

How to Track Electric Demand in Portfolio Manager

EPA’s ENERGY STAR Portfolio Manager tool helps you measure and track the energy and water use, waste and materials, and greenhouse gas emissions of your buildings, all in a secure online environment. You can use the tool to identify under-performing buildings, set investment priorities, verify efficiency improvements, and receive EPA recognition for superior energy performance.

Steps to Track Electric Demand

1. Enter Electric Demand and Demand Cost
2. Track Annual Demand Metrics

Utilities typically charge commercial customers for both the quantity and the rate of electricity consumed. **Electric demand** is the rate of using electricity, and **demand cost** is the cost you are charged for this demand on each bill. Tracking demand and demand cost will help you understand what portion of your bill is associated with demand and when this demand occurs, so you can look for ways to reduce your demand and lower your utility bill. Using less electricity and using it at a lower rate throughout your billing period will reduce your demand charges.

Utilities present demand in many ways. Figure 1 is one example of how demand might be captured on your energy bill, noting the specific demand and demand cost elements that will need to be captured in Portfolio Manager.

1 Enter Your Electric Demand and Demand Cost for Each Electricity Bill

On the main page of your property, go to the **Energy** tab.

1. Click on your electric meter. Select the first electric meter for which you wish to track demand and demand cost.
2. Enter demand (kW) for each meter entry. You will need a full year of demand input before you can get any demand metrics. If you can’t find “demand” on your bill, look for the largest measured value you see in kilowatts (kW) across any breakdown of demand on your bill. It might be called “Peak kW” or “On-Peak kW.”
3. Enter demand cost (\$) for each period. Include any costs associated with:
 - ✓ Kilowatt (kW) usage
 - ✓ Anything labeled “Demand Charge”

XYZ Utility			
Customer Name:	Jane Smith, ABC Corporation		
Service Address:	123 Main Street, Anytown, Any State, ZIP		
Service Period:	01/31/19 - 02/28/19		
Rate Class:	Commercial		
Account Number:	987654321		
Meter Number:	1234567		
Demand Data			
Contract Demand (kW)	2,160		
kW (Peak)	2,089.50		
Consumption Data			
Meter Readings	Line 1	Line 2	
Current	37,066	640	
Previous	36,680	0	
Difference	386	640	
Constant	750	750	
kWh Usage	289,500	480,000	
Total kWh Usage			769,500
Billing Days	29		
Account Balance			
Service Charge			818.95
Energy Charge	769,500 kWh @ \$0.05972	45,954.54	
Demand Charge	1,000.00 kW @ \$13.07	13,070.00	
Demand Charge	1,089.50 kW @ \$15.15	16,505.93	
State Sales Tax	7.00%	5,344.46	
Total Balance Due 3/26/19			\$81,693.88

Figure 1: Sample utility bill

Note: Demand in Portfolio Manager was designed to be generic and flexible to track electric demand use and costs based on what information is available and most important to you in managing your energy use. Demand data can be entered into Portfolio Manager through any of the data entry options discussed in the guide [How to Get Utility Data into Portfolio Manager](#). Below is an example of what you would see on the “Manage Bills” page, for a meter where both consumption and demand are being tracked.

	Start Date	End Date	Usage kWh (thousand Watt-hours)	Total Cost (\$)	Estimation	Green Power	Demand (kW)	Demand Cost (\$)
<input type="checkbox"/>	1/1/2019	1/30/2019	692,650	73,416.84	<input type="checkbox"/>	<input type="checkbox"/>	1,880.55	26,609.78
<input type="checkbox"/>	1/31/2019	2/28/2019	769,500	81,693.88	<input type="checkbox"/>	<input type="checkbox"/>	2,089.5	29,575.93
<input type="checkbox"/>	3/1/2019	3/31/2019	731,025	77,488.65	<input type="checkbox"/>	<input type="checkbox"/>	1,985.02	28,088.10

Figure 2: Individual meter energy demand

2 Pull Demand Metrics into Custom Reports

After you have entered at least 12 months of demand data into Portfolio Manager, you can begin including demand metrics in your custom reports. For more information on this process, please see the [Guide](#). The following metrics will be available for custom reports, under the **Summary** tab, **Change Metrics**, and by selecting the “Energy Performance Metrics” and “Cost Performance Metrics” categories. Please note that demand metrics are calculated at the property level, not the meter level.

- ✓ **Annual Maximum Demand (kW):** highest demand value across all your electric meters covered in the 12-month performance period.
- ✓ **Annual Maximum Demand (MM/YYYY):** ending month and year of the 12-month period that had the highest demand.
- ✓ **Annual Maximum Demand (Meter Name (Meter ID)):** name of the meter that had the highest measured demand, and the Meter ID that assigned by Portfolio Manager.
- ✓ **Annual Demand Cost (\$):** sum of all demand costs across all months and all meters in the selected 12-month performance period.

Learn More!

To learn more about Portfolio Manager, visit www.energystar.gov/benchmark.

To get answers to your questions, visit <https://www.energystar.gov/buildingshelp>.