

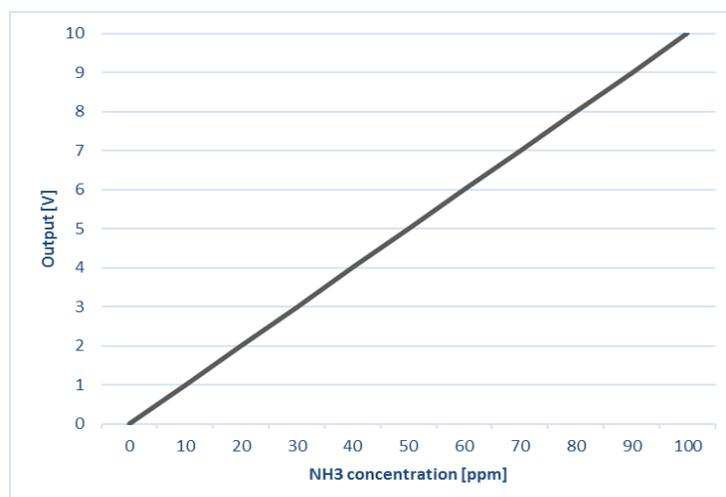
DOL 53 Ammonia Sensor (NH₃)

Climate sensor for measuring ammonia level in livestock houses



DOL 53 consists of an electro chemical diffusion sensor and signal processing electronics. DOL 53 works like a "nose". DOL 53 only transmits the concentration measured at the sensor. The measuring unit ppm (parts per million) is a volume concentration. DOL 53 is connected to suitable control unit over a 3-wire cable. The measuring signal during normal operation is between 0 V and 10 V

DOL 53 is used for the stationary continuous monitoring of ammonia concentrations in the ambient air under atmospheric conditions.



PRODUCT SURVEY



140247	DOL 53 AMMONIA SENSOR
140248	DOL 53 REPLACEMENT SENSOR HEAD
140236	DOL 53 DUST FILTER (5 PCS.)

TECHNICAL DATA

Max. sensor element storage period	See date on the label, sensor element box or shipping carton
Warranty for sensor element and DOL 53	2 years from delivery date
Expected sensor element service life	3 years from commissioning, expiration date see sensor element rating plate
Power supply	Rated voltage 24 V (18 V to 30 V DC); DC < 0.2 Vss
Current consumption	<10 mA
Signal transmission to the control unit	0 V to 10 V corresponds to 0 to 100 ppm
Detection range	0 to 100 ppm NH ₃
Signal transmission resolution	0.5 ppm
Accuracy	1.5 ppm or ±10% of the measured value
Response time T50	≤30 seconds
Long-term drift	< ±10 % of the measured value/year
Cable type	3-wire
Temperature range (operational)	0 °C to +50 °C
Humidity (operational)	15% to 95% RH
Air pressure (operational)	700 hPa to 1300 hPa
Temperature range (storage)	-20 °C to +60 °C
Dimensions H x W	155 mm x 75 mm
DOL 53 housing material	PA
Weight approx.	450 g
Chemical resistance	Typical detergents, disinfectants, alcohol, surfactants, peracetic acid, soap
Protection class	IP 65
Compliance	CE Mark

DIMENSIONAL SKETCH

