

B3 BENCHMARKING newsletter

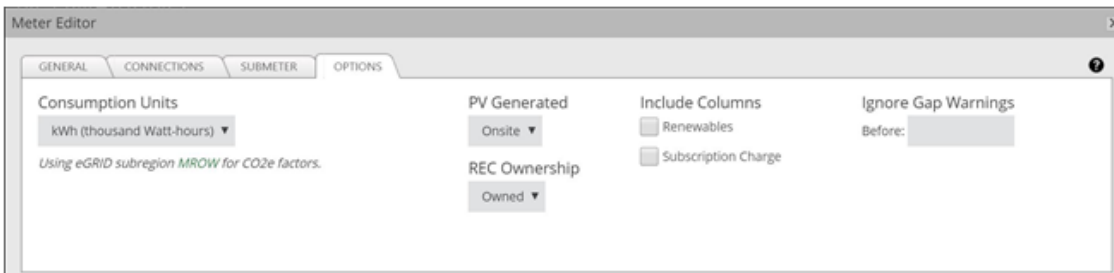
In this newsletter:

- Enhanced Renewables Functionality
- New Features Webinars

Enhanced Renewables Functionality

As the price of renewables decreases and more utility renewable programs become available, more and more organizations are taking advantage of renewable energy. B3 has been enhanced to better track different renewable opportunities, especially with PV.

When you select a PV or wind renewable meter, the Options tab has been enhanced to allow further tracking of renewable attributes.

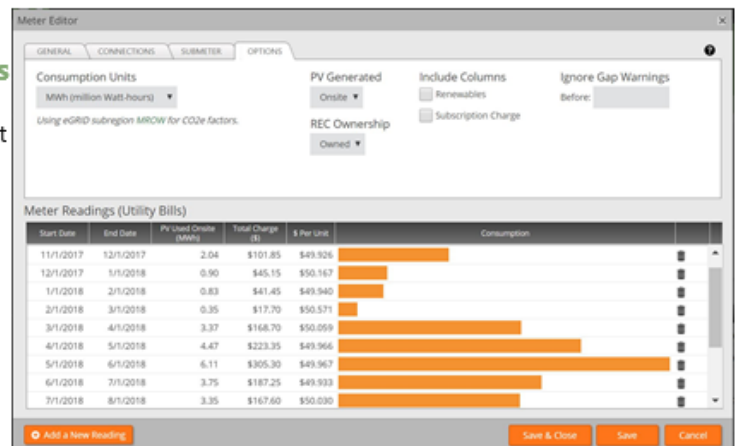


- PV Generated provides designation of where the renewable was produced – onsite vs offsite.
- REC (Renewable Energy Certificate) Ownership allows users to designate if the RECs are owned thus the site can claim the carbon offset. The sold option is used when onsite RECs have been sold but also when RECs have not been purchased through a renewable program.
- Renewables columns replace the single consumption column with two columns to identify energy used onsite vs energy exported to the grid. These will be added together by the application to report total production. This is great for sites that (sometimes) over produce and may be working towards net zero.
- Subscription Charge columns are utilized for community solar gardens and programs where the site is paying a third-party vendor for solar but also getting a utility credit.

Examples of various scenarios will be highlighted below along with reporting in Visualizations tab.

Small owned onsite PV array that never overproduces

Leave the additional columns off to provide a streamlined entry of just reporting the PV used onsite. With the array being owned, total charge columns may be zero.



Owned onsite PV array that periodically/typically over produces and sends energy back to the grid

Since the array sometimes overproduces, include the 'Renewables' columns to provide break out when some PV was exported back to the grid. The application will then add the PV used onsite to the PV export to calculate total production. Depending on total site consumption, there may or may not be a negative total charge (credit) for the array.

Start Date	End Date	PV Used Onsite (MWh)	PV Exported Offsite (MWh)	Total PV Production (MWh)	Total Charge (\$)	\$ Per Unit	Consumption
5/1/2018	6/1/2018	6.11	0.45	6.56	\$305.30	\$49.967	
6/1/2018	7/1/2018	3.75	0.31	4.06	\$187.25	\$49.933	
7/1/2018	8/1/2018	3.35	1.87	5.22	\$167.60	\$50.030	
8/1/2018	9/1/2018	2.97	0.27	3.24	\$152.48	\$51.340	
9/1/2018	10/1/2018	1.87	0.00	1.87	\$93.48	\$49.989	
10/1/2018	11/1/2018	0.68	0.00	0.68	\$34.10	\$50.147	
11/1/2018	12/1/2018	0.42	0.00	0.42	\$21.15	\$50.357	
12/1/2018	1/1/2019	0.20	0.00	0.20	\$10.00	\$50.000	

Community solar garden subscription

When subscribing to a community solar garden, there is the complexity of tracking how much is being charged by the solar vendor against how much is being credited by the utility. Some organization also choose to over subscribe so they are purchasing more community solar than the site is actually using. Including the "Subscription Charge" columns provides additional columns to track the consumption subscribed to as well as columns for the vendor charge and utility credit. Depending on the subscription, there may or may not be a negative total charge (credit) for the subscription. Some subscriptions include RECs and some do not so select the appropriate option. Another key aspect of a community solar garden meter is to assign it as a submeter to the utility meter that it is tied to. This ensures that the energy reported in the utility electric meter is offset by the renewable energy that is being reported in the community solar meter to accurately display the amount of renewable energy the site is utilizing.

Start Date	End Date	Consumption (kWh)	PV Vendor Charge (\$)	Subscription Credit (\$)	Total Charge (\$)	\$ Per Unit	Consumption
3/1/2019	4/1/2019	27,226.17	\$3,131.01	\$3,407.35	-\$276.34	-\$0.010	
4/1/2019	5/1/2019	24,382.34	\$2,803.97	\$3,044.63	-\$240.66	-\$0.010	
5/1/2019	6/1/2019	32,500.00	\$3,700.00	\$4,012.19	-\$312.19	-\$0.010	
6/1/2019	7/1/2019	43,000.00	\$3,500.00	\$3,951.47	-\$451.47	-\$0.010	

Another key aspect of a community solar garden meter is to assign it as a submeter to the utility meter that it is tied to. This ensures that the energy reported in the utility electric meter is offset by the renewable energy that is being reported in the community solar meter to accurately display the amount of renewable energy the site is utilizing.

Power Purchase Agreement (PPA) where the RECs have not been purchased

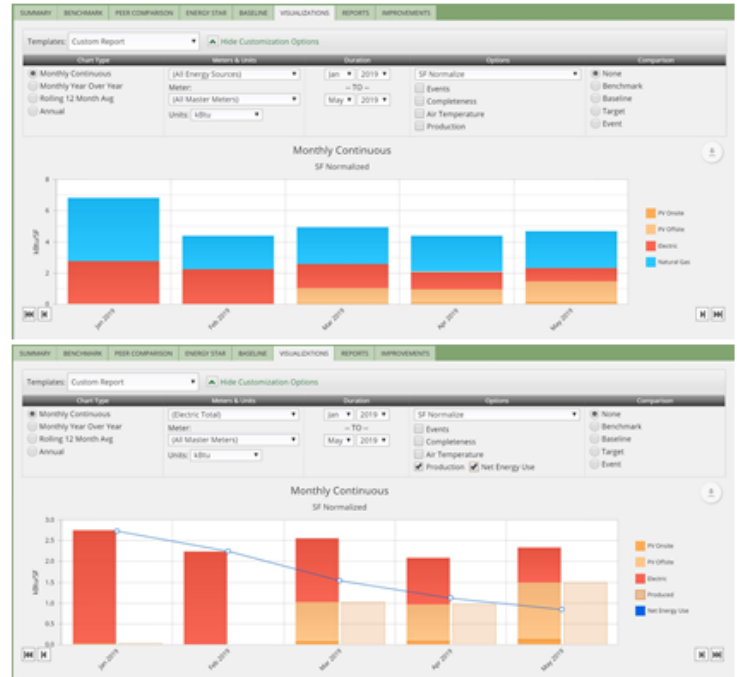
Solar power purchase agreements may/may not include the RECs and this example it does not. Since the purchased power is separate from the utility, no additional columns need to be included.

Start Date	End Date	PV Used Onsite (MWh)	Total Charge (\$)	\$ Per Unit	Consumption
7/1/2018	8/1/2018	4.86	\$243.00	\$50.000	
8/1/2018	9/1/2018	3.29	\$164.50	\$50.000	
9/1/2018	10/1/2018	2.67	\$133.50	\$50.000	
10/1/2018	11/1/2018	1.80	\$90.00	\$50.000	
11/1/2018	12/1/2018	0.82	\$41.00	\$50.000	
12/1/2018	1/1/2019	0.34	\$17.00	\$50.000	

Visualizations highlights the renewable options

This site is highlighting the renewables coming from the community solar subscription that started in March are offsetting the electricity purchased from the grid.

Drilling into just the electric meters, Visualizations can now display how much PV was produced compared to consumption and report net energy use.



New Features Webinars

Want to see these new features in action or ask questions, join us for an upcoming webinar.

- Wednesday, December 11th at 2:00pm CST - [Register Now](#)
- Thursday, December 19th at 2:00pm CST - [Register Now](#)

New to Benchmarking?

[Contact us](#) to get setup or provide an overview.