Unitil Energy Systems, Inc.
PROJECTED RATE YEAR STEP ADJUSTMENT - REVENUE REQUIREMENT
Projected at December 31, 2010

LINE NO	(1) DESCRIPTION	(2) AMOUNT
1	NET UTILITY PLANT	$ 13,302,676
2	LESS: ACCUMULATED DEFERRED INCOME TAXES	122,581
3	RATE BASE	13,180,096
4	PRE-TAX RATE OF RETURN	12.06%
5	RETURN AND RELATED INCOME TAXES	1,589,520
6	AMORTIZATION OF 2010 WIND STORM COSTS (SYD OVER 10-YRS)	1,050,744
7	ANNUAL BOOK DEPRECIATION @4.06% DEPRECIATION RATE	620,820
8	ANNUAL PROPERTY TAXES @ 1.62% TAX RATE	247,716
8	INCREMENTAL STEP ADJUSTMENT TO REFLECT 2011 PROJECTED PENSION AND PBOP EXPENSE	557,346
10	TOTAL STEP ADJUSTMENT REVENUE REQUIREMENT	$ 4,066,146

Unitil Energy Systems, Inc.
STEP ADJUSTMENT FOR 2010 WIND STORM DAMAGE RECOVERY
To reflect ten year SYD rate recovery of deferred storm costs in connection with 2010 Wind Storm
12 Months Ending December 31, 2010

Deferred Costs for 2010 Wind Storm @ 3/31/10	$ 4,577,281
Total Storm Damage Costs to be recovered	$ 4,577,281
Revenue Requirement for Step Adjustment	$ 1,050,744

Recovery Using Sum of the Year's Digits Methodology

Year	Annual Percentage	Annual Amortization	End of Year Balance	Average Balance	Def. Taxes (@ 40.53%)	Balance to Calculate Return	Return at 8.83%	Total Annual Expense
1	18.18%	$ 832,233	$ 3,745,048	$ 4,161,165	$ (1,686,520)	$ 2,474,645	$ 218,511	$ 1,050,744
2	16.36%	749,010	2,996,038	3,370,543	(1,366,081)	2,004,462	176,994	926,004
3	14.55%	665,786	2,330,252	2,663,145	(1,079,373)	1,583,773	139,847	805,633
4	12.73%	582,563	1,747,689	2,038,971	(826,395)	1,212,576	107,070	689,633
5	10.91%	499,340	1,248,349	1,498,019	(607,147)	890,872	78,664	578,004
6	9.09%	416,116	832,233	1,040,291	(421,630)	618,661	54,628	470,744
7	7.27%	332,893	499,340	665,786	(269,843)	395,943	34,962	367,855
8	5.45%	249,670	249,670	374,505	(151,787)	222,718	19,666	269,336
9	1	4,077,941	(3,828,271)	(1,789,301)	725,204	(1,064,097)	(93,960)	3,983,981
10	1.82%	83,223	(3,911,495)	(3,869,883)	1,568,464	(2,301,419)	(203,215)	(119,992)
55		$ 8,488,776					$ 533,167	$ 9,021,943

Unitil Energy Systems, Inc.
Incremental Step Adjustment to Reflect 2011 Projected Pension and PBOP Expense

Line No.		PENSION	PBOP	TOTAL
1	2011 Projected Expense	$ 1,668,337	$ 802,606	$ 2,470,943
2	2010 Proforma Expense	1,198,068	715,529	1,913,597
3	Incremental Step Adjustment	$ 470,269	$ 87,077	$ 557,346

Unitil Corporation Retirement Plan
Preliminary FAS 87 Expense by Division for Fiscal Year Ending 12/31/2011

Net Periodic Benefit Cost	UES	Fitchburg Non-Union	Fitchburg Union	USC	Portland Non-Union	Portland Union	Portsmouth Non-Union	Portsmouth Union	Granite Non Union	Granite Union	Total
Service cost	455,036	224,326	320,716	1,832,703	60,823	128,383	85,559	150,096	24,756	17,449	3,299,847
Interest cost	1,318,071	437,018	702,738	1,761,655	13,933	117,820	9,790	128,255	18,310	11,515	4,519,105
Expected return on plan assets	(1,234,197)	(408,636)	(658,982)	(1,669,290)	(13,259)	(108,589)	(9,355)	(122,352)	(17,185)	(10,714)	(4,252,559)
Amortization of transition (asset) obligation	-	-	-	-	-	-	-	-	-	-	-
Amortization of prior service cost	(10,663)	39,641	58,820	8,394	-	69,520	-	80,341	-	7,287	253,340
Amortization of net (gain) loss	1,508,110	478,911	761,018	1,002,065	2,373	19,298	(2,840)	10,360	12,437	767	3,792,499
Net periodic benefit cost	**2,036,357**	**771,260**	**1,184,310**	**2,935,527**	**63,870**	**226,432**	**83,154**	**246,700**	**38,318**	**26,304**	**7,612,232**

Assumptions	
Discount rate	4.75%
Expected return on plan assets	8.50%
Rate of compensation increase	3.50%
Contributions	
Retirement Plan - 2010	3,604,000
Retirement Plan - 2011	5,706,000

Unitil Corporation Postretirement Medical and Life Insurance Benefits
Preliminary FAS 106 Expense by Division for Fiscal Year Ending 12/31/2011

Net Periodic Benefit Cost	UES	Fitchburg Non-Union	Fitchburg Union	USC	Portland Non-Union	Portland Union	Portsmouth Non-Union	Portsmouth Union	Granite Non Union	Granite Union	Total
Service cost	159,303	159,148	264,741	1,236,037	46,545	147,386	28,296	133,641	-	20,766	2,195,863
Interest cost	432,837	226,189	502,733	705,970	49,508	123,543	46,153	139,132	11,092	12,732	2,249,889
Expected return on plan assets	(163,421)	(38,231)	(40,020)	(500,156)	(8,362)	(24,148)	(8,240)	(21,697)	(1,953)	(12,495)	(818,723)
Amortization of transition (asset) obligation	9,318	2,375	4,783	4,910	-	-	-	-	-	-	21,386
Amortization of prior service cost	488,810	149,701	369,991	101,443	76,497	160,156	103,202	242,001	34,217	25,537	1,751,555
Amortization of net (gain) loss	(23,434)	9,911	15,469	47,166	4,380	13,047	455	5,586	(559)	239	72,260
Net periodic benefit cost	903,413	509,093	1,117,697	1,595,370	168,568	419,984	169,866	498,663	42,797	46,779	5,472,230

Assumptions

Discount rate	4.75%
Expected return on plan assets	8.50%
Rate of compensation increase	3.50%
Medical Trend Rates	
2011	7.00%
2012	6.50%
2013	6.00%
2014	5.50%
2015	5.00%
2016	4.50%
2017+	4.00%
Contributions	
Postretirement Medical - 2010	3,482,000
Postretirement Medical - 2011	3,482,000

Unitil Corporation Gross Pension Expense
2009 - 2011
As Provided by Unitil's Actuary (Diversified Investment Advisors)

Fiscal Year Ending 12/31/2009

2009	UES	Fitchburg Non-Union	Fitchburg Union	USC	Portland Non-Union	Portland Union	Portsmouth Non-Union	Portsmouth Union	Granite Non-Union	Granite Union	Total
Net Periodic Benefit Cost											
Service cost	$ 298,853	$ 170,874	$ 250,863	$ 1,214,083	$ 52,967	$ 82,132	$ 74,826	$ 112,818	$ 11,484	$ 13,367	$ 2,282,287
Interest cost	1,267,928	448,905	711,819	1,596,874	257	116,896	361	136,551	52	12,578	4,294,221
Expected return on plan assets	(1,305,737)	(461,683)	(733,413)	(1,656,165)	(267)	(119,984)	(373)	(140,860)	(53)	(13,051)	(4,431,586)
Amortization of prior service cost	(11,323)	45,640	58,820	12,245	-	69,520	-	80,341	-	7,287	263,530
Amortization of net (gain) loss	709,853	189,052	296,126	493,252	(98)	(95)	(140)	(357)	(20)	(53)	1,597,520
Curtailment (gain)/loss	(2,356)	16,469	-	17,466	-	-	-	-	-	-	31,599
Net periodic benefit cost	$ 957,256	$ 410,257	$ 584,215	$ 1,589,755	$ 52,859	$ 148,469	$ 74,674	$ 188,493	$ 11,463	$ 20,128	$ 4,037,571

Fiscal Year Ending 12/31/2010

2010	UES	Fitchburg Non-Union	Fitchburg Union	USC	Portland Non-Union	Portland Union	Portsmouth Non-Union	Portsmouth Union	Granite Non-Union	Granite Union	Total
Net Periodic Benefit Cost											
Service cost	$ 351,792	$ 187,308	$ 255,754	$ 1,434,564	$ 60,636	$ 100,957	$ 66,655	$ 123,797	$ 13,163	$ 13,845	$ 2,608,471
Interest cost	1,360,507	452,609	692,506	1,682,782	5,764	110,949	5,940	134,766	1,024	10,501	4,457,438
Expected return on plan assets	(1,272,565)	(422,592)	(647,830)	(1,586,507)	(5,474)	(103,185)	(5,636)	(126,432)	(871)	(9,935)	(4,161,137)
Amortization of prior service cost	(10,663)	39,641	58,820	8,394	-	69,520	-	80,341	-	7,287	253,340
Amortization of net (gain) loss	1,050,416	335,320	512,831	527,704	(959)	(7,694)	(2,240)	(8,032)	(395)	(1,703)	2,405,359
Curtailment (gain)/loss	-	-	-	-	-	-	-	-	-	-	-
Net periodic benefit cost	$ 1,479,469	$ 592,376	$ 872,081	$ 2,066,937	$ 59,976	$ 170,547	$ 64,719	$ 204,450	$ 12,921	$ 19,995	$ 5,543,471

Fiscal Year Ending 12/31/2011 - Preliminary

2011 Preliminary	UES	Fitchburg Non-Union	Fitchburg Union	USC	Portland Non-Union	Portland Union	Portsmouth Non-Union	Portsmouth Union	Granite Non-Union	Granite Union	Total
Net Periodic Benefit Cost											
Service cost	$ 455,036	$ 224,326	$ 320,716	$ 1,832,703	$ 60,823	$ 128,383	$ 89,559	$ 150,096	$ 24,756	$ 17,449	$ 3,299,847
Interest cost	1,318,071	437,018	702,736	1,761,655	13,933	117,620	5,790	128,255	18,310	11,515	4,519,105
Expected return on plan assets	(1,234,197)	(408,636)	(658,982)	(1,669,290)	(13,259)	(108,589)	(9,355)	(122,352)	(17,185)	(10,714)	(4,252,559)
Amortization of prior service cost	(10,663)	39,641	58,820	8,394	-	69,520	-	80,341	-	7,287	253,340
Amortization of net (gain) loss	1,508,110	478,911	761,018	1,002,065	2,373	19,298	(2,840)	10,360	12,437	767	3,792,499
Curtailment (gain)/loss	-	-	-	-	-	-	-	-	-	-	-
Net periodic benefit cost	$ 2,036,357	$ 771,260	$ 1,184,310	$ 2,935,527	$ 63,870	$ 226,432	$ 83,154	$ 246,700	$ 38,318	$ 26,304	$ 7,612,232

Unitil Corporation Gross PBOP Expense
2009 - 2011
As Provided by Unitil's Actuary (Diversified Investment Advisors)

Exhibit D
Unitil Energy Systems, Inc.
Docket No. DE 10-055
Supplemental Schedule MHC-14

Fiscal Year Ending 12/31/2009

2009	UES	Fitchburg Non-Union	Fitchburg Union	USC	Portland Non-Union	Portland Union	Portsmouth Non-Union	Portsmouth Union	Granite Non-Union	Granite Union	Total
Net Periodic Benefit Cost											
Service cost	$ 97,797	$ 185,921	$ 216,042	$ 943,480	$ 19,744	$ 430	$ 39,574	$ 13,558	$ -	$ 43	$ 1,416,589
Interest cost	508,770	277,693	555,181	782,717	41,381	790	53,668	31,401	17,380	131	2,269,112
Expected return on plan assets	(120,453)	(27,289)	(13,264)	(277,835)	(351)	-	(712)	-	-	-	(439,904)
Amortization of transition (asset) obligation	9,318	2,375	4,783	4,910	-	-	-	-	-	-	21,386
Amortization of prior service cost	519,696	175,252	369,991	232,697	97,322	1,765	126,432	69,076	41,308	293	1,633,822
Amortization of net (gain) loss	-	-	-	-	-	-	-	-	-	-	-
Net periodic benefit cost	$ 1,015,128	$ 613,952	$ 1,132,733	$ 1,596,969	$ 158,096	$ 2,975	$ 218,962	$ 114,036	$ 58,688	$ 467	$ 4,901,605

Fiscal Year Ending 12/31/2010

2010	UES	Fitchburg Non-Union	Fitchburg Union	USC	Portland Non-Union	Portland Union	Portsmouth Non-Union	Portsmouth Union	Granite Non-Union	Granite Union	Total
Net Periodic Benefit Cost											
Service cost	$ 120,096	$ 126,251	$ 288,390	$ 830,798	$ 16,517	$ 114,739	$ 20,739	$ 16,296	$ -	$ 14,472	$ 1,466,298
Interest cost	442,624	228,190	512,651	627,015	31,908	78,652	37,809	33,151	12,986	12,531	2,015,717
Expected return on plan assets	(142,171)	(37,450)	6,411	(413,460)	(4,233)	-	(4,224)	531	(4,106)	-	(598,702)
Amortization of transition (asset) obligation	9,318	2,375	4,783	4,910	-	-	-	-	-	-	21,386
Amortization of prior service cost	488,810	149,701	369,991	101,443	76,497	160,156	103,202	69,076	34,217	25,537	1,578,630
Amortization of net (gain) loss	-	-	-	-	-	-	-	-	-	-	-
Net periodic benefit cost	$ 918,677	$ 466,067	$ 1,102,426	$ 1,150,706	$ 120,689	$ 353,547	$ 157,526	$ 118,054	$ 43,097	$ 52,540	$ 4,483,329

Fiscal Year Ending 12/31/2011 - Preliminary

2011 Preliminary	UES	Fitchburg Non-Union	Fitchburg Union	USC	Portland Non-Union	Portland Union	Portsmouth Non-Union	Portsmouth Union	Granite Non-Union	Granite Union	Total
Net Periodic Benefit Cost											
Service cost	$ 159,303	$ 159,148	$ 264,741	$ 1,238,037	$ 46,545	$ 147,386	$ 28,296	$ 133,641	$ -	$ 20,766	$ 2,195,863
Interest cost	432,837	226,169	502,733	795,970	40,508	123,543	46,153	139,132	11,092	12,732	2,249,869
Expected return on plan assets	(163,421)	(38,231)	(40,020)	(500,166)	(8,362)	(24,148)	(8,240)	(21,697)	(1,953)	(12,495)	(818,723)
Amortization of transition (asset) obligation	9,318	2,375	4,783	4,910	-	-	-	-	-	-	21,386
Amortization of prior service cost	488,810	149,701	369,991	101,443	76,497	160,156	103,202	242,001	34,217	25,537	1,751,555
Amortization of net (gain) loss	(23,434)	9,911	15,469	47,166	4,380	13,647	455	5,566	(559)	239	72,260
Net periodic benefit cost	$ 903,413	$ 509,093	$ 1,117,697	$ 1,595,370	$ 168,568	$ 419,884	$ 169,666	$ 498,663	$ 42,797	$ 48,779	$ 5,472,230

Pension Discount Rate

The pension discount rate for 2011 is 4.75% based upon the following analysis:

To determine an appropriate pension discount rate for 2011, several factors were considered, including recent high-quality bond yields, yield curve and cash flow analysis, and market information compiled by SEI, Unitil's benefit plan consultant. First, bond yields from three sources were reviewed: Merrill Lynch AA 15+ Corporate yields; Moody's Long-Term AA Corporate Bond yields; and Moody's AA Utility Bond Yield.

	Dec 2009	Aug 2010	Change
Merrill Lynch AA 15+ Corporate Yields[1]	5.89%	5.14%	(.75%)
Moody's Long-Term AA Corporate Yields[2]	5.44%	4.72%	(.72%)
Moody's AA Utility Bond Yields[2]	5.52%	4.75%	(.77%)
Average			(.75%)

This data on high quality corporate bond yields indicates that current August 2010 yields range from 4.72% to 5.14% with an average decrease of 75 basis points from the prior year end.

SEI recommends that Plan sponsors consider selecting the discount rate using a method that matches plan cash flows to the Citigroup pension yield curve rather than using an index benchmark. Therefore, we have also examined the Citigroup pension yield curve, applied to Unitil's plan obligations. Using this methodology, with yield curve data as of August 2010, an effective average discount rate of 4.84% is derived.

Based on this analysis and review of both long-term bond yields and the Citigroup pension yield curve, the recommended Discount Rate for the 2011 budgeting is 4.75%, a decrease of 100 basis points from the 2010 rate of 5.75%.

[1] Source: http://www.mlindex.ml.com/GISPublic/bin/MLIndex.asp, Index Snapshot.
[2] Source: http://www.moodys.com/cust/default.asp, Credit Trends.