

Newall's NMS300 Digital Readout System sets the standard for reliability, value and ease of use. Specifically designed to be partnered with machine tool builders and importers, the NMS300 DRO System includes Newall's Spherosyn300 and Microsyn300 encoders. Newall's inductive encoders are simple to install and designed to provide consistent accuracy and reliability even under the harshest work shop conditions.

### FEATURES INCLUDE:

- Lathe and Mill specific functions
- Panel mount option
- Selectable resolutions
- Global technical support
- User definable function keys
- Custom mounting brackets available
- Custom labelling, setup and display message available



### THE NEWALL ADVANTAGE

- Backed by a company with nearly 50 years of proven quality in manufacturing DRO systems & linear encoders
- Reliable and dependable inductive encoder technology
- Encoders carry an IP67 rating – All electronic and measuring components are sealed from the environment
- No glass to break or scratch
- Continually provides accurate readings even under the harshest work shop conditions
- No cleaning or maintenance required
- Tolerant to shock and vibration
- Easy to install—No backer bar or machined surface needed

## ALL NMS300 PACKAGES INCLUDE EVERYTHING REQUIRED FOR A COMPLETE INSTALLATION:

- NMS300 DRO (2 or 3 axes)
- Spherosyn300 and/or Microsyn300 assemblies with
- Scale bracket kit and hardware
- Reader head mounting brackets and hardware\*
- Display mounting arm and hardware \*

\*All packages are available with or without mounting brackets for the reader head and mounting arm.



Display	FSTN LCD screen - 94mm x 110mm— Membrane keypad with audible tactile feedback	
Common Functions	<ul style="list-style-type: none"> <li>• 2 or 3 Axes configuration</li> <li>• Multiple language support</li> <li>• Four user definable function keys</li> <li>• Absolute / Incremental operation</li> <li>• Axis Pre-set / Zero reset</li> <li>• Inch/mm conversion</li> </ul>	<ul style="list-style-type: none"> <li>• Linear and segmented error compensation</li> <li>• Digifind/Reference mark</li> <li>• Centre find</li> <li>• Programmable memory (200 per axis)</li> <li>• Built in calculator</li> <li>• Undo function</li> </ul>
	<ul style="list-style-type: none"> <li>• Bolthole Circle / PCD Calculations</li> <li>• Line Hole Calculations</li> <li>• Arc Contouring</li> <li>• Pocket Milling</li> </ul>	
Milling Specific Functions	<ul style="list-style-type: none"> <li>• Radius/Diameter Readings</li> <li>• Tool Offset Library (50)</li> <li>• Taper Calculation</li> </ul>	
Lathe Specific Functions		
Construction	High impact ABS front panel, powder coated steel rear housing	
Dimensions	Height: 160mm (6.3"), Width: 270mm (10.63"), Depth: 38.20mm (1.5")	
Electrical Requirements	Voltage of 100-240 VAC (47 – 63 Hz) to external PSU included Voltage Input to NMS300 display 15 – 24 VDC $\pm$ 10%	

Encoder Mechanical Specs.	Spherosyn300	Microsyn300
Scale Travels	52mm—3200mm	50mm—1000mm
Scale Diameter / Material	15.25mm / stainless steel	5.75mm / carbon fibre
Reader Head Dimension	99.45mm x 47mm x 30.5mm	75mm x 35mm x 25mm
Overall Scale Length	Travel length + 258mm	Travel length + 173mm
Standard Cable Length	3.5 metre and/or 7.0 metre with Armour and D Style Connector	



### Panel Mounting (Optional)

The NMS300 is available in a panel mount configuration. The unique mounting design was specially engineered to make for a clean, seamless look. The bracket design allows for a one-person installation when mounting the DRO to the panel.

Panel cutout dimension: 120mm x 210mm  $\pm$ 2.5mm

Features and specifications subject change without notice.

For more information about this or any of our products please contact us at [sales@newall.com](mailto:sales@newall.com) or visit [www.newall.com/NMS300](http://www.newall.com/NMS300)