

SIMATIC ET 200iSP

Product Data Sheet

6ES7134-7SD51-0AB0

RTD analog input module

INPUTS	SENSORS	RESOLUTION	NET WEIGHT
4 RTD channels	Pt100 / Ni100	16 bit incl. sign	0.230 kg

Siemens 6ES7134-7SD51-0AB0 acquires four resistance or RTD signals in an ET 200iSP station. Configurable conversion and diagnostics provide measured values to the host process-control system.

01 VERIFIED TECHNICAL DATA

Analog Inputs	4 channels
Sensor Types	Pt100 / Ni100
Resistance Ranges	0-600 ohm / 0-1000 ohm
Resolution	16 bit including sign
Maximum Input Current	22 mA
Typical Power Loss	0.4 W
Maximum Cycle Time	320 ms, all channels
Conversion Time	80 ms at 50 Hz; 66 ms at 60 Hz
Shielded Cable Length	500 m maximum
Sensor Wiring	2-wire, 3-wire or 4-wire
Linearity Error	+/-0.015% of input range
Temperature Error	+/-0.02%/K of input range
Repeat Accuracy	+/-0.01% at 25 deg C
Series-Mode Rejection	70 dB minimum
Common-Mode Rejection	90 dB minimum

02

PRODUCT IDENTITY AND FUNCTION

Siemens 6ES7134-7SD51-0AB0 provides four analog inputs for Pt100 and Ni100 resistance thermometers in an ET 200iSP distributed I/O station. The plug-in electronic module connects through a TM-IM/EM or TM-EM/EM terminal module and supports two-, three- and four-wire resistance measurement.

An integrating sigma-delta converter digitizes the measured resistance with 16-bit resolution including sign. Configurable linearization, smoothing and 50/60 Hz interference suppression support stable temperature acquisition, while wire-break diagnostics help maintenance personnel identify faulty sensor circuits. These functions supply measured values to the host control system for process supervision.

03

OFFICIAL APPLICATIONS

- Reaction and Separation Areas in Chemical Plants: Stirred-tank reactor units and Process distillation columns.
- Fermentation and Recovery Areas in Ethanol Plants: Jacketed fermentation vessels and Fermenter eductor pump assemblies.
- Ingredient Fermentation and Controlled Substrate Dosing Areas: Biological production fermenters and Substrate dosing equipment.

04

SYSTEM COMPATIBILITY

Use a TM-IM/EM or TM-EM/EM terminal module. Match the RTD characteristic, wiring method, station configuration and applicable hazardous-area approvals. The channels are not isolated from one another.

05

OFFICIAL SOURCES

Siemens ET 200iSP Operating Instructions, 11/2022, section 14.4.

Siemens exact-article record: identity, packaging and net weight.

Siemens Product Information A5E00308257-06, English pp. 6-10.

AMIKON PRODUCT SUPPORT

+86-18020776786

INFO@AMIKON.CN

AMIKONG.COM