

STAFF REPORT



ITEM NO. 19
CITY OF OCEANSIDE

DATE: April 3, 2013
TO: Honorable Mayor and City Councilmembers
FROM: Water Utilities Department
SUBJECT: **ADOPTION OF A RESOLUTION MAKING FINDINGS RELATED TO ENERGY SERVICES CONTRACTING AND APPROVING A POWER PURCHASE AGREEMENT FOR THE CONSTRUCTION OF THE LA SALINA WASTEWATER TREATMENT PLANT COGENERATION FACILITY PROJECT AND SUBSEQUENT ENERGY PURCHASE**

SYNOPSIS

Staff and the Utilities Commission recommend that the City Council adopt a resolution making findings that the La Salina Wastewater Treatment Plant Cogeneration Facility project will generate cost-savings, approve a Power Purchase Agreement with CHPCE La Salina, LLC, of Boston, MA, for construction of the La Salina Wastewater Treatment Plant Cogeneration Facility project and subsequent energy purchase, and authorize the City Manager to execute the agreement.

BACKGROUND

A recently completed cogeneration facility at the San Luis Rey Wastewater Treatment Plant (SLRWWTP) has proven to be beneficial and an overall cost savings for the plant in the reduction of electrical and natural gas costs. The facility uses biogas, generated as a byproduct of the wastewater treatment process, and produces electricity which is sold back to the City at a savings versus electrical purchases from San Diego Gas & Electric (SDG&E). CHP Clean Energy the parent company of CHPCE La Salina, LLC, acquired the San Luis Rey Wastewater Treatment Cogeneration Facility in 2011 and began discussing with staff their interest in a similar project for the La Salina Wastewater Treatment Facility.

The La Salina Wastewater Treatment Plant (LSWWTP), located at 1330 S. Tait Street (Exhibit A), provides wastewater treatment and disposal for approximately 20 percent of the City. The LSWWTP sewage process is similar to the SLRWWTP and is therefore a prime candidate for cogeneration.

ANALYSIS

The LSWWTP currently has two anaerobic digesters each with a diameter of 45 feet. The excess gas produced by the digesters is currently flared and not beneficially utilized. Both digesters are also heated with an existing gas boiler that uses natural gas as a fuel source. This project will consist of financing, construction, operation and maintenance of a cogeneration facility on-site at the LSWWTP by CHPCE La Salina, LLC, currently under contract for the cogeneration facility at the San Luis Rey Water

Reclamation Facility. As allowed under the Utility Code, the City selected CHPCE La Salina, LLC, from its established pool of qualified energy service companies. The cogeneration facility will be fueled by digester gas produced by the plant facility for use by the contractor. All power produced by the contractor will be sold to the City at a lower rate than what SDG&E is currently charging. The cogeneration facility will also provide supplemental heat for the digesters, offsetting the use of the onsite boiler and ultimately reducing the costs of natural gas. The cogeneration facility shall include gas treatment, heat recovery, and connections to the digester gas, natural gas, hot water, and electrical systems. Repair and reconstruction of any existing facilities affected by the work including pavement will be made by CHPCE La Salina, LLC, at no cost to the City.

The construction is anticipated to commence in May 2013, and be completed and fully operational by the end of the calendar year.

FISCAL IMPACT

The construction value of the project is \$750,000, the cost of which will also be entirely borne by CHPCE La Salina, LLC. The contractor will be funding the ongoing operation and maintenance of the cogeneration facility. Currently, the LSWWTP uses approximately 4,700,000 kilowatt hours (kwh) of power per year with a total energy cost of \$643,000. The contractor will be able to produce an average of 19 percent of this power (approximately 867,000 kwh) per year. CHPCE La Salina, LLC, will sell that electrical power back to the LSWWTP at \$.0750 per kilowatt hour, which is a cost lower than the average cost of \$.125 per kilowatt hour charged by SDG&E. Entering into a power purchase agreement will result in a total savings to the City of approximately \$21,000 annually and \$315,000 for the contract term. The agreement with CHPCE La Salina, LLC, is for 15 years and at the end of 15 years, the City has an option to extend the contract for 10 more years or negotiate for the purchase of the cogeneration facility. If at the end of 10 years, the City does not want to exercise the option or buy out the facility, the contractor is responsible for removing the facility at their expense.

As part of the operation of the cogeneration facility, heat will be produced, which will result in the cogeneration facility being able to heat the digesters part of the time. This will result in a cost savings on the purchase of natural gas. The savings in the summer will be larger than winter. The total savings to the City for natural gas is estimated to be approximately \$310,000 over the term of the contract.

CHPCE La Salina, LLC has acquired financial assistance from the California Center for Sustainable Energy through its Self Generation Incentive Program (SGIP) on behalf of the City of Oceanside which allows for them to sell the energy produced by the facility at a reduced rate. The incentives have been included in the rate structure and calculations listed above. The incentive program requires that CHPCE La Salina, LLC and the City of Oceanside execute an agreement by April 6, 2013, or the incentive will be relinquished.

With the cogeneration facility in operation, the City will save approximately \$625,000 over the next 15 years in electrical and natural gas savings.

INSURANCE REQUIREMENTS

The City's standard insurance requirements will be met.

COMMISSION OR COMMITTEE REPORT

The Utilities Commission approved staff's recommendation during its regularly scheduled meeting on July 24, 2012.

CITY ATTORNEY'S ANALYSIS

The referenced documents have been reviewed by the City Attorney and approved as to form.

RECOMMENDATIONS

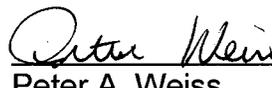
Staff and the Utilities Commission recommend that the City Council adopt a resolution making findings that the La Salina Wastewater Treatment Plant Cogeneration Facility project will generate cost-savings, approve a Power Purchase Agreement with CHPCE La Salina, LLC, of Boston, MA, for construction of the La Salina Wastewater Treatment Plant Cogeneration Facility project and subsequent energy purchase, and authorize the City Manager to execute the agreement.

PREPARED BY:



Jason Dafforn
Water Utilities Division Manager

SUBMITTED BY:



Peter A. Weiss
City Manager

REVIEWED BY:

Michelle Skaggs Lawrence, Deputy City Manager



Cari Dale, Water Utilities Director



Teri Ferro, Financial Services Director



Exhibit A: Site Map
Exhibit B: Resolution

La Salina Wastewater Treatment Plant Cogeneration Site

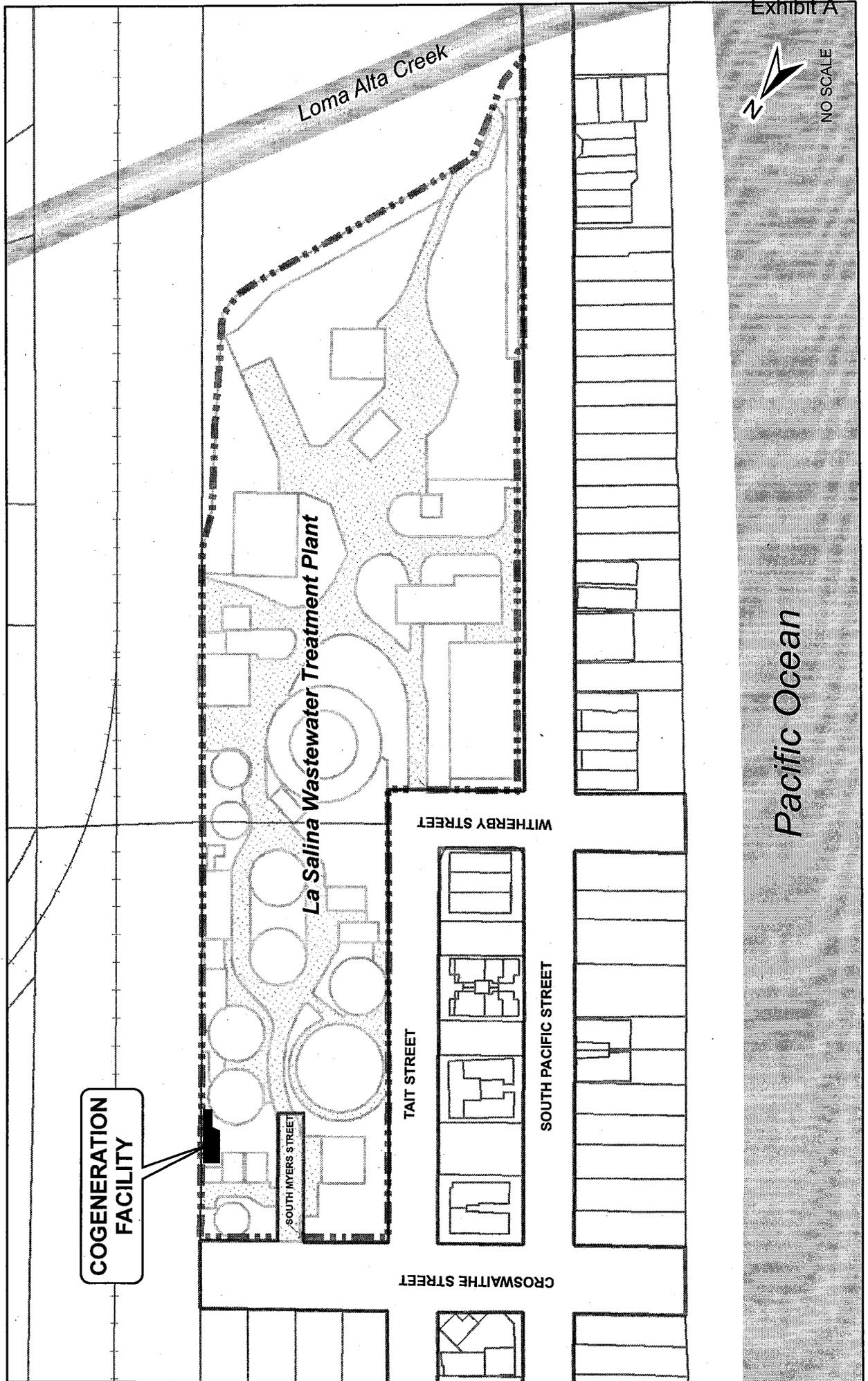


Exhibit A



NO SCALE

Pacific Ocean

RESOLUTION NO. _____

A RESOLUTION OF THE CITY COUNCIL OF THE CITY OF
OCEANSIDE MAKING FINDINGS FOR ENERGY SERVICES
CONTRACTING AND AUTHORIZING EXECUTION OF
POWER PURCHASE AGREEMENT

WHEREAS, the City of Oceanside ("City") owns and controls real property upon which the City desires to authorize a third party to install, operate, and maintain in good repair a cogeneration system; and

WHEREAS, City desires to purchase the output from the cogeneration system installed by a third party at a negotiated fixed rate pursuant to a power purchase agreement ("Power Purchase Agreement"); and

WHEREAS, the proposed authorization to a third party and purchase of energy from the third party would decrease City's energy costs as well as City's dependence on fossil fuel electric generating resources or other energy and promote the generation of electricity from cogeneration facilities; and

WHEREAS, Government Code section 4217 *et seq.* provides that public agencies may enter into agreements under which the public agency may purchase the energy generated from the facilities constructed on the public agency's property under an agreement so long as certain findings are made by the agency's governing body; and

WHEREAS, pursuant to Government Code section 4217.12, as a condition of entering into power purchase agreement, the governing body must make a finding that the anticipated cost to the entity for electrical energy services will be less than the anticipated marginal cost to the entity of electrical or other energy that would have been consumed by the entity; and

WHEREAS, Government Code section 4217.12 requires the governing body of a public entity to also find that the difference, if any, between the fair market value for the facility is anticipated to be offset by below-market energy purchases or other benefits provided under the proposed Power Purchase Agreement.

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1 NOW, THEREFORE, the Oceanside City Council does hereby resolve as follows:

2 1. The recitals above are true and correct.

3 2. The Council hereby finds, pursuant to Government Code section 4217.12, that the
4 anticipated cost to City for electrical energy services to be purchased by City from a third party
5 under a Power Purchase Agreement will be less than the anticipated marginal cost to City of
6 electrical or other energy that would have been consumed by the City.

7 3. The Council hereby finds, pursuant to Government Code section 4217.12, that the
8 difference, if any, between the fair market value of the facility is anticipated to be offset by
9 below-market energy purchases or other benefits provided under the Power Purchase
10 Agreement.

11 4. The City Manager, or designee, is authorized to execute said Power Purchase
12 Agreement.

13 5. The Mayor shall sign this Resolution and the City Clerk shall attest thereto, and
14 this Resolution shall take effect and be in force on the date of its adoption.

15 PASSED AND ADOPTED by the City Council of the City of Oceanside, California, this
16 _____ day of _____, 2013, by the following vote

17 AYES:

18 NAYES:

19 ABSENT:

20 ABSTAIN:

21
22 ATTEST:

MAYOR, CITY OF OCEANSIDE

23
24 _____
CITY CLERK

25 APPROVED AS TO FORM:

26 
27 _____
CITY ATTORNEY