

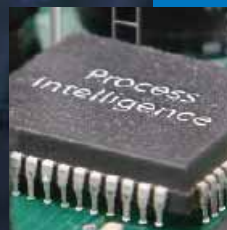
# Process Intelligence for liquid level measurement



## SITRANS LR250

2-wire 25 GHz radar level transmitter for liquids and slurries in vessels up to 20 m (66 ft)

- **Easy to install** – small horn and narrow beam allows installation practically anywhere on your vessel
- **Quick to configure** – Quick Start Wizard guides you during setup
- **Process Intelligence** – advanced echo processing for unparalleled performance
- **Reliable and accurate** – extremely high signal and low noise yields high performance
- **Full vessel capacity** – high accuracy of low and high levels, even with low dielectric media
- **Operational in minutes** – infrared handheld programmer for local operation or SIMATIC PDM via HART® or PROFIBUS PA
- **Local user interface** – graphically displays echo profiles and diagnostic information



# sitrans LR250



SITRANS LR250 is Siemens' new 2-wire continuous radar level transmitter for liquid and slurry applications. This radar transmitter is the easiest to install and quickest to configure on the market today. With its narrow beam and small antenna, SITRANS LR250 can be installed practically anywhere on your vessel. The graphical user interface and Quick Start Wizard get you operational in minutes. Process Intelligence echo processing ensures reliable dynamic echo evaluation, even on short ranges and low dielectric media. Install the SITRANS LR250 on your liquid application and prepare to be amazed at how easy the most intelligent and reliable radar transmitter is to operate.

[www.siemens.com/LR250](http://www.siemens.com/LR250)

# SIEMENS

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# Technical specifications

SITRANS LR250	
<b>Power</b>	Nominal 24 V DC, max 30 V DC
<b>Performance*</b>	
Measurement range	0.05 to 20 m (2" to 65 ft)
Non-repeatability	5 mm (0.2")
Frequency	25 GHz (k-band)
Dielectric constant	>1.6, horn and application dependent
<b>Output</b>	
Analog output	4 to 20 mA
Display (local)	Graphic local user interface including Quick Start Wizard and echo profiles
Communication	<ul style="list-style-type: none"> <li>■ HART®</li> <li>■ PROFIBUS PA optional</li> </ul>
Programming	<ul style="list-style-type: none"> <li>■ SIMATIC PDM</li> <li>■ Intrinsically safe infrared handheld programmer (local operation)</li> </ul>
<b>Design</b>	
Enclosure	<ul style="list-style-type: none"> <li>■ Construction: die-cast aluminum, polyester powder-coated</li> <li>■ Ingress protection: Type 4X/NEMA 4X, Type 6/NEMA 6, IP67, IP68</li> <li>■ Cable inlet: M20x1.5 or ½" NPT (qty 2)</li> </ul>
Process connections**	1½" or 2" NPT (ASME 1.20.1), BSPT (EN10226-1), or G (BS EN ISO 228-1)
Horn antenna	<ul style="list-style-type: none"> <li>■ 1.5" (40 mm), 2" (48 mm), 3" (75 mm), 4" (95 mm) nominal</li> <li>■ 100 mm (4") optional horn extension</li> <li>■ Stainless steel 316L/1.4404 or 316L/1.4435 [optional alloy N06022/2.4602 (Hastelloy® C-22® or equivalent)]</li> </ul>
<b>Process Conditions***</b>	
Ambient temperature	-40 to 80 °C (-40 to 176 °F)
Process temperature	-40 to 200 °C (-40 to 392 °F) at process connection with FKM o-ring
Pressure (vessel)	40 bar g (580 psi g) max., temperature and process connection type dependent
<b>Approvals</b>	
General	CSA <sub>us/er</sub> , CE, FM, NE 21, NE 43, C-Tick
Radio	European Radio (R&TTE), Industry Canada, FCC, C-Tick
Hazardous areas	CSA, FM, ATEX, IECEx

\* Reference conditions according to IEC 60770-1

\*\*Other process connections are available by special request.

\*\*\* For applications beyond these specifications, custom configured units are available: contact your local representative. Specifications are subject to change without notice.

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## Signal processing with field experience

Siemens level measurement instruments come with extensive field experience. Siemens developed the signal processing technology for level instruments based on the experience of a million instruments in industrial applications.

With this experience, we understand the importance of reliability, and we know what it takes to make a trusted and accurate instrument for demanding applications. That's why our engineers invented Process Intelligence, Sonic Intelligence® and Auto False-Echo Processing, and that's why these instruments carry so many patents. With Siemens you get the experience of a million applications in one instrument.

