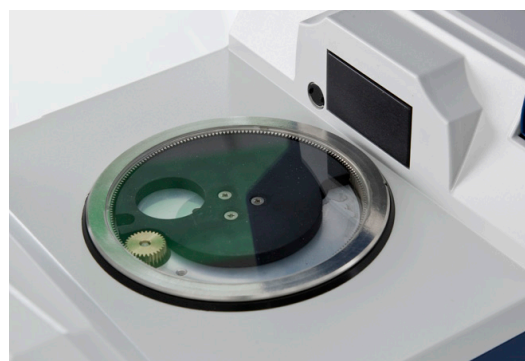# NIRS™ DA1650

Ready-to-use near infrared analysis for forward-looking rendering plants and other producers of meat by-products

NIRS™ DA1650 uses state-of-the-art near infrared technology to bring high accuracy NIR analysis into the rendering and meat by-product process. Produce closer to specification and get a consistent final product quality.

Control the quality of your meat by-products

Analyse samples from rendering production or other meat by-products with one simple analysis in less than a minute and increase your sampling frequency without extra cost. Get immediate results to adjust the production process or stop poor quality products at the gate.

Ready-to-use calibrations for meal products

NIRS DA1650 can be pre-calibrated for the basic parameters that have the greatest impact on production costs. Based on a range of samples taken from all over the world, FOSS global calibrations are robust, require low maintenance and are ready to use from day one.

Easy to operate with intuitive touch screen

Easy sample preparation and intuitive touch screen interface allows anyone to run analysis with a minimum of training. Remote instrument monitoring with FossManager™ networking software allows FOSS NIR experts to troubleshoot and diagnose performance issues without interrupting operations.

Sample type
Ground or un-ground samples of powder and meal products

Parameters
Fat, moisture, protein, ash

Technology
Diode array (DDA) based NIR reflectance and transreflectance analyser with a versatile scanning range of 1100 - 1650 nm.

Specifications

Feature	Specification
Dimensions (w x d x h)	230 x 530 x 280 mm
Weight	16 kg
Degree of protection	IP 65 (Dust and water proof)
Measurement mode	Reflectance or transflectance (for liquid samples)
Wavelength range	1100 - 1650 nm
Detector	256 pixel InGaAs diode array
Optical bandwidth	10.44 ±0.5 nm
Spectral resolution	0.5 nm/data point
Number of data points	1100
Absorbance range	Up to 2 AU
Analysis time	<1 minute*
Wavelength accuracy	<0.5 nm
Wavelength precision	<0.05 nm (standard deviation)
Wavelength temperature stability	<0.02 nm/ °C

Installation requirements	
Voltage supply	100 - 240 V AC*, frequency 50 - 60 Hz, Class 1, protective earth
Ambient temperature	5 - 40°C
Storage temperature	-20°C to 70°C
Ambient humidity	< 93% RH
Mechanical environment	Stationary during use
EMC environment	Laboratory use, industry requirements

* Mains supply voltage fluctuations not exceeding ±10% of the rated voltage.

Instrument management	
Networking software	FossManager™