

New Mexico Finance Authority Oversight Committee

Energy Efficiency and Renewable Energy Bonding Act

September 20, 2016



- At its 2005 Regular Session, and subsequently amended at its 2007 Regular Session, the Legislature of the State of New Mexico authorized the New Mexico Finance Authority to issue and sell bonds for energy efficiency improvements in an amount not to exceed \$20 million outstanding at any one time.
- The Energy Efficiency Bonding Act is available to public schools and state agencies as a tool implement energy saving measures.
- Energy projects must complete an assessment (energy audit) that analyzes what measures can be taken to create energy savings and the costs associated.



- The Energy, Minerals and Natural Resources Department reviews the assessment and must certify the need to issue Energy Efficiency Bonds based on the energy audit results.
- Though secured by the State Gross Receipts Tax, Energy Efficiency Bonds are ultimately repaid through the annual budgeting process by withholding 90% of the annual estimated savings from the requesting entity's budget.
- Assuming that project produces the level of savings identified by the assessment, both the state agency's/school district's budget and the State's General Fund should realize a net positive gain.



- There have been four (4) bonds to date issued under the program:
 - 1) Department of Cultural Affairs: retrofit energy efficiency measures at the Museum of Space History (Alamogordo), Museum of Natural History (Albuquerque), and Museum of Fine Arts (Santa Fe).
 - **2) Socorro Consolidated School District:** retrofit energy efficiency measures including lighting and HVAC improvements at Socorro High School.
 - 3) Mountainair Public School District: retrofit energy efficiency measures including lighting, solar thermal, HVAC, and roof improvements at the administration building, elementary school and gymnasium.
 - **4) Santa Fe Public School District:** Constructed PV solar array systems at Santa Fe High School and Ramirez Thomas Elementary School.



• The Act has established \$20 million ceiling on the amount of par bonds that can be outstanding at any given time. Remaining capacity of the program:

Entity	Amount Issued	Amount Outstanding	Maturity			
DCA	\$368,780	\$147,294	2020			
Socorro CSD	\$419,906	\$331,040	2032			
Mountainair PSD	\$363,668	\$283,919	2027			
Santa Fe PSD	\$2,962,734	\$2,962,734	2041			
Totals	\$4,115,088	\$3,724,987				
Bond Ceiling		\$20,000,000				
Remaining Capacity		\$16,275,013				



Case Study:

Santa Fe Public School District





- In 2010, Santa Fe PSD began a conservation program to:
 - Reduce energy/water/waste/resource use
 - Reduce utility expenditures, redirect more of the Operational Budget to the classroom
 - Reduce District's negative impact on the environment
 - ➤ Increase sustainable practices in the organization with all stakeholders
 - Model environmental stewardship and fiscal responsibility



• Accomplishments of the conservation program include:

Pre-Program Benchmark Year of 2010/11	5th Year of Program - FY 2015
 17,502,123 FF kwh electricity used 93,321 mmbtus of natural gas burned 55,385,149 gallons of water consumed ½ kw of solar PV generating 1,445 kwh solar power produced 6.7% waste recycled (rate) 0 schools food waste composting 	 15,663,877 FF kwh used – down 10.5% 70,807 mmbtus of nat gas – down 24% 32,074,953 gals of water – down 42% 465 kw of solar PV (+ 65 thru March 2016) 616,765 kwh solar power produced 33% waste recycled (rate) 14 schools food waste composting



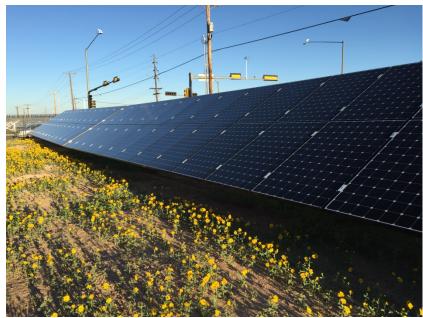
• Santa Fe High- 900 kw system to produce 65% of School's electricity (\$2.6 million project cost).





Santa Fe High's PV solar system has completed construction.







• Ramirez Thomas Elementary- 117 kw system to produce 31% of School's electricity (\$416.3 thousand project cost).



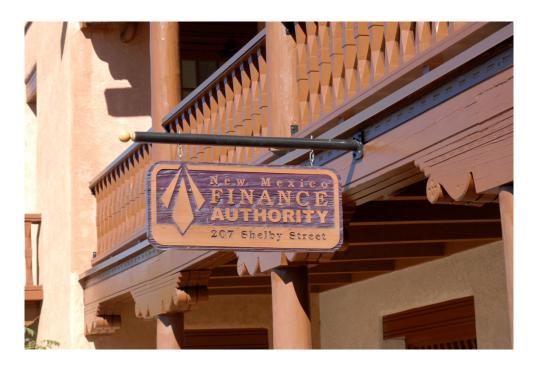


Fiscal Year	Ramirez Thomas Net Utility Savings		SF High Meter E2 Net Utility Savings		SF High Meter E3 Net Utility Savings		SF High Meter E4 Net Utility Savings		SF High Meter E5 Net Utility		Combined Net Utility Savings		Annual NMFA Debt Service		Annual Positive Cashflow		
										Savings							
2016-17	\$	10,148.57	\$	38,356.23	\$	15,601.68	\$	26,722.82	\$	38,377.46	\$	129,206.76	\$	107,635.36	\$	21,571.40	
2017-18	\$	15,401.04	\$	58,044.76	\$	23,597.35	\$	40,707.34	\$	58,074.29	\$	195,824.78	\$	167,591.60	\$	28,233.18	
2018-19	\$	15,671.38	\$	58,819.59	\$	23,893.15	\$	41,659.56	\$	58,845.61	\$	198,889.28	\$	170,348.86	\$	28,540.42	
2019-20	\$	15,946.37	\$	59,608.37	\$	24,194.35	\$	42,638.59	\$	59,630.84	\$	202,018.52	\$	173,165.68	\$	28,852.84	
2020-21	\$	16,226.10	\$	52,473.87	\$	24,501.03	\$	39,579.61	\$	52,358.02	\$	185,138.64	\$	157,974.24	\$	27,164.40	
2021-22	\$	16,510.65	\$	49,342.39	\$	24,813.29	\$	38,591.89	\$	49,155.87	\$	178,414.09	\$	151,921.18	\$	26,492.91	
2022-23	\$	16,800.10	\$	50,204.23	\$	25,131.22	\$	39,671.09	\$	50,014.48	\$	181,821.12	\$	154,988.34	\$	26,832.78	
2023-24	\$	17,094.54	\$	51,080.92	\$	25,454.92	\$	40,780.15	\$	50,887.90	\$	185,298.43	\$	158,117.46	\$	27,180.97	
2024-25	\$	17,394.04	\$	51,972.74	\$	21,951.10	\$	41,919.88	\$	51,776.38	\$	185,014.16	\$	157,861.32	\$	27,152.84	
2025-26	\$	17,698.71	\$	52,879.95	\$	20,379.53	\$	43,091.14	\$	52,680.18	\$	186,729.51	\$	159,405.96	\$	27,323.55	
2026-27	\$	18,008.62	\$	53,802.80	\$	20,735.49	\$	44,294.80	\$	53,599.57	\$	190,441.28	\$	162,746.06	\$	27,695.22	
2027-28	\$	18,323.87	\$	54,741.56	\$	21,097.59	\$	45,531.74	\$	54,534.81	\$	194,229.57	\$	166,155.48	\$	28,074.09	
2028-29	\$	18,644.54	\$	55,696.52	\$	21,465.93	\$	46,802.89	\$	55,486.18	\$	198,096.07	\$	169,635.50	\$	28,460.57	
2029-30	\$	18,970.74	\$	56,667.95	\$	21,840.62	\$	48,109.19	\$	56,453.96	\$	202,042.46	\$	173,186.92	\$	28,855.54	
2030-31	\$	19,302.55	\$	57,656.13	\$	22,221.78	\$	49,451.61	\$	57,438.41	\$	206,070.49	\$	176,812.36	\$	29,258.13	
2031-32	\$	19,640.08	\$	58,661.36	\$	22,609.51	\$	50,831.15	\$	58,439.84	\$	210,181.94	\$	180,512.22	\$	29,669.72	
3032-33	\$	19,983.42	\$	59,683.91	\$	23,003.92	\$	52,248.83	\$	59,458.54	\$	214,378.63	\$	184,290.18	\$	30,088.45	
2033-34	\$	20,332.67	\$	60,724.11	\$	23,405.13	\$	53,705.71	\$	60,494.80	\$	218,662.41	\$	188,145.26	\$	30,517.15	
2034-35	\$	20,687.93	\$	61,782.23	\$	23,813.26	\$	55,202.86	\$	61,548.92	\$	223,035.20	\$	192,080.60	\$	30,954.60	
2035-36	\$	21,049.31	\$	62,858.61	\$	24,228.43	\$	56,741.39	\$	62,621.22	\$	227,498.95	\$	196,097.82	\$	31,401.13	
2036-37	\$	21,593.88	\$	64,313.85	\$	24,802.78	\$	58,515.86	\$	64,079.28	\$	233,305.65	\$	201,323.86	\$	31,981.79	
2037-38	\$	22,056.29	\$	65,607.82	\$	25,308.40	\$	60,237.32	\$	65,372.50	\$	238,582.34	\$	206,073.16	\$	32,509.18	
2038-39	\$	22,436.66	\$	66,740.84	\$	25,745.41	\$	61,906.99	\$	66,501.21	\$	243,331.10	\$	210,347.02	\$	32,984.08	
2039-40	\$	22,823.56	\$	67,893.39	\$	26,189.96	\$	63,622.80	\$	67,649.37	\$	248,179.08	\$	214,709.68	\$	33,469.40	
2040-41	\$	23,217.13	\$	69,065.81	\$	26,642.17	\$	65,386.02	\$	68,817.33	\$	253,128.46	\$	219,165.06	\$	33,963.40	
	\$	465,962.74	\$ 1	L,438,679.97	\$	582,628.00	\$	1,207,951.23	\$:	1,434,296.98	\$:	5,129,518.93	\$	4,400,291.18	\$	729,227.75	



- When considering approval of the Santa Fe PSD Bonds, the NMFA Board of Directors asked staff to take a look at the Act for potential improvements to overall process.
- Enclosed is a working draft bill that redlines changes to the Act.
- Changes to the Act include:
 - > Expanding the program to include Higher Education Institutions.
 - ➤ Clarifies processes involving review of the energy assessment, bond certification and roles of different stakeholders involved in the program.
 - ➤ Changes the transfer of energy savings so that they are retained in the State General Fund.





New Mexico Finance Authority 207 Shelby Street Santa Fe, NM 87501 505-984-1454

www.nmfa.net