MS3500 Ammonia Monitor for Waste Water Treatment Plants

The MS3500 is an Ammonia Monitor capable of measuring Ammonia in treated and untreated Waste Water. It is designed for:

- **Raw Waste Water Flows**
- **Waste Water Treatment Process Control**
- **Treated Waste Water Discharge monitoring**

It provides on-line, real time monitoring for process control, environmental protection and the protection of plant in water treatment facilities.

The instrument samples air from the headspace in a sampling tank which has been designed specifically to cope with waste water applications.

- **Non-contact operation**
- **High reliability**
- **Low operational costs**

The use of a **non-contact measurement system** eliminates fouling, corrosion of probes and sensitivity to water conditions.

The MS3500 provides **low cost of ownership** through long servicing and validation periods.

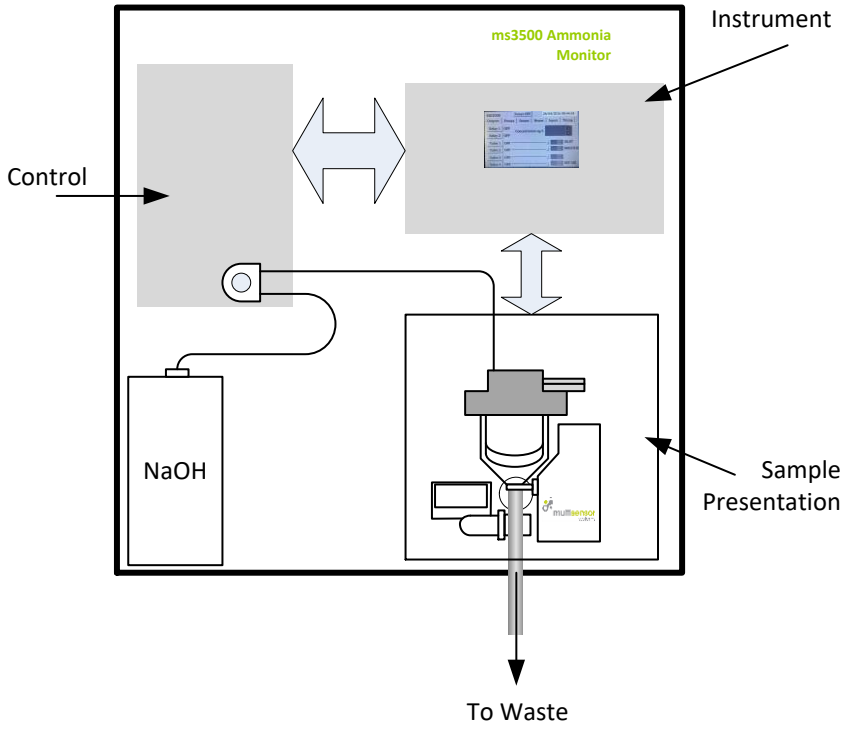
The user interface is via a robust touch screen and data output is through a 4 – 20mA interface or Ethernet based Profibus or Modbus. Wireless communications options are also available.

The MS3500 incorporates data logging capability which provides for detailed data and process analysis at any stage in the product lifetime.

The system is powered from either 90-240V AC or 24V DC and is protected by an IP67 rated cabinet.

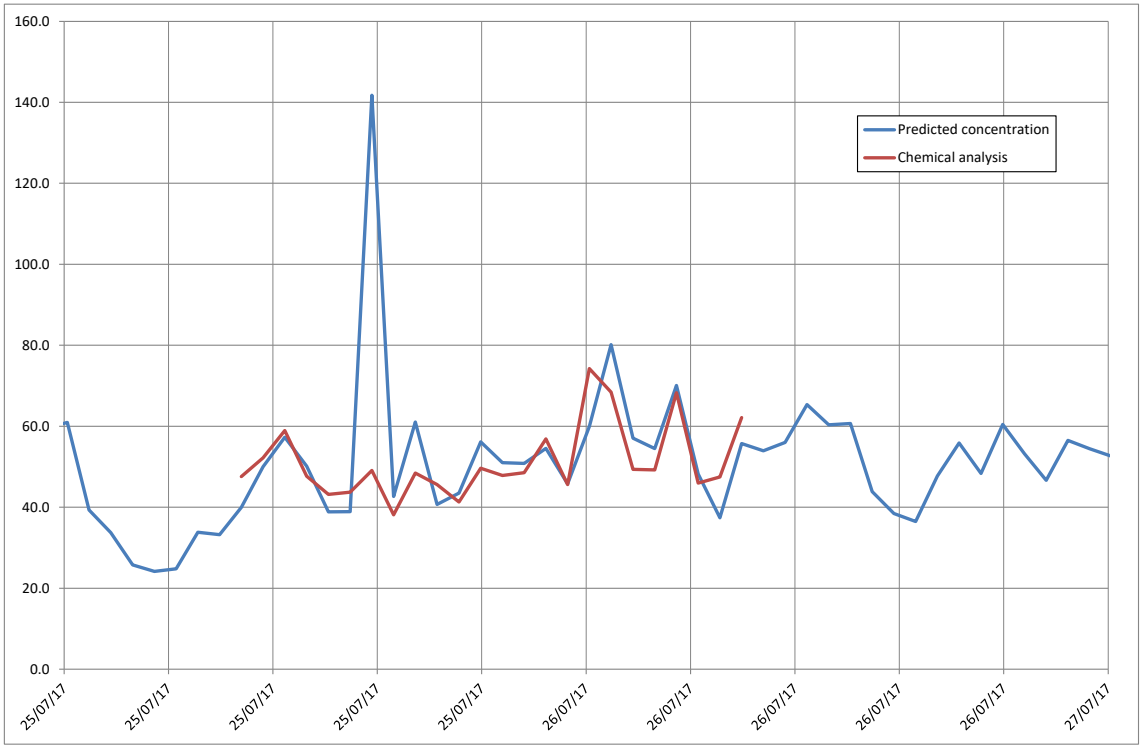
Summary Specification

Dynamic Range:	1 ppm – 200 ppm in waste water
Absolute Accuracy:	Ammonia in Water: ±10%
Repeatability:	Repeated measurement, 5ppm Ammonia in Water: ±2%
Sampling Frequency:	60/30 minutes
Relays:	2x, User Programmable function
Analogue Output:	4 – 20mA, Loop Resistance 40Ω - 1kΩ
Digital Outputs:	Modbus, Profibus as options
Wireless:	Bluetooth, Wi-Fi, 4G
Typical Power Consumption:	70W in normal operation
NaOH Requirement:	15l of 1M NaOH per 26 Weeks
Enclosure:	GRP, IP67 rated
Operating Temperature:	1 – 50C
Height above channel:	<6m
Dimensions:	750mm (h) x 750mm (w) x 420mm (d)

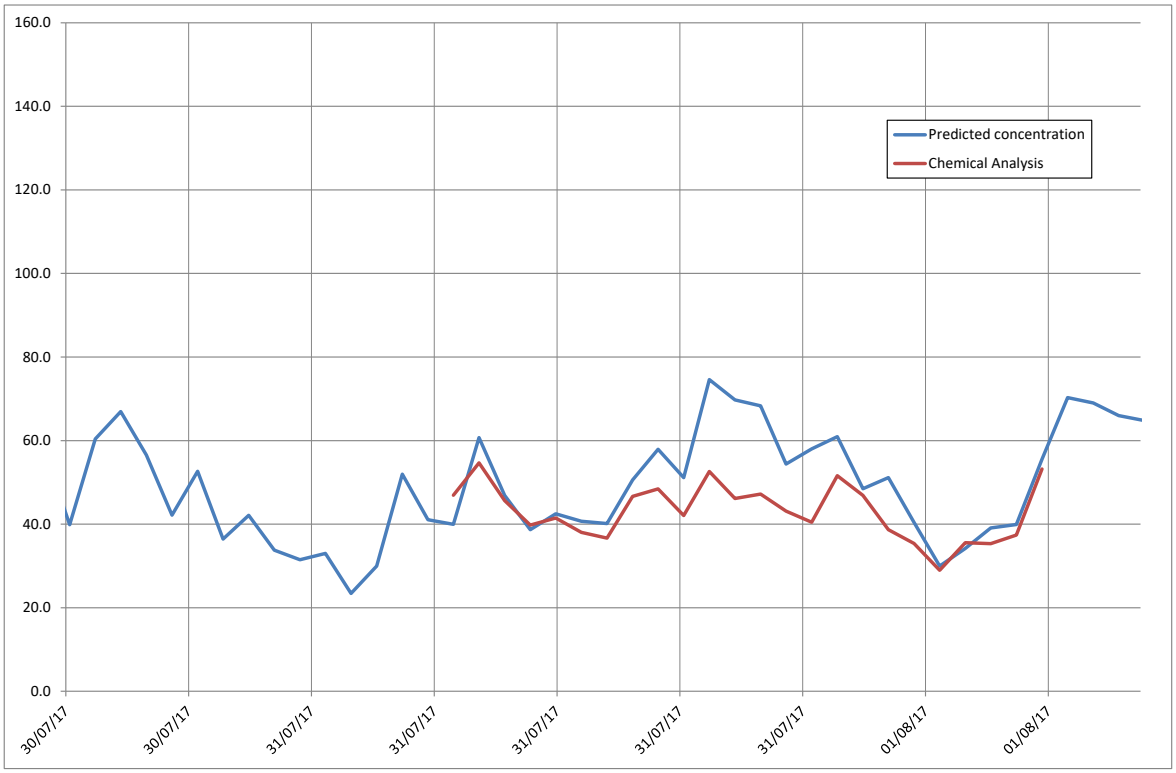


Key Components of the MS3500

Typical responses over 24 Hours versus laboratory sampling.



Response 1. Shows previously undetected peak which repeats over longer period



Response 2.