

Gas Supply & Monitoring System

SF6 Supply, Monitoring Sensors, Weather Stations and PC Logging

This bespoke system was designed and built by TQC to provide the customer with the means to apply a tracer gas and the ability to log this gas concentration along with basic weather data information.

The specific application was for a submarine with the system used to monitor the flow characteristics within the vessel and how this was affected by the weather conditions outside when the submarine was at the surface and the hatch was open.

The system incorporated the following main elements -

- 5 Gas sensing instruments
- 2 Weather station instruments
- Electrical interfaces housed in a flight case
- Laptop computer running the data logging application software.

The parameters the system monitored included the following -

- Laptop monitoring on and off times
- Sustained 1 minute wind speed
- Peak wind speed
- Average wind direction
- Temperature
- Barometric pressure
- Gas concentration at each of the 5 sensor locations

