



## Things You May Not Know About Your OmniSite Dialers

### Check the Alarm Status of All Your Pumping Stations

On the main page, go to “Status” → “Quick Views” → “Station List”. All of the alarm indicators should be Normal” . If indicators are In Alarm” ● or “Acknowledged” ●, the condition should be investigated and corrected at the pumping station.



### Check the Status of Your Pumps

On the Main Page, go to “Analyzer” → “Pump Calculations” → “All Stations” for a quick view of the status of each pump in your system.

- Cycles
- Average Drawdown Time
- Runtime
- Average GPM (Pump Capacity)
- Effluent (Total Pumped Flow)

Decreased pump capacity is a warning sign of a potential problem – clogged pump, clogged check valve, excessive internal clearance, worn impeller, or other pump or system issues. Detecting and fixing a problem early can prolong the life of your equipment, prevent overflows, reduce power costs, and reduce emergency callouts.



### Are Both Pumps Operating Simultaneously in a Duplex Pumping Station?

The OmniSite can be used to monitor simultaneous run times. State regulations require each pump in a duplex pumping station to have the capacity to handle the peak flow. Under normal operation, two pumps should not operate at the same time. If two pumps are operating at the same time, it could be a sign of one or more of the following:

- The inflow into the station has increased beyond the capacity of the pumps
- The pumps are worn and need to be serviced
- There is a system problem that needs to be corrected

Please contact us for information on how to monitor simultaneous run times with the OmniSite.

## Take Advantage of the Mapping Function

The GuardDog website uses Google Maps to provide you with the ability to place your pumping stations on the map view. To see the map on the GuardDog website, go to “Status” ➡ “Quick Views” ➡ “Map View” to bring up Google Maps.

To add a pumping station to the map, go to “Setup” ➡ “Device Setup” ➡ “Station Information” and add the street address or the GPS coordinates for the pumping station. If you need assistance, please contact us.



## Understand the Usefulness and Limitations of Volumetric Flow Metering

The OmniSite volumetric flow measurement can be extremely helpful in monitoring the performance of your pumps and provides valuable inflow information that can be used for multiple purposes. The OmniSite uses the “Draw Down” method to measure inflow into the wet well and the pumping rate.

When using the volumetric flow function of the OmniSite it is important to understand the limitations of volumetric flow measurement. The volumetric flow data calculated by the OmniSite device and recorded on GuardDog website is very accurate under most flow conditions; however, it is less accurate for some flow conditions:

- When the inflow rate exceeds the pumping rate of one pump
- When the inflow rate into the wet well has sudden and significant variations, such as when an upstream pump station turns on
- When the wet well dimensions and pump drawdown distance is not accurately entered into the OmniSite device
- For pumps that use variable speed drives (VFD)
- With long ramp up/down times when using RVSS “soft start” motor starters

## Be Careful Changing Wet Well Levels

If you are using the OmniSite’s volumetric flow function, and you change the wet well operating levels by adjusting float switches or your level controller, the wet well drawdown dimensions in the OmniSite also need to be changed or the volumetric flow calculations will be inaccurate. Call us if you need assistance. We can easily walk you through the changes needed to keep your volumetric flow calculations accurate.

## OmniSite Crystal Ball On Water Tank Applications

The Crystal Ball is often used on potable water tank applications to monitor tank water levels and high/low level alarms. It can also be used to control the pumps or monitor the following:

- Chlorine residual
- Turbidity
- Pressure
- Amp readings



## Two Models Available

OmniSite offers two models for pumping stations – the XR50 and the Crystal Ball. For most applications, the XR50 is more than adequate, but the Crystal Ball offers enhanced capabilities. The major differences between the two are as follows:

	XR50	Crystal Ball
Alarm Inputs	7	11
Pump Activity Inputs	3	4
Analog Inputs (4-20 ma)	0	4
Pump Control (relay outputs)	No	Yes
Pulse Flow Totalization	Yes	Yes

## Use the OmniSite to Transmit Flow Meter Readings

Use the OmniSite to transmit flow readings from a flow meter. The flow data is displayed on the GuardDog website for easy access from any computer. The flow information on the webpage can be exported to an Excel spreadsheet for tabulating and graphing total flow. Peak hourly flow can also be monitored with the Elite Cellular Service Plan.



## Download the GuardDog Mobile App

Download the GuardDog mobile app to your iPhone or Android device to receive data from your remote pumps and alarms.

For stations connected to an OmniSite remote monitoring system, you will have the ability to view pumps, alarms, runtimes, and cycles at any time or place.



**Contact us if you have any questions or would like additional information.**



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