## EXHIBIT I ACTUARIAL EQUIVALENCE TABLES (Retiree Coverage Only)

### Actuarial Equivalent Value of Reduction in Retiree Contribution for Each Additional Year of Service – Total Less Than 20

Each Additional Year of Service – Total Less Than 20				
Age at Retirement	Retirements Commencing from July 1, 2017 through June 30, 2018	Retirements Commencing from July 1, 2018 through June 30, 2019		
40				
40	\$8,737	\$9,208		
42	8,551	9,012		
42	8,360	8,812		
43	8,165	8,607		
45	7,965	8,397		
_	7,760	8,182		
46	7,550	7,962		
47	7,335	7,736		
48	7,115	7,505		
49	6,890	7,268		
50	6,658	7,025		
51	6,421	6,776		
52	6,179	6,522		
53	5,930	6,260		
54	5,675	5,992		
55	5,413	5,718		
56	5,145	5,436		
57	4,871	5,148		
58	4,590	4,853		
59	4,302	4,551		
60	4,007	4,241		
61	3,707	3,924		
62	3,402	3,601		
63	3,094	3,273		
64	2,783	2,941		
65	2,470	2,606		
66	2,395	2,527		
67	2,319	2,448		
68	2,244	2,368		
69	2,167	2,288		
70	2,090	2,207		
71	2,013	2,126		
72	1,935	2,044		
73	1,857	1,963		
74	1,780	1,881		
75	1,702	1,800		
76	1,625	1,719		
77	1,549	1,638		
78	1,473	1,559		
79	1,399	1,481		
80	1,326	1,405		

### EXHIBIT II CALCULATION EXAMPLES

Examp	ole	1:

Retirement Date:

August 1, 2017

Age at Retirement

Service at retirement, before addition of service

14

Actuarial equivalent cost per additional year of service

\$4,590

#### Example 2:

Retirement date: February 1, 2018

Age at retirement 67

Service at retirement, before addition of 3 years of Service 10

Actuarial equivalent cost of 3 additional years of service \$6,957 (3 X \$2,319)

### Example 3:

Retirement date:

Age at retirement

62

Service at retirement, before addition of Service

7

Actuarial equivalent cost per additional year of service

\$3,601

### Example 4:

Retirement Date:

Age at Retirement

60

Service at Retirement, before addition of Service

22

Actuarial equivalent cost per additional year of service

Not Eligible

### EXHIBIT III ACTUARIAL ASSUMPTIONS

Service Purchase does not apply to the spousal subsidy rate.

**Discount Rate:** 7.75%

#### **Mortality Rates:**

The mortality basis for the actuarial equivalence is a weighted average of the healthy post-retirement mortality rates from the June 30, 2016 GASB 43 valuation:

30% PERA Healthy Male 20% PERA Healthy Female 15% ERB Healthy Male\* 35% ERB Healthy Female\*

Below is a series of sample rates:

Age	Mortality Rate (%)
40	0.1017
45	0.1432
50	0.1921
55	0.2715
60	0.4363
65	0.7877
70	1.3159
75	2.2557
80	4.1047
85	7.5339
90	13.6610

<sup>\*</sup> The ERB mortality tables were changed from a generational projection in the valuation to static projection to 2018 for the service purchase calculation.

### **EXHIBIT III ACTUARIAL ASSUMPTIONS**

#### **Retiree Contribution Increments Used for Actuarial Equivalence**

Reduction in annual retiree contribution for additional year of service, when total years of service does not exceed 20:

### **Under Age 65**

12-month period from July 1, 2017 through June 30, 2018	\$ 395.94
12-month period from July 1, 2018 through June 30, 2019	\$ 426.63
Age 65 and Older	
12-month period from July 1, 2017 through June 30, 2018	\$ 148.47
12-month period from July 1, 2018 through June 30, 2019	\$ 159.98

#### **Assumed Increases in Future Retiree Contributions**

Year Ended June 30,	Assumed Rate of Increase Over Preceding 12-month Period
2020	7.25%
2021	6.75%
2022	6.25%
2023	5.75%
2024	5.25%
2025 and Later	5.00%