Hi David,

I was able to boil everything down to this basic conditional when determining whether or not a POLD leak alarm has occurred with past and current devices:

If ((alarm\_type === 3) || (alarm\_type === 4 && chan\_mod === 0)) {

cur\_val = cur\_val; (not pold\_id)

This should be labeled as a generic POLD alarm but no friendly names can be assigned since cur\_val is not representing the POLD ID. These will also be the conditions for strongly recommending an update to the new control panel once it becomes available (TBD).

} else if(alarm\_type === 4 && chan\_mod === 1) {

cur\_val = pold\_id;

Use friendly names and recommend naming if not previously added.

}

Here is how a Low Battery condition for POLDs should be recognized:

If (alarm\_type === 5 && chan\_mod === 1 && trip\_val < 100) {

cur\_val = pold\_id;

Trip Val = Bat Low;

Bat Low (as laid out in the POLD mock device page) will be a value less than 100(%) and represent the current POLD battery state. Although our devices do not currently have the capability to recognize and transmit their precise battery condition, it’s very likely this will be the case with future devices. For current devices, they will only transmit a 50% when low and will not transmit when full (100%). The low battery flag should be set for the device indicated by cur\_val.

}

There will be a third type of “POLD” alarm in future devices which is an alarm by another panel (alarm\_rem\_panel):

If(alarm\_type === 6 && chan\_mod === 1) {

cur\_val = cur\_val; (not pold\_id)

This will represent a POL that is wired directly to the control panel. There can be only one, so the pold\_id is irrelevant. We will want to display something like “Leak Detected… Source: Wired Sensor at the Control Panel.” Ideally this will be a device that can be renamed to something like “Sewer Backup Sensor.”

} else if (alarm\_type === 6 && chan\_mod === 0) {

cur\_val = cur\_val; (not pold\_id)

This will represent a control panel that is in alarm by another control panel. In other words, a control panel has detected a leak and shared that condition with another device to, for example, ensure that all valves close. As things develop, we will most likely want to explore how we can bind two or more devices together so that when one reports an alarm state some sort of action can be taken for all devices in the group. In the meantime, we will want to display something like “Leak Detected… Source: By Another Control Panel.”

}