FILED APR 27, 2015 DOCUMENT NO. 02319-15 FPSC - COMMISSION CLERK

AUSLEY MCMULLEN

ATTORNEYS AND COUNSELORS AT LAW

P.O. BOX 391 (ZIP 32302)

TALLAHASSEE, FLORIDA 32301

(850) 224-9115 FAX (850) 222-7560

April 27, 2015

HAND DELIVERED

Ms. Carlotta S. Stauffer Commission Clerk Florida Public Service Commission 2540 Shumard Oak Boulevard Tallahassee, FL 32399-0850

Re: Petition for Approval of Demand-Side Management Plan of Tampa Electric

Company; FPSC Docket No. 150081-EG

Dear Ms. Stauffer:

TEL

Enclosed for filing in the above docket are the original and five copies of Tampa Electric Company's responses to the Florida Public Service Commission Staff's First Data Request (Nos. 1-43), propounded and served by electronic mail on April 6, 2015.

Also enclosed is a CD to supplement Tampa Electric's responses in Excel format.

Please acknowledge receipt and filing of the above by stamping the duplicate copy of this letter and returning same to this writer.

Thank you for your assistance in connection with this matter.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 1 PAGE 1 OF 3 FILED: APRIL 27, 2015

1. Please provide the estimated costs of each program's incentives, administrative & equipment costs, and total costs for the ten-year goals period (nominal and net present value). Also, please provide the percentage of total costs that are used for incentives by program. As part of this response, please provide an electronic version of the table below in Excel format with your response.

Program Costs (Nominal)									
Program Name	Incentives	Administrative & Equipment	Total	Percent Incentives					
[Residential]									
Residential Subtotal									
[Comm/Industrial]									
Comm/Ind. Subtotal									
Common Expenses									
Total									

Program Costs (NPV)										
Program Name	Incentives	Administrative & Equipment	Total	Percent Incentives						
[Residential]			٠							
Residential Subtotal										
[Comm/Industrial]										
Comm/Ind. Subtotal										
Common Expenses										
Total										

A. Tampa Electric's estimated nominal and net present value ("NPV") costs for each proposed Demand Side Management ("DSM") Program for the ten-year goals period is included in the tables below. The tables include incentives, administrative & equipment costs, total costs and the percentage of total costs that are used for incentives for the ten-year goals period. The electronic version of this table is available in the enclosed CD.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 1 PAGE 2 OF 3

Program Co	sts (Nominal)	· · · · · · · · · · · · · · · · · · ·		
	Incentives	Administrative/ Equipment	Total	Percent Incentives
Residential Walk-Through Audit (Free)	\$0	\$17,156,761	\$17,156,761	0%
Residential Customer Assisted Energy Audit	\$0	\$199,820	\$199,820	0%
Residential Computer Assisted Energy Audit (RCS)	\$0	\$3,164	\$3,164	0%
Residential Ceiling Insulation	\$3,523,000	\$743,661	\$4,266,661	83%
Residential Duct Repair	\$990,000	\$190,982	\$1,180,982	84%
Residential Electronically Commutated Motor (ECM)	\$35,650	\$3,521	\$39,171	91%
Energy Education, Awareness and Agency Outreach	\$0	\$211,976	\$211,976	0%
Energy Star for New Homes	\$1,955,000	\$56,631	\$2,011,631	97%
Residential Heating and Cooling	\$1,127,250	\$201,529	\$1,328,779	85%
Neighborhood Weatherization	\$0	\$27,442,793	\$27,442,793	0%
Energy Planner-Residential Price Responsive Load Management	\$0	\$11,797,998	\$11,797,998	0%
Energy Planner - Legacy Customers	\$0	\$43,762,728	\$43,762,728	0%
Residential Wall Insulation	\$43,400	\$15,852	\$59,252	73%
Residential Window Replacement	\$1,630,000	\$249,775	\$1,879,775	87%
Residential Solar Photovoltaic	\$1,056,000	\$185,618	\$1,879,773	85%
Residential Solar Water Heaters (Low Income Water Heaters)	\$20,000	\$14,400	\$34,400	58%
Primetime Legacy Customers	\$2,900,222	\$5,999,778	\$8,900,000	33%
Residential Subtota	 	·····		
	\$13,280,322	\$2,632,954	\$121,517,509	11%
Commercial/Industrial Audit (Free)			\$2,632,954	0%
Comprehensive Commercial/Industrial Audit (Paid)	\$0	\$35,790	\$35,790	0%
Commercial Ceiling Insulation	\$337,500	\$113,231	\$450,731	75%
Commercial Chiller	\$700,800	\$11,101	\$711,901	98%
Cogeneration	\$0	\$2,109,210	\$2,109,210	0%
Conservation Value	\$740,560	\$44,404	\$784,964	94%
Cool Roof	\$1,550,000	\$126,553	\$1,676,553	92%
Commercial Cooling	\$128,000	\$49,955	\$177,955	72%
Demand Response	\$0	\$437,440	\$437,440	0%
Demand Response - Legacy Customers	\$0	\$39,850,776	\$39,850,776	0%
Commercial Duct Repair	\$337,500	\$248,413	\$585,913	58%
Commercial Electronically Commutated Motors (ECM)	\$10,000	\$7,660	\$17,660	57%
Industrial Load Management (GSLM 2&3)	\$187,843,885	\$319,881	\$188,163,765	100%
Lighting Conditioned Space	\$850,340	\$57,291	\$907,631	94%
Lighting Non-Conditioned Space	\$297,825	\$12,725	\$310,550	96%
Lighting Occupancy Sensors	\$189,000	\$29,806	\$218,806	86%
Commercial Load Management (GSLM 1)	\$40,410	\$20,493	\$60,903	66%
Commercial Load Management (GSLM 1) - Legacy Customers	\$80,881	\$7,129	\$88,010	92%
Refrigeration Anti-Condensate Control	\$21,600	\$2,305	\$23,905	90%
Standby Generator	\$299,950	\$74,266	\$374,216	80%
Standby Generator - Legacy Customers	\$31,483,443	\$379,165	\$31,862,608	99%
Thermal Energy Storage	\$1,518,148	\$92,687	\$1,610,835	94%
Commercial Wall Insulation	\$2,420	\$1,954	\$4,374	55%
Commercial Water Heating	\$5,000	\$2,032	\$7,032	71%
Conservation Research and Development ("R&D")	\$0	\$1,000,000	\$1,000,000	0%
Commercial Solar Photovoltaic	\$100,000	\$5,000	\$105,000	95%
Solar for Schools	\$0	\$150,000	\$150,000	0%
Commercial/Industrial Subtota	+		\$274,359,483	83%
Common Expenses	\$0	\$19,426,937	\$19,426,937	0%
Tota	+*	\$175,486,145	\$415,303,929	58%

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 1 PAGE 3 OF 3

es Administrative/ Total Equipment	Percent Incentives
\$14,946,343 \$14,946,343	0%
\$174,076 \$174,076	0%
\$2,756 \$2,756	0%
\$640,601 \$3,688,567	83%
\$168,438 \$1,045,664	84%
\$2,992 \$33,384	91%
\$184,665 \$184,665	0%
\$48,899 \$1,743,870	97%
\$177,832 \$1,176,721	85%
\$23,770,118 \$23,770,118	0%
\$10,237,152 \$10,237,152	0%
\$38,124,489 \$38,124,489	0%
\$13,810 \$51,794	73%
\$217,595 \$1,644,181	87%
\$181,091 \$1,211,334	85%
\$14,049 \$33,561	58%
\$5,779,837 \$8,599,643	33%
3,579 \$94,684,742 \$106,668,320	11%
\$2,287,375 \$2,287,375	0%
\$31,179 \$31,179	0%
\$98,643 \$394,025	75%
\$9,671 \$623,016	98%
\$1,837,467 \$1,837,467	0%
\$38,684 \$686,826	94%
\$110,248 \$1,466,818	92%
\$43,519 \$155,545	72%
\$382,794 \$382,794	0%
\$34,716,539 \$34,716,539	0%
\$217,892 \$515,297	58%
\$6,673 \$15,425	57%
24 \$278,668 \$163,921,392	100%
\$49,270 \$783,696	94%
\$10,862 \$266,164	96%
\$25,966 \$191,380	86%
\$17,852 \$53,220	66%
\$6,210 \$76,671	92%
\$1,954 \$20,330	90%
\$64,698 \$327,216	80%
4 \$330,315 \$27,757,539	99%
\$79,174 \$1,380,532	94%
\$1,702 \$3,820	55%
\$1,702 \$3,820	71%
\$929,166 \$929,166	0%
\$4,878 \$102,439	95%
\$146,341 \$146,341	0%
	83%
	0%
	58%
\$16,924,037 ,426 \$153,338,290	\$16,924,037 \$362,670,716

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 2 PAGE 1 OF 3

FILED: APRIL 27, 2015

2. Please provide the estimated costs of each program's administrative & equipment costs, costs for the ten-year goals period (nominal and net present value), broken into the categories detailed in the table below. As part of this response, please provide an electronic version of the table below in Excel format with your response.

	Program Administrative & Equipment Costs (Nominal)										
Program Name	Depreciation & Return	Payroll & Benefits	Materials & Supplies	Outside Services	Advertising	Vehicles & Travel	Other	Revenues (if any)	Total		
[Residential]											
Residential Total											
[Comm/Ind.]											
Comm/Ind. Total								-			
Common Expenses											
Total											

Program Administrative & Equipment Costs (NPV)										
Program Name	Depreciation & Return	Payroll & Benefits	Materials & Supplies	Outside Services	Advertising	Vehicles & Travel	Other	Revenues (if any)	Total	
[Residential]										
Residential Total										
[Comm/Ind.]										
Comm/Ind. Total										
Common Expenses										
Total										

A. Tampa Electric's estimated nominal and NPV costs for each proposed DSM Program's administrative & equipment costs for the ten-year goals period is included in the tables below. The tables include depreciation and return, payroll and benefits, materials and supplies, outside services, advertising, vehicles and travel, other revenues and the total. The electronic version of this table is available in the enclosed CD.

	Depreciation & Return	Payroll & Benefits	Materials & Supplies	Costs (Nomina Outside Services	Advertising	Vehicles & Travel	Other	Revenues (If any)	Total
Residential Walk-Through Audit (Free)	\$0	\$7,720,542	\$0	\$1,709,570	\$6,433,091	\$865,886	\$427,670	\$0	\$17,156,761
Residential Customer Assisted Energy Audit	\$0	\$199,820	\$0	\$0	\$0	\$0	\$0	\$0	\$199,820
Residential Computer Assisted Energy Audit (RCS)	\$0	\$3,219	\$0	\$0	\$0	\$95	\$0	-\$150	\$3,164
Residential Ceiling Insulation	\$0	\$678,661	\$30,000	\$0	\$0	\$15,000	\$20,000	\$0	\$743,661
Residential Duct Repair	\$0	\$139,417	\$3,820	\$0	\$0	\$3,820	\$43,926	\$0	\$190,982
Residential Electronically Commutated Motor (ECM)	\$0	\$3,521		\$0	\$0	\$0	\$0	\$0	\$3,521
Energy Education, Awareness and Agency Outreach	\$0	\$131,425	\$21,198	\$57,233	\$0	\$2,120	\$0	\$0	\$211,976
Energy Star for New Homes	\$0	\$53,799	··· · · · · · · · · · · · · · · · · ·	· ,	·	\$0	\$2,832	\$0	\$56,631
Residential Heating and Cooling	\$0	\$192,460	\$0	\$0	\$0	\$1,008	\$8,061	\$0	\$201,529
Neighborhood Weatherization	\$0	\$4,253,633	\$466,527	·	\$0	\$219,542	\$0	\$0	\$27,442,793
Energy Planner-Residential Price Responsive Load Management	·					. ,	·	\$0	\$11,797,998
Energy Planner - Legacy Customers		\$9,190,173	· /			· · · · · · · ·	\$4,376,273	\$0	\$43,762,728
	\$0	\$15,789	· · ·		\$0	\$63	\$0	\$0	\$15,852
Residential Wall Insulation	\$0 \$0	\$15,789	\$500		\$0 \$0	·	\$0	\$0	\$249,775
Residential Window Replacement	\$0 \$0	\$247,027	\$00		\$0		·	\$0	\$185,618
Residential Solar Photovoltaic	T -			· · · · · · · · · · · · · · · · · · ·	\$0	' -/-	\$0	\$0	\$14,400
Residential Solar Water Heaters (Low Income Water Heaters)		\$14,256	\$0	7 -	\$0 \$0	\$15,599	\$59.998	\$0	\$5,999,778
Primetime Legacy Customers	\$0	\$1,033,162	\$65,398	\$4,825,621	T	<u> </u>		Ş∪ - \$150	
Residential Subtotal	\$19,776,661	\$26,482,310	\$2,909,348		\$15,035,678	\$2,885,603	\$4,942,265		·
Commercial/industrial Audit (Free)	\$0	\$2,317,000	\$157,977	·	\$0	\$105,318	\$52,659	\$0	\$2,632,954
Comprehensive Commercial/Industrial Audit (Paid)	\$0	\$27,669	\$7,648	7	\$0	\$795	\$0	-\$322	\$35,790
Commercial Ceiling Insulation	\$0	\$109,766	\$1,902	\$0	\$0	\$1,563	\$0	\$0	\$113,231
Commercial Chiller	\$0	\$9,622	\$1,479	\$0	\$0	\$0	\$0	\$0	\$11,101
Cogeneration	\$0	\$2,104,570	\$0	T -	\$0	\$4,640	\$0	\$0	\$2,109,210
Conservation Value	\$0	\$35,559	\$8,686	\$0	\$0	\$160	\$0	\$0	\$44,404
Cool Roof	\$0	\$122,794	\$2,531	\$0	\$0	\$1,228	\$0	\$0	\$126,553
Commercial Cooling	\$0	\$48,876	\$814	\$0	\$0	\$265	\$0	\$0	\$49,955
Demand Response	\$0	\$7,331	\$6,554	\$423,530	\$0	\$25	\$0	\$0	\$437,440
Demand Response - Legacy Customers	\$0	\$244,811	\$0	\$39,531,970	\$0	\$73,995	\$0	\$0	\$39,850,776
Commercial Duct Repair	\$0	\$245,656	\$2,062	\$0	\$0	\$696	\$0	\$0	\$248,413
Commercial Electronically Commutated Motors (ECM)	\$0	\$6,462	\$1,198	\$0	\$0	\$0	\$0	\$0	\$7,660
Industrial Load Management (GSLM 2&3)	\$163,075	\$154,886	\$0	\$0	\$0	\$1,919	\$0	\$0	\$319,881
Lighting Conditioned Space	\$0	\$56,100	\$80	\$0	\$0	\$1,111	\$0	\$0	\$57,291
Lighting Non-Conditioned Space	ŚO	\$12,460	\$0	\$0	\$0	\$265	\$0	\$0	\$12,725
Lighting Occupancy Sensors	\$0	\$25,109	\$4,480	\$0	\$0	\$218	\$0	\$0	\$29,806
Commercial Load Management (GSLM 1)	\$0	\$16,317	\$982	\$3,193	\$0	\$0	\$0	\$0	\$20,493
Commercial Load Management (GSLM 1) - Legacy Customers	\$0	\$6,476	\$152	\$501	\$0	\$0	\$0	\$0	\$7,129
Refrigeration Anti-Condensate Control	\$0	\$2,305	\$0	\$0	\$0	\$0	\$0	\$0	\$2,305
Standby Generator	\$0	\$60,555	\$8,827	\$0	\$2,120	\$329	\$2,435	ŚO	\$74,266
Standby Generator - Legacy Customers	\$0	\$328,092	\$37,803	\$0	\$11,489	\$1.782	\$0	\$0	\$379,165
Thermal Energy Storage	\$0	\$74,224	\$16,999	\$0	\$0	\$1,464	\$0	\$0	\$92,687
Commercial Wall Insulation	\$0	\$1,870	\$44	\$0	\$0	\$40	\$0	\$0	\$1,954
	\$0	\$1,560	\$471	\$0	\$0	\$0	\$0	\$0	\$2,032
Commercial Water Heating	\$0	\$0	\$0	\$0	\$0	\$0	\$1,000,000	\$0	\$1,000,000
Conservation Research and Development ("R&D")	·	·	\$0		\$0 \$0	\$50	\$1,000,000	\$0	\$5,000
Commercial Solar Photovoltaic	\$0	\$3,000	<u> </u>	\$1,950	\$0	\$1,500	\$0	\$0	\$150,000
Solar for Schools	\$0	\$0	\$0	\$148,500	7	 	·	<u> </u>	
Commercial/Industrial Subtotal	\$163,075		\$260,689		\$13,609	\$197,362		-\$322	
Common Expenses	\$0	\$16,062,009	\$238,951	\$2,317,816	\$0	\$34,968	\$773,192	\$0	\$19,426,937

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 2 PAGE 2 OF 3 FILED: APRIL 27, 2015

	Prog	ram Administra	tive & Equipme	nt Costs (NPV)					
	Depreciation	Payroll &	Materials &	Outside		Vehicles &		Revenues (If	75-4-1
	& Return	Benefits	Supplies	Services	Advertising	Travel	Other	any)	Total
Residential Walk-Through Audit (Free)	\$0	\$6,725,854	\$0	\$1,489,315	\$5,604,274	\$754,329	\$372,571	\$0	\$14,946,343
Residential Customer Assisted Energy Audit	\$0	\$174,076	\$0	\$0	\$0	\$0	\$0	\$0	\$174,076
Residential Computer Assisted Energy Audit (RCS)	\$0	\$2,805	\$0	\$0	\$0	\$83	\$0	-\$131	\$2,756
Residential Ceiling Insulation	\$0	\$583,712	\$26,256	\$0	\$0	\$13,128	\$17,504	\$0	\$640,601
	\$0	\$122,960	\$3,369	\$0	\$0	\$3,369	\$38,741	\$0	\$168,438
Residential Electronically Commutated Motor (ECM)	\$0	\$2,992	\$0	\$0	\$0	\$0	\$0	\$0	\$2,992
Energy Education, Awareness and Agency Outreach	\$0		\$18,467	\$49,860	\$0	\$1,847	\$0	\$0	\$184,665
Energy Star for New Homes	\$0	\$46,454	\$0	\$0	\$0	\$0	\$2,445	\$0	\$48,899
Residential Heating and Cooling	\$0	\$169,829	\$0	\$0	\$0	\$889	\$7,113	\$0	\$177,832
Neighborhood Weatherization	\$0	\$3,684,368	\$404,092	\$19,491,497	\$0	\$190,161	\$0	\$0	\$23,770,118
Energy Planner-Residential Price Responsive Load Managemen	\$2,345,158	\$2,159,479	\$874,012	\$1,357,605	\$3,491,187	\$6,676	\$3,035	\$0	\$10,237,152
Energy Planner - Legacy Customers		\$8,006,143	\$1,143,735	\$4,765,561	\$4,003,071	\$1,524,980	\$3,812,449	\$0	\$38,124,489
Residential Wall Insulation	\$0	\$13,755	\$0	\$0	\$0	\$55	\$0	\$0	\$13,810
Residential Window Replacement	\$0	\$215,201	\$435	\$0	\$0	\$1,958	\$0	\$0	\$217,595
Residential Solar Photovoltaic	\$0	\$108,654	\$0	\$70,625			\$0	\$0	\$181,091
Residential Solar Water Heaters (Low Income Water Heaters)	\$0		\$0	\$0	\$0	\$140	\$0	\$0	\$14,049
Primetime Legacy Customers	\$0	\$995,288	\$63,000	\$4,648,723	\$0	\$15,028	\$57,798	\$0	\$5,779,837
Residential Subtotal	\$17,213,708	\$23,139,971	\$2,533,366	\$31,873,186	\$13,098,533	\$2,514,453	\$4,311,655	-\$131	\$94,684,742
Commercial/Industrial Audit (Free)	\$0	\$2,012,890	\$137,243	\$0	\$0	\$91,495	\$45,748	\$0	\$2,287,375
Comprehensive Commercial/Industrial Audit (Paid)	\$0	\$24,104	\$6,663	\$0	\$0	\$692	\$0	-\$281	\$31,179
Commercial Ceiling Insulation	\$0	\$95,624	\$1,657	\$0	\$0	\$1,361	\$0	\$0	\$98,643
Commercial Chiller	\$0	\$8,383	\$1,288	\$0	\$0	\$0	\$0	\$0	\$9,671
Cogeneration	\$0	\$1,833,424	\$0	\$0	\$0	\$4,042	\$0	\$0	\$1,837,467
Conservation Value	\$0	\$30,978	\$7,566	\$0	\$0	\$139	\$0	\$0	\$38,684
Cool Roof	\$0	\$106,974	\$2,205	\$0	\$0	\$1,069	\$0	\$0	\$110,248
Commercial Cooling	\$0	\$42,579	\$709	\$0	\$0	\$231	\$0	\$0	\$43,519
Demand Response	\$0	\$6,387	\$5,709	\$370,676	\$0	\$22	\$0	\$0	\$382,794
Demand Response - Legacy Customers	\$0	\$213,271	\$0	\$34,438,807	\$0	\$64,462	\$0	\$0	\$34,716,539
Commercial Duct Repair	\$0	\$215,473	\$1,809	\$0	\$0	\$610	\$0	\$0	\$217,892
Commercial Electronically Commutated Motors (ECM)	\$0	\$5,629	\$1,044	\$0	\$0	\$0	\$0	\$0	\$6,673
Industrial Load Management (GSLM 2&3)	\$142,065	\$134,931	\$0	\$0	\$0	\$1,672	\$0	\$0	\$278,668
Lighting Conditioned Space	\$0	\$48,246	\$69	\$0		\$956	\$0	\$0	\$49,270
Lighting Non-Conditioned Space	\$0	\$10,636	\$0	\$0	\$0	\$226	\$0	\$0	\$10,862
Lighting Occupancy Sensors	\$0	\$21,874	\$3,903	\$0		\$190	\$0	\$0	\$25,966
Commercial Load Management (GSLM 1)	\$0	\$14,215	\$856	\$2,782	\$0	\$0	\$0	\$0	\$17,852
Commercial Load Management (GSLM 1) - Legacy Customers	\$0	\$5,641	\$132	\$437	\$0	\$0	\$0	\$0	\$6,210
Refrigeration Anti-Condensate Control	\$0	\$1,954	\$0	\$0	\$0	\$0	\$0	\$0	\$1,954
Standby Generator	\$0	\$52,753	\$7,690	\$0	\$1,847	\$287	\$2,122	\$0	\$64,698
Standby Generator - Legacy Customers	\$0	\$285,821	\$32,932	\$0	\$10,009	\$1,552	\$0	\$0	\$330,315
Thermal Energy Storage	\$0	\$63,403	\$14,521	\$0	\$0	\$1,251	\$0	\$0	\$79,174
Commercial Wall Insulation	\$0	\$1,629	\$38	\$0	\$0	\$35	\$0	\$0	\$1,702
Commercial Water Heating	\$0	\$1,359	\$411	\$0	\$0	\$0	\$0	\$0	\$1,770
Conservation Research and Development ("R&D")	\$0	\$0	\$0	\$0	\$0	\$0	\$929,166	\$0	\$929,166
Commercial Solar Photovoltaic	\$0	\$2,927	\$0	\$1,902	\$0	\$49	\$0	\$0	\$4,878
Solar for Schools	\$0	\$0	\$0	\$144,878	\$0	\$1,463	\$0	\$0	\$146,341
Commercial/Industrial Subtotal	\$142,065	\$5,241,106	\$226,444	\$34,959,482	\$11,856	\$171,804	\$977,035	-\$281	\$41,729,511
Common Expenses	\$0	\$13,972,630	\$208,166	\$2,039,202	\$0	\$30,463	\$673,577	\$0	\$16,924,037
	\$17,355,773	\$42,353,708	\$2,967,976	\$68,871,870	\$13,110,388	\$2,716,720	\$5,962,267	-\$412	\$153,338,290

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 2 PAGE 3 OF 3 FILED: APRIL 27, 2015

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 3 PAGE 1 OF 2 FILED: APRIL 27, 2015

- **3.** For each program that includes "Outside Services" costs in Data Request No. 2 above, please detail what those "Outside Services" costs include.
- **A.** Tampa Electric charges the following functions and measures to "Outside Services" within the following DSM programs:

Residential Walk-Through Audit (Free): Tampa Electric contracts with a temporary technical staffing company to hire temporary contractors to perform Residential Walk-Through Audits (Free) during the peak busy season.

Energy Education, Awareness and Agency Outreach: Tampa Electric pays for the CFLs and associated shipping to customers that participate in an energy education event through a contract with a distribution company. The Company also pays for the ability to participate in at least six energy education and awareness events each year.

Neighborhood Weatherization: Tampa Electric purchases the energy efficiency measures that are included in the delivery of this program to low income customers. The Company also pays for the distribution and installation of these measures to qualifying customers. Tampa Electric makes payment for marketing decals on the participating contractor vehicles installing the energy efficiency kits.

Energy Planner – Residential Price Responsive Load Management: Tampa Electric pays for the outside contractors that install, maintain and remove Energy Planner equipment at customer's homes.

Residential & Commercial Solar Photovoltaic: Tampa Electric pays an outside vendor to conduct the measurement and verification analysis of the solar photovoltaic systems.

Prime Time: Tampa Electric pays for the contractor that performs periodic equipment inspections and removal of the equipment as part of the retirement of this program. The projected full retirement of the Primetime program is estimated for the end of 2016.

Commercial Load Management (GSLM 1): Tampa Electric pays for the outside contractor to install, remove or replace the associated radio control equipment.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 3 PAGE 2 OF 2 FILED: APRIL 27, 2015

Commercial Demand Response: Tampa Electric pays for an outside vendor to administer the program. Incentive payments are included in the contract payment total and are distributed to customers from the vendor.

Common Expense: Tampa Electric pays for the configuring, completion and future maintenance of the new energy efficiency collaboration platform. This platform is in the development and configuration phase and is slated to replace the energy management data warehouse currently in use.

Solar for Schools: Tampa Electric pays for the outside contractor which installs and commissions the photovoltaic system at the chosen school.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 4 PAGE 1 OF 1 FILED: APRIL 27, 2015

- **4.** For each program that includes "Other" costs in Data Request No. 2 above, please detail what those "Other" costs include.
- **A.** Tampa Electric charges the following functions and measures to "Other" costs for supporting the associated DSM programs:

Employee Training:

- Residential Walk-Through Audit (Free)
- Commercial/Industrial Audit (Free)

Professional Dues:

- Residential Walk-Through Audit (Free)
- Energy Star for New Homes
- Residential Heating & Cooling
- Energy Planner Residential Price Responsive Load Management
- Commercial/Industrial Audit (Free)
- Standby Generator

IT Maintenance Charges:

- Residential Ceiling Insulation
- Residential Duct Repair
- Residential Heating & Cooling
- PrimeTime

Settled claim issues on defective equipment:

- Energy Planner Residential Price Responsive Load Management
- PrimeTime

Conservation Research & Development ("R&D"):

Potential new conservation programs

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 5 PAGE 1 OF 3

FILED: APRIL 27, 2015

Please provide the estimated costs of each program's incentive costs, costs for the ten-year goals period (nominal and net present value), broken into the categories detailed in the table below. As part of this response, please provide an electronic version of the table below in Excel format with your response.

Program Incentives (Nominal)									
Program Name	Incentives (Non- Recurring)	Incentives (Recurring)	Total						
[Residential]									
Residential Subtotal									
[Comm/Industrial]									
Comm/Ind.									
Subtotal									
Common Expenses									
Total									

Program Incentives (NPV)									
Program Name	Incentives (Non- Recurring)	Incentives (Recurring)	Total						
[Residential]									
Residential Subtotal									
[Comm/Industrial]									
Comm/Ind.									
Subtotal									
Common Expenses									
Total									

A. Tampa Electric's estimated nominal and NPV costs for each proposed DSM Program's incentive costs for the ten-year goals period is included in the tables below. The tables include non-recurring incentives, recurring incentives and the total incentives. The electronic version of this table is available in the enclosed CD.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 5 PAGE 2 OF 3

Program Incentives	(Nominal)		
	Incentives (Non-	Incentives	70-4-1
·	Recurring)	(Recurring)	Total
Residential Walk-Through Audit (Free)			
Residential Customer Assisted Energy Audit			
Residential Computer Assisted Energy Audit (RCS)			
Residential Ceiling Insulation	\$3,523,000	\$0	\$3,523,000
Residential Duct Repair	\$990,000	\$0	\$990,000
Residential Electronically Commutated Motor (ECM)	\$35,650	\$0	\$35,650
Energy Education, Awareness and Agency Outreach			
Energy Star for New Homes	\$1,955,000	\$0	\$1,955,000
Residential Heating and Cooling	\$1,127,250	\$0	\$1,127,250
Neighborhood Weatherization			
Energy Planner-Residential Price Responsive Load Management	,, , , , , , , , , , , , , , , , , , ,		
Energy Planner - Legacy Customers			
Residential Wall Insulation	\$43,400	\$0	\$43,400
Residential Window Replacement	\$1,630,000	\$0	\$1,630,000
Residential Solar Photovoltaic	\$1,056,000	\$0	\$1,056,000
Residential Solar Water Heaters (Low Income Water Heaters)	\$20,000	\$0	\$20,000
Primetime Legacy Customers	\$0	\$2,900,222	\$2,900,222
Residential Subtotal	\$10,380,300	\$2,900,222	\$13,280,522
Commercial/Industrial Audit (Free)	710,500,500	72,500,222	713,200,322
Comprehensive Commercial/Industrial Audit (Paid)			
Commercial Ceiling Insulation	\$337,500	\$0	\$337,500
Commercial Chiller	\$700,800	\$0	\$700,800
Cogeneration	3700,800	30	\$700,800
Conservation Value	\$740,560	\$0	\$740,560
Cool Roof	\$1,550,000	\$0	\$1,550,000
Commercial Cooling	\$128,000	\$0	\$128,000
Demand Response	\$128,000	Note 1	\$128,000
		Note 1	
Demand Response - Legacy Customers Commercial Duct Repair	\$337,500	\$0	\$337,500
	\$10,000	\$0	\$10,000
Commercial Electronically Commutated Motors (ECM)	\$10,000	\$187,843,885	
Industrial Load Management (GSLM 2&3)		3187,043,063	\$187,843,885
Lighting Conditioned Space	\$850,340		\$850,340
Lighting Non-Conditioned Space	\$297,825		\$297,825
Lighting Occupancy Sensors	\$189,000	***	\$189,000
Commercial Load Management (GSLM 1)	\$0	\$40,410	\$40,410
Commercial Load Management (GSLM 1) - Legacy Customers	\$0	\$80,881	\$80,881
Refrigeration Anti-Condensate Control	\$21,600		\$21,600
Standby Generator	\$0	\$299,950	\$299,950
Standby Generator - Legacy Customers	\$0	\$31,483,443	\$31,483,443
Thermal Energy Storage	\$1,518,148	\$0	\$1,518,148
Commercial Wall Insulation	\$2,420	\$0	\$2,420
Commercial Water Heating	\$5,000	\$0	\$5,000
Conservation Research and Development ("R&D")			
Commercial Solar Photovoltaic	\$100,000	\$0	\$100,000
Solar for Schools			
Commercial/Industrial Subtotal	\$6,788,693	\$219,748,568	\$226,537,261
Common Expenses			
Total	\$17,168,993	\$222,648,791	\$239,817,784

Note 1: The Demand Response program and associated legacy customer's incentives are included in the administrative costs of \$40,288,216.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 5 PAGE 3 OF 3

Program Incentive			
	Incentives (Non- Recurring)	Incentives (Recurring)	Total
Residential Walk-Through Audit (Free)			
Residential Customer Assisted Energy Audit			
Residential Computer Assisted Energy Audit (RCS)			
Residential Ceiling Insulation	\$3,047,966	\$0	\$3,047,966
Residential Duct Repair	\$877,227	\$0	\$877,227
Residential Electronically Commutated Motor (ECM)	\$30,392	\$0	\$30,392
Energy Education, Awareness and Agency Outreach			
Energy Star for New Homes	\$1,694,971	\$0	\$1,694,971
Residential Heating and Cooling	\$998,890	\$0	\$998,890
Neighborhood Weatherization	,		,
Energy Planner-Residential Price Responsive Load Management			
Energy Planner - Legacy Customers			
Residential Wall Insulation	\$37,984	\$0	\$37.984
Residential Window Replacement	\$1,426,586	\$0	\$1,426,586
Residential Solar Photovoltaic	\$1,030,244	\$0	\$1,030,244
Residential Solar Water Heaters (Low Income Water Heaters)	\$19,512	\$0	\$19,512
Primetime Legacy Customers	\$0	\$2,819,806	\$2,819,806
Residential Subtotal		\$2,819,806	\$11,983,579
Commercial/Industrial Audit (Free)	75,105,775	\$2,013,000	711,303,373
Comprehensive Commercial/Industrial Audit (Paid)			
Commercial Ceiling Insulation	\$295,382	\$0	\$295,382
Commercial Chiller	\$613,345	\$0	\$613,345
Cogeneration	3013,343	30	3013,343
Conservation Value	¢649 143	\$0	6649 143
Cool Roof	\$648,143 \$1,356,570	\$0	\$648,143 \$1,356,570
Commercial Cooling	\$1,336,370	\$0	\$1,336,370
	\$112,020	Note 2	\$112,026
Demand Response		Note 2	
Demand Response - Legacy Customers	¢207.406	60	6207.406
Commercial Duct Repair	\$297,406	\$0	\$297,406
Commercial Electronically Commutated Motors (ECM)	\$8,752	\$0	\$8,752
Industrial Load Management (GSLM 2&3)	\$0	\$163,642,724	\$163,642,724
Lighting Conditioned Space	\$734,426	\$0	\$734,426
Lighting Non-Conditioned Space	\$255,302	\$0	\$255,302
Lighting Occupancy Sensors	\$165,414	\$0	\$165,414
Commercial Load Management (GSLM 1)	\$0	\$35,367	\$35,367
Commercial Load Management (GSLM 1) - Legacy Customers	\$0	\$70,460	\$70,460
Refrigeration Anti-Condensate Control	\$18,376	\$0	\$18,376
Standby Generator	\$0	\$262,518	\$262,518
Standby Generator - Legacy Customers	\$0	\$27,427,224	\$27,427,224
Thermal Energy Storage	\$1,301,358	\$0	\$1,301,358
Commercial Wall Insulation	\$2,118	\$0	\$2,118
Commercial Water Heating	\$4,376	\$0	\$4,376
Conservation Research and Development ("R&D")			
Commercial Solar Photovoltaic	\$97,561	\$0	\$97,561
Solar for Schools			
	CE 010 FE4	\$191,438,294	\$197,348,848
Commercial/Industrial Subtotal	\$5,910,554	9232,730,237	7 ,,
Commercial/Industrial Subtotal Common Expenses	\$5,910,554	\$232,430,234	, , , , , , , , , , , , , , , , , , , ,

Note 2: The Demand Response program and associated legacy customer's incentives are included in the NPV administrative costs of \$35,099,333.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 6 PAGE 1 OF 3

FILED: APRIL 27, 2015

6. Please provide for each program with demand and energy savings the net present value of the benefits and costs described in the Rate Impact Measure Test and detailed in the table below. As part of this response, please provide an electronic version of the table below in Excel format with your response.

	Benefits							Costs			Net
Program Name	Gen	T&D	Fuel	Other	Total	Utility	Incentives	Lost Revenues	Other	Total	Benefit
[Residential]						·					
Residential											
Subtotal											
[Comm/Industrial]						·					
Comm/Ind.			C								
Subtotal											
Total											

A. Tampa Electric's NPV of the benefits and costs described within the RIM test for the 2015-2024 DSM Plan are included in the table below. The electronic version of this table is available in the enclosed CD.

			Benefit	S				Costs			Net
Program Name	Gen	T&D	Fuel	Other	Total	Utility	Incentives	Lost Revenues	Other	Total	Benefit
Residential Ceiling Insulation	1,310	381	1,725	0	3,416	190	978	1,896	0	3,064	352
Residential Duct Repair	556	157	412	0	1,125	81	447	467	0	995	130
Residential Electronically Commutated Motor (ECM)	8	2	10	0	20	1	7	11	0	19	1
Energy Education, Awareness and Agency Outreach	52	19	263	0	334	71	0	314	0	385	-51
Energy Star for New Homes	587	122	1,225	0	1,934	16	600	1,227	0	1,843	91
Residential Heating and Cooling	671	288	661	0	1,620	79	470	750	0	1,299	321
Neighborhood Weatherization	5,250	1,671	11,054	0	17,975	2,644	7,943	13,157	0	23,744	-5,769

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 6 PAGE 2 OF 3

2,825 0 612 0 3,437 10,581 5 16 25 0 46 1 84 588 1,458 0 2,130 588 5,996 11,049 19,917 0 36,962 6,245 38 122 714 0 874 149 4 253 756 0 1,013 48 15 267 1,385 0 1,667 267 43 559 2,286 0 2,888 69 17 46 765 0 828 14
5 16 25 0 46 1 84 588 1,458 0 2,130 588 5,996 11,049 19,917 0 36,962 6,245 38 122 714 0 874 149 4 253 756 0 1,013 48 15 267 1,385 0 1,667 267 43 559 2,286 0 2,888 69
5 16 25 0 46 1 84 588 1,458 0 2,130 588 5,996 11,049 19,917 0 36,962 6,245 38 122 714 0 874 149 4 253 756 0 1,013 48 15 267 1,385 0 1,667 267 43 559 2,286 0 2,888 69
5 16 25 0 46 1 84 588 1,458 0 2,130 588 5,996 11,049 19,917 0 36,962 6,245 38 122 714 0 874 149 4 253 756 0 1,013 48 15 267 1,385 0 1,667 267 43 559 2,286 0 2,888 69
84 588 1,458 0 2,130 588 5,996 11,049 19,917 0 36,962 6,245 38 122 714 0 874 149 4 253 756 0 1,013 48 15 267 1,385 0 1,667 267 43 559 2,286 0 2,888 69
84 588 1,458 0 2,130 588 5,996 11,049 19,917 0 36,962 6,245 38 122 714 0 874 149 4 253 756 0 1,013 48 15 267 1,385 0 1,667 267 43 559 2,286 0 2,888 69
5,996 11,049 19,917 0 36,962 6,245 38 122 714 0 874 149 4 253 756 0 1,013 48 15 267 1,385 0 1,667 267 43 559 2,286 0 2,888 69
5,996 11,049 19,917 0 36,962 6,245 38 122 714 0 874 149 4 253 756 0 1,013 48 15 267 1,385 0 1,667 267 43 559 2,286 0 2,888 69
38 122 714 0 874 149 4 253 756 0 1,013 48 15 267 1,385 0 1,667 267 43 559 2,286 0 2,888 69
4 253 756 0 1,013 48 15 267 1,385 0 1,667 267 43 559 2,286 0 2,888 69
4 253 756 0 1,013 48 15 267 1,385 0 1,667 267 43 559 2,286 0 2,888 69
15 267 1,385 0 1,667 267 43 559 2,286 0 2,888 69
43 559 2,286 0 2,888 69
24 1,737 42 0 1,803 952
24 1,757 42 0 1,805 952
93 135 3,351 0 3,579 999
93 133 3,331 0 3,379 999
3 4 24 0 31 5
3 1 21 0 32 3
14 226 4,177 0 4,417 1,482
3 72 850 0 925 23
10 68 1,483 0 1,561 67
8 11 0 0 19 32
8 155 0 0 163 301
0 4 19 0 23 4
44 108 57 0 209 2,663
20 352 1,815 0 2,187 469
1 1 6 0 8 0
1 2 6 0 9 1
3 72 850 0 925 10 68 1,483 0 1,561 8 11 0 0 19 8 155 0 0 163 0 4 19 0 23 44 108 57 0 209 20 352 1,815 0 2,187

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 6 PAGE 3 OF 3

Commercial/Industrial											
Subtotal	14,672	2,669	12,408	0	29,749	346	4,122	17,736	0	22,204	7,545
Total	37,588	5,500	29,868	0	72,956	6,342	15,171	37,653	0	59,166	13,790

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 7 PAGE 1 OF 3

FILED: APRIL 27, 2015

7. Please provide for each program with demand and energy savings the net present value of the benefits and costs described in the Total Resource Cost (TRC) Test and detailed in the table below. As part of this response, please provide an electronic version of the table below in Excel format with your response.

·		В	enefits				Costs	}		Net	
Program Name	Gen	T&D	Fuel	Other	Total	Utility	Participant	Other	Total	Benefit	
[Residential]											
Residential					l l						
Subtotal					i						
[Comm/Industrial]											
Comm/Ind.											
Subtotal											
Total											

A. Tampa Electric's NPV of the benefits and costs described within the TRC test for the 2015-2024 DSM Plan are included in the table below. The electronic version of this table is available in the enclosed CD.

			Benefit	S			Cost	s		Net
Program Name	Gen	T&D	Fuel	Other	Total	Utility	Participant	Other	Total	Benefit
Residential Ceiling										
Insulation	1,310	381	1,725	0	3,416	190	2,098	0	2,288	1,128
Residential Duct Repair	556	157	412	0	1,125	81	652	0	733	392
Residential Electronically										
Commutated Motor (ECM)	8	2	10	0	20	1	25	0	26	-6
Energy Education, Awareness and										
Agency Outreach	52	19	263	0	334	71	0	0	71	263
Energy Star for New Homes	587	122	1,225	0	1,934	16	1,608	0	1,624	310
Residential Heating										
and Cooling	671	288	661	0	1,620	79	990	0	1,069	551
Neighborhood	5.050	4.074	44.054		47.075	0.044			0.044	45 004
Weatherization	5,250	1,6/1	11,054	0	17,975	2,644	0	0	2,644	15,331

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 7 PAGE 2 OF 3

<u> </u>										
Energy Planner-										
Residential Price										
Responsive Load	10 110			•	44040	0.005			0.005	
Management	13,412	0	606	0	14,018	2,825	0	0	2,825	11,193
Residential Wall		_		_		_		_		_
Insulation	18	6	23	0	47	5	37	0	42	5
Residential Window										
Replacement	1,052	185	1,481	0		84	1,232	0	1,316	1,402
Residential Subtotal	22,916	2,831	17,460	0	43,207	5,996	6,642	0	12,638	30,569
Commercial Ceiling	_									
Insulation	227	74	722	0	1,023	38	260	0	298	725
Commercial Chiller	441	113	507	0	1,061	4	616	0	620	441
Conservation Value	1,440	398	96	0	1,934	15	824	0	839	1,095
Cool Roof	674	245	2,038	0	2,957	43	3,794	0	3,837	-880
Commercial Cooling	313	114	415	0	842	17	556	0	573	269
Demand Response	2,667	0	88	0	2,755	24	0	0	24	2,731
Commercial Duct										
Repair	1,067	361	3,150	0	4,578	93	439	0	532	4,046
Commercial										
Electronically	}									
Commutated Motors										
(ECM)	4	2	30	0	36	3	7	0	10	26
Lighting Conditioned										
Space	1,637	463	3,799	0	5,899	14	1,077	0	1,091	4,808
Lighting Non-										
Conditioned Space	91	81	776	0	948	3	1,554	0	1,557	-609
Lighting Occupancy										
Sensors	856	267	505	0	1,628	10	224	0	234	1,394
Commercial Load										
Management (GSLM 1										
- Cyclic)	51	0	0	0	51	8	0	0	8	43
Commercial Load										
Management (GSLM 1										
- Extended)	464	0	0	0	464	8	0	0	8	456
Refrigeration Anti-										
Condensate Control	3	1	23	0	27	0	9	0	9	18
Standby Generator	2,751	0	121	0	2,872	44	262	0	306	2,566
Thermal Energy										
Storage	1,980	548	128	0	2,656	20	1,101	0	1,121	1,535
Commercial Wall										
Insulation	4	1	3	0	8	1	6	0	7	1
Commercial Water										
Heating	2	1	7	0	10	1	5	0	6	4

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 7 PAGE 3 OF 3

Commercial/Industrial										
Subtotal	14,672	2,669	12,408	0	29,749	346	10,734	0	11,080	18,669
Total	37,588	5,500	29,868	0	72,956	6,342	17,376	0	23,718	49,238

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 8 PAGE 1 OF 3

FILED: APRIL 27, 2015

8. Please provide for each program with demand and energy savings the net present value of the benefits and costs described in the Participants Test and detailed in the table below. As part of this response, please provide an electronic version of the table below in Excel format with your response.

]	Benefits				Cost	S		Net	
Program Name	Bill Savings	Tax Credits	Incentive	Other	Total	Equipment	O&M	Other	Total	Benefit	
[Residential]											
Residential											
Subtotal											
[Comm/Industrial]											
Comm/Ind.											
Subtotal				-							
Total											

A. Tampa Electric's NPV of the benefits and costs described within the PCT test for the 2015-2024 DSM Plan are included in the table below. The electronic version of this table is available in the enclosed CD.

]	Benefits	-			Cost	s		Net
Program Name	Bill Savings	Tax Credits	Incentive	Other	Total	Equipment	O&M	Other	Total	Benefit
Residential Ceiling							_			
Insulation	3,493	0	978	0	4,471	2,098	0	0	2,098	2,373
Residential Duct Repair	854	0	447	0	1,301	652	0	0	652	649
Residential										
Electronically										
Commutated Motor										
(ECM)	21	0	7	0	28	25	0	0	25	3
Energy Education,										
Awareness and Agency										
Outreach	569	0	0	0	569	0	0	0	0	569
Energy Star for New										
Homes	2,328	0	600	0	2,928	1,608	0	0	1,608	1,320
Residential Heating										
and Cooling	1,371	0	470	0	1,841	1,096	0	0	1,096	745
Neighborhood										
Weatherization	23,820	0	7,943	0	31,763	0	0	0	0	31,763

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 8 PAGE 2 OF 3

Energy Planner-			į		_	T		·····		
Residential Price										
Responsive Load										
Management	3,471	o	0	0	3,471	l ol	0	o	0	3,471
Residential Wall	3,771			0	3,471					3,771
Insulation	46	0	16	0	62	37	0	0	37	25
Residential Window	- 10			-	02	37	-			
Replacement	2,784	0	588	0	3,372	1,232	0	o	1,232	2,140
Residential Subtotal	38,757	0	11,049		49,806		0	0	6,748	43,058
Commercial Ceiling	, , , , ,					-,				
Insulation	1,385	o	122	0	1,507	260	0	o	260	1,247
Commercial Chiller	1,227	0	253	0			0	0	616	864
Conservation Value	1,472	0	267	0			0	0	824	915
Cool Roof	4,262	0	559	0		3,794	0	0	3,794	1,027
Commercial Cooling	1,167	0	46	0	1,213		0	0	556	657
Demand Response	121	0	1,737	0	1,858		0	0	0	1,858
Commercial Duct										
Repair	6,322	o	135	0	6,457	439	0	o	439	6,018
Commercial										···········
Electronically					-					
Commutated Motors										
(ECM)	53	o	4	0	57	7	0	0	7	50
Lighting Conditioned										
Space	7,861	0	226	0	8,087	1,077	0	0	1,077	7,010
Lighting Non-										
Conditioned Space	1,679	0	72	0	1,751	1,554	0	0	1,554	197
Lighting Occupancy										
Sensors	1,987	0	68	0	2,055	224	0	0	224	1,831
Commercial Load										
Management (GSLM 1									_	
- Cyclic)	0	0	11	0	11	0	0	0	. 0	11
Commercial Load										
Management (GSLM 1	_		155	0	155				0	155
- Extended)	0	0	155	0	155	0	0	0	0	155
Refrigeration Anti- Condensate Control	42	o	4	0	46	9	0	0	9	37
Standby Generator	167	0	108	0			262	0	262	13
Thermal Energy	10/	U	100	U	2/3	0	202	U	202	13
Storage	1,930	o	352	0	2,282	1,101	0	0	1,101	1,181
Commercial Wall	1,550		332		2,202	1,101	0	U	1,101	1,101
Insulation	9	o	1	0	10	6	0	0	6	4
Commercial Water				- 0	10					
Heating	13	o	2	0	15	5	0	0	5	10
i loading	13									10

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 8 PAGE 3 OF 3 FILED: APRIL 27, 2015

Commercial/Industrial Subtotal	29,697	0	4,122	0 33,81	10,472	262	0 10,734	23,085
Total	68.454	0	15.171		 		0 17.482	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO: 9 PAGE 1 OF 2

FILED: APRIL 27, 2015

9. Please provide the actual and projected Energy Conservation Cost Recovery (ECCR) annual funds in nominal dollars for the period 2010 through 2024.

Year	ECCR Expenditures
2010	
2011	
2012	
2013	
2014	
2015	
2016	
2017	
2018	
2019	
2020	
2021	
2022	
2023	
2024	

A. Tampa Electric's actual and projected Energy Conservation Cost Recovery (ECCR) annual funds in nominal dollars for the period 2010 through 2024 are contained in the table on the following page.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 9 PAGE 2 OF 2 FILED: APRIL 27, 2015

*7	ECCR
Year	Expenditures
2010	\$43,371,442
2011	\$43,349,092
2012	\$46,593,831
2013	\$47,502,652
2014	\$46,620,508
2015	\$42,655,082
2016	\$40,422,041
2017	\$38,018,886
2018	\$39,139,385
2019	\$40,420,373
2020	\$41,110,569
2021	\$42,013,367
2022	\$42,905,658
2023	\$43,834,206
2024	\$44,784,361

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 10 PAGE 1 OF 2

FILED: APRIL 27, 2015

10. Please provide the actual and projected monthly customer bill associated with the ECCR for a residential and commercial/industrial customer with the usage described in the table below, in nominal dollars. Please also provide the actual and projected total monthly customer bill. As part of this response, please provide an electronic version of the table below in Excel format with your response.

Year	Residential 1,200 k		Commercial/Industrial Customer 400,000 kWh/mo & 1,000 kW Peak		
	ECCR Portion (\$)	Total Bill (\$)	ECCR Portion (\$)	Total Bill (\$)	
2010	, ,				
2011					
2012					
2013					
2014					
2015					
2016					
2017					
2018					
2019					
2020					
2021					
2022					
2023					
2024					

A. Tampa Electric's actual and projected monthly customer bill in nominal dollars associated with the ECCR for a residential and commercial/industrial customer with the usage described in the header of the table is provided on the following page. Included in the table is also the actual and projected total monthly customer bills based upon the usage described. The electronic version of this table is available in the enclosed CD.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 10 PAGE 2 OF 2 FILED: APRIL 27, 2015

Year		l Customer Wh/mo	Commercial/Industrial Customer 400,000 kWh/mo & 1,000 kW Peak		
	ECCR Portion	Total Bill (\$)	ECCR Portion	Total Bill (\$)	
	(\$)		(\$)		
2010	\$3.05	\$137.22	\$880	\$38,386.67	
2011	\$3.29	\$130.37	\$930	\$36,212.31	
2012	\$3.62	\$130.23	\$1050	\$36,206.15	
2013	\$3.58	\$130.94	\$1060	\$35,290.26	
2014	\$3.54	\$133.20	\$1040	\$35,702.56	
2015	\$3.06	\$131.93	\$890	\$35,126.15	
2016	\$2.54	\$134.47	\$815	\$36,193.85	
2017	\$2.34	\$132.65	\$761	\$35,631.88	
2018	\$2.35	\$134.07	\$776	\$36,123.42	
2019	\$2.38	\$134.70	\$793	\$36,399.21	
2020	\$2.36	\$137.04	\$798	\$37,195.50	
2021	\$2.36	\$138.93	\$808	\$37,846.0	
2022	\$2.36	\$139.47	\$817	\$38,040.47	
2023	\$2.35	\$139.88	\$827	\$38,197.89	
2024	\$2.35	\$141.07	\$837	\$38,612.45	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 11 PAGE 1 OF 4

FILED: APRIL 27, 2015

11. For TECO's audit programs, please provide a list of measures used to determine energy and demand savings. Please identify each measure and specify whether the measure is equipment provided by the Company and installed by the auditor, equipment provided by the Company but installed by the home or business owner, or a behavioral measure savings. As part of this response, please complete the table below for each measure and please provide an electronic version of the table below in Excel format with your response.

			[Measure Na	ame]						
		Audit Measure Savings (Savings @ Generator)								
		Per Customer			Total Annual					
Year	kWh Reduction	Winter kW Reduction	Summer kW Reduction	kWh Reduction	Winter kW Reduction	Summer kW Reduction				
2015										
2016										
2017										
2018	·									
2019						***************************************				
2020										
2021										
2022										
2023										
2024				 						

A. The energy audit is primarily an educational program designed to motivate customers to a higher level of energy consumption awareness.

Awareness entails both energy efficiency measures and behavioral changes to lifestyles. Detailed information is collected, reviewed and provided to the customer. Tampa Electric reinforces its initial recommendations with ongoing education made available through bill inserts, customer newsletters, bill messaging, company website and media advertising to sustain energy conservation behavioral changes developed by the customer as a direct result of having an energy audit performed on their residence.

Since 1995 Tampa Electric has counted the savings from energy audits toward its conservation goals. These savings have been and will continue to be based on audit-induced customer modifications of practices and

TAMPA ELECTRIC COMPANY
DOCKET NO: 150081-EG
DEMAND SIDE MANAGEMENT
STAFF'S FIRST DATA REQUEST
REQUEST NO. 11
PAGE 2 OF 4
FILED: APRIL 27, 2015

behaviors. Any savings attributable to DSM program participation that occurs subsequent to an audit are only captured by the specific DSM program and not the energy audit. Due to this methodology energy audits have always been a component of Tampa Electric's Commission-approved DSM plans designed and implemented to meet the company's 10-year DSM goals approved by the Commission. The methodology for measuring and verifying the incremental energy and demand savings per audit is detailed in Tampa Electric's response to Staff's First Data Request No. 12.

The projected energy and demand savings from residential and commercial energy audits are contained in the tables below. The electronic version of these tables is available in the enclosed CD.

	Residential Walk-Through Audit - Free									
		Audit Mea	sure Savings	(Savings @ Generator)						
		Per Custome	r		Total Annual					
Year	kWh Reduction	Winter kW Reduction	Summer kW Reduction	kWh Reduction	Winter kW Reduction	Summer kW Reduction				
2015	419	0.086	0.075	2,512,200	518	448				
2016	419	0.086	0.075	2,512,200	518	448				
2017	419	0.086	0.075	2,512,200	518	448				
2018	419	0.086	0.075	2,512,200	518	448				
2019	419	0.086	0.075	2,512,200	518	448				
2020	419	0.086	0.075	2,512,200	518	448				
2021	419	0.086	0.075	2,512,200	518	448				
2022	419	0.086	0.075	2,512,200	518	448				
2023	419	0.086	0.075	2,512,200	518	448				
2024	419	0.086	0.075	2,512,200	518	448				

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 11 PAGE 3 OF 4

	Residential Customer Assisted Energy Audit									
		Audit Measure Savings (Savings @ Generator)								
		Per Custome	r		Total Annual					
Year	kWh Reduction	Winter kW Reduction	Summer kW Reduction	kWh Reduction	Winter kW Reduction	Summer kW Reduction				
2015	314	0.065	0.056	157,000	33	28				
2016	314	0.065	0.056	157,000	33	28				
2017	314	0.065	0.056	157,000	33	28				
2018	314	0.065	0.056	157,000	33	28				
2019	314	0.065	0.056	157,000	33	28				
2020	314	0.065	0.056	157,000	33	28				
2021	314	0.065	0.056	157,000	33	28				
2022	314	0.065	0.056	157,000	33	28				
2023	314	0.065	0.056	157,000	33	28				
2024	314	0.065	0.056	157,000	33	28				

	Residential Computer Assisted Energy Audit - Paid									
		Audit Mea	sure Savings	(Savings @	Generator)					
		Per Custome			Total Annual					
Year	kWh Reduction	Winter kW Reduction	Summer kW Reduction	kWh Reduction	Winter kW Reduction	Summer kW Reduction				
2015	419	0.086	0.075	419	0.086	0.075				
2016	419	0.086	0.075	419	0.086	0.075				
2017	419	0.086	0.075	419	0.086	0.075				
2018	419	0.086	0.075	419	0.086	0.075				
2019	419	0.086	0.075	419	0.086	0.075				
2020	419	0.086	0.075	419	0.086	0.075				
2021	419	0.086	0.075	419	0.086	0.075				
2022	419	0.086	0.075	419	0.086	0.075				
2023	419	0.086	0.075	419	0.086	0.075				
2024	419	0.086	0.075	419	0.086	0.075				

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 11 PAGE 4 OF 4

	Commercial/Industrial Energy Audit - Free									
		Audit Mea	sure Savings	(Savings @	Generator)					
	1	Per Custome	r		Total Annual					
Year	kWh Reduction	Winter kW Reduction	Summer kW Reduction	kWh Reduction	Winter kW Reduction	Summer kW Reduction				
2015	864	0.1	0.099	640,800	70	69				
2016	864	0.1	0.099	640,800	70	69				
2017	864	0.1	0.099	648,000	75	74				
2018	864	0.1	0.099	691,200	80	79				
2019	864	0.1	0.099	691,200	80	79				
2020	864	0.1	0.099	691,200	80	79				
2021	864	0.1	0.099	691,200	80	79				
2022	864	0.1	0.099	691,200	80	79				
2023	864	0.1	0.099	691,200	80	79				
2024	864	0.1	0.099	691,200	80	79				

	Commercial/Industrial Energy Audit - Paid									
		Audit Mea	sure Savings	(Savings @	Generator)					
		Per Custome			Total Annual					
Year	kWh Reduction	Winter kW Reduction	Summer kW Reduction	kWh Reduction	Winter kW Reduction	Summer kW Reduction				
2015	864	0.100	0.099	3,456	0.400	0.396				
2016	864	0.100	0.099	3,456	0.400	0.396				
2017	864	0.100	0.099	3,456	0.400	0.396				
2018	864	0.100	0.099	3,456	0.400	0.396				
2019	864	0.100	0.099	3,456	0.400	0.396				
2020	864	0.100	0.099	3,456	0.400	0.396				
2021	864	0.100	0.099	3,456	0.400	0.396				
2022	864	0.100	0.099	3,456	0.400	0.396				
2023	864	0.100	0.099	3,456	0.400	0.396				
2024	864	0.100	0.099	3,456	0.400	0.396				

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 12 PAGE 1 OF 2 FILED: APRIL 27, 2015

- 12. If TECO's audit programs include behavioral savings, please describe the empirical basis for asserting such savings (i.e. double blind experiments, transfer of findings from other utilities, engineering guesses) and how the savings are monitored and verified.
- **A.** Tampa Electric offers four residential energy audits and two commercial energy audits.

The basis for the demand and energy savings of Tampa Electric's residential energy audit programs is the customer's behavioral modifications and low cost measure adoptions accomplished through the performance of the company's free Residential Walk-Through Audit.

Specifically, the kWh billing histories of customers who received the free audit were compared to the billing histories of matched customers who did not participate in the audit. In this analysis, care was given so as to not include customers that participated in other DSM programs. Energy consumption before and after the audit was compared for both sets of customers to estimate the impact associated with the audit. Based on load research data, the consumption impacts were then extrapolated into corresponding demand savings.

The demand and energy savings for the company's paid Residential Computer Assisted Energy Audit was assumed to be the same as the free Residential Walk-Through Audit. This assumption was based on the limited number of paid audits historically performed and the fact that the same behavioral practices and low-cost measures are evaluated for the customer during both audits.

The demand and energy savings for Tampa Electric's Residential Customer Assisted Audits (On-Line and Phone Assisted Energy Audits) have historically been calculated to be 25 percent less than the savings achieved by the Residential Walk-Through Audit. This assumption is based on the fact that although the same behavioral practices and low-cost measures are evaluated for the customer, the on-site presence of an energy analyst in the customer's residence has the greater impact on customer behavioral modifications.

The basis for the demand and energy savings of Tampa Electric's Commercial/Industrial energy audit programs is the customer's behavioral modifications and low cost measure adoptions accomplished through the

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 12 PAGE 2 OF 2 FILED: APRIL 27, 2015

performance of the company's free Commercial/Industrial Audit. The specific methodology used is the same as that used for the free Residential Energy Audit referenced above.

The demand and energy savings for the company's paid Commercial/Industrial Energy Audit was assumed to be the same as the free Commercial/Industrial Audit. This assumption was based on the limited number of paid audits historically performed and the fact that the same behavioral practices and low-cost measures are evaluated for the customer during both audits.

TAMPA ELECTRIC COMPANY **DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT** STAFF'S FIRST DATA REQUEST **REQUEST NO. 13** PAGE 1 OF 1 FILED: APRIL 27, 2015

- 13. Do any of the programs in TECO's DSM Plan include savings associated with Compact Fluorescent Lightbulbs? If so, what baseline is used?
- A. Tampa Electric's 2015-2024 DSM Plan includes savings associated with Compact Fluorescent Lightbulbs ("CFLs") for two DSM programs. Tampa Electric's proposed Neighborhood Weatherization and Energy Education, Awareness and Agency Outreach include CFLs as a portion of their overall energy and demand savings. The updated ITRON study baseline used a 43-Watt incandescent bulb. When comparing this to the actual 13-Watt CFLs that are included as part of the energy efficiency kits that customers receive, it results in the following energy and demand savings toward the goals per CFL:

Summer Demand:

0.004 kW

Winter Demand:

0.005 kW

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 14 PAGE 1 OF 1 FILED: APRIL 27, 2015

- 14. Please identify each program in TECO's DSM Plan that include measures with an estimated 2-year or less payback period, and which measures are included by each program.
- A. Tampa Electric's DSM Plan includes two programs that contain measures with a simple payback of two years or less. These two programs are Neighborhood Weatherization and Energy Education, Awareness and Agency Outreach.
 - a. Neighborhood Weatherization includes the following measures with a simple payback of two years or less:
 - Eight CFLs
 - Installation of up to three low flow faucet aerators
 - Installation of up to two low flow shower heads
 - Installation of a water heater blanket, if necessary
 - b. Energy Education, Awareness and Agency Outreach includes the following measures with a simple payback of two years or less:
 - Four CFLs
 - Two low flow faucet aerators

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 15 PAGE 1 OF 2

FILED: APRIL 27, 2015

15. For each program that includes measures with an estimated 2-year or less payback period, please provide the amount of savings (kWh, Win kW, and Sum kW) associated with these measures for each program and for the entire DSM Plan. As part of this response, please provide an electronic version of the table below in Excel format with your response.

	[Program Name or DSM Plan Combined] Program Savings from 2-Year Payback Measures (Savings @ Generator)								
	Progra	m Savings fron	n <mark>2-Year P</mark> ayba	ick Measures (Savings @ Ger	erator)			
		Per Customer			Total Annual				
Year	kWh Reduction	Winter kW Reduction	Summer kW Reduction	kWh Reduction	Winter kW Reduction	Summer kW Reduction			
2015									
2016		·							
2017									
2018									
2019									
2020									
2021									
2022									
2023									
2024									

A. Tampa Electric's programs that contain measures with a simple payback of two years or less and their associated amount of savings (kWh, Win kW, and Sum kW) at the generator for each program and the entire DSM Plan are reflected on the following page. The electronic version of these tables is available in the enclosed CD.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 15 PAGE 2 OF 2

	Neighborhood Weatherization									
	Progra	m Savings fron	n 2-Year Payba	ick Measures (Savings @ Ger	erator)				
		Per Customer			Total Annual					
Year	kWh Reduction	Winter kW Reduction	Summer kW Reduction	kWh Reduction	Winter kW Reduction	Summer kW Reduction				
2015	726	0.109	0.064	3,630,500	544	320				
2016	726	0.109	0.064	4,175,075	625	368				
2017	726	0.109	0.064	4,538,125	680	400				
2018	726	0.109	0.064	4,901,175	734	432				
2019	726	0.109	0.064	5,082,700	761	448				
2020	726	0.109	0.064	5,082,700	761	448				
2021	726	0.109	0.064	5,082,700	761	448				
2022	726	0.109	0.064	5,082,700	761	448				
2023	726	0.109	0.064	5,082,700	761	448				
2024	726	0.109	0.064	5,082,700	761	448				

Energy Education, Awareness and Agency Outreach						
	Program Savings from 2-Year Payback Measures (Savings @ Generator)					
Year	Per Customer			Total Annual		
	kWh Reduction	Winter kW Reduction	Summer kW Reduction	kWh Reduction	Winter kW Reduction	Summer kW Reduction
2015	363	0.049	0.027	181,260	25	13
2016	363	0.049	0.027	181,260	25	13
2017	363	0.049	0.027	181,260	25	13
2018	363	0.049	0.027	181,260	25	13
2019	363	0.049	0.027	181,260	25	13
2020	363	0.049	0.027	181,260	25	13
2021	363	0.049	0.027	181,260	25	13
2022	363	0.049	0.027	181,260	25	13
2023	363	0.049	0.027	181,260	25	13
2024	363	0.049	0.027	181,260	25	13

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 16 PAGE 1 OF 2 FILED: APRIL 27, 2015

- **16.** Please describe how TECO's avoided generator, transmission and distribution costs were developed. In the description, please discuss the resources relied upon.
- **A.** Tampa Electric develops the avoided costs for generation, transmission and distribution using the following methodology:

Generator: Tampa Electric's integrated resource planning (IRP) process has been in place for decades and is used to develop an avoided cost of generation. In order to determine this avoided cost, Tampa Electric develops a "base case" expansion plan. This base case expansion plan includes all existing generation units and all options to meet the projected load including any new generation, purchased power agreements and incremental DSM. The costs for all of these options are used to develop the cost of an avoided generator. For the goals setting docket, Tampa Electric runs a 2nd case expansion without any incremental DSM to develop a new avoided cost of generation. This new avoided cost of a generator is used for both the DSM goal setting as well as the supporting DSM Plan development.

Transmission: Tampa Electric considers the transmission system to be any voltage greater than 69kV, all associated costs are allocated to the transmission cost/kW. Annually a study is conducted to review the project costs directly associated with system expansion of the transmission system. Even though this process is done annually, the cost associated with system expansion are typically not annual costs because most projects span multiple years. The derived costs of the bulk system expansion is quantified and then divided by the bulk kW capacity added to the system to develop the current annual avoided cost for transmission. Tampa Electric takes this value and includes it in the average over the prior six years to obtain the appropriate avoided cost for transmission.

Distribution: Tampa Electric considers the 69kV system and below as distribution and all associated costs are allocated to the distribution cost/kW. Annually a study is conducted to review the project costs directly associated with system expansion of the bulk 69KV and 13 kV systems. Even though this process is done annually, the cost associated with system expansion are typically not annual costs because most projects span multiple years. The derived costs of the bulk system expansion is quantified and then divided by the bulk kW capacity added to

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 16 PAGE 2 OF 2 FILED: APRIL 27, 2015

the system to develop the current annual avoided cost for distribution. Tampa Electric takes this value and includes it in the average over the prior six years to obtain the appropriate avoided cost for distribution.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 17 PAGE 1 OF 1 FILED: APRIL 27, 2015

- 17. Please describe the avoided unit used in TECO's cost-effectiveness evaluations of the programs in its DSM Plan. Is the avoided unit the same as the one TECO used in the goal-setting docket? If not, please explain why, and the differences in avoided costs resulting from the change.
- A. The avoided unit used in Tampa Electric's cost-effectiveness evaluations is a 7FA CT that is rated at 190 summer MW and 220 winter MW capacity. This avoided unit which would occur in 2019 if there was no DSM, was the same avoided unit used in the evaluations of the programs for the DSM Plan as it was in the goals setting docket.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 18 PAGE 1 OF 1 FILED: APRIL 27, 2015

- 18. Please discuss whether any measure's demand and energy savings used in TECO's cost-effectiveness evaluations of the programs in its DSM Plan differed from the one used in the goal-setting docket. If so, please explain why and the differences in demand and energy savings resulting from the change.
- **A.** The demand and energy savings used in cost effectiveness evaluations of the programs for the DSM Plan are the same demand and energy savings used in the goal-setting docket.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 19 PAGE 1 OF 3

FILED: APRIL 27, 2015

19. Please provide the annual avoided cost savings associated with each of the following four scenarios for a measure that reduces energy or demand by: 1,000 kWh, 1 kW Summer Demand, 1 kW Winter Demand, or 1 kW Summer and Winter Demand. Please provide the savings through the longest time period used to evaluate the programs in your DSM Plan.

		Savings by Measure Type											
Year	1,000 kWh		1 kW Summer		1 kW W	Vinter	1 kW Sum & Win						
	Nominal	Real	Nominal	Real	Nominal	Real	Nominal	Real					
2015													
2016													
2017													
2018													
2019					-								
2020					·								
2021													
2022													
2023													
2024													

A. Tampa Electric's avoided cost savings associated with each of the scenarios for a residential and commercial customer are contained in the tables on the following pages. In each scenario the consumer price index for the base is 2015.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 19 PAGE 2 OF 3 FILED: APRIL 27, 2015

			Savings b	y Measur	e Type (Res	sidential)		
Year	1,000	kWh	1 kW Sı	ummer	1 kW V	Vinter	1 kW Sun	n & Win
	Nominal	Real	Nominal	Real	Nominal	Real	Nominal	Real
2015	\$21.35	\$21.35	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
2016	\$58.95	\$57.48	\$56.99	\$55.57	\$52.06	\$50.76	\$61.15	\$59.62
2017	\$88.45	\$83.82	\$58.36	\$55.30	\$53.31	\$50.51	\$62.62	\$59.33
2018	\$133.85	\$123.33	\$59.76	\$55.06	\$54.59	\$50.30	\$64.12	\$59.08
2019	\$161.02	\$144.66	\$599.07	\$538.22	\$274.29	\$246.43	\$781.42	\$702.05
2020	\$172.88	\$151.78	\$587.81	\$516.06	\$270.83	\$237.78	\$766.97	\$673.36
2021	\$186.44	\$160.01	\$578.20	\$496.24	\$268.29	\$230.25	\$755.25	\$648.18
2022	\$198.31	\$166.38	\$569.97	\$478.20	\$266.32	\$223.44	\$745.35	\$625.34
2023	\$208.47	\$171.01	\$561.27	\$460.41	\$264.09	\$216.63	\$734.61	\$602.59
2024	\$225.00	\$180.49	\$553.11	\$443.68	\$262.06	\$210.22	\$724.48	\$581.15
2025	\$241.53	\$189.49	\$549.81	\$431.36	\$262.25	\$205.75	\$721.35	\$565.95
2026	\$248.73	\$190.90	\$549.24	\$421.54	\$263.69	\$202.38	\$722.15	\$554.25
2027	\$257.63	\$193.46	\$549.14	\$412.36	\$265.36	\$199.27	\$723.62	\$543.38
2028	\$267.80	\$196.79	\$549.20	\$403.57	\$267.13	\$196.29	\$725.30	\$532.98
2029	\$287.71	\$206.93	\$546.29	\$392.91	\$267.55	\$192.43	\$722.64	\$519.74
2030	\$297.03	\$209.13	\$547.49	\$385.47	\$269.87	\$190.01	\$725.95	\$511.12
2031	\$314.83	\$217.03	\$547.57	\$377.48	\$271.71	\$187.31	\$727.61	\$501.59
2032	\$332.63	\$224.56	\$546.23	\$368.76	\$272.91	\$184.25	\$727.19	\$490.93
2033	\$350.42	\$231.72	\$544.93	\$360.34	\$274.16	\$181.29	\$726.81	\$480.60
2034	\$355.93	\$230.57	\$548.31	\$355.19	\$277.45	\$179.73	\$732.95	\$474.80
2035	\$389.83	\$247.44	\$549.40	\$348.72	\$279.50	\$177.41	\$735.19	\$466.65
2036	\$411.44	\$255.94	\$545.08	\$339.06	\$278.98	\$173.54	\$729.25	\$453.63
2037	\$444.92	\$271.27	\$547.02	\$333.52	\$281.35	\$171.54	\$732.41	\$446.55
2038	\$483.90	\$289.23	\$540.15	\$322.85	\$279.72	\$167.19	\$722.72	\$431.98
2039	\$516.10	\$302.47	\$546.00	\$319.99	\$283.93	\$166.40	\$731.55	\$428.73

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 19 PAGE 3 OF 3

			Savings by	y Measure	Type (Con	nmercial)		
Year	1,000	kWh	1 kW S		1 kW V		1 kW Sur	n & Win
	Nominal	Real	Nominal	Real	Nominal	Real	Nominal	Real
2015	\$21.26	\$21.26	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
2016	\$58.70	\$57.24	\$56.98	\$55.56	\$52.05	\$50.76	\$61.13	\$59.61
2017	\$88.08	\$83.46	\$58.35	\$55.29	\$53.30	\$50.51	\$62.60	\$59.32
2018	\$133.28	\$122.81	\$59.75	\$55.05	\$54.58	\$50.29	\$64.10	\$59.07
2019	\$160.34	\$144.05	\$598.99	\$538.16	\$274.25	\$246.40	\$781.31	\$701.96
2020	\$172.15	\$151.14	\$587.73	\$516.00	\$270.80	\$237.75	\$766.86	\$673.26
2021	\$185.65	\$159.33	\$578.12	\$496.17	\$268.25	\$230.22	\$755.13	\$648.08
2022	\$197.47	\$165.67	\$569.88	\$478.13	\$266.27	\$223.40	\$745.22	\$625.23
2023	\$207.59	\$170.29	\$561.18	\$460.33	\$264.04	\$216.59	\$734.47	\$602.48
2024	\$224.05	\$179.72	\$553.01	\$443.60	\$262.02	\$210.18	\$724.34	\$581.03
2025	\$240.51	\$188.69	\$549.70	\$431.28	\$262.20	\$205.71	\$721.19	\$565.82
2026	\$247.68	\$190.09	\$549.12	\$421.45	\$263.63	\$202.34	\$721.98	\$554.11
2027	\$256.54	\$192.64	\$549.01	\$412.26	\$265.30	\$199.22	\$723.43	\$543.24
2028	\$266.67	\$195.96	\$549.05	\$403.47	\$267.06	\$196.24	\$725.09	\$532.82
2029	\$286.50	\$206.06	\$546.13	\$392.79	\$267.48	\$192.38	\$722.41	\$519.58
2030	\$295.78	\$208.25	\$547.32	\$385.35	\$269.80	\$189.96	\$725.70	\$510.95
2031	\$313.50	\$216.12	\$547.39	\$377.35	\$271.62	\$187.25	\$727.34	\$501.41
2032	\$331.22	\$223.61	\$546.04	\$368.63	\$272.82	\$184.18	\$726.91	\$490.74
2033	\$348.95	\$230.74	\$544.73	\$360.20	\$274.06	\$181.22	\$726.51	\$480.40
2034	\$354.43	\$229.60	\$548.09	\$355.05	\$277.35	\$179.67	\$732.63	\$474.59
2035	\$388.19	\$246.39	\$549.17	\$348.58	\$279.40	\$177.34	\$734.85	\$466.44
2036	\$409.70	\$254.86	\$544.85	\$338.92	\$278.88	\$173.48	\$728.91	\$453.42
2037	\$443.04	\$270.12	\$546.78	\$333.37	\$281.25	\$171.48	\$732.06	\$446.34
2038	\$481.86	\$288.01	\$539.92	\$322.71	\$279.61	\$167.13	\$722.38	\$431.77
2039	\$513.92	\$301.19	\$545.76	\$319.85	\$283.82	\$166.33	\$731.19	\$428.52

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 20 PAGE 1 OF 2

FILED: APRIL 27, 2015

20. For each demand response program, use the table below to provide the information listed on an annual basis for customer participation. Please also provide a summary of all demand response programs using the chart below. As part of this response, please provide an electronic version of the table below in Excel format with your response.

[All D	[All Demand Response Programs Combined or By Demand Response Program Name]										
Year	Average Number of (MW)		New Participants	Added Capacity (MW)		Participants Lost	Lost Capacity (MW)				
	Participants	Sum	Win		Sum	Win		Sum	Win		
2005											
2006											
2007											
2008											
2009											
2010											
2011											
2012								·			
2013											
2014											

A. The chart on the following page provides the information listed on an annual basis for customer participation in Tampa Electric's Commercial Demand Response Program. The Company's Commercial Demand Response Program was initiated in March 2008. For the average number of participants, the company used the number of participants at the beginning of the program and at the beginning of each year. The electronic version of this table is available in the enclosed CD.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 20 PAGE 2 OF 2

FILED: APRIL 27, 2015

	Commercial Demand Response											
Year	Average Number of	Available Capacity (MW)		New Participants	Added Capacity ts (MW)		Participants Lost	Lost Capacity (MW)				
	Participants	Sum	Win	_	Sum	Win		Sum	Win			
2005												
2006												
2007												
2008	59	0	0	82	34	34	0	0	0			
2009	84	34	34	6	0	0	2	2	2			
2010	96	32	32	18	5	5	1	2	2			
2011	102	35	35	1	2	2	4	0	0			
2012	100	37	37	0	1	1	3	0	0			
2013	100	38	38	7	1	1	6	0	0			
2014	95	39	39	52	1	1	33	0	0			

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 21 PAGE 1 OF 2

FILED: APRIL 27, 2015

21. For each demand response program, use the table below to provide the information listed on an annual basis in seasonal peak demand and number of participants. Please also provide a summary of all demand response programs using the chart below. As part of this response, please provide an electronic version of the table below in Excel format with your response.

[A	ll Demand	Respons	e Progra	ms Com	bined or	or By Demand Response Program Name]					
		S	ummer			Winter					
Year	Number of Events	I .	rage t Size		mum t Size	Number of Events	1	rage t Size	Maxi Even		
	(MW)	(MW)	(Part.)	(MW)	(Part.)	(MW)	(MW)	(Part.)	(MW)	(Part.)	
2005	×										
2006											
2007											
2008											
2009											
2010										, , , , , , , , , , , , , , , , , , , ,	
2011											
2012											
2013											
2014											

A. The chart on the following page provides the information listed on an annual basis in seasonal peak demand and number of affected customers in Tampa Electric's Commercial Demand Response Program. The Company's Commercial Demand Response Program was initiated in March 2008. The electronic version of this table is available in the enclosed CD.

				Com	mercial Deman	d Response			-	
			Summe	r				Winter		
	Number	r Average Maxi			cimum	imum Number		Average		imum
Year	of Events	Event Size Event Size of Events		Event Size		Event Size				
	(MW)	(MW)	(Part.)	(MW)	(Part.)	(MW)	(MW)	(Part.)	(MW)	(Part.)
2005		-								
2006										
2007										
2008	0	Not Applicable	Not Applicable	Not Applicable	Not Applicable	1	37	77	37	77
2009	2	31	84	31	84	1	29	82	29	82
2010	0	Not Applicable	Not Applicable	Not Applicable	Not Applicable	1	36	101	36	101
2011	0	Not Applicable	Not Applicable	Not Applicable	Not Applicable	1	47	99	47	99
2012	0	Not Applicable	Not Applicable	Not Applicable	Not Applicable	Not Applicable	Not Applicable	Not Applicable	Not Applicable	Not Applicable
2013	1	39	103	39	103	Not Applicable	Not Applicable	Not Applicable	Not Applicable	Not Applicable
2014	0	Not Applicable	Not Applicable	Not Applicable	Not Applicable	1	48	.96	48	96

FILED: APRIL 27, 2015

TAMPA ELECTRIC COMPANY
DOCKET NO: 150081-EG
DEMAND SIDE MANAGEMENT
STAFF'S FIRST DATA REQUEST
REQUEST NO. 21
PAGE 2 OF 2

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 22 PAGE 1 OF 2

FILED: APRIL 27, 2015

22. For each demand response program, use the table below to provide the information listed on an annual basis for seasonal peak activations. Please also provide a summary of all demand response programs using the chart below. As part of this response, please provide an electronic version of the table below in Excel format with your response.

[A	[All Demand Response Programs Combined or By Demand Response Program Name]										
			Summer Peak		Winter Peak						
Year	Average Number of Participants	Activated During Peak?	# of Participants Activated	Capacity Activated	Activated During Peak?	# of Participants Activated	Capacity Activated				
		(Y/N)	(MW)	(MW)	(Y/N)	(MW)	(MW)				
2005											
2006											
2007											
2008											
2009											
2010											
2011											
2012											
2013				***************************************							
2014		-									

A. The chart on the following page provides the information listed on an annual basis for seasonal peak activations in Tampa Electric's Commercial Demand Response Program. The Company's Commercial Demand Response Program was initiated in March 2008. The electronic version of this table is available in the enclosed CD.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 22 PAGE 2 OF 2

FILED: APRIL 27, 2015

	Commercial Demand Response										
			Summer Peak		Winter Peak						
Year	Average Number of Participants	Activated During Peak?	# of Participants Activated	Capacity Activated	Activated During Peak?	# of Participants Activated	Capacity Activated				
		(Y/N)	(MW)	(MW)	(Y/N)	(MW)	(MW)				
2005											
2006						·					
2007											
2008	59	Υ	77	29	Υ	84	35				
2009	84	Υ	82	32	Υ	88	31				
2010	96	Υ	101	35	Υ	103	35				
2011	102	Υ	99	35	Υ	100	38				
2012	100	Υ	100	38	Υ	101	39				
2013	100	Υ	98	39	Υ	98	40				
2014	95	Υ	85	39	Υ	123	40				

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 23 PAGE 1 OF 1 FILED: APRIL 27, 2015

- 23. For each demand response program, please describe whether the current credit is based upon TECO's most recent avoided unit. If not, please explain why, and provide how the credit was derived.
- **A.** Tampa Electric's Commercial Demand Response Program's current credit is based upon the Company's most recent avoided unit.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 24 PAGE 1 OF 1 FILED: APRIL 27, 2015

- **24.** For each demand response program, please provide the credit amount that would reduce the value of the program's RIM Test to 1.0.
- A. Tampa Electric's Commercial Demand Response program is a turn-key program. The credit (incentive) amount is included as a portion of the administrative cost per participant which has an estimated cost of \$42,746. The administrative cost per participant could be increased to \$65,591 which would reduce the value of the programs RIM Test to 1.0.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 25 PAGE 1 OF 1 FILED: APRIL 27, 2015

- 25. For each demand response program, please discuss whether TECO considered reducing the credit provided to customers. As part of this response, please discuss the impacts a lower credit would have on existing participation levels.
- A. Tampa Electric evaluated the credit for the Commercial Demand Response Program during development of the 2015-2024 DSM Plan. The cost-effectiveness test results for the program combined with the current program needs and customer participation levels did not merit reducing or increasing the credit provided to customers. The Company would expect more difficulty in attracting customers to this program if the decision was made to lower the credit amount.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 26 PAGE 1 OF 1 FILED: APRIL 27, 2015

- **26.** Please discuss the methodology used to estimate expected participation for each program proposed by TECO.
- A. Tampa Electric evaluated each program for projected participation rates as part of the development for the 2015-2024 DSM. The evaluation methodology to determine the projected participation rates was consistent amongst all DSM Programs. To evaluate the anticipated future participation levels, the Company first evaluated historical actual participation of each current DSM Program. This actual participation rate was then projected over the next ten years to establish an initial future participation rates while holding the current program requirements and incentives at the prior DSM Plan levels. These future participation rates were then adjusted based upon changes to program requirements and incentive levels to obtain future potential participation rates. These participation rates were evaluated for finalization if all of the proposed DSM programs collectively would successfully achieve the Commission approved DSM goals on an annual basis.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 27 PAGE 1 OF 1

FILED: APRIL 27, 2015

- 27. Please compare the projected participation rates of continuing programs with the actual participation rates for the previous 10 years (or less, depending upon the start date of the program).
- **A.** The tables below compare the projected participation rate of continuing programs with the actual participation rates for the previous ten years.

Year	Service Area Customers	Actual Program Participants	Program Participation Rate
2005	629,092	17,758	2.82%
2006	646,801	19,165	2.96%
2007	659,161	19,280	2.92%
2008	659,793	21,745	3.30%
2009	659,002	29,760	4.52%
2010	663,164	32,930	4.97%
2011	667,960	31,686	4.74%
2012	676,274	34,073	5.04%
2013	686,736	35,515	5.17%
2014	698,065	37,911	5.43%

Year	Projected Service Area Customers	Projected Program Participants	Program Participation Rate
2015	708,283	17,574	2.48%
2016	719,893	18,430	2.56%
2017	731,961	18,992	2.59%
2018	744,159	19,509	2.62%
2019	755,990	20,280	2.68%
2020	767,929	20,235	2.64%
2021	779,242	20,235	2.60%
2022	790,021	20,036	2.54%
2023	800,469	19,936	2.49%
2024	810,594	19,836	2.45%

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 1 OF 33

FILED: APRIL 27, 2015

- **28.** For all existing DSM programs that are being continued, please complete the chart below.
 - a. For any existing program that TECO is projecting lesser participation than has been previously realized, please explain the reason for the decrease in the projection.
 - b. For any existing program that TECO is projecting greater participation than has been previously realized, please explain the reason for the increase in the projection.

	[Program Name]		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)	
2008			
2009			
2010			
2011			
2012			
2013	You down the same		
2014			
2015			
2016			
2017			
2018			
2019			
2020			
2021		71.71	
2022			
2023			
2024			

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 2 OF 33 FILED: APRIL 27, 2015

A. a. The DSM Programs that Tampa Electric is projecting lesser participation than has been previously realized and the main reason for this decrease in projection is included below:

Residential Walk-Through Audit (Free): Tampa Electric is projecting a decrease in Residential Walk-Through Audit participation due to the removal of the eight free CFLs included as part of the energy audit and balancing the cost of the program with the new Commissioned approved DSM goals.

Residential Walk-Through Audit (Free)		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	5,807	
2009	8,681	
2010	10,291	
2011	8,652	
2012	7,908	
2013	7,743	
2014	9,520	
2015		6,000
2016		6,000
2017		6,000
2018		6,000
2019		6,000
2020		6,000
2021		6,000
2022		6,000
2023		6,000
2024		6,000

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 3 OF 33 FILED: APRIL 27, 2015

Residential Customer Assisted Energy Audit: Tampa Electric is projecting a decrease in Residential Customer Assisted Energy Audits participation due to the removal of the eight free CFLs included as part of the energy audit and balancing the cost of the program with the new Commissioned approved DSM goals.

Residential Customer Assisted Energy Audit		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	1,851	
2009	1,905	
2010	2,072	
2011	1,449	
2012	1,065	
2013	680	
2014	1,067	
2015		500
2016	·	500
2017		500
2018		500
2019		500
2020		500
2021	·	500
2022		500
2023		500
2024		500

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 4 OF 33 FILED: APRIL 27, 2015

Residential Ceiling Insulation: Tampa Electric is projecting a decrease in Residential Ceiling Insulation participation due to a decrease in the rebate payment amount. After 2018, the Company projects a slight increase due to projected customer growth.

Residential Ceiling Insulation		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	1,267	
2009	1,558	
2010	2,126	
2011	4,626	
2012	11,367	
2013	10,059	
2014	5,880	
2015		1,000
2016		1,000
2017		1,000
2018		1,000
2019		1,500
2020		1,500
2021		1,500
2022		1,500
2023		1,500
2024		1,500

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 5 OF 33 FILED: APRIL 27, 2015

Residential Duct Repair: Tampa Electric is projecting a decrease in Residential Duct Repair participation due to a decrease in the rebate payment amount.

Residential Duct Repair		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	9,056	
2009	9,772	
2010	3,907	
2011	4,215	
2012	2,272	
2013	1,708	
2014	1,706	
2015		750
2016		750
2017		750
2018		750
2019		500
2020		500
2021		500
2022		500
2023		500
2024		500

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 6 OF 33 FILED: APRIL 27, 2015

Energy Education, Awareness and Agency Outreach: Tampa Electric is projecting a decrease in Energy Education, Awareness and Agency Outreach participation due to balancing the cost of the program with the new Commissioned approved DSM goals.

Energy Education, Awareness and Agency Outreach		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	Not Applicable.	
2009	Not Applicable.	
2010	Not Applicable.	
2011	26	
2012	434	
2013	1,597	
2014	1,124	
2015		500
2016		500
2017		500
2018		500
2019		500
2020		500
2021	· · · · · · · · · · · · · · · · · · ·	500
2022	1/ 1/ 1/ 1/ 1/ 1/ 1/ 1/ 1/ 1/ 1/ 1/ 1/ 1	500
2023		500
2024		500

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 7 OF 33 FILED: APRIL 27, 2015

Energy Star for New Homes: Tampa Electric is projecting a decrease in Energy Star for New Homes participation as compared to the prior New Construction program due to a reduction in the overall potential rebate payment amount.

Energy Star for New Homes		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	2	
2009	257	
2010	854	
2011	1,745	
2012	1,720	
2013	2,381	
2014	2,277	
2015		100
2016		200
2017		250
2018	197 A 1874 PF 8	250
2019		250
2020		250
2021		250
2022		250
2023		250
2024		250

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 8 OF 33

FILED: APRIL 27, 2015

Residential Heating and Cooling: Tampa Electric is projecting a decrease in Residential Heating and Cooling participation due to a decrease in the rebate payment amount.

Residential Heating and Cooling		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	1,918	
2009	3,529	
2010	5,926	· _
2011	4,501	
2012	3,138	
2013	3,844	
2014	4,292	
2015		1,000
2016		1,000
2017		950
2018		900
2019		900
2020	MATERIAL TO THE TOTAL THE TOTAL TO THE TOTAL	900
2021		900
2022		700
2023		600
2024		500

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 9 OF 33 FILED: APRIL 27, 2015

Neighborhood Weatherization: Tampa Electric is projecting a decrease in Neighborhood Weatherization participation due to balancing the cost of the program with the new Commissioned approved DSM goals.

Neighborhood Weatherization		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	126	\$115 MANAGES 15 WAS 15 MANAGES 15
2009	207	
2010	43	
2011	305	A STATE OF THE STA
2012	3,387	
2013	4,048	·
2014	7,859	
2015		5,000
2016		5,750
2017		6,250
2018		6,750
2019		7,000
2020		7,000
2021		7,000
2022		7,000
2023		7,000
2024		7,000

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 10 OF 33 FILED: APRIL 27, 2015

Residential Widow Replacement: Tampa Electric is projecting a decrease in Residential Window Replacement participation due to a decrease in the rebate payment amount.

	Residential Window Replacement		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)	
2008	274		
2009	702	***	
2010	1,349		
2011	2,055		
2012	1,136		
2013	1,362		
2014	1,619		
2015		500	
2016		500	
2017		500	
2018		500	
2019	THE THE PARTY OF T	500	
2020		500	
2021	www.	500	
2022		500	
2023	- Marillan	500	
2024		500	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 11 OF 33 FILED: APRIL 27, 2015

Commercial Ceiling Insulation: Tampa Electric is projecting a decrease in Commercial Ceiling Insulation participation due to a decrease in the rebate payment amount.

	Commercial Ceiling Insulation		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)	
2008	2		
2009	4		
2010	5		
2011	32		
2012	79		
2013	92		
2014	37	-	
2015		50	
2016	4.2.000	50	
2017	4.4.1.1994	50	
2018	4.2.4	50	
2019		50	
2020		50	
2021		50	
2022		50	
2023		50	
2024		50	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 12 OF 33 FILED: APRIL 27, 2015

Commercial Chiller: Tampa Electric is projecting a decrease in Commercial Chiller participation due to a decrease in the rebate payment amount.

	Commercial Chiller		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)	
2008	3		
2009	17		
2010	4		
2011	3		
2012	4		
2013	8		
2014	10		
2015		5	
2016		5	
2017		5	
2018		5	
2019		5	
2020		5	
2021		5	
2022		5	
2023		5	
2024		5	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 13 OF 33 FILED: APRIL 27, 2015

Cool Roof: Tampa Electric is projecting a decrease in Cool Roof participation due to a decrease in the rebate payment amount.

	Cool Roof		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)	
2008			
2009			
2010	0		
2011	25		
2012	49		
2013	43		
2014	32		
2015		20	
2016		20	
2017	· 	20	
2018		20	
2019		20	
2020		20	
2021		20	
2022		20	
2023		20	
2024		20	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 14 OF 33 FILED: APRIL 27, 2015

Commercial Cooling: Tampa Electric is projecting a decrease in Commercial Cooling participation due to a decrease in the rebate payment amount.

Commercial Cooling		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	256	
2009	245	
2010	109	
2011	195	
2012	58	
2013	197	
2014	375	
2015		100
2016		100
2017		100
2018		100
2019		100
2020		100
2021		100
2022		100
2023		100
2024		100

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 15 OF 33 FILED: APRIL 27, 2015

Demand Response: Tampa Electric is projecting a decrease in Demand Response participation due to an expected decreased need for additional capacity for the program.

-	Demand Response		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)	
2008	82		
2009	0		
2010	0		
2011	18		
2012	7		
2013	7		
2014	19		
2015		1	
2016		1	
2017		1	
2018		1	
2019		1	
2020		1	
2021		1	
2022		1	
2023		1	
2024		1	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 16 OF 33 FILED: APRIL 27, 2015

Commercial Duct Repair: Tampa Electric is projecting a decrease in Commercial Duct Repair participation due to a decrease in the rebate payment amount.

Commercial Duct Repair		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	52	
2009	1,185	·
2010	4,725	
2011	2,655	
2012	643	
2013	476	
2014	172	
2015		250
2016		250
2017		250
2018		250
2019		250
2020		200
2021		200
2022		200
2023		200
2024		200

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 17 OF 33 FILED: APRIL 27, 2015

Lighting Conditioned Space: Tampa Electric is projecting a decrease in Lighting Conditioned Space participation due to a decrease in the rebate payment amount.

Lighting Conditioned Space		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	35	
2009	114	****
2010	114	
2011	111	
2012	58	
2013	48	
2014	112	
2015		25
2016		25
2017		25
2018	Angel Mary Myross and	25
2019	······································	40
2020		40
2021		40
2022		40
2023		40
2024		40

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 18 OF 33

FILED: APRIL 27, 2015

Lighting Non-Conditioned Space: Tampa Electric is projecting a decrease in Lighting Non-Conditioned Space participation due to a decrease in the rebate payment amount.

Lighting Non-Conditioned Space		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	15	
2009	26	
2010	15	
2011	35	
2012	18	
2013	22	
2014	21	
2015		5
2016		5
2017		5
2018		5
2019		5
2020		10
2021		10
2022		10
2023		10
2024		10

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 19 OF 33 FILED: APRIL 27, 2015

Lighting Occupancy Sensors: Tampa Electric is projecting a decrease in Lighting Occupancy Sensors participation due to a decrease in the rebate payment amount.

Lighting Occupancy Sensors		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	2	
2009	20	
2010	45	
2011	34	
2012	11	
2013	37	
2014	48	
2015		15
2016		15
2017		15
2018		15
2019		15
2020		15
2021		15
2022		15
2023		15
2024		15

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 20 OF 33 FILED: APRIL 27, 2015

Standby Generator: Tampa Electric is projecting a decrease in Standby Generator participation due to the emissions rules enacted by the Environmental Protection Agency on generators utilized as part of a utility load management program.

Standby Generator		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	38	
2009	5	
2010	7	
2011	6	
2012	2	
2013	6	
2014	2	
2015		1
2016		1
2017		1
2018		1
2019		1
2020		1
2021		1
2022		1
2023		1
2024		1

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 21 OF 33 FILED: APRIL 27, 2015

b. The DSM Programs that Tampa Electric is projecting greater participation than has been previously realized and the main reason for this increase in projection is included below:

Residential Computer Assisted Energy Audit (RCS): Tampa Electric is projecting limited Residential Computer Assisted Energy Audit (RCS) participation due to the nationally recognized professional certifications the Residential Energy Analysts now have which is expected to lead to a limited number of paid energy audits.

Residential Computer Assisted Energy Audit (RCS)		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	0	
2009	0	
2010	0	
2011	0	
2012	0	
2013	0	
2014	0	
2015		1
2016		1
2017		1
2018	n	1
2019	*****	1
2020		1
2021		1
2022		1
2023		1
2024		1

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 22 OF 33 FILED: APRIL 27, 2015

Residential Electronically Commutated Motor (ECM): Tampa Electric is projecting an increase in Residential Electronically Commutated Motor (ECM) participation due to the technology still gaining awareness in the United States.

Residential Electronically Commutated Motor (ECM)		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008		
2009		
2010		
2011	0	
2012	0	
2013	1	
2014	0	
2015		5
2016		10
2017		20
2018		35
2019		40
2020		40
2021		40
2022		40
2023		40
2024		40

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 23 OF 33

FILED: APRIL 27, 2015

Energy Planner-Residential Price Responsive Load Management: Tampa Electric is projecting an increase in Energy Planner-Residential Price Responsive Load Management participation due to the program still being relatively new and the expectation of gaining some customers that switch over as the PrimeTime program is retired.

Energy Planner-Residential Price Responsive Load Management		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	-13	
2009	517	
2010	674	
2011	489	
2012	109	
2013	243	
2014	1007	
2015		1,000
2016		1,000
2017		1,000
2018		1,000
2019		1,250
2020		1,250
2021		1,250
2022		1,250
2023		1,250
2024		1,250

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 24 OF 33 FILED: APRIL 27, 2015

Residential Wall Insulation: Tampa Electric is projecting a slight increase in Residential Wall Insulation participation due to discontinuing other building envelope programs which should bring more attention to this program.

Residential Wall Insulation		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	2	
2009	6	
2010	12	
2011	3	
2012	13	
2013	13	
2014	14	
2015		28
2016		28
2017		28
2018		28
2019	7.7115	28
2020		28
2021		28
2022		28
2023		28
2024		28

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 25 OF 33

FILED: APRIL 27, 2015

Commercial/Industrial Audit (Free): Tampa Electric is projecting an increase in Commercial/Industrial Audit (Free) participation due to the partnership opportunities in performing energy audits for Government and County agencies.

	Commercial/Industrial Audit (Free)		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)	
2008	970		
2009	1009		
2010	652		
2011	505		
2012	587		
2013	897		
2014	713		
2015		700	
2016		700	
2017		750	
2018		800	
2019		800	
2020		800	
2021		800	
2022		800	
2023		800	
2024		800	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 26 OF 33 FILED: APRIL 27, 2015

Comprehensive Commercial/Industrial Audit (Paid): Tampa Electric is projecting an increase in Comprehensive Commercial/Industrial Audit (Paid) participation due to increased awareness of the value of having this energy audit performed.

Comprehensive Commercial/Industrial Audit (Paid)		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	0	
2009	0	-
2010	0	
2011	0	, ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,
2012	0	
2013	3	7.00
2014	3	
2015		4
2016		4
2017		4
2018		4
2019		4
2020		4
2021		4
2022		4
2023	**************************************	4
2024		4

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 27 OF 33 FILED: APRIL 27, 2015

Commercial Load Management (GSLM 1): Tampa Electric is projecting a slight increase in Commercial Load Management (GSLM 1) participation due to searching for potential replacement technologies to support this program.

Commercial Load Management (GSLM 1)		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008	0	
2009	1	
2010	0	
2011	0	
2012	0	
2013	0	
2014	0	
2015		2
2016		2
2017		2
2018		2
2019		2
2020		2
2021		2
2022		2
2023		2
2024		2

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 28 OF 33 FILED: APRIL 27, 2015

Conservation Value: Tampa Electric is projecting a slight increase in Conservation Value participation due to technology development in the energy management market.

	Conservation Value		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)	
2008	0		
2009	0		
2010	0		
2011	0		
2012	7		
2013	0		
2014	2		
2015		2	
2016		2	
2017		2	
2018		2	
2019		2	
2020		2	
2021		2	
2022		2	
2023		2	
2024		2	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 29 OF 33 FILED: APRIL 27, 2015

Commercial Electronically Commutated Motor (ECM): Tampa Electric is projecting an increase in Commercial Electronically Commutated Motors (ECM) due to the technology still gaining awareness in the United States.

Commercial Electronically Commutated Motors (ECM)		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008		
2009		
2010		-
2011	0	
2012	0	
2013	0	
2014	0	
2015	4.00	5
2016		5
2017		5
2018	7,	5
2019		5
2020		5
2021		5
2022		5
2023		5
2024		5

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 30 OF 33 FILED: APRIL 27, 2015

Refrigeration Anti-Condensate Control: Tampa Electric is projecting an increase in Refrigeration Anti-Condensate Control due to the technology still gaining awareness in the United States.

	Refrigeration Anti-Condensate Control		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)	
2008	0		
2009	0		
2010	0		
2011	0		
2012	0		
2013	0		
2014	0		
2015		1	
2016		1	
2017		2	
2018		2	
2019	Will a II.	3	
2020		3	
2021		3	
2022		4	
2023		4	
2024		4	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 31 OF 33 FILED: APRIL 27, 2015

Thermal Energy Storage: Tampa Electric is projecting an increase in Thermal Energy Storage participation as this is a new program.

Thermal Energy Storage		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)
2008		A*
2009		
2010		
2011		
2012		
2013		
2014		
2015		1
2016	·	2
2017		3
2018		5
2019		5
2020		5
2021		5
2022		5
2023		5
2024		5

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 32 OF 33 FILED: APRIL 27, 2015

Commercial Wall Insulation: Tampa Electric is projecting a slight increase in Commercial Wall Insulation participation due to discontinuing other building envelope programs which should bring more attention to this program.

	Commercial Wall Insulation		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)	
2008	0		
2009	0		
2010	0		
2011	1		
2012	1		
2013	0		
2014	0		
2015		2	
2016		2	
2017		2	
2018		2	
2019		2	
2020		2	
2021		2	
2022		2	
2023		2	
2024		2	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 28 PAGE 33 OF 33 FILED: APRIL 27, 2015

Commercial Water Heating: Tampa Electric is projecting a slight increase in Commercial Water Heating participation due to raising the rebate payment amount.

	Commercial Water Heating		
Year	Actual Annual Number of Program Participants	Projected Annual Number of Program Participants (Docket No. 150081)	
2008	0		
2009	0		
2010	0		
2011	0		
2012	0		
2013	0		
2014	0		
2015		1	
2016		1	
2017		1	
2018		1	
2019		1	
2020		1	
2021		1	
2022		1	
2023		1	
2024		1	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 29 PAGE 1 OF 1 FILED: APRIL 27, 2015

- 29. Please describe how TECO determined the rebate amounts provided in its DSM Plan.
- A. Tampa Electric believes its proposed 2015 2024 DSM Plan is the most costeffective approach to meet the company's Commission-set goals. The Company used the following guiding methodology in developing the DSM Plan
 - Follow all Commission rules and guidelines.
 - Produce a cost-effective DSM Plan that benefits all of Tampa Electric's rate payers.
 - Retain and balance DSM Programs as much as practical to ensure the individual DSM program will be sustainable over at least the next five years.
 - Recognize existing rebate levels may need to be adjusted to prevent unnecessary expenses to achieve new Commission approved DSM goals.
 - Ensure that all customers and all rate classes have the opportunity to take advantage of DSM Programs
 - Evaluate new rebate amounts in cost-effectiveness tests and adjust if warranted based upon cost-effectiveness.
 - Evaluate new rebate to pay no more than 50 percent of the incremental equipment cost.
 - Examine historical and projected participation levels.
 - Evaluate participation of individual programs and programs collectively with new rebate amounts and ensure the total Commission approved goals can be achieved.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 30 PAGE 1 OF 3

FILED: APRIL 27, 2015

30. For each rebate listed on the table below, please discuss both the reason for the rebate revision, as well as the methodology used to revise and calculate each rebate.

Rebate Revisions		te Revisions
Title of Rebate	Reason(s)	Methodology
Residential Ceiling Insulation		
Residential Duct Repair		
Residential Electronically		
Commutated Motors		
Residential Heating and Cooling		
Residential Wall Insulation		
Residential Window Replacement		
Commercial Ceiling Insulation		
Commercial Chiller		
Conservation Value		
Cool Roof		
Commercial Cooling-Direct		
Expansion ("DX:)		
Commercial Duct Repair		
Commercial Electronically		
Commutated Motors ("ECM")		
Lighting Conditioned Space		
Lighting Non-Conditioned Space		
Lighting Occupancy Sensors		
Refrigeration Anti-Condensate		
Control		
Commercial Wall Insulation		
Commercial Water Heating		

A. Tampa Electric made needed modifications to its existing residential, commercial and industrial DSM programs that will be offered with the Company's 2015–2024 DSM Plan. The table on the following page lists the reason(s) for the change in rebate amount from the 2010-2019 DSM Plan. The methodology used to revise and calculate these rebate changes was consistently applied as described in Tampa Electric's response to Staff's 1st Data Request No. 29.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 30 PAGE 2 OF 3

FILED: APRIL 27, 2015

	Rebate	Revisions
Title of Rebate	Reason(s)	Methodology
Residential Ceiling Insulation	Fails RIM at prior rebate	Note 1
Residential Duct Repair	Prior rebate exceeds 50	Note 1
	percent of the current	
	equipment cost.	
Residential Electronically	Fails RIM at prior	Note 1
Commutated Motors	rebate.	
Residential Heating and	Fails RIM at prior	Note 1
Cooling	rebate; Prior rebate	
	exceeds 50 percent of	
	the current incremental	
	equipment cost.	
Residential Wall Insulation	Fails RIM at prior	Note 1
	rebate; Prior rebate	
	exceeds 50 percent of	
	the current incremental	
	equipment cost.	
Residential Window	Prior rebate exceeds 50	Note 1
Replacement	percent of the current	
	incremental equipment	
	cost.	
Commercial Ceiling Insulation	Prior rebate exceeds 50	Note 1
	percent of the current	
	incremental equipment	
	cost.	
Commercial Chiller	Fails RIM at prior	Note 1
	rebate; Prior rebate	
	exceeds 50 percent of	
	the current incremental	
	equipment cost.	
Conservation Value	Fails RIM at prior rebate	Note 1
Cool Roof	Fails RIM and TRC at	Note 1
	prior rebate	
Commercial Cooling-Direct	Fails RIM at prior rebate	Note 1
Expansion ("DX:)		
Commercial Duct Repair	Prior rebate exceeds 50	Note 1
·	percent of the current	
	incremental equipment	
	cost.	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 30 PAGE 3 OF 3

FILED: APRIL 27, 2015

Commercially Electronically Commutated Motors ("ECM")	Prior rebate exceeds 50 percent of the current incremental equipment cost.	Note 1
Lighting Conditioned Space	Participation rates with current rebate level unnecessary for goal achievement.	Note 1
Lighting Non-Conditioned Space	Fails RIM and TRC at prior rebate	Note 1
Lighting Occupancy Sensors	Fails RIM at prior rebate; Prior rebate exceeds 50 percent of the current incremental equipment cost.	Note 1
Refrigeration Anti-Condensate Control	Fails RIM at prior rebate; Prior rebate exceeds 50 percent of the current incremental equipment cost.	Note 1
Commercial Wall Insulation	Fails RIM at prior rebate;	Note 1
Commercial Water Heating	Prior rebate results in RIM value of 1.17; Prior rebate has led to zero participants.	Note 1

Note 1: See Staff's 1st Data Request, Request No. 29.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 31 PAGE 1 OF 1 FILED: APRIL 27, 2015

- **31.** Please describe how TECO selected its new programs to implement.
- A. Tampa Electric chose in the 2015-2024 DSM Plan to offer Thermal Energy Storage as a new program. Historically, Tampa Electric offers programs to customers that have both been studied and evaluated through the Conservation R&D Program or the Conservation Value Program. When Tampa Electric studies a measure to become a stand-alone program, the Company ensures the program will meet all of the Commission's rules, be cost-effective to offer to customers, be commercially available in the Florida marketplace, be able to be efficiently managed, and the technology must produce reliable results in energy and/or demand savings within Florida's climate. In the past Thermal Energy Storage has been rebated through the Conservation Value Program where it has proven that it can be a stand-alone program. Tampa Electric followed the same protocols in the establishment of the current Commercial Chiller Program which has been offered since 2008.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 32 PAGE 1 OF 2 FILED: APRIL 27, 2015

- 32. Please refer to page 3 of TECO's DSM Plan, where TECO its plan to discontinue the residential Heating, Ventilating, and Air Conditioning (HVAC) Re-commissioning program. TECO stated that the program is not cost-effective based on the RIM and TRC tests. The stated main driver for this decision is a shortened useful life of the program, compared to the prior goal setting period.
 - a. What were the additional drivers, if any, that caused this program to fail the RIM and TRC tests in the instant proceeding as compared to the prior goal-setting period?
 - b. What was the assumed useful life of the measure or program during the prior goal-setting period?
 - c. Please explain why TECO believes that the useful life of the measure or program has been shortened, and provide the documents relied on by TECO in response to this question.
 - d. What is the minimum number of years of useful life that would have been necessary for the program to be cost-effective?
- A. a. The other specific driver that influenced this program to fail costeffectiveness was a slight reduction in demand savings as compared
 to the prior goal setting period. Other common drivers that influenced
 this program to fail cost effectiveness would be considered to be
 influencing all programs in this same direction. Examples of these
 common drivers are lower fuel prices, lower K Factor for Generation
 and lower K Factor for Transmission and Distribution.
 - b. Tampa Electric used a measure life (study period for conservation program) in the 2010-2019 goal-setting period of ten years.
 - c. Tampa Electric used a measure life (study period for conservation program) of five years in the 2015-2024 DSM plan cost-effectiveness evaluations. This measure life was taken directly from the updated ITRON Technical Potential Study which was the same measure life utilized to develop the DSM goals. The Excel spreadsheet is provided to show the useful life of the measure that was taken.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 32 PAGE 2 OF 2 FILED: APRIL 27, 2015

d. The minimum number of years of useful life that would have been necessary for the Residential HVAC Re-Commissioning program to be cost-effective is seven years with the rebate set to zero.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 33 PAGE 1 OF 2 FILED: APRIL 27, 2015

- 33. Please refer to page 3 of TECO's DSM Plan, where TECO discusses its plan to discontinue the Residential Window Film program. TECO stated that the program is not cost-effective based on the RIM and TRC tests. The stated main drivers are a shortened useful life, as well as reductions in both demand and energy savings, when compared to the prior goal-setting period.
 - a. Please indicate whether TECO is referring to a shortened useful life of the actual residential window film product itself, or referring to a shortened useful life of the entire program.
 - b If TECO is referring to a shortened useful life of the window film product itself, please:
 - Explain why TECO believes that the useful life of the window film product has been shortened;
 - Provide the document(s) relied on by TECO in response to this question; and
 - Provide the estimated useful life of the window film product that was used in both the instant docket and the prior goal-setting docket.
 - c. If TECO is referring to a shortened useful life of the entire program, please:
 - Explain why TECO believes that the useful life of the program has been shortened, and
 - Provide the document(s) relied on by TECO in response to this question.
 - d. What additional drivers, if any, caused this program to fail the RIM and TRC tests in the instant proceeding as compared to the prior goal-setting period?
 - e. What is the minimum number of years of useful life that would have been necessary for the program to be cost-effective?
- **A.** a. Tampa Electric is referring to the actual useful life of the residential window film product.
 - Tampa Electric used a measure life (study period for conservation program) of ten years in the 2015-2024 DSM plan cost-effectiveness evaluations. This measure life was taken directly from the updated

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 33 PAGE 2 OF 2 FILED: APRIL 27, 2015

ITRON Technical Potential Study which was the same measure life utilized to develop the DSM goals. The Excel spreadsheet is provided to show the useful life of the measure that was taken. The measure life utilized in the 2010-2019 goal setting and subsequent DSM plan was 23 years.

- c. Tampa Electric is referring to the useful life of the window film product, not the useful life of the entire program.
- d. The other drivers that influenced this program to fail cost-effectiveness were common changes to all DSM program cost effectiveness inputs. These common input changes would influence all programs in this same direction. Examples of these common drivers are lower fuel prices, lower K Factor for Generation and lower K Factor for Transmission and Distribution.
- e. The minimum number of years of useful life that would have been necessary for the Residential Window Film program to be cost-effective is 15 years with the rebate set to zero.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 34 PAGE 1 OF 2 FILED: APRIL 27, 2015

- 34. Please refer to page 3 of TECO's DSM Plan, where TECO discusses its plan to discontinue the Commercial HVAC Re-commissioning program. TECO stated that the program is not cost-effective based on the RIM test. The stated reasons for failing the RIM test are a reduction in demand savings of 49 percent and a shortened useful life of 6 years as compared to the prior goal-setting period.
 - a. What are the reasons for a reduction of demand savings of 49 percent?
 - b. What was the useful life of the measure or program during the prior goal-setting period?
 - c. Please explain why TECO believes that the useful life of the program has been shortened, and provide the documents relied on by TECO in response to this question.
 - d. What is the minimum number of years of useful life that would have been necessary for the program to be cost-effective?
- A. Tampa Electric used the demand and energy savings based upon the updated ITRON Technical Potential Study which was the same demand and energy utilized to develop the Commission approved 2019-2024 DSM goals. Tampa Electric believes the reduction in demand savings is mainly due to increases in overall efficiency of HVAC equipment installed in commercial facilities as compared to five years ago which was updated as part of the study.
 - b. Tampa Electric used a measure life (study period for conservation program) in the 2010-2019 goal-setting period of ten years
 - c. Tampa Electric used a measure life (study period for conservation program) of six years in the 2015-2024 DSM plan cost-effectiveness evaluations. This measure life was taken directly from the updated ITRON Technical Potential Study which was the same measure life utilized to develop the Commission approved 2019-2024 DSM goals. The Excel spreadsheet is provided to show the useful life of the measure that was taken.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 34 PAGE 2 OF 2 FILED: APRIL 27, 2015

d. The minimum number of years of useful life that would have been necessary for the Commercial HVAC Re-Commissioning program to be cost-effective is ten years with the rebate set to zero.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 35 PAGE 1 OF 3

FILED: APRIL 27, 2015

- 35. Please refer to pages 3 and 4 of TECO's DSM Plan, where TECO discusses its plan to discontinue the Commercial Window Film program. The reasons stated for TECO's decision are: that the program is not a cost-effective offering based on the RIM and TRC tests, a shortened useful life of ten years, and a 136 percent increase in incremental installation costs as compared to the prior goal-setting period.
 - a. What was the useful life of the measure or program during the prior goal-setting period?
 - b. Is TECO referring to a shortened useful life of the actual commercial window film product itself, or the commercial window film program?
 - c. If TECO is referring to a shortened useful life of the window film product itself, please:
 - Explain why TECO believes that the useful life of the window film product has been shortened;
 - Provide the document(s) relied on by TECO in response to this question; and
 - Provide the estimated useful life of the window film product that was used in both the instant docket and the prior goal-setting docket.
 - d. If TECO is referring to a shortened useful life of the entire program, please:
 - Explain why TECO believes that the useful life of the program has been shortened, and
 - Provide the document(s) relied on by TECO in response to this question.
 - e. What is the minimum number of years of useful life that would have been necessary for the program to be cost-effective?
 - f. Please list the reasons why the incremental installation costs for commercial facilities increased 136 percent as compared to the prior goal-setting period.
 - g. Did TECO consider the possibility of any cost saving methods that might have offset some or all of the incremental increases in the installation costs for this program?

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 35 PAGE 2 OF 3 FILED: APRIL 27, 2015

- h. If the response to (g) is affirmative, please explain.
- A. a. Tampa Electric used a measure life (study period for conservation program) in the 2010-2019 goal-setting period of 25 years
 - b. Tampa Electric is referring to the actual useful life of the commercial window film product.
 - c. Tampa Electric used a measure life (study period for conservation program) of ten years in the 2015-2024 DSM plan cost-effectiveness evaluations. This measure life was taken directly from the updated ITRON Technical Potential Study which was the same measure life utilized to develop the Commission approved 2015-2024 DSM goals. The Excel spreadsheet is provided to show the useful life of the measure that was taken.
 - d. Tampa Electric is referring to the useful life of the window film product, not the useful life of the entire program.
 - e. The minimum number of years of useful life that would have been necessary for the Commercial Window Film program to be cost-effective is 19 years with the rebate set to zero.
 - f. Tampa Electric tracks participants and associated data with each commercial window film installation. The incremental cost of overall installations has increased by the associated 136% as given in the 2015-2024 DSM Plan as compared to the prior goal setting period. Tampa Electric believes this higher incremental cost is mainly due to higher quality film being produced, selected and installed in commercial facilities. The shading coefficient of window film during the prior goal setting period was 0.50. The average shading coefficient for rebated jobs over the past five years was 0.31.
 - g. Tampa Electric did evaluate the potential for offsetting some or all of the incremental increase seen in the overall installation costs that are charged to the end use customers by window film manufacturers or vendors and window film installers and evaluated this offset to be impractical and imprudent. Tampa Electric evaluated this by setting the administrative and incentive costs to zero. The resulting RIM and TRC values with both of these costs set to zero are 0.83 and 0.91

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 35 PAGE 3 OF 3 FILED: APRIL 27, 2015

respectively. These resultant cost-effectiveness values prevent offsetting the associated costs of the program to make it cost effective to offer.

h. Not applicable.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 36 PAGE 1 OF 2 FILED: APRIL 27, 2015

- 36. Please refer to page 7 of TECO's DSM Plan, where TECO discusses its Standby Generator, Cogeneration, Renewable Energy and Renewable Energy Systems Initiative. TECO stated that there were no modifications necessary to these programs. Please discuss the reason(s) why no modifications were necessary to these programs.
- A. Tampa Electric did not make program modifications to the Standby Generator, Cogeneration, Renewable Energy and Renewable Energy Systems Initiative for the following reasons:

Standby Generator: Tampa Electric's Standby Generator program's most recent incentive adjustment was approved by the Commission as a stipulation in the rate case Docket No. 130040-El, Order No. PSC-13-0443-FOF-El, issued September 30, 2013. The cost benefit analysis conducted as part of the 2015-2024 DSM Plan preparation showed the Standby Generator program as a cost-effective program with a RIM value of 13.73, a PCT value of 13.36 and a TRC value of 9.41. Because of these cost-effectiveness values coupled with the fact that the current approved incentive amount is motivating customers to participate in the Standby Generator program justifies why no modifications were necessary.

Cogeneration: Tampa Electric's Cogeneration program is not counted toward DSM goals; therefore, a DSM cost benefit analysis is not required and has not been performed. However, Cogeneration is an approved conservation program and the company is allowed to recover its unreimbursed costs for program activity through the ECCR clause. Specifically, the administrative expenses of Cogeneration are recovered through the ECCR clause as allowed by Docket No. 800604-EG, Order No. 9715, issued December 17, 1980. The company has included Cogeneration in its 2015-2024 DSM Plan to indicate the continuation of program accountability through the ECCR clause as originally contemplated by the Commission. Therefore, no DSM cost-effectiveness analysis or modifications are necessary.

Renewable Energy: Tampa Electric's Renewable Energy program does not contribute to the company's efforts to accomplish its DSM goals. It is simply a voluntary program that is self-funded by its participants. In Docket No. 060678-EG, Order No. PSC-06-1063-TRF-EG, issued December 26, 2006, the Commission allowed Tampa Electric to utilize the ECCR clause to account for expenses and revenues associated with the program. The company has included its Renewable Energy Program in its 2015-2024 DSM

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 36 PAGE 2 OF 2 FILED: APRIL 27, 2015

Plan to indicate the continuation of program accountability through the ECCR clause as originally contemplated by the Commission. Therefore, no DSM cost-effectiveness analysis or modifications are necessary.

Renewable Energy Systems Initiative: Tampa Electric's Renewable Energy Systems Initiative (Solar Pilot) was part of the 2010-2019 DSM goals setting process. This program was offered for five years. Because the decision was made in Docket No. 140002 to retire this pilot program at the end of 2015 and any modifications would not make the pilot program cost effective. Tampa Electric did not present any cost-benefit analyses or make any modifications of this program in the 2015-2024 DSM Plan.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 37 PAGE 1 OF 1 FILED: APRIL 27, 2015

- 37. On page 8 of TECO's DSM Plan it states that TECO has conducted Research & Development (R&D) projects on conservation and demand response technologies in the past which have led to the successful launch of DSM programs. Please list the successful DSM programs referenced in this statement.
- A. Tampa Electric has conducted R&D projects on conservation and demand response technologies in the past which have led to the successful launch of DSM programs. Here are the list of successful DSM programs that have launched into successful DSM program from initial R&D projects:
 - 1. Residential Duct Repair
 - 2. Commercial Duct Repair
 - 3. Commercial Load Management
 - 4. Residential Price Responsive Load Management
 - 5. Smart Source (Tampa Electric's current Renewable Energy Program)

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 38 PAGE 1 OF 1

FILED: APRIL 27, 2015

- **38.** Please refer to page 8 of TECO's DSM Plan, where TECO discusses its Conservation R&D Program.
 - a. What R&D projects is TECO currently working on?
 - b. Does the \$200,000 annual R&D figure provided represent an anticipated annual cap to be spent on R&D programs?
 - c. If the response to (c) is negative, what is the significance of the \$200,000 figure?
 - d. Please provide the amount spent on R&D programs for each of the past 5 years (2010 2014).
- A. a. Tampa Electric is aware of several potential measures that may merit gathering more information as part of an R&D project if needed to help achieve the Commission's approved DSM goals. At this time, Tampa Electric is not working on any potential new measures for introduction as a new DSM program.
 - b. Yes, this is the anticipated annual cap which Tampa Electric would not exceed during any one year for all R&D programs.
 - c. Not Applicable.
 - d. The chart below lists the amount spent on R&D programs by Tampa Electric over the past five years.

Tampa Electric's R&D Expenses		
Year	Expenses	
2010	\$105,405	
2011	\$16,846 (Credit)	
2012	\$0	
2013	\$0	
2014	\$0	

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 39 PAGE 1 OF 1

FILED: APRIL 27, 2015

- **39.** Please provide the following information regarding TECO's current and proposed Conservation R&D program:
 - a. Please describe the technologies TECO plans to research over the next 5 years, and explain the reason(s) TECO believes each technology should be researched. Please be as specific as possible with regards to each program's estimated potential annual reductions in both demand and energy.
 - b. Please provide any information/documentation regarding any planned areas of research under the proposed program.
 - c. Please provide any information/documentation regarding how TECO plans to implement any proposed or future projects.
- A. a. Tampa Electric is aware of several potential measures that may merit gathering more information as part of an R&D project if needed to help achieve the Commission's approved DSM goals. At this time, Tampa Electric is not working on any potential new measures for introduction as a new DSM program.
 - b. Tampa Electric is not working on any planned areas of research for potential new programs.
 - c. Tampa Electric is not working on any planned areas of research for the implementation of potential new programs.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 40 PAGE 1 OF 1 FILED: APRIL 27, 2015

40. What projects are currently being evaluated under TECO's Conservation R&D program? As part of your response, please complete the table below providing the following information: name and description of the project, initial startup date of the project, and year-to-date dollars spent on each project. Additionally, please provide whether or not TECO believes said project(s) could result in a potential conservation program. If TECO perceives a program(s) is imminent, please provide expected startup date.

	Conservation Rese	arch and Development	
Project Name	Description	Implementation Date	Expenditures

A. At this time, Tampa Electric is currently not working on any potential new measures for introduction as a new DSM program.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 42 PAGE 1 OF 7 FILED: APRIL 27, 2015

- **41.** What current programs has TECO offered to its customers as a result of the Conservation R&D program? In addition to the name of the program, please provide the description, startup date and year-to-date expenditures for each program.
- A. Tampa Electric currently offers the following programs that were initially evaluated as a Conservation R&D program with the description, startup date and year-to-date expenditures below
 - 1. Residential Duct Repair
 - 2. Commercial Duct Repair
 - 3. Commercial Load Management
 - 4. Residential Price Responsive Load Management
 - 5. Smart Source (Tampa Electric's current Renewable Energy Program)

Residential Duct Repair: The Residential Duct Repair Program is a conservation rebate program designed to reduce demand and energy by decreasing the load on residential HVAC equipment helping the customer reduce their energy consumption and reducing Tampa Electric's peak demand. This program eliminates or reduces areas of HVAC air distribution losses by sealing and repairing the ADS. The ADS is defined as the air handler, air ducts, return plenums, supply plenums and any connecting structure.

Customers call Tampa Electric to request appointments for duct repair and an HVAC contractor appointed by Tampa Electric will seal and repair all accessible components of the ADS in the residence. Tampa Electric's rebate is included in the payment to the participating contractor performing ADS repairs.

The Residential Duct Repair Program started in September 1992. Year to date expenditure are provided in the table on the following page. Actual Duct Repair Program expenditures are provided back through 1999 on an annual basis. The data for 1998 shows actual expenditures from April 1998 through December 1998. Actual Duct Repair Program expenditures prior to April 1998 are unavailable.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 42 PAGE 2 OF 7

FILED: APRIL 27, 2015

Residential Duct Repair			
Sta	Start Date: September 1992		
Year	Expenditures		
1998	\$601,748		
1999	\$910,125		
2000	\$820,540		
2001	\$1,008,692		
2002	\$1,085,764		
2003	\$1,371,600		
2004	\$899,292		
2005	\$866,787		
2006	\$1,219,347		
2007	\$1,301,423		
2008	\$1,704,825		
2009	\$1,783,889		
2010	\$1,435,381		
2011	\$846,920		
2012	\$534,481		
2013	\$464,712		
2014	\$410,368		

Commercial Duct Repair: The Commercial Duct Repair Program is designed to encourage commercial/industrial customers to make cost-effective improvements to existing facilities. The goal of this conservation program is to offer rebates for sealing existing facility's duct system to reduce demand and energy by decreasing the load on commercial HVAC equipment. This program eliminates or reduces areas of HVAC air distribution losses by sealing and repairing the ADS.

Customers call Tampa Electric to request appointments for duct repair and a HVAC contractor appointed by Tampa Electric will seal and repair all accessible components of the ADS in the facility. Tampa Electric's rebate is included in the payment to the participating contractor performing ADS repairs.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 42 PAGE 3 OF 7 FILED: APRIL 27, 2015

The Commercial Duct Repair Program started in March 2008. Year to date expenditure are provided in the table below.

Commercial Duct Repair			
	Start Date: March 2008		
Year	Year Expenditures		
2008	\$12,242		
2009	\$246,314		
2010	\$1,133,588		
2011 \$714,371			
2012	\$101,182		
2013	\$179,836		
2014	\$74,324		

Commercial Load Management: The Commercial Load Management Program is intended to help alter Tampa Electric's system load curve by reducing summer and winter demand peaks. The goal is to offer customer incentives for allowing the installation and control of load management control equipment on specific technologies to reduce Tampa Electric's weather sensitive peak demand. Customers that participate in this program choose whether to have the technology controlled either interrupted for the entire control period or cycled during the control period. Tampa Electric will provide a monthly incentive credit to customers participating in this program.

The Commercial Load Management Program started in January 1998. Actual Commercial Load Management Program expenditures are provided back through 1999 on an annual basis. The data for 1998 shows actual expenditures from April 1998 through December 1998. Actual Commercial Load Management Program expenditures prior to April of 1998 are unavailable.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 42 PAGE 4 OF 7

FILED: APRIL 27, 2015

Commercial Load Management		
S	tart Date: January 1998	
Year	Expenditures	
1998	\$35,929	
1999	\$53,751	
2000	\$20,753	
2001	\$14,825	
2002	\$13,560	
2003	\$14,376	
2004	\$21,815	
2005	\$13,139	
2006	\$8,209	
2007	\$5,173	
2008	\$9,302	
2009	\$14,816	
2010	\$6,289	
2011	\$17,179	
2012	\$7,856	
2013	\$8,025	
2014	\$10,431	

Residential Price Responsive Load Management: The Company's program relies on a multi-tiered rate structure combined with price signals conveyed to participating customers during the day. This price information is designed to encourage customers to make behavioral or equipment usage changes to their energy consumption thereby achieving the desired high cost period load reduction to assist in meeting system peak.

Price information from the utility is used by the customer to program a "smart" thermostat into preset actions based on the level of pricing. Equipment may be turned on, turned off or changed to a different temperature setting automatically by the smart thermostat or manually by the customer through the smart thermostat in response to either the multi-tiered rates or critical price signals.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 42 PAGE 5 OF 7

FILED: APRIL 27, 2015

Tampa Electric will install a communication device along with a "smart" thermostat at the customer's home used to control the operation of selected appliances such as space heating, air conditioning, water heating and pool pumps. Customers will be able to program the operation of this equipment and alter their energy consumption based the price tiers occurring at specific times of the day and year.

The Residential Price Responsive Load Management Program started in September 2007. Year to date expenditure are provided in the table below.

Residential Price Responsive Load Management		
Sta	art Date: September 2007	
Year	Expenditures	
2007	\$1,178,025	
2008	\$1,589,431	
2009	\$1,495,578	
2010 \$2,444,633		
2011 \$3,020,606		
2012	\$3,561,102	
2013	\$2,861,507	
2014	\$3,626,625	

Smart Source: (Tampa Electric's current Renewable Energy Program): This program provides customers with the option to purchase 200 kWh blocks of renewable energy for five dollars per block to assist in the delivery of renewable energy to the company's grid system. This specific effort provides funding for renewable energy procurement, program administration, evaluation and market research.

Renewable energy participants will be served from the existing electrical system. Renewable energy may not be delivered to the customer, but will displace energy that would have otherwise been produced from traditional fossil fuels. Tampa Electric will report program progress through the annual ECCR True-up and Projection Filings.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 42 PAGE 6 OF 7 FILED: APRIL 27, 2015

This program was initially funded as an R&D Conservation program. Once the analysis was complete, the decision was made to establish this program as a self-funding program. The Commission requires Tampa Electric to monitor and evaluate the program and provide reports on the program's progress as required in Docket No. 060678-EG, Order No. PSC-06-1063-TRF-EG, issued December 26, 2006.

The Renewable Energy Program started in December 2006. Year to date expenditure are provided in the table below.

Smart Source: Renewable Energy Program				
Start Date: December 2006				
Year	Expenditures			
2006	\$104,835			
2007	\$147,240			
2008	\$129,790			
2009	\$176,837			
2010	\$304,409			
2011	\$32,456			
2012	\$200,738			
2013	\$61,419			
2014	\$202,072			

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 42 PAGE 7 OF 7 FILED: APRIL 27, 2015

- **42.** Please provide the amount spent on Conservation R&D programs for each of the past 5 years. Please provide the corresponding project name, implementation date, and dollar amount for each project.
- A. The chart below lists the amount spent on R&D programs by Tampa Electric over the past five years. The discussion for which projects were funded during the individual years is below the chart.

Tampa Electric's R&D Expenses			
Year	Expenses		
2010	\$105,405		
2011	\$16,846 (Credit)		
2012	\$0		
2013	\$0		
2014	\$0		

In 2010, Tampa Electric worked toward completion of a Commercial General Service Price Responsive Load Management Pilot. The pilot was concluded in December of 2010. The actual expenses for this pilot during this year were \$105,405. The program was not implemented.

In 2011, Tampa Electric had no new activity in DSM R&D; however, the company worked toward completion of the Commercial General Service Price Responsive Load Management Pilot. The company concluded the pilot in December 2010 and removed equipment through February 2011 resulting in an ending credit of \$16,846 booked in 2011. The program was not implemented.

TAMPA ELECTRIC COMPANY DOCKET NO: 150081-EG DEMAND SIDE MANAGEMENT STAFF'S FIRST DATA REQUEST REQUEST NO. 43 PAGE 1 OF 1

FILED: APRIL 27, 2015

43. Please complete the table below to illustrate TECO's expected projects in Conservation R&D. As part of this response, please provide an electronic version of the table below in Excel format with your response.

Conservation Research and Development – Project Name				
Year	Project Name	Description	Expected Expenditures	
2015				
2016				
2017				
2018				
2019				
2020				
2021				
2022				
2023		-		
2024				

A. Tampa Electric is aware of several potential measures that may merit gathering more information as part of an R&D project if needed to help achieve the Commission's approved DSM goals. Tampa Electric is not working on any potential new measures for introduction as a new DSM program.