LOUISIANA PUBLIC SERVICE COMMISSION
DOCKET NO. R-31417

LOUISIANA PUBLIC SERVICE COMMISSION,
EX PARTE

In re: Re-examination of the Commission's Net Energy Metering Rules found in General Order No. R-27558, Dated November 30, 2005 (the "Net Metering Order")

COMMENTS OF JEFF SHAW - GULF SOUTH SOLAR

I, Jeff Shaw, submit the following additional specific comments pursuant to the Commission's Notice of Request for Specific Comments (the "Request for Comments") issued to the parties to this proceeding on March 14, 2013, by the Louisiana Public Service Commission on the report titled "Revised Proposed Staff Report and Recommendation."

The staff request for specific comments appears to be based around an assumption that net metering is a "cost" to the utilities and non net metered ratepayers. Since an independent cost-benefit analysis **has not been performed** for Louisiana nor have the numerous reports from other states been considered it is not reasonable to assume that excess solar generation is a "cost". Cost-benefit analysis reports provided for other states using independent methodologies show that **in all cases solar provides more benefit than cost** to the utilities, ratepayers and non-ratepayers. These were submitted in the last request for comments.

1. *RESPONSE* (Adjustments to avoided cost questions):

   a. Meter Capability. 2-way or multichannel meters **are not necessary** to determine net excess generation as existing bi-directional meters function perfectly in this capacity. In cases where the utility desires the upgraded meter, **the law already provides for that charge** to be passed to the net metered customer, which is currently implemented by Entergy and other utilities.

   b. Benefits of distributed generation in general and solar in particular.

      i. Reduction in T&D Line Losses

         1. *Line loss savings are an important benefit of net metering. For every kWh generated by a utility scale generator, 5 to 10 percent of electricity will be lost on the way to customers in the form of transmission and distribution losses. In contrast, net metering at the customer's site with almost no line loss since neighbors typically use the excess generation from a distributed generation facility with negligible line losses*

2. *Joint comments from Entergy Gulf States Louisiana and Entergy Louisiana from 2/4/2013 acknowledge that reduced T&D line losses are benefits attributable to net metering. They state line losses for EGSL at 9.0199% and ELL at 7.3125%.*

ii. *Reduction in Peak Demands*
1. *Solar systems will produce power from sunrise to sunset and therefore are capable of reducing peak demand even if they occur in late evening hours.*
2. *Joint comments from Entergy Gulf States Louisiana and Entergy Louisiana from 2/4/2013 acknowledge that reduction in peak demands or peak shavings are benefits attributable to net metering*

iii. *Avoided Electrical Generation Capacity Costs*
1. *Distributed generation systems such as solar that are installed over many years aggregate and provide sufficient capacity that would defer some quantity of system level utility investments for new capacity and should be attributed some value*
2. *Studies have concluded that capacity benefits are real and incremental, with aggregate distributed solar generation being far more stable and predictable than the obviously intermittent nature of individual solar facilities*

iv. *Environmental Benefits*
1. *Solar systems produce clean energy and there are several examples of how this benefit has been valued in Louisiana.*
   a. *Entergy Geaux Green Program – priced green energy at 2.25 cents/kWh premium over retail rates*
   b. *Entergy Renewable Energy Tariff "Schedule RFP" – prices renewable energy at 3 cents/kWh premium over hourly avoided cost but not less than 6 cents/kWh or greater than 12 cents/kWh*
   c. *Entergy was part of the "Geaux Green" initiative launched by the Super Bowl XLVII to limit the environmental impact of the Super Bowl by offering participants to purchase 1000 lbs CO2 carbon offsets for $5. This equates to about 0.5 to 1.0 cents/kWh depending on the fossil fuel source*

v. *Economic Development & Job Creation*
1. *There are over 200 solar installers employing more than a 1000 high paying, high skilled workers in Louisiana.*
2. *Utility bill savings by owners of renewable energy systems translates into disposable household income that directly enhances the state's economy. Estimated impact from the 3,000 installed solar systems over their productive lifetimes is so far over $90,000,000 which directly boosts consumer spending in communities throughout the state.*

vi. *Listed below are many of the other benefits of distributed generation and solar that have been cited in many national studies and may apply to Louisiana. A thorough cost/benefits analysis would be able to identify and quantify the value of these benefits.*
1. *Reduce demand on an increasingly strained electrical grid.*
2. *Avoided fixed operating costs*
3. *Avoided fuel purchases*
4. *Hedge on natural gas prices*
5. *Fuel diversity.*
6. *Disaster recovery*
7. *Blackout prevention and emergency utility dispatch*
8. *Managing load uncertainty*

9. *Reactive power control*
10. *Facilitate energy self-reliance*
11. *Help meet goals of future Renewable Portfolio Standards (RPS)*
12. *Improved air quality and public health*

c. Simplicity of calculation

i. *The simplicity and understandability of net metering have been pivotal in reducing barriers to consumer understanding of energy technologies such as solar and is arguably one of the most successful market transformation policies for the renewable energy market.*

ii. *Having different rates for net excess generated power vs. power purchased from the grid will make it confusing as well as costly to implement. This is supported by comments from CLECO in their 3/1/2013 comment filing that stated: "Implementation of Staff's recommendations will require Cleco to modify its customer billing system to accommodate changes in Cleco's method of calculating, tracking and crediting customers for excess generation. Cleco estimates that these changes will involve substantial internal effort to revise processes and controls, and incorporate changes into customer bills."*

2. The data submitted by utilities may show that at least one utility has reached 0.5% of its retail peak demand. If so, should the Commission retain the 0.5% threshold as a cap on net metering installation for each utility? Please explain.

RESPONSE:

The Commission should consider raising this threshold for the following reasons:

a. *It is questionable if any of the utilities have actually reached the 0.5% limit. Northeast Louisiana Power Cooperative (NELPC) is the one utility that provided data to suggest they have reached the 0.5% of retail peak demand. When you analyze their data against all other utilities they stand out in several areas which makes their data suspect. For example, the amount of kWh purchased by NELPC relative to the NELPC Net Metering Generation Capacity is over 3.5 times the average of all the other utilities (83% vs. 23%). Another anomaly is the LPSC Staff calculation for NELPC on the Annual Subsidy/Customer which is 9 times the average of all the other utilities ($1.19 vs. $0.13).*

b. *Louisiana's limit of 0.5% of peak demand is among the lowest in the nation being ranked 41 out of the 44 states with net metering policies.*

c. *National Best Practices:*
   a. *19 states have no limits*
   b. *21 states have limits > 0.5%*

d. *Capacity limits artificially restrict the expansion of distributed renewable generation and curtail the market for new renewable energy systems*

e. *Capacity limits create uncertainty for customers considering investing in renewable energy systems. Since customers have no way of knowing when capacity limits will be met, they cannot effectively plan for future installations. This regulatory uncertainty inhibits renewable energy investments*

3. Parties may also comment on issues raised by other parties in the last round of comments to assist the Staff in finalizing its recommendation in this matter.

RESPONSE:

Below is a list of comments on issues and data from other parties including the LPSC Staff:

a. *The data for CLECO on the Net Meter Subsidized Purchased Power Cost – FINAL spreadsheet provided by LPSC Staff is actually Claiborne Electric's data. When you look at the CLECO tab in the LPSC spreadsheet the data is labeled Claiborne Electric Coop data and is not CLECO's data. Claiborne Electric Coop is completely missing from the list of utilities.*
b. *Staff recommended paying the Avoided Cost Rate vs. Retail Rate for Net Metered kWh Purchases. But when the Staff did their Subsidy calculations (Table IX-3), they use the difference between the Fuel Clause Rate vs. Retail Rate. Would the Staff clarify if the recommendation is for paying the Avoided Cost Rate or Fuel Clause Rate?*
c. *If the Staff intends to actually use the Fuel Clause Rate vs. Avoided Cost Rate, then some Utilities (Jefferson Davis, Northeast Louisiana, Panola-Harrison) didn't provide the Monthly Fuel Clause Rate data as requested by the LPSC so the Staff had to use their Monthly Avoided Cost Rate data. Jefferson Davis said in their comments that the "Fuel Clause Rate is attached," but what they attached doesn't show Monthly Fuel Clause Rate data so the LPSC defaulted to using instead their Monthly Avoided Cost Rate data. Northeast stated that "NELPCO does not have a fuel clause rate" so the LPSC defaulted to using their Monthly Avoided Cost Rate data instead. Panola-Harrison only provided Monthly Avoided Cost Rate data and didn't provide Monthly Fuel Clause Rate data as requested so the LPSC defaulted to using their Avoided Cost Rate data.*
d. *CLECO did not provide the Average Rate per kWh (i.e. Retail Rate) as requested by the LPSC. In their comments, they noted "The average rate per kWh in column (b) represents CLECO Power's yearly average avoided cost rates …". Without their Monthly Retail Rate data, the Subsidy Calculation for CLECO cannot be calculated.*
e. *Washington-St. Tammany data still shows 0 Net Meter kWh purchases for Jan, June, July, August and December which is very suspect. They also did not provide the Monthly Inverter Capacities as requested by the LPSC.*
f. *Concordia Electric Cooperative submitted their data about a month late (submitted 2/27/2013) and then didn't provide hardly any of the data as requested by the LPSC. Their data is not included in the LPSC spreadsheets so the LPSC isn't using all the necessary Utility data.*
g. *SLECA stated that they estimated the Net Metered kWh Purchases and did not include any explanation on how this estimate was calculated so this makes their data suspect.*
h. *Panola-Harrison provided exactly the same Monthly Residential Rate for every month which is not consistent with how all the other Utilities Monthly Residential Rate data varies month to month and therefore makes their data suspect.*
i. *Dixie Electric provided exactly the same Monthly Avoided Cost Rate for every month which is not consistent with how all the other Utilities Monthly Avoided Cost Rate data varies month to month and therefore makes their data suspect.*
j. *Northeast Louisiana data is suspect. It shows that the Net Metered kWh Purchases average about 83% of Theoretical Capacity which is much higher than all the other Utilities whose average is 23%. While possible, this is not probable, considering that the Utility doesn't have extremely large systems (avg. 8.3 kW per system). Another point that suggests their data is suspect is that their Annual Subsidy/Customer is $1.19. This is 9X the average of all the other Utilities Annual Subsidy/Customer which is $0.13 and is 4.7X larger than the highest of all the other Utilities Annual Subsidy/Customer which is Jefferson Davis at $0.25*
k. *As noted by the LPSC on Table IX-2, Beauregard, Jefferson Davis and SLECA did not provide all the Monthly Data as requested by the LPSC.*

l. *Entergy Gulf States and Entergy Louisiana failed to provide the 2012 Monthly Peak Load data as requested by LPSC.*
m. *Several Utilities (Beauregard, Jefferson Davis) list the Inverter Capacity exactly as the same amount as the Generating Capacity which we know is not the case. Therefore this data is not consistent with all the other Utilities data and makes their data suspect.*
n. *Several Utilities (CLECO, SWEPCO, SLECA, Point Coupe, Entergy-EGSL, Entergy-ELL) show Total Generation Capacity higher than Total Inverter Capacity which is not typical and therefore makes the data suspect.*
o. *The % Peak Load Summary Spreadsheet calculates the % Peak Load as the Inverter Capacity divided by the Peak Load. To be accurate, this should be calculated as the minimum of the Inverter Capacity or Generator Capacity divided by the Peak Load since the output of a system is limited by the lower of the generation or inverter capacity. Again, typically on systems the Inverter Capacity is sized larger than the Generation Capacity so the typical limiting factor would be the Generator Capacity and not the Inverter Capacity.*
p. *Claiborne noted in their data submittal that the "kWh Purchased from Net Metering Customers" was for "banked" credit (i.e. rollover) which is not what the LPSC requested or needs and therefore not consistent with all the other Utilities data and makes their data suspect.*

CONCLUSION

As outlined above, the data provided by the utilities to the Staff as well as the Staff's calculations and analysis have many potential problems ***and it would be negligent*** *to make any recommendations or consider any changes until this is corrected. Also, the LPSC Staff is proposing changes to the Net Metering Rules without any cost-based justification for doing so. A foundation of utility ratemaking is that utility charges must be based on cost of service and net metering customers have a right to be treated no differently. Studies in other states have shown that the customer investments in net metered local generation are actually delivering a net benefit to other ratepayers[2]. Outcome from these studies shows that a thorough cost and benefits analysis with solid data can address subsidy concerns and arrive at an outcome that is fair for all stakeholders – utility customers, renewable energy customers, and the utilities.*

I respectfully request that **no changes** to the net metering rules be proposed until an expert can be retained to do the proper cost-benefit analysis and/or consider looking at the "Value of Solar" Tariff model. Based on the numbers submitted there is no urgent need to dismantle the current operating rules without proper data and analysis. It is evident from what has been submitted that we have neither proper data nor proper analysis.

Respectfully submitted,

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