Connect-FD
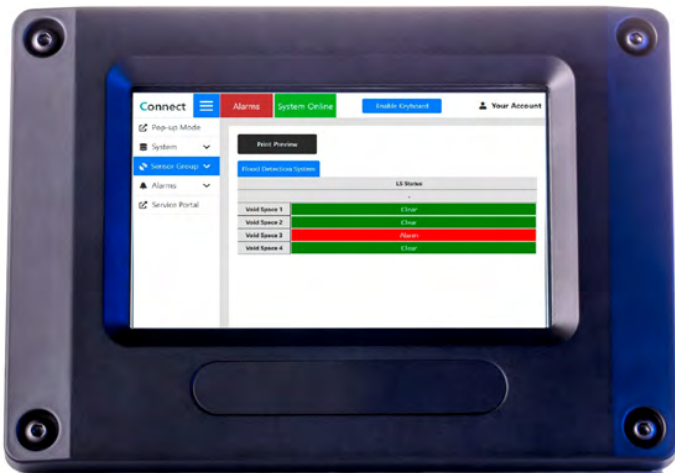# Dedicated System for Flood Detection

Key features

• Dedicated system for water ingress detection in bilges and void spaces

• Type Approved

• Clear visual indication of status via integral 7" Touchscreen

• Cable fault / break detection

• Repeater displays may be added

• Serial (Modbus) output to other systems

• Detection switches have integral test mechanism

• Wall or Console mounting

• Primary and secondary supply inputs

PSM is a Scanjet Group Company

Overview

The FD system is developed from PSM's established Connect family of data acquisition and display systems to provide a Type Approved dedicated Flood detection and display solution. The system is scalable for vessels of all types, with signal marshaling and acquisition modules and display points being distributed as needed.

Flood Detection Sensors

PSM's BLS9200 detection switches are installed at all locations where water ingress is to be monitored.

The BLS9200 is an all stainless steel float switch having an internal reed switch which is activated by a magnet within the switch float

When used as part of the PSM flood detection system the BLS9200 is fitted with internal resistors on the normally open and normally closed lines. In this way a variable current can be measured depending on the switch state and additionally, cable fault detection for short-circuit or open circuit can be detected and displayed.

The BLS9200 also has an integral test handle to simulate an active alarm.

Status signals from BLS9200 flood detection switches are routed via signal conditioning modules which then connect to the Display via an RS485 serial connection.

 Depending on optimum cable routing on a particular installation, these signal conditioning modules may be included together with the display in a wall mount enclosure. or may be mounted in separate marshaling enclosure(s) which accepts all input switch signals and then communicates to the display enclosure via a single 4 core cable.

Display

The central display includes a full colour TFT touchscreen which is individually configured to suit the application. Clear indication of status, Clear, Alarm, Cable Break, Cable Short, is given for each input.

The display may be console or wall mounted as required.

Alarms may be acknowledged via the screen.

Display Outputs

The display may be fitted with a relay output card which provides four independent changeover contacts providing an alarm output for Clear, Alarm, Cable Break, Cable Short conditions on any of the monitored signals.
A second RS485 communications port allows connection to the Vessels central Alarm Monitoring / Platform Management System. The central system may interrogate the display for a full report on status using Modbus RTU protocol.

Additional Displays

Two displays may be interconnected via a single direct Ethernet connection. Each VPM shares the status of all connected inputs i.e., clear / active / unacknowledged / acknowledged such that both can display status of all monitored points. Acknowledgement of an alarm is only possible from the VPM to which the input signal is directly connected, ensuring that alarms cannot be remotely acknowledged and potentially missed.
Further VPM displays (up to 6) may be added by the inclusion of a simple Ethernet switch, again with all sharing data for a complete overview of all alarm points.

Please contact PSM for further details of individual system components