$1,403,985</u>
Normal Cost & Expense	20.35% \$81,278,000	21.78% \$80,500,000	19.86% \$66,884,309	19.61% \$61,552,849	19.59% \$57,661,010	19.37% \$52,456,478	18.60% \$47,480,220
Normal Cost & Expense	20.35% \$81,278,000	21.78% \$80,500,000	19.86% \$66,884,309	19.61% \$61,552,849	19.59% \$57,661,010	19.37% \$52,456,478	18.60% \$47,480,220
Amortization	<u>(8.95%)</u> <u>(\$35,755,000)</u>	<u>(6.57%)</u> <u>(\$24,276,000)</u>	<u>(4.75%)</u> <u>(\$15,997,003)</u>	<u>(3.12%)</u> <u>(\$9,793,212)</u>	<u>(2.31%)</u> <u>(\$6,799,231)</u>	<u>(1.92%)</u> <u>(\$5,199,610)</u>	<u>0.00%</u> <u>\$0</u>
Total Requirements	11.40% \$45,523,000	15.21% \$56,224,000	15.11% \$50,887,307	16.49% \$51,759,637	17.28% \$50,861,779	17.45% \$47,256,869	18.60% \$47,480,220
Employee Contributions	7.60% \$30,362,000	7.60% \$28,082,000	7.60% \$25,595,204	7.60% \$23,855,260	7.60% \$22,369,764	7.80% \$21,123,414	8.00% \$20,421,600
Employer Contributions	11.40% \$45,543,000	11.40% \$42,123,000	11.40% \$38,392,806	11.40% \$35,782,890	11.40% \$33,554,646	11.70% \$31,685,121	12.00% \$30,632,400
Employer Add'l Cont.	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Direct State Funding	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Other Govt. Funding	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Administrative Assessment	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>
Total Contributions	19.00% \$75,905,000	19.00% \$70,205,000	19.00% \$63,988,010	19.00% \$59,638,150	19.00% \$55,924,410	19.50% \$52,808,535	20.00% \$51,054,000
Total Requirements	11.40% \$45,523,000	15.21% \$56,224,000	15.11% \$50,887,307	16.49% \$51,759,637	17.28% \$50,861,779	17.45% \$47,256,869	18.60% \$47,480,220
Total Contributions	<u>19.00%</u> <u>\$75,905,000</u>	<u>19.00%</u> <u>\$70,205,000</u>	<u>19.00%</u> <u>\$63,988,010</u>	<u>19.00%</u> <u>\$59,638,150</u>	<u>19.00%</u> <u>\$55,924,410</u>	<u>19.50%</u> <u>\$52,808,535</u>	<u>20.00%</u> <u>\$51,054,000</u>
Deficiency (Surplus)	(7.60%) (\$30,382,000)	(3.79%) (\$13,981,000)	(3.89%) (\$13,100,703)	(2.51%) (\$7,878,514)	(1.72%) (\$5,062,631)	(2.05%) (\$5,551,667)	(1.40%) (\$3,573,780)
Amortization Target Date	2020	2020	2020	2020	2020	2020	2020
Actuary	Milliman & Robertson	Milliman & Robertson	Milliman & Robertson	Milliman & Robertson	Milliman & Robertson	Milliman & Robertson	Milliman & Robertson

Actuarial Valuation Data

Public Employees Police and Fire Fund

(PERA-P&F)

	1991	1990	1989	1988	1987	1986	1985
<b>Membership</b>							
Active Members	6,309	6,136	5,891	5,611	5,385	5,127	4,928
Service Retirees	1,130	1,057	995	965	895	838	765
Disabilitants	93	89	84	73	66	58	54
Survivors	359	347	333	325	310	302	279
Deferred Retirees	165	128	110	105	97	555	163
Nonvested Former Members	<u>112</u>	<u>121</u>	<u>100</u>	<u>107</u>	<u>462</u>	<u>461</u>	<u>350</u>
Total Membership	8,168	7,878	7,513	7,186	7,215	7,341	6,539
<b>Funded Status</b>							
Accrued Liability	\$794,295,000	\$715,963,000	\$651,776,000	\$574,133,000	\$486,674,000	\$447,742,000	\$382,998,000
Current Assets	<u>\$839,560,000</u>	<u>\$755,204,000</u>	<u>\$656,654,000</u>	<u>\$557,669,000</u>	<u>\$506,153,000</u>	<u>\$424,936,000</u>	<u>\$338,400,000</u>
Unfunded Accrued Liability	(\$45,265,000)	(\$39,241,000)	(\$4,878,000)	\$16,464,000	(\$19,479,000)	\$22,806,000	\$44,598,000
Funding Ratio	105.70%	105.48%	100.75%	97.13%	104.00%	94.91%	88.36%
<b>Financing Requirements</b>							
Covered Payroll	\$234,208,000	\$216,022,000	\$197,982,000	\$178,768,000	\$164,975,000	\$153,714,000	\$139,222,000
Benefits Payable	\$19,672,000	\$17,631,000	\$15,446,000	\$13,821,000	\$11,314,000	\$9,555,000	\$7,899,000
Normal Cost	17.08% \$40,002,726	16.98% \$36,680,536	15.79% \$31,261,358	15.84% \$28,316,851	15.47% \$25,521,633	15.84% \$24,348,298	16.22% \$22,581,808
Administrative Expenses	<u>0.46%</u> <u>\$1,077,357</u>	<u>0.58%</u> <u>\$1,252,928</u>	<u>0.42%</u> <u>\$831,524</u>	<u>0.46%</u> <u>\$822,333</u>	<u>0.50%</u> <u>\$824,875</u>	<u>0.48%</u> <u>\$737,827</u>	<u>0.47%</u> <u>\$654,343</u>
Normal Cost & Expense	17.54% \$41,080,083	17.56% \$37,933,463	16.21% \$32,092,882	16.30% \$29,139,184	15.97% \$26,346,508	16.32% \$25,086,125	16.69% \$23,236,152
Normal Cost & Expense	17.54% \$41,080,083	17.56% \$37,933,463	16.21% \$32,092,882	16.30% \$29,139,184	15.97% \$26,346,508	16.32% \$25,086,125	16.69% \$23,236,152
Amortization	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.39%</u> <u>\$697,195</u>	<u>0.00%</u> <u>\$0</u>	<u>0.78%</u> <u>\$1,198,969</u>	<u>1.63%</u> <u>\$2,269,319</u>
Total Requirements	17.54% \$41,080,083	17.56% \$37,933,463	16.21% \$32,092,882	16.69% \$29,836,379	15.97% \$26,346,508	17.10% \$26,285,094	18.32% \$25,505,470
Employee Contributions	8.00% \$18,736,640	8.00% \$17,281,760	8.00% \$15,838,560	8.00% \$14,301,440	8.00% \$13,198,000	8.00% \$12,297,120	8.00% \$11,137,760
Employer Contributions	12.00% \$28,104,960	12.00% \$25,922,640	12.00% \$23,757,840	12.00% \$21,452,160	12.00% \$19,797,000	12.00% \$18,445,680	12.00% \$16,706,640
Employer Add'l Cont.	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Direct State Funding	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Other Govt. Funding	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Administrative Assessment	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>
Total Contributions	20.00% \$46,841,600	20.00% \$43,204,400	20.00% \$39,596,400	20.00% \$35,753,600	20.00% \$32,995,000	20.00% \$30,742,800	20.00% \$27,844,400
Total Requirements	17.54% \$41,080,083	17.56% \$37,933,463	16.21% \$32,092,882	16.69% \$29,836,379	15.97% \$26,346,508	17.10% \$26,285,094	18.32% \$25,505,470
Total Contributions	<u>20.00%</u> <u>\$46,841,600</u>	<u>20.00%</u> <u>\$43,204,400</u>	<u>20.00%</u> <u>\$39,596,400</u>	<u>20.00%</u> <u>\$35,753,600</u>	<u>20.00%</u> <u>\$32,995,000</u>	<u>20.00%</u> <u>\$30,742,800</u>	<u>20.00%</u> <u>\$27,844,400</u>
Deficiency (Surplus)	(2.46%) (\$5,761,517)	(2.44%) (\$5,270,937)	(3.79%) (\$7,503,518)	(3.31%) (\$5,917,221)	(4.03%) (\$6,648,493)	(2.90%) (\$4,457,706)	(1.68%) (\$2,338,930)
Amortization Target Date	2020	2020	2020	2018	2009	2009	2009
Actuary	Milliman & Robertson	Wyatt	Wyatt	Wyatt	Wyatt	Wyatt	Wyatt

Actuarial Valuation Data

Public Employees Police and Fire Fund

(PERA-P&F)

	1984	1983	1982	1981	1980	1979	1978
<b>Membership</b>							
Active Members	4,744	4,598	4,508	4,356	4,492	4,092	3,971
Service Retirees	715	674	632	593	554	515	437
Disabilitants	44	52	53	33	27	30	29
Survivors	242	224	216	207	177	268	276
Deferred Retirees	175	179	178	213	216	210	200
Nonvested Former Members	0	0	0	0	0	0	0
Total Membership	5,920	5,727	5,587	5,402	5,466	5,115	4,913
<b>Funded Status</b>							
Accrued Liability	\$306,817,265	\$250,280,229	\$222,472,470	\$187,934,297	\$161,723,394	\$139,339,808	\$119,929,854
Current Assets	<u>\$279,757,310</u>	<u>\$249,539,820</u>	<u>\$209,225,419</u>	<u>\$174,896,238</u>	<u>\$143,124,478</u>	<u>\$120,427,888</u>	<u>\$98,804,037</u>
Unfunded Accrued Liability	\$27,059,955	\$740,409	\$13,247,051	\$13,038,059	\$18,598,916	\$18,911,920	\$21,125,817
Funding Ratio	91.18%	99.70%	94.05%	93.06%	88.50%	86.43%	82.38%
<b>Financing Requirements</b>							
Covered Payroll	\$117,880,783	\$105,153,394	\$97,295,847	\$85,810,155	\$75,851,475	\$68,125,873	\$59,933,726
Benefits Payable	\$6,592,773	\$5,576,067	\$5,352,786	\$4,597,457	\$3,378,785	\$2,931,102	\$2,421,612
Normal Cost	15.66% \$18,460,131	15.48% \$16,277,745	15.46% \$15,041,938	15.42% \$13,231,926	15.49% \$11,749,393	15.68% \$10,682,137	15.87% \$9,511,482
Administrative Expenses	<u>0.18%</u> <u>\$212,185</u>	<u>0.09%</u> <u>\$94,638</u>	<u>0.09%</u> <u>\$87,566</u>	<u>0.09%</u> <u>\$77,229</u>	<u>0.09%</u> <u>\$68,266</u>	<u>0.09%</u> <u>\$61,313</u>	<u>0.09%</u> <u>\$53,940</u>
Normal Cost & Expense	15.84% \$18,672,316	15.57% \$16,372,383	15.55% \$15,129,504	15.51% \$13,309,155	15.58% \$11,817,660	15.77% \$10,743,450	15.96% \$9,565,423
Normal Cost & Expense	15.84% \$18,672,316	15.57% \$16,372,383	15.55% \$15,129,504	15.51% \$13,309,155	15.58% \$11,817,660	15.77% \$10,743,450	15.96% \$9,565,423
Amortization	<u>1.09%</u> <u>\$1,284,901</u>	<u>0.05%</u> <u>\$52,577</u>	<u>0.93%</u> <u>\$904,851</u>	<u>1.02%</u> <u>\$875,264</u>	<u>1.62%</u> <u>\$1,228,794</u>	<u>1.81%</u> <u>\$1,233,078</u>	<u>2.92%</u> <u>\$1,750,065</u>
Total Requirements	16.93% \$19,957,217	15.62% \$16,424,960	16.48% \$16,034,356	16.53% \$14,184,419	17.20% \$13,046,454	17.58% \$11,976,528	18.88% \$11,315,487
Employee Contributions	8.00% \$9,430,463	8.00% \$8,412,272	8.00% \$7,783,668	8.00% \$6,864,812	8.00% \$6,068,118	8.00% \$5,450,070	8.00% \$4,794,698
Employer Contributions	12.00% \$14,145,694	12.00% \$12,618,407	12.00% \$11,675,502	12.00% \$10,297,219	12.00% \$9,102,177	12.00% \$8,175,105	12.00% \$7,192,047
Employer Add'l Cont.	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Direct State Funding	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Other Govt. Funding	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Administrative Assessment	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>
Total Contributions	20.00% \$23,576,157	20.00% \$21,030,679	20.00% \$19,459,169	20.00% \$17,162,031	20.00% \$15,170,295	20.00% \$13,625,175	20.00% \$11,986,745
Total Requirements	16.93% \$19,957,217	15.62% \$16,424,960	16.48% \$16,034,356	16.53% \$14,184,419	17.20% \$13,046,454	17.58% \$11,976,528	18.88% \$11,315,487
Total Contributions	<u>20.00%</u> <u>\$23,576,157</u>	<u>20.00%</u> <u>\$21,030,679</u>	<u>20.00%</u> <u>\$19,459,169</u>	<u>20.00%</u> <u>\$17,162,031</u>	<u>20.00%</u> <u>\$15,170,295</u>	<u>20.00%</u> <u>\$13,625,175</u>	<u>20.00%</u> <u>\$11,986,745</u>
Deficiency (Surplus)	(3.07%) (\$3,618,940)	(4.38%) (\$4,605,719)	(3.52%) (\$3,424,814)	(3.47%) (\$2,977,612)	(2.80%) (\$2,123,841)	(2.42%) (\$1,648,646)	(1.12%) (\$671,258)
Amortization Target Date	2009	2009	2009	2009	2009	2009	1997
Actuary	Comp. & Capital	Comp. & Capital	Comp. & Capital	Comp. & Capital	Comp. & Capital	Comp. & Capital	Comp. & Capital

Actuarial Valuation Data

Public Employees Police and Fire Fund

(PERA-P&F)

	1977	1976	1975	1974	1973	1972	1971
<b>Membership</b>							
Active Members	3,732	3,800	3,690	3,393	3,105	3,027	2,837
Service Retirees	395	362	331	290	251	216	185
Disabilitants	20	15	12	9	6	5	4
Survivors	242	238	142	129	201	192	179
Deferred Retirees	194	183	22	17	13	11	30
Nonvested Former Members	0	0	0	0	0	0	0
Total Membership	4,583	4,598	4,197	3,838	3,576	3,451	3,235
<b>Funded Status</b>							
Accrued Liability	\$102,297,741	\$87,155,968	\$67,641,232	\$59,553,376	\$51,833,540	\$34,094,783	\$28,533,461
Current Assets	<u>\$81,962,092</u>	<u>\$67,027,999</u>	<u>\$56,100,213</u>	<u>\$47,546,849</u>	<u>\$38,959,178</u>	<u>\$31,648,753</u>	<u>\$25,988,163</u>
Unfunded Accrued Liability	\$20,335,649	\$20,127,969	\$11,541,019	\$12,006,527	\$12,874,362	\$2,446,030	\$2,545,298
Funding Ratio	80.12%	76.91%	82.94%	79.84%	75.16%	92.83%	91.08%
<b>Financing Requirements</b>							
Covered Payroll	\$52,889,851	\$46,848,679	\$40,849,878	\$35,270,010	\$30,192,486	\$28,359,526	\$24,263,426
Benefits Payable	\$1,833,314	\$1,513,808	\$1,275,785	\$1,011,955	\$736,734	\$555,687	\$455,215
Normal Cost	16.20% \$8,568,156	16.37% \$7,669,129	15.36% \$6,274,541	15.80% \$5,572,662	16.07% \$4,851,933	17.47% \$4,954,409	17.92% \$4,348,006
Administrative Expenses	0.09% <u>\$47,601</u>	0.09% <u>\$42,164</u>	0.10% <u>\$40,850</u>	0.10% <u>\$35,270</u>	0.11% <u>\$33,212</u>	0.12% <u>\$34,031</u>	0.12% <u>\$29,116</u>
Normal Cost & Expense	16.29% \$8,615,757	16.46% \$7,711,293	15.46% \$6,315,391	15.90% \$5,607,932	16.18% \$4,885,144	17.59% \$4,988,441	18.04% \$4,377,122
Normal Cost & Expense	16.29% \$8,615,757	16.46% \$7,711,293	15.46% \$6,315,391	15.90% \$5,607,932	16.18% \$4,885,144	17.59% \$4,988,441	18.04% \$4,377,122
Amortization	3.09% <u>\$1,634,296</u>	3.35% <u>\$1,569,431</u>	2.15% <u>\$878,272</u>	2.52% <u>\$888,804</u>	3.06% <u>\$923,890</u>	0.52% <u>\$147,470</u>	0.62% <u>\$150,433</u>
Total Requirements	19.38% \$10,250,053	19.81% \$9,280,723	17.61% \$7,193,664	18.42% \$6,496,736	19.24% \$5,809,034	18.11% \$5,135,910	18.66% \$4,527,555
Employee Contributions	8.00% \$4,231,188	8.00% \$3,747,894	8.00% \$3,267,990	8.00% \$2,821,601	8.00% \$2,415,399	7.00% \$1,985,167	7.00% \$1,698,440
Employer Contributions	12.00% \$6,346,782	12.00% \$5,621,841	12.00% \$4,901,985	12.00% \$4,232,401	12.00% \$3,623,098	12.00% \$3,403,143	12.00% \$2,911,611
Employer Add'l Cont.	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Direct State Funding	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Other Govt. Funding	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0
Administrative Assessment	0.00% <u>\$0</u>	0.00% <u>\$0</u>	0.00% <u>\$0</u>	0.00% <u>\$0</u>	0.00% <u>\$0</u>	0.00% <u>\$0</u>	0.00% <u>\$0</u>
Total Contributions	20.00% \$10,577,970	20.00% \$9,369,736	20.00% \$8,169,976	20.00% \$7,054,002	20.00% \$6,038,497	19.00% \$5,388,310	19.00% \$4,610,051
Total Requirements	19.38% \$10,250,053	19.81% \$9,280,723	17.61% \$7,193,664	18.42% \$6,496,736	19.24% \$5,809,034	18.11% \$5,135,910	18.66% \$4,527,555
Total Contributions	20.00% <u>\$10,577,970</u>	20.00% <u>\$9,369,736</u>	20.00% <u>\$8,169,976</u>	20.00% <u>\$7,054,002</u>	20.00% <u>\$6,038,497</u>	19.00% <u>\$5,388,310</u>	19.00% <u>\$4,610,051</u>
Deficiency (Surplus)	(0.62%) (\$327,917)	(0.19%) (\$89,012)	(2.39%) (\$976,312)	(1.58%) (\$557,266)	(0.76%) (\$229,463)	(0.89%) (\$252,400)	(0.34%) (\$82,496)
Amortization Target Date	1997	1997	1997	1997	1997	1997	1997
Actuary	Comp. & Capital	Comp. & Capital	Comp. & Capital	A.S. Hansen	A.S. Hansen	A.S. Hansen	A.S. Hansen

Actuarial Valuation Data

Public Employees Police and Fire Fund

(PERA-P&F)

	1970	1969	1968	1967	1966	1965	1963
<b>Membership</b>							
Active Members	2,619	2,475	2,207	2,038	1,918	1,767	1,525
Service Retirees	164	150	132	114	83	64	32
Disabilitants	5	2	2	1	1	1	--
Survivors	162	139	114	92	46	35	20
Deferred Retirees	27	22	6	7	0	0	--
Nonvested Former Members	0	0	0	0	0	0	0
Total Membership	2,977	2,788	2,461	2,252	2,048	1,867	1,577
<b>Funded Status</b>							
Accrued Liability	\$22,636,714	\$19,684,778	\$18,668,231	\$16,208,760	\$14,188,352	\$14,820,276	
Current Assets	<u>\$21,357,001</u>	<u>\$17,629,538</u>	<u>\$14,661,150</u>	<u>\$10,716,806</u>	<u>\$8,971,310</u>	<u>\$7,398,562</u>	<u>\$5,020,937</u>
Unfunded Accrued Liability	\$1,279,713	\$2,055,240	\$4,007,081	\$5,491,954	\$5,217,042	\$7,421,714	
Funding Ratio	94.35%	89.56%	78.54%	66.12%	63.23%	49.92%	
<b>Financing Requirements</b>							
Covered Payroll	\$20,528,530	\$16,581,199	\$14,582,018	\$11,995,822	\$9,584,075	\$8,455,354	\$6,550,000
Benefits Payable	\$398,798	\$335,798	\$279,834	\$243,366	\$182,000	\$128,838	\$61,176
Normal Cost	11.95% \$2,453,159	11.68% \$1,936,684	12.36% \$1,802,337	12.73% \$1,527,068	14.90% \$1,428,027	18.93% \$1,600,599	\$0
Administrative Expenses	<u>0.15%</u> <u>\$30,793</u>	<u>0.15%</u> <u>\$24,872</u>	<u>0.18%</u> <u>\$26,248</u>	<u>0.14%</u> <u>\$16,794</u>	<u>0.18%</u> <u>\$17,251</u>	<u>\$0</u>	<u>\$0</u>
Normal Cost & Expense	12.10% \$2,483,952	11.83% \$1,961,556	12.54% \$1,828,585	12.87% \$1,543,862	15.08% \$1,445,279	18.93% \$1,600,599	\$0
Normal Cost & Expense	12.10% \$2,483,952	11.83% \$1,961,556	12.54% \$1,828,585	12.87% \$1,543,862	15.08% \$1,445,279	18.93% \$1,600,599	\$0
Amortization	<u>0.36%</u> <u>\$73,903</u>	<u>0.70%</u> <u>\$116,068</u>	<u>1.43%</u> <u>\$208,523</u>	<u>2.34%</u> <u>\$280,702</u>	<u>2.72%</u> <u>\$260,687</u>	<u>4.31%</u> <u>\$364,426</u>	<u>\$0</u>
Total Requirements	12.46% \$2,557,855	12.53% \$2,077,624	13.97% \$2,037,108	15.21% \$1,824,565	17.80% \$1,705,965	23.24% \$1,965,024	\$0
Employee Contributions	6.00% \$1,231,712	6.00% \$994,872	6.00% \$874,921	6.00% \$719,749	6.00% \$575,045	6.00% \$507,321	\$0
Employer Contributions	11.50% \$2,360,781	11.50% \$1,906,838	11.50% \$1,676,932	11.50% \$1,379,520	11.50% \$1,102,169	11.50% \$972,366	\$0
Employer Add'l Cont.	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	\$0
Direct State Funding	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	\$0
Other Govt. Funding	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	0.00% \$0	\$0
Administrative Assessment	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>0.00%</u> <u>\$0</u>	<u>\$0</u>
Total Contributions	17.50% \$3,592,493	17.50% \$2,901,710	17.50% \$2,551,853	17.50% \$2,099,269	17.50% \$1,677,213	17.50% \$1,479,687	\$0
Total Requirements	12.46% \$2,557,855	12.53% \$2,077,624	13.97% \$2,037,108	15.21% \$1,824,565	17.80% \$1,705,965	23.24% \$1,965,024	\$0
Total Contributions	<u>17.50%</u> <u>\$3,592,493</u>	<u>17.50%</u> <u>\$2,901,710</u>	<u>17.50%</u> <u>\$2,551,853</u>	<u>17.50%</u> <u>\$2,099,269</u>	<u>17.50%</u> <u>\$1,677,213</u>	<u>17.50%</u> <u>\$1,479,687</u>	<u>\$0</u>
Deficiency (Surplus)	(5.04%) (\$1,034,638)	(4.97%) (\$824,086)	(3.53%) (\$514,745)	(2.29%) (\$274,704)	0.30% \$28,752	5.74% \$485,337	\$0
Amortization Target Date	1997	1997	1997	1997	1997	1997	--
Actuary	A.S. Hansen	A.S. Hansen	A.S. Hansen	A.S. Hansen	A.S. Hansen	A.S. Hansen	A.A. Weinberg