

RFB 19-38 Pre-Bid Meeting

7/25/19 @ 10:00 am

Attendees

| Name | Company | Phone | Email |
|------------------|--------------------------|----------------|--|
| Jeff Morton | Strata Solar- Polytech | (704) 661-8192 | jmorton6@gmail.com |
| Andrew Schurman | Pike/UC Synergetic | (803) 833-3236 | aschurman@ucseng.com |
| John Berkner | CW Wright | (910) 581-1638 | johnberkner@hotmail.com |
| Allen White | CW Wright | (252) 933-1134 | allen_white@cwwright.com |
| Billy Butts | CW Wright | (252) 414-1980 | billy_butts@cwwright.com |
| Thomas Cooney | Booth & Associates | (803) 381-8568 | cooneytr@booth-assoc.com |
| Robert Stevenson | Rising Edge Group | (919) 809-3858 | r_stevenson@risingedgegroup.com |
| Steve Filley | Rising Edge Group | (919) 986-0826 | j_filley@risingedgegroup.com |
| William Rudisill | Jake Rudisill Associates | (704) 377-6901 | william@jakerudisill.com |
| Joseph Adkins | HICO America | (878) 208-5585 | jadkins@hicoamerica.com |
| Kirk Neubauer | Worley | (423) 757-5866 | kirk.neubauer@worley.com |
| Joe Mountjoy | Gregory Poole | (919) 755-7049 | joe.mountjoy@gregpoole.com |
| David Herman | Pitt Electric | (252) 227-2332 | dherman@pittelectric.com |
| Robert Tugwell | Power Secure | (919) 632 9010 | rtugwell@powersecure.com |
| Jonathan Tugwell | Power Secure | (919) 530-9897 | jtugwell@powersecure.com |
| Kyle Brown | GUC | (252) 551-1484 | brownkw@guc.com |
| Jacob Barnes | GUC | (252) 329-2155 | barnesjw@guc.com |
| Cleve Haddock | GUC | (252) 551-1533 | haddockc@guc.com |

Information by Kyle Brown

GUC is a member of the North Carolina Eastern Municipal Power Agency, which represents about 32 cities and towns in Eastern North Carolina. As a result of our wholesale purchase power agreement with Duke Energy Progress, one of the rate variables that we have is known as coincident peak demand. This means that every month there is one hour that Duke Energy records as their system peak and GUC gets billed a ratcheted KW demand charge.

As a result, for 30+ years we have been heavily involved in residential load management, voltage regulation and our peak shaving generator program. For the last 30 years, that has primarily consisted of natural gas or diesel peak shaving generators that customers, mainly industrial own/maintain. Additionally, we own and maintain about 12 different generator sites where we own and operate peak shaving generators behind customers meters.

Our dispatch center and load management group are responsible for monitoring Duke's system load and determining when we run load management. Typically, we run about 200 hours per year, depending on weather and things of that nature. There is a monthly peak, not an annual peak. Recently with the advancement in battery storage technology and some conversations we have had with

NCEMPA and Duke about the language within our purchase power contract and what is considered generation and not generation, we have concluded that we can utilize battery energy storage for peak shaving.

We decided it would be a good idea for us to conduct a Battery Energy Storage Pilot Project specifically utilizing the system for peak shaving. GUC is looking for a turn key project vendor to design, build and install the system, the spec gives information about the location and the available foot print of the project. As mentioned, this is a pilot project, so depending on the success of the project and what we learn after the fact from operational data and maintenance data and how successful it is, incorporating that into our load management program we would most likely be looking to expand our investments in battery storage. We would like, as part of the proposal, to know if we did expand how we would incorporate that expansion into the site.

Questions

1. Who's Scada System do you use currently and how would you control the battery storage?
 - a. We currently Servalant, so we control our generators through our SCADA system and we would expect this system to be set up in much the same way. We would run fiber from our control house and substation to the controller in this battery storage system, so that we can send a signal from dispatch.
2. Are you going to terminate that fiber in the control house?
 - a. Yes, typically if we run the fiber we will terminate it in the GUC panel.
 - b. See spec
3. On your funding, were you able to secure any outside grants through APPA or Deed or is this strictly GUC funded?
 - a. We did receive a \$125,000 grant from Deed.
4. Can you talk more about your vision for this next project, the bigger space? Is it solar, battery storage?
 - a. Just batteries. (Talked about red area on map for pilot and the blue for future expansion possibilities.
5. If we come up with a solution that takes up more space than the allotted space, are we allowed to take up a little more area (blue on map) if needed?
 - a. We are bounded to that area by the fence and we do not want to incur any extra expenses to move the fence during the pilot project. We have constraints the other way, right now this is a one transformer station but it is planned to be a two transformer station, so we are limited for the pilot project to the allotted area.
6. You will provide the conduit over to the existing controls?
 - a. We will bring the fiber conduit from the control house to stub it out to a hand hold adjacent to the transformer and the vendor will be responsible for bringing it into the battery storage system.
 - b. See spec
7. Will that all be close to this red box?

- a. That will all be within the red box, including the pad mount transformer. Based off our research, we expect to be able to contain this pilot project within this area. If you quote it and take exception to that, just note that and you would have to take an exception.
8. Are there any safety and operating clearances or distances that you are aware of? (how far from the fence, how far from the building?, etc)
 - a. For security, 10 ft away from the fence for perimeter security, but as far as clearance from energized bus, we are well outside of that.
9. Will there be any issues with a crane setting the materials inside that specific red area?
 - a. That would be up to the vendor to lay out
10. Do you own the land outside of the substation so the crane can work from the outside and drop it in?
 - a. Yes
11. If the permit takes most of the time to get, would there be any allowance for more time to complete the project?
 - a. The 12 months is our anticipated schedule, but there would be some relief available time wise.
12. Are any permits required for this job?
 - a. This is our first project like this, so that responsibility would lie on the vendor.
13. Does it have to be submitted to the state or any agencies?
 - a. Vendor responsibility
14. Is there anything underground there that we need to be aware of, or are there any underground plans that can be shared?
 - a. Yes, we could make available some of the substation drawings, everything is underground feeders, nothing that would be impacted in this area, but we could get a conduit lay out.
15. Do you have geotechs at this site?
 - a. No
16. Do you have geotechs at any other substation site?
 - a. No
17. For the feeders, there are power feeders and aux power feeders, are we responsible for creating the distribution for that aux power or can we pull from a panel somewhere in the substation?
 - a. Everything would come off the pad mount transformer.
18. Any restrictions on excavating inside the substation? Can we use any standard excavator?
 - a. We could work through the details on that when the time came, information on existing ground grid is in proposal and our staff would want to be the ones to uncover and oversee that work.
19. During the construction phase, will you help us supply the construction power or should we plan on using a generator?
 - a. Generator
20. Do we need to provide communications within the system itself ? (Ex. Ethernet connections)
 - a. The only communication GUC is responsible for is fiber optics connections to the control house of the system.

21. Any fire protection suppression requirements? There is a shift in how these things are protected with the APS fires going on. How do you want us to approach this? Do you want prices for both of these options?
 - a. In accordance with the current standards. If you want to provide both options you can, but we need what is within current standards.
22. So this has been funded?
 - a. Yes
23. You guys highlight LFP Technology but then also talk about NMC is there a reason the preferred is LFP?
 - a. This is a pilot project so we don't know exactly what we want, so we are looking to explore what is out there. Cost benefit analysis
24. If we team up with a battery vendor that only supplies one of these, is that considered not compliant if we don't give both?
 - a. Yes, according to the specs we need both
25. Do we need to supply an option for both, or supply an option for LFP and then an alternate if you want to supply an alternate?
 - a. We would like a quote for utilizing both
 - b. See Appendix A of spec
26. So we need to supply a base quote as the entire solution LFP, then an alternate with the entire solution being NMC, not mixing and matching in the container? Then one quote for each for 400 Mega Watt Hours, so a total of 4 quotes?
 - a. Yes
 - b. See Appendix A of spec
27. Quite a few of the vendors will not allow a witness to factory acceptance test. They will provide certified documents on whether it passed or failed, but it seems you are looking for a witnessed one. Is on site testing something you would be ok with?
 - a. It would need to be an exception.
28. Is there anything that you did not include in the spec that you would now like to tell us about as an option that you would like to have?
 - a. Any changes will be addendum to the spec.
29. Is there a possibility that an addendum will follow?
 - a. Unknown
30. The information listed for evaluation looks like it is only price, is that correct?
 - a. NC General Statute requires the selection to be made by lowest responsible vendor. Other factors are considered before that stage.
31. Will there be a scope review for the apparent load in person?
 - a. Cleve referred to website – bids, addendums and recommendations all found on website.
32. How do you prefer the sealed bid to be submitted?
 - a. Cleve referred to pre-bid package. Sealed bid needs to be sealed with tape. On outside of envelope identify name of company and name of bid including number.
33. Is the bid opening still at 401 S Greene St, because of construction?

- a. As of right now the bid opening will be at 401 S Greene St, we must receive them there because of receptionist being the one who time and date stamps them. If the bid opening has to be moved to a different location, we will announce it.
- 34. Will the bids be read aloud?
 - a. Yes. Parts of the bid will be read aloud.
- 35. Are you the engineer for this job (Kyle)?
 - a. Kyle is the engineer for this job.
- 36. Did Duke give you a copy of their spec?
 - a. No.