

**LOCAL GOVERNMENT PARTNERSHIP
CITY OF BEAUMONT**

2009-2011 Program Cycle Abstract

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PART 1. PARTNER INFORMATION

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- b) New Local Government Partner
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PART 2. PROPOSAL SUMMARY AND BUDGET ALLOCATION

The City of Beaumont partnership (the “Partnership”) presents a model for community energy partnerships that brings the City of Beaumont (the “City”) and its energy utility, Southern California Edison Company (SCE), together in a partnership in which each partner brings its experience, expertise and resources to work towards the task of saving energy. The City of Beaumont is located in the County of Riverside between Mt. San Gorgonio and Mt. San Jacinto. The City’s current population is approximately 28,250 and spans over 30 square miles.

The partnership is unique in that it leverages existing technical and energy project management expertise that is invaluable to the implementation of desired energy efficient projects. This partnership program will deliver immediate energy savings and reduce peak demand at the City’s facilities.

The state of California benefits from this partnership because the City’s residents and businesses will become reliable providers of cost-effective, environmentally-friendly energy resources that help meet the State’s growing energy needs. In return, the City’s citizens and businesses reap the economic benefits of their participation in a comprehensive program that helps them save money and energy.

City residents and businesses will continue to enjoy complete access to all of the programs currently offered by SCE. Additionally, under the partnership, the City and SCE will join together to promote energy efficiency through:

- Cost-effective implementation of energy-saving technologies as they become available.
- Closely coordinated community outreach and training efforts to educate consumers and co-promote programs.
- Financial packages that bundle practical utility incentives with various City-arranged monetary incentives aimed at improving the participation of residents.

The City’s goal is to reduce energy consumption by 20% during the term of the partnership. To attain such dramatic savings, the City plans to implement a variety of programs that are funded through several sources. The program includes energy-saving lighting retrofits, solar power generating systems, LED streetlights, and innovative retrofitting of the wastewater treatment facility.

In addition to the City’s comprehensive plan for energy savings with regards to City facilities, community usage is another aspect of the overall goal of energy-efficiency and sustainability. In

order to assess possible areas of improvement, the City has requested community usage records from Southern California Edison. However, these records have not been made available to the City at this time and therefore will not be included in the scope of this abstract.

Table 3-1 Energy Savings and Demand Reduction Forecast

Installation Goals	Year #1 – Year #3
Gross Peak Demand Reduction (kW)	301.4
Gross Energy Savings (kWh)	1,170,525.5
Gross Therm Savings (therms)	To be determined

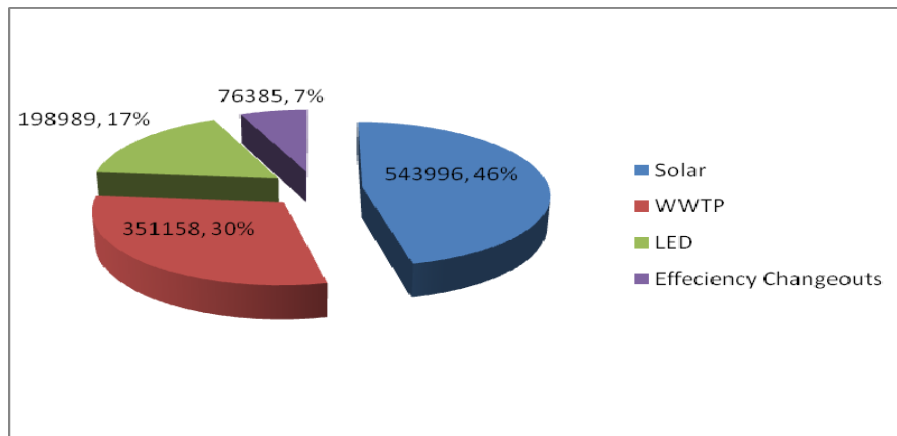
Table 3-2 Overall Budget Allocation (\$)

Utility Name:		
Item	Program Budget	
	(\$)	(%)
Administrative Costs	25,000	2.5%
Marketing/Outreach Costs	75,000	7.5%
Incentive/Rebate Costs	150,000	15%
Direct Implementation Costs	750,000	75%
Total	1,000,000	100%

PART 3.

ITEM A. COST EFFICIENCY

The City’s goal is to reduce energy consumption by 20% during the term of the partnership. To attain such dramatic savings, the City plans to implement a variety of programs that are funded through several sources. The program includes energy-saving lighting retrofits, solar power generating systems, LED streetlights, and innovative retrofitting of the wastewater treatment facility. These programs will result in a reduction of 1,170,528kWh of electricity used over the term of the partnership. Below is a breakdown of the projected energy savings (by kWh) for the various programs to be employed by the City of Beaumont. Additionally, it is anticipated that there will be a savings of 712 metric tons of CO2 annually with the proposed systems.



The City is dedicated to the implementation of sustainable energy solutions. As such, the City has extensively researched the use of municipal property for energy generation. Through the installation of photovoltaic panels on the existing City Hall and Police Department Building the City plans to start its movement towards being self sufficient in terms of energy. The PV systems would provide sufficient energy to reduce the City’s dependency on outside power for these structures to zero. Solar programs well give an annual reduction of 543,996kWh for the city.

As part of the City’s effort to reduce energy consumption, a partnership with General Electric has been formed to help make Beaumont a test site for large scale LED street light implementation. This city wide program intends to replace every existing high pressure sodium street lights with a high efficiency LED streetlight of comparable lumen output. This program would reduce the energy consumed by over 50% resulting in a net reduction of 198,989kWh. Being that this is a proprietary system and that a direct partnership has been formed the cost of implementation for stated system is still in negotiation. As such the cost effectiveness is difficult to determine, but in similar situations (Ann Arbor, MI) the payback period was around 3 years; adding the IOU contribution should shorten this timeframe further.

The City is currently researching the possibility of adding a large scale (up to 1MW) solar system at its Wastewater Treatment Plant. This system could offset nearly 1.5 million kWh per year for the City. This system is also in negotiation/design and will not be available for cost analysis for this abstract.

Table 3-3: Budget (Resource and Non-resource Activities)

Item	Year #1 – Year #3
1) Total Resource Activity Budget (\$)	975,000
2) Total Resource Activity Budget Sponsored by Partner (\$)*	815,754
3) Non-resource Activity Budget (\$)	25,000
4) Total Non-resource Activity Budget Sponsored by Partner (\$)*	25,000
Total Proposed Budget (\$) to IOU = 1) – 2) + 3) – 4)	159,244

Note: *Budget “Sponsored by Partner” means a contribution from funding sources other than the IOU. Please also see Appendix A for definitions of resource and non-resource types of activities.

ITEM B. SKILL AND EXPERIENCE

The City of Beaumont, through partnerships with agencies such as Waste Management and the Beaumont-Cherry Valley Water District, has demonstrated the ability to implement programs that promote sustainability, water conservation, energy efficiency, and emissions reduction. Not only has the City shown it can implement an energy conservation program that can reach the Platinum Affinity Level, but the City has also proven itself to be an innovative and progressive advocate for environmental initiatives. The following examples are a representative sample of the City’s commitment to reducing its environmental footprint.

The Master Bikeway and Pedestrian Plan, an initiative currently being implemented by the Community and Economic Development department, will lead to reduced traffic congestion and air pollution while promoting alternate methods of transportation. The plan, which currently

totals 7.5 miles and a proposed length of 40 to 50 miles at completion, is to develop a network of connected bikeways within Riverside County and surrounding cities. The plan emphasizes increased efficiency for pedestrians and cyclists as well as comfortable and convenient non-motorized travel options throughout the City and the region. Another key benefit of the plan is its integration with other methods of public transportation including the Pass Transit system which provides both dial-a-ride and fixed route services and RTA (Riverside Transit Authority). All fixed route busses will install bicycle racks to accommodate passengers who are using both the City's plan and the transportation systems described above.

The City has replaced its Citizen Volunteer Vehicles with two fuel-efficient hybrids. These hybrids, in addition to the purchase of three new Compressed Natural Gas technology buses for the Pass Transit system, are aimed at reducing carbon dioxide emissions in the region.

The Community Services department has replaced inefficient lighting fixtures in two large City parks with energy-efficient LED halogen light bulbs. These parks, which are the sites of various community events such as the Summer Concert Series, the Cherry Festival, and year-round organized recreational activities, are important community assets within the City. By transitioning these highly-trafficked parks to energy-efficient lighting, the City has demonstrated that such eco-friendly efforts can be both practical and cost-effective.

The City also participates in several regional initiatives that are directed at reducing environmental impact. As an active member of the Western Riverside Council of Governments, the City has followed the council's lead in pursuing several green programs that apply to the full spectrum of government functions. Most recently, the Planning Committee has spent considerable time educating City Planners in the area about the principles of "green building." These meetings are aimed at creating standards that reflect "green building" principles and encouraging the implementation of sustainable building and development methods.

ITEM C. DEMONSTRATED COMMITMENT

The City of Beaumont has demonstrated their commitment to sustainability and environmental responsibility through the consideration of City Council Resolution 2008-11. This resolution, which City Council is expected to adopt, states that City Council is committed to supporting local, regional, state, and national principles of sustainability and conservation. The resolution also affirms the City's intent to reduce per capita energy consumption by 20% over the next two years in order to achieve the Platinum Affinity Level.

The City has also been selected, on the basis of their commitment to energy efficiency and sustainability, to become a "test city" for General Electric's new LED streetlights that will not be publicly available until 2009. The City plans to implement an educational and promotional program that involves monthly "trade-in" events where the public can come to a specified location and receive free upgrades in exchange for their antiquated light bulbs, thermostats, etc.

The City is one of the fastest growing in Southern California. To keep up with this growth and to ensure the safety of residents, businesses, and guests, the City is launching an effort to

digitally monitor strategic community assets. This program is extremely beneficial from both a public safety and a community services standpoint, as the City will be able to accomplish significant long-term savings with relatively minor investment.

The system consists of Internet-based megapixel cameras located at City parks, intersections, and municipal structures. The Police Department will be able to access these cameras via a local wireless network. Through remote monitoring, the Police Department can reduce the average patrol time of each vehicle, which in turn reduced fuel consumption by approximately 10%. This estimated reduction in consumption will result in a savings of:

- 6,000 fewer gallons of gasoline burned
- 60 tons fewer of CO₂ produced
- 143 fewer barrels of oil consumed

The savings in fuel alone allows the Police Department to recoup a significant portion of the installation cost each year while also enjoying the benefits of increased security and flexibility that the system offers.

ITEM D. PARTNER'S MUNICIPAL FACILITIES AND INFRASTRUCTURE

The City of Beaumont's main facilities include City Hall, Community Center, the Transit Center, the Police Department, park facilities and the waste water treatment plant. Additionally, the City has approximately 1,500 street lights located within City limits. There are approximately 15 City-owned buildings with a total square footage of approximately 50,488 square feet. Within the last five years, the City has made great strides to make City-owned buildings more energy-efficient. City Hall and Police Department buildings now have motion sensors on all lighting fixtures. The City's sport park was recently renovated to replace all light fixtures with energy-efficient LED halogen light bulbs. The City's Police Department has replaced its Citizen Volunteer vehicles with two fuel-efficient hybrids. The City's Transit Department, Pass Transit, is reducing carbon emissions with three new CNG buses that are powered by natural gas.

ITEM E. FEASIBILITY

The implementation of this program will apply lessons learned from other partnership programs. The management structure of the partnership will be customized to allow greater flexibility in project assessment and implementation for outreach to all City departments. The projects will be managed by a team of City staff and SCE staff with SCE having overall administration responsibilities for the partnership program. Both parties will work together to facilitate the application. City staff is currently preparing a resolution for City Council to demonstrate the City's commitment to energy efficiency and renewable technologies (Resolution 2008-11). The resolution is expected to be in front of City Council for approval March 18th.

The City will begin to make the proposed changes to city buildings after acceptance of the partnership. The City's mobile unit will also begin to carry information about energy efficiency that can be distributed to residents. Additionally, the City will begin hosting workshops and training sessions to inform residents how can become more energy efficient. The program will

include monthly “trade-in” events where residents can come to a specified location and receive free upgrades in exchange for their antiquated light bulbs, thermostats, etc.

The City has also designated an employee to be their “energy champion.” This position will oversee the implementation of the aforementioned energy conservation projects and will serve as the liaison between the different City departments that will be involved in the process of implementing these programs.

ITEM F. INTEGRATED APPROACH

The City of Beaumont currently has a Memorandum of Cooperation (MOC) with SCE designating SCE as Beaumont’s “Hometown Electric Company.” The MOC states that City and SCE will work together to enhance the quality of life of current and future residents; will provide education and information designed to promote energy conservation and cost containment; and will allow SCE and the City to work on a cooperative basis to explore new ideas and technologies that will benefit the economic growth and development of the City.

One specific measure the City has proposed involves installing solar panels at City facilities. These panels make buildings more energy-efficient and reduce the demand for outside energy. The City believes this partnership is an important step in both promoting energy-efficiency and reducing per capita demand.

ITEM G. COMPREHENSIVENESS

The City of Beaumont’s program will include multiple measures and program elements to increase energy-efficiency. The City will look at all available measures to reduce energy consumption. In considering these technologies, the City will assess both their energy-efficiency and life-cycle in order to make smart decisions that will have lasting effects.

Additionally, the City is working towards a green builder incentive program that encourages builders to construct more efficient homes. In addition to the City of Beaumont’s comprehensive plan for energy savings with regards to City facilities, community usage is another aspect of the overall goal of energy-efficiency and sustainability. In order to assess possible areas of improvement, the City has requested community usage records from Southern California Edison. However, these records have not been made available to the City at this time and therefore will not be included in the scope of this abstract.

ITEM H. INNOVATION AND REFLECTS THE STRATEGIC PLANNING PROCESS

The City of Beaumont’s Proposal meets the goals and objectives of the California Energy Efficiency Strategic Plan. The program consists of:

- *Incentives* including rebates, innovative or discounted financing, and/or non-financial support to consumers who implement energy-efficient practices and measures that exceed current practice or mandates.

- *Education and Information* informing consumers and others about energy use and opportunities associated with energy-efficiency. They are provided by a wide variety of marketing, education, and outreach techniques.

The City is trying to fundamentally change the way they view energy-efficiency and their impact on the environment. The City understands that efficiency must be acquired not only as a near-term resource, but as a permanent market transformation that will be achieved by continually incorporating efficiency gains into buildings and market products. To meet both its short- and long-term goals, the City has adopted the following strategies:

- Take a broad series of actions toward zero-net-energy new buildings and very-low-energy existing buildings.
- Transform businesses and residences through continuous energy improvements.
- Develop a shared vision and process for energy, climate, and air regulation coordination in California.
- Greatly accelerate the development and commercialization of new and emerging technologies to enable market transformation.
- Provide consumers with tools and information to help them understand not only the importance of efficiency, but the many opportunities for implementation through innovative financing, incentives, benchmarks, new technologies, and other means.