



Request for Proposals for Location of an Organics Processing Facility on City of Santa Rosa Property

I. Instructions

The City of Santa Rosa (City) is seeking proposals from qualified entities (Proposer) interested in negotiating the use of City property for the implementation of an organics processing facility as outlined in the Sonoma County Waste Management Agency's (Agency) "Request for Proposals (RFP) for Organic Materials Processing Services" dated May 31, 2017.

Any questions regarding the contents of this RFP must be directed, in writing, by either mail or email to:

Mike Prinz, P.E. | Deputy Director, Subregional Operations
Santa Rosa Water | 4300 Llano Rd | Santa Rosa, CA 95407
Office (707) 543-3357 | Fax (707) 543-3399 | mprinz@srcity.org

To be considered, an electronic copy of the proposal (.PDF file) must be submitted by the due date to the same.

Schedule. The anticipated schedule for selection is as follows:

- | | |
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| • Issue Request for Proposals | Tuesday, July 18, 2017 |
| • Pre-Proposal Meeting and Site Visit | Monday, July 31, 2017 |
| • Proposals Due to the City | Monday, August 14, 2017 by 5:00 p.m. |
| • Notification of Selected Proposer(s) | Week of September 5, 2017 |
| • Board of Public Utilities (BPU) Approval of Signed Letter of Intent to Negotiate | Thursday, September 21, 2017 |

Mandatory Pre-Proposal Meeting. A mandatory pre-proposal meeting is scheduled to be held on Monday, July 31, 2017 beginning at 10:00 a.m. at 4300 Llano Road, Santa Rosa, CA 95407.

II. Background Information

The City is aware of the challenges the Agency has been facing for some time regarding local green waste processing and composting. The City is very interested in supporting the current initiative of the Agency by offering a potential facility site for respondents to include in their proposal to the Agency for Organic Materials Processing Services.

The City owns several parcels of mostly vacant land adjacent to the Laguna Treatment Plant (Plant) along Llano Road, located in an agricultural area which may be well suited for an organics processing facility. A location map of the parcels is included as Exhibit A for reference. The City is willing to consider a lease of up to approximately 26 contiguous acres located on all or part of the following parcels:

- 134-232-022 – 5 acres with a house/office space (annexation plan in process)
- 134-232-012 – 18 acres of vacant land (annexed into the City)
- 134-231-021 – 1.74 acres (annexation plan in process)

- 134-231-020 – 4.11 acres of vacant land (annexation plan in process)
- 134-231-024 – 3.7 acres with a house/office space (annexation plan in process)
- 134-231-014 and 134-231-015 – 3.16 acres (annexation plan in process)

The City has plans to move forward with annexation of the un-annexed parcels. Re-zoning and zoning of these parcels and the currently annexed parcel has not yet been determined, but the City will propose zoning to allow an organics processing facility. Environmental review and a minor conditional use permit, as well as building permits, will likely be required for any proposed facility.

There is intermittent gas and electric services in the area and some of the parcels have well and septic systems of unknown condition. All the parcels identified are listed as critical habitat for the Sonoma California Tiger Salamander (CTS) under the Endangered Species Act. The Proposer should familiarize themselves with the requirements of constructing in CTS habitat.

Property taxes on the above-mentioned parcels, if any, would be paid by the City. Any possessory use tax that may be assessed would be the responsibility of the Lessee. Additionally, the City is willing to consider a long-term lease if desired.

The City has done some preliminary review of the potential lease value of these parcels and has concluded that there is potentially a large range of value. The City is willing to negotiate lease rates based on the details of any proposal and possible synergies with the City's existing neighboring uses and facilities, with the intent to obtain a net, fair market value for any proposed use of the parcels. The City does not currently hold any lease agreements with comparable uses in the area. The City does currently hold farming (fodder crops) and grazing lease agreements on nearby City properties which are leased at \$200 per acre and \$80-\$100 per acre, respectively. The City does not currently have a lease agreement to share that would be appropriate for this type of lease. It is important to note that these farming and grazing lease agreements are low intensity use, allow for other City activity and uses on the property, and are short term leases.

The available property also presents potential synergies between the Plant's infrastructure and a nearby organics processing facility that Proposers should consider. The potential synergistic use opportunities include, but are not limited to, use of the City's water treatment facility, recycled water, anaerobic digestion process, digester gas, heat, biosolids, and/or compost. A brief discussion and details regarding potential synergistic use opportunities follows.

Water Treatment and Recycled Water. The Plant is an activated sludge tertiary treatment plant with effluent filtration that treats the wastewater from Santa Rosa, Rohnert Park, Cotati, Sebastopol, and unincorporated areas of Sonoma County. The plant removes organic and suspended material from the waste stream to Title 22 levels for unrestricted reuse. Runoff generated from areas like rooftops and parking lots at an organics processing facility could be treated at the Plant, likely alleviating much of the traditional storm water and runoff concerns in siting such a facility. Recycled water produced by the Plant may present an available resource for providing processing services. The Plant produces approximately 6.6 billion gallons of recycled water annually, all of which is typically reused through irrigation and recharge of the Geysers.

The Plant has received five odor complaints since 2013. Three complaints were from residences on Walker Road, one complaint was from a residence on Daywalt Road, and one was from an unidentified

individual. Only the complaints originating from Walker Road were identified and, in each case, the source was odors escaping from trunk line manholes or vault covers, and easily rectified.

Anaerobic Digestion, Digester Gas, and Heat. The City operates four one-million gallon anaerobic digesters to process waste solids generated at the Plant. There may be digester capacity that could be used by the Proposer in the near or long-term for anaerobic digestion of some portion of the collected organics.

Methane and carbon dioxide are produced as a result of the digestion process and the methane is used as the primary fuel source for four co-generation engines. The digester gas (DG) production for the last 12-months averages about 463,544-cubic feet per day (Table 1).

Table 1 - Digester Gas Production

Month	Average Daily DG Production (ft ³)
July 2016	358,547
August 2016	381,161
September 2016	415,797
October 2016	436,425
November 2016	490,542
December 2016	502,114
January 2017	476,140
February 2017	507,558
March 2017	530,509
April 2017	508,869
May 2017	492,069
June 2017	467,992
Average per day	463,544

The four 1,100 kW generators are powered by model GQSK60, single turbine, 16 cylinder Cummins engines. Current engine efficiency for electrical output is approximately 37% and about 9,300 BTU/kWhr. The engines may be fueled with digester gas (DG) augmented with natural gas (NG), or with NG alone, in emergencies. Running the engines on DG reduces the amount of electricity that must be purchased by the Plant from the local utility. The City pays an average of \$0.101 per kWh for electricity and \$0.510 per MMBtu for natural gas. The Plant currently runs two engines at any given time but has available capacity for additional DG utilization and an interest in the ability to store DG.

The engine system consists of jacket cooling water pumps, lube oil pumps and intercoolers, and a heat recovery exhaust silencer. A portion of the waste heat from the engines is used to provide the necessary heat for the anaerobic digestion process. The Plant captures heat from the jacket water and exhaust, however two engines create more heat than can normally be used, even in winter. The excess heat that the Plant produces could be used by the Proposer to help facilitate organics processing. A schematic of the Plant's heat recovery system and associated operating flow rates and temperatures is attached as Exhibit B for reference.

Biosolids and Compost. The City produces approximately 28,500 wet tons of Class B biosolids annually. Of the biosolids the City produces, 65% is land applied to local farms, 33% is combined with green waste to produce compost, 1% goes to the landfill where it is used as alternative daily cover, and 1% is directed

to the Lystek Organic Material Recovery Center at the Fairfield Suisun Sewer District. Biosolids disposal costs, per wet ton, are approximately \$152 for composting, \$90 for Lystek delivery, \$51 for landfill application, and \$29 for farmland application. Farmland and landfill application are the City's most economical disposal options but farmland application is not permitted year-round and landfill application is subject to landfill limitations.

The City's compost facility, located across Llano Road from the Plant, produces approximately 1,400 cubic yards of a EPA Class-A biosolids-based compost annually, which is suitable for unrestricted use. Construction of the compost facility was completed in 1995 at a capital cost of approximately \$12 million and, due to 22-years of normal operations, requires investment within the next 5-years. An organics processing facility located near the Plant may be able to provide the City's compost operation with the needed green waste (approximately 800 cubic yards of processed green waste per week) as well as other advantages of infrastructure and operating efficiencies including the co-location of the two compost operations. During certain operational conditions, increased capacity for biosolids and compost storage would be desirable.

III. Submittal Requirements

Cover Letter. The cover letter shall contain an executive summary of the contents of the proposal and be signed by an official authorized to bind the Proposer and shall contain the name, title, mailing address, email address, and telephone number of the individual to whom correspondence and other contact should be directed.

Qualifications. Include a proposed team organizational structure, including teaming partners, subconsultants, and all key personnel. Identify the roles and responsibilities of each member of the team, including subconsultants and key personnel. Please specifically identify who will be responsible for coordinating the environmental review/permitting effort. Describe the team's, including subconsultants and key personnel, experience providing similar services to those required by the Agency's RFP and include a list of at least three (3) references for whom the Proposer completed the same.

Technical Proposal. Identify the type of facility/technology that will be utilized to process the organic materials, the acreage needed to operate, and the APNs of the properties the Proposer is interested in leasing from the City. Identify the baseline lease rate at which the Proposer values the City's land, provide a detailed description of the synergistic use opportunities the Proposer desires to engage in with the City, identify the value of the proposed synergistic use opportunities, and provide a proposed lease rate the Proposer is prepared to offer the City. Identify any additional agreements the Proposer anticipates will need to be negotiated and the expected term of all anticipated agreements. The Proposer should consider whether the proposal submitted to the City is subject to prevailing wage laws based on anticipated interactions with the City. If the Proposer believes its proposed interactions with the City are subject to prevailing wage laws, all costs should be reflective of such.

Implementation Plan. Provide a detailed implementation schedule and plan for obtaining all necessary permits to construct and operate the facility. List the permits your organization anticipates will be necessary and list the expected timeframe for receipt of all permits. Identify the process and associated schedule necessary to comply with the requirements of the California Environmental Quality Act (CEQA).

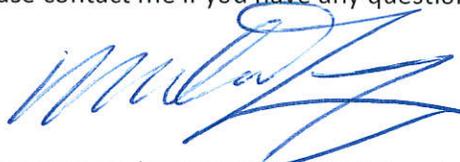
IV. Review Process

Selection will be based on the City's evaluation of the Proposals submitted. A review panel may request clarifying information from any or all entities that submit a Proposal. The City anticipates providing the selected Proposer(s) with a Letter of Intent to Negotiate to be included in the Proposer's submission to the Agency. Receipt of a Letter of Intent from the City will only be used to demonstrate the potential for securing a site on which the Proposer may operate and does not constitute a binding agreement with the City. If the Proposer chooses to participate in the City's RFP process for the purpose of securing a right to operate on City-owned land, the Proposer does so at its own risk and may wish to consider an alternate site in the event of non-selection by the City. Any Proposer not selected by the City shall have no further recourse through the Agency or the City if the Proposer's only viable site is located on City parcel(s). Any Proposer selected by the Agency that has included a Letter of Intent in their response to the Agency's RFP, shall negotiate, in good faith, one or more agreements with the City based on the terms of the proposal reviewed in this process.

Selection Criteria. The following is a partial list of the City's criteria for the selection process.

- Previous Experience/Demonstrated Ability
- Qualifications of the Team
- City/Community Value (Value of Lease and Synergistic Use Opportunities)
- Project Implementation Schedule

Please contact me if you have any questions about this Request for Proposals.



Mike Prinz, PE | Deputy Director, Subregional Operations

Attachments

Exhibit A – Available City Owned Parcels

Exhibit B - Heat Recovery System Schematic

AVAILABLE CITY OWNED PARCELS

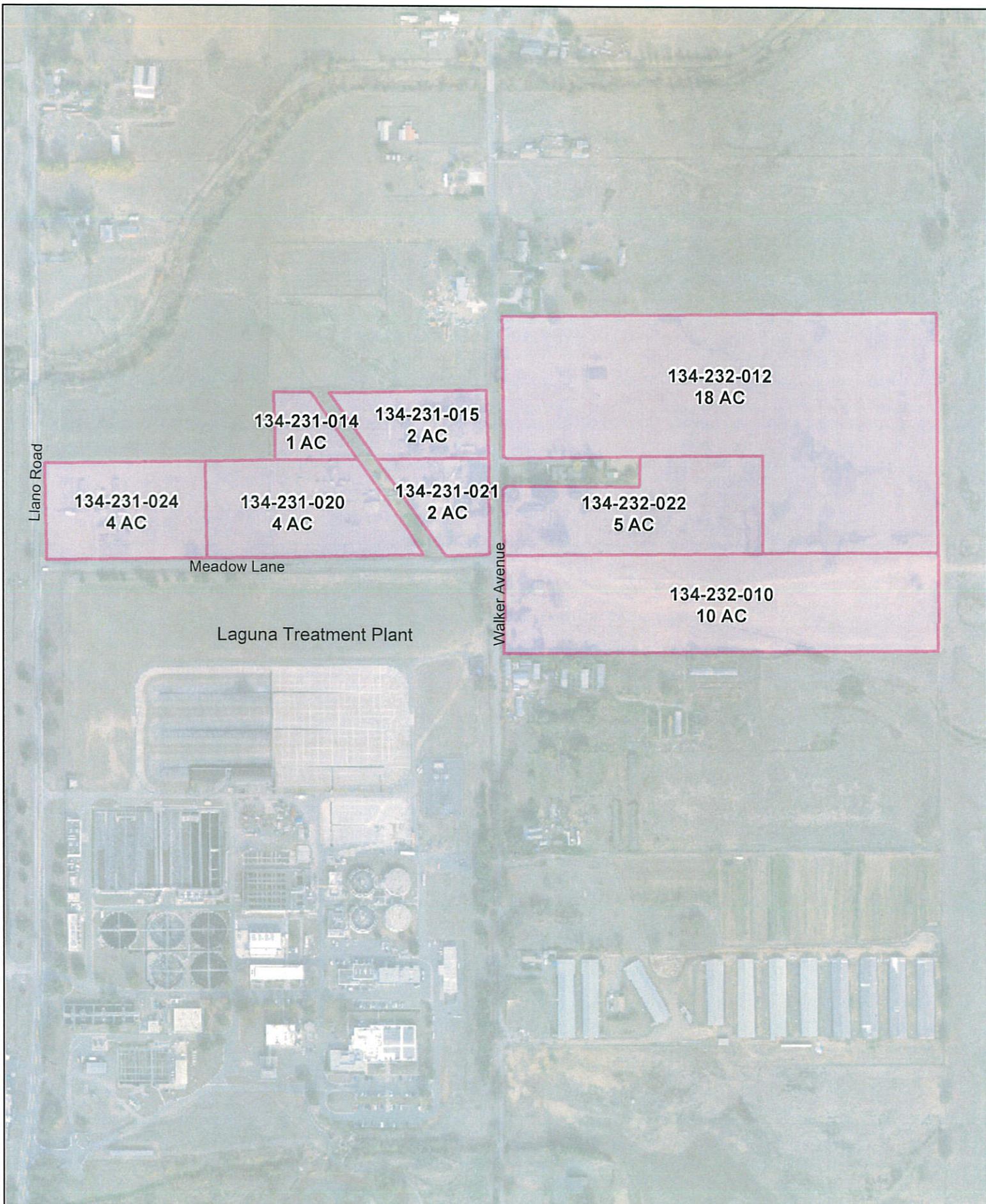
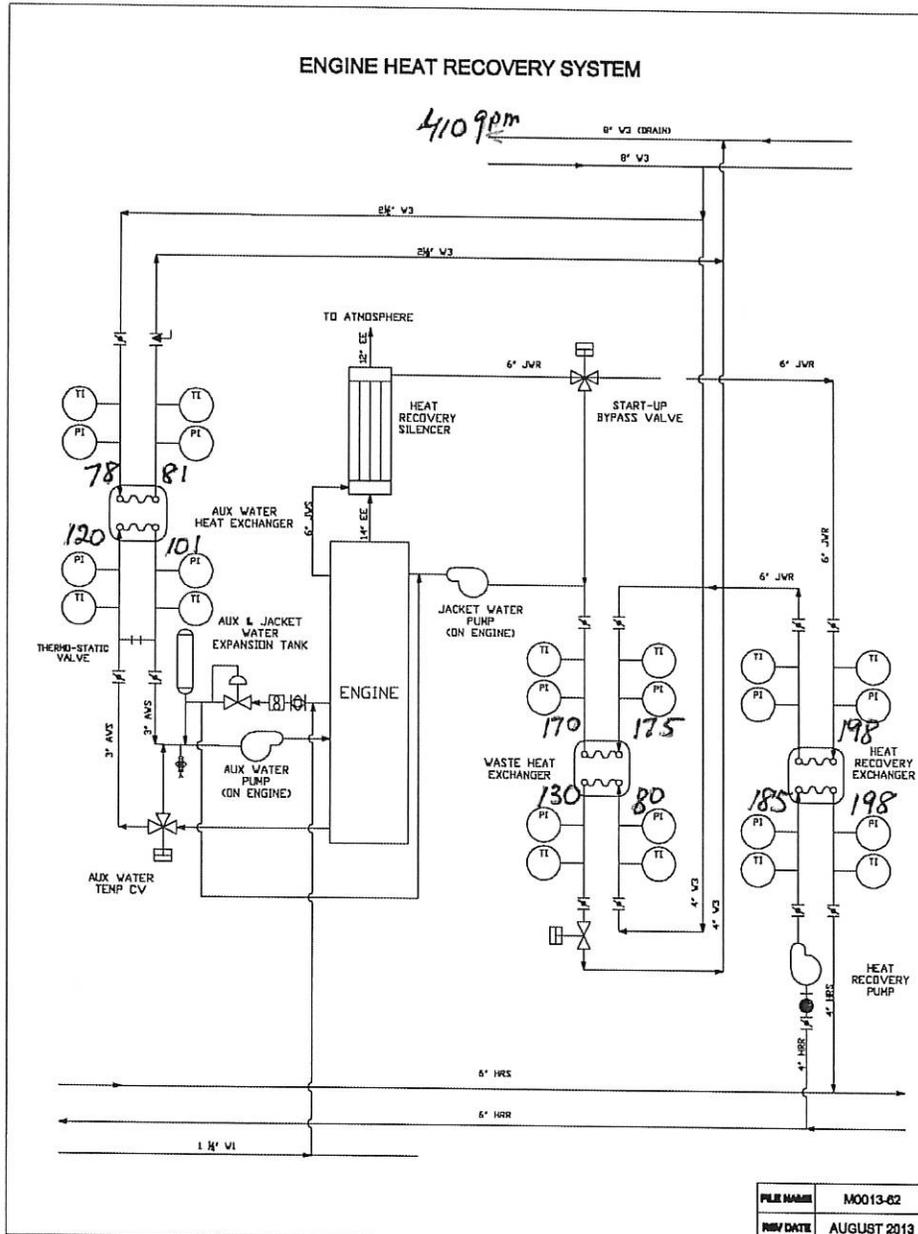


Exhibit B





Request for Proposals for Location of an Organics Processing Facility on City of Santa Rosa Property Addendum 1

Change in Due Date for Submission of Proposals. Notice is hereby given that the due date for submission of Proposals in response to the RFP is being extended to **August 18, 2017 by 5:00 p.m.**

The following questions were submitted in response to the original RFP document issued on July 18, 2017. The City's response to each of these questions is provided below.

1. What is the energy usage for the WWTP?

Plant load averages about 4,375 kWh (105,000 kWh/day). We purchase about 2,775 kWh (66,600 kWh/day) from Pacific Gas & Electric (PG&E). The amount we purchase from PG&E fluctuates as a result of storm flows. Daily load from PG&E can exceed 125,000 kWh.

2. What has been the average change in price that the WWTP has paid for electricity in the past 5 years on an annualized basis? What is the spread from on peak to off peak times in terms of pricing and what is the periods of the day for on-peak and off-peak?

The City has experienced an increase in electricity costs of approximately 10% over the last 5-years (since 2012). We are on the E20T rate schedule.

Our demand rates by component for generation are as follows:

- Maximum peak demand summer: \$15.89/kW
- Maximum part-peak demand summer: \$3.79/kW
- There is no demand spread during winter months

Our usage rates are as follows:

- Peak summer: \$0.10/kWh
- Part-peak summer: \$0.089/kWh
- Off-peak summer: \$0.072/kWh
- Part-peak winter: \$0.09/kWh
- Off-peak winter= \$0.078/kWh

Summer months are defined as May 1 through October 31 and the peak periods are as follows:

- Peak time: noon to 6:00 pm
- Partial-peak time: 8:30 am to noon and 6:00 to 9:00 pm

Winter months are defined as November 1 through April 30 and the peak periods are as follows:

- Partial-peak time: 8:30 am to 9:30 pm

Our actual costs are somewhat lower because we pay Sonoma Clean Power for the generation costs.

3. What is the cost to transport the biosolids to each disposal outlet and what is the overhead/management costs including land costs for the biosolids?

Our cost breakdown for biosolids disposal is as follows:

*Santa Rosa Biosolids
Cost Analysis Operating Costs (2011)*

Category	Landfill	Composting	Land Application
Labor	\$6,851	\$692,957	\$167,636
Fuel	--	\$30,600	\$5,400
Repairs	--	\$54,420	--
Supplies	--	\$61,020	--
Electricity	--	\$84,044	--
E&R Vehicle	--	\$101,922	\$16,186
Hauling	\$7,235	\$14,011	\$144,849
Tipping	\$47,580	--	--
Lime	--	--	\$111,140
Spreading	--	--	\$82,053
Total	\$61,666	\$1,038,974	\$527,264
Wet Tons	1,220	6,841	18,416
Cost/Ton	\$50.55	\$151.87	\$28.63

4. Can you share the permits on the biosolids composting operation?

The City’s compost facility operates under a CalRecycle Permit (SWIS Number 49-AA-0368). There are also requirements outlined in the Treatment Plant’s National Pollutant Discharge Elimination System Permit (ORDER NO. R1-2013-0001, NPDES NO. CA0022764, WDID NO. 1B83099OSON) that address operation of the compost facility. Both documents are available online.

5. Could anything be sited at the compost facility?

The parcel on which the City’s compost facility is located is occupied and fully utilized by the City but the City is open to suggestions.

6. Based on your biogas flows, you seem to be around 1.4MW of electrical output. Is that correct? If so, do we have it correct that you supplement with NG to fill the rest of the engine up so you can sustain 2.2MW?

That is correct, we produce around 1.4 MW with our DG. However, our air permit allows us to supplement with up to 10% NG in the engines so we actually produce about 1.6 MW total. In the next 18-24 months, we are anticipating alterations to our permit that will allow us to increase our NG usage in two of our engines to 100%. The remaining two engines are anticipated to remain at the 10% limit.

7. The average daily production of biogas has risen by over 100,000 cubic feet per day over the past year, is that due to industrial organics and is the numbers expected to be consistent going forward?

Yes, this is due to our recent acceptance of high strength waste and yes, we expect the DG production to be consistent moving forward.

8. Are you permitted by PG&E to send the biogas under the road to the existing engines and if so, what quality (H₂S, etc.) does the gas need to be?

We are not currently permitted to send biogas under the road but we anticipate that is something we could arrange as this would be accomplished with dedicated piping not tied into PG&E gas lines. Gas quality to the engines requires less than 13 ppm hydrogen sulfide, no water, and virtually no siloxanes. Gas heat value should be near or greater than that of DG gas (60-65% methane).

9. Can you provide a map of the gas and electric services in the area?

The City does not maintain gas and electric maps. This information can be requested and obtained from PG&E.

10. Do you have any storage of digester gas on site or did we understand it correctly that you have an interest in doing so?

We do not have on-site DG storage and we are interested in having it.

11. When were the engines installed and have they been maintained with proper minor/major overhauls as required?

Our engines were commissioned in 2013. They are properly maintained according to the manufacturer's warranty requirements.

12. Can you provide a map of the wells on the properties and the septic systems?

The City has not done any well or septic testing on the properties, we know that wells and septic systems exist intermittently on the parcels and that information can be obtained from County records.

13. Can you tell me the moisture percent of the bio sludge.

The moisture content of the City's biosolids have been averaging 16.6% for the last 30 days. The typical range varies between 15-17%.

14. What is the ratio of green waste, to overs, to biosolids?

Our ratios vary depending on the moisture content of the products but under optimum conditions our ratios are 15 yards of green waste, 15 yards of overs, and 12,000 to 13,000 pounds of biosolids.

15. What is the flooding impact from Colgan Creek?

The Proposer should be aware that Colgan Creek experiences flashy and localized flooding during some rain events.

16. Will City Wastewater plant accept contact or waste water generated from a processing facility located on these lots? If so, what limits should be assumed and at what cost?

The requirements for sewer discharge are comprehensively outlined in the Santa Rosa City Code under Title 15 SEWERS. Section 15-08.100 LOCAL LIMITS specifically outlines the pollutant limits for Significant Industrial Users (SIUs). Limits for non-SIUs are variable base on discharged volumes. Costs are determined based on the actual level of contaminants found in the waste stream. Waste streams with low ultraviolet transmissivity (UVT) are of particular concern to the City and may be subject to restrictive discharge requirements during certain times of the year. Runoff generated at the site that does not have low UVT will likely be accepted at the Plant.

17. What CTS/wetland compensatory mitigation obligation do they currently have on any of the parcels?

For CTS, based on the Santa Rosa Plain Conservation Strategy for a given site, the mitigation ratios are either 1:1 or 2:1. Permit conditions are ultimately dictated by State and Federal Resource Agencies. CTS credits cost in the range of \$125,000 to \$150,000 per acre.

For wetlands, any proposed site will need to be delineated and, if impacts to wetlands cannot be avoided, will need to be mitigated. Typically, the offset ratio for wetlands is 3:1, with credits in the range of \$100,000 per acre.

18. Is the City able to obtain “take” authorization and mitigation credit to purchase via the Santa Rosa Plain Conservation Strategy?

The City has no unique take authorization granted by the Santa Rosa Plain Conservation Strategy. Obtaining all permits will be the responsibility of the Proposer. The City has staff experienced with obtaining Incidental Take Permits and purchasing mitigation credits and is willing to share its knowledge of the process.

19. Have environmental and biological surveys been performed on these lots? If, so will City provide studies prior to bid? Have there been any definitive mapping of extent and location of CTS populations located on lots?

No environmental or biological surveys have been performed on these lots. The CTS mapping is included as Exhibit A. – California Tiger Salamander

20. Who will be responsible for performing CEQA review and obtaining a Use permit for the proposed process on these lots? Will City be the lead agency under CEQA? Will City, as land owner, act as the proponent for the project or will proposer be required to obtain the land and use permits on these lots.

The Proposer will be the project applicant and therefore be responsible for the costs associated with any CEQA review through the City's normal project application process. The City will likely be the lead agency under CEQA.

21. The house between parcel 002 and 012 is a concern. Can you elaborate on the City's views on how to manage this landowner?

The Proposer should anticipate that the land owner's adjacent to any project proposed on a City owned parcel will participate in all public comment processes.

22. Please clarify where homes and people are located in relation to parcels 134-232-012, 134-232-022 and 134-232-010. Are there mitigation plans to address occupied parcels if needed? The map indicates that the parcels go right to Walker Avenue.

Parcel 134-232-012. There are homes that appear to be occupied on the parcels directly to the north and south. These parcels are not owned by the City and Proposers are welcome to do a site visit and perform research with the County. The City cannot be certain of the status of any County owned parcels.

Parcel 134-232-022. There is a home on this City owned property that is vacant that could potentially be used as office space. This parcel borders the occupied home on 134-232-023 that is not owned by the City.

Parcel 134-232-010. This parcel is vacant, the parcel bordering to the south is also City owned and is currently in a short-term lease with an aquatic nursery. No one lives on the parcel leased by the aquatic nursery nor are there any homes on the parcel.

There are no mitigation plans to address occupied parcels not owned by the City. Any business leases we currently have are short term.

23. What is the parcel number for property directly south of 134-232-010 and how many acres? We could not find a map on the website.

The parcel directly south of 134-232-010 is 134-232-031, 4164 Walker Avenue. This is a City owned parcel, is approximately 9.5 acres, and is currently in a short-term lease with an aquatic nursery.

24. Will the City acquire or condemn the residential property bound by lots 134-232-012 and 134-232-022? If not, does the City anticipate an off-set requirement relative to processing activity occurring on lots 134-232-012 and 134-232-022 relative to resident bound by these lots?

At this time, the City does not know what setback limits would be required. Any setback requirements would be set by the City's Planning and Economic Department. The City cannot comment on purchases or condemnations of any parcels.

25. Aside from improvements, are there other taxes levied on each parcel that lessor would be responsible for (ie. WS DAM-Russian River proj, Bellevue Elem bond, Sr. High Dist Bond)?

The City will pay all property taxes on the parcels. The City reports their leases to the County annually, any possessory use tax would be the responsibility of the Lessee and would be addressed in the negotiation of the Lease/Agreement. Tax information can be obtained from the County Tax Collector.

26. Will improvements to leased parcel be taxed at 1%?

Refer to the answer to Question 24.

27. Will City consider selling the lots in question?

The City does not have plans to sell any parcels.

28. What are the market rates that you consider reasonable on the parcels of land and does the City have an expected range?

The City does not currently have any leases of this type or with this intensity, therefore we cannot comment on a market value or range. The Proposer should look at fair market value for comparable uses and take potential synergies into consideration.

29. Can they provide more details on the prevailing wage comments in the RFP.

The City is simply advising that there needs to be compliance with the Labor Code. Any detailed analysis would depend on the specifics of each proposal and any possible participation of the City.

Exhibit A - California Tiger Salamander Mapping

