

For Semiconductor Cleaning Processes

Conductivity Meter High Concentration Type

HE-480H



CE marking compliant

A New Type of Sensor Enables High-Concentration Measurement

Conductivity is the basis of the parameters that control chemical solutions and waste water. Because the HE-480H enables the measurement of conductivity in high-concentration samples, this unit is perfect for controlling chemical and waste water in liquid crystal and semiconductor manufacturing processes.

FES-125F



HE-480H



Features

●Wide-ranging response

New type sensors have been developed to enable the HE-480H to offer wide-ranging response. The measurement range has been increased 25% over conventional meters. (Horiba comparison)

●Sensor self-diagnosis function

The HE-480H can now automatically diagnose sensor degradation that comes after long-term use.

●Selectable temperature compensation function

The HE-480H offers selection of the desired setting between the temperature characteristics for "NaCl", the "standard temperature" and the "temperature compensation coefficient", allowing the implementation of temperature compensation that is most appropriate to the measured liquid.

●Icon-based status display & security function

Instrument status on the HE-480H is indicated through an easy-to-understand icon display that eliminates operational errors. And, by setting a passcode, all key operation can be locked to prevent measurement errors caused by inadvertent operation.

●CE Marking compliant

 The HE-480H is also an environmentally-friendly product that uses lead-free solder for mounting chips on the PCB.

Specifications (Converter)

Model	HE-480H			
Measuring method	4-electrode method			
Sensor input	1-channel			
Cell constant	Approx. 1.0/cm			
Temperature sensor specifications	Platinum resistance 1000Ω/0°C			
Measuring range	Conductivity	mS/cm	0.00 to 20.00	0.0 to 200.0
		S/m	0.000 to 2.000	0.00 to 20.00
	Seawater Salinity conversion Value : 0.00 to 4.00			
	NaCl salinity conversion value : 0.0 to 20.0			
Repeatability	Temperature : 0? to 100? (Select your desired decimal point from 0, 1, and 2 digits)			
	Conductivity display	Within ±0.5% of the full scale		
	Salinity Conversion display	Within ±1% of the full scale		
Linearity	Conductivity display	Within ±0.5% of the full scale		
	Salinity Conversion display	Within ±1% of the full scale		
Transmission output	4 to 20mA DC : input/output isolated type Maximum load resistance : 900 Ω Transmission output range : Freely selectable within the measurement range			
Contact output	Outputs : 2 points			
	Alarm contact output (R1,R2)			
	Contact type : relay contact, SPDT			
	Contact rating : 240V AC 3A and 30V DC, 3A (resistance load) Contact function : selectable from upper/lower limit operation(ON/OFF control), alarm, and maintenance.			
Calibration function	Conductivity : Based on the specified compensation coefficient for the cell constant (parameter input) Temperature : Calibrated by comparing with the reference thermometer			
Transmission output hold feature	Selectable from the Previous value hold and the Optional value hold. (However, only the previous value hold is available in the maintenance mode.)			
Self-diagnosis function	·Sensor diagnosis (Short-circuit and disconnection of the temperature sensor) ·Out of the measurement range ·A/D converter scale over ·Converter error			
Temperature compensation	·Based on the reference temperature and user-defined temperature coefficient (reference temperature : 5°C to 95°C) ·Based on the temperature characteristics of NaCl			
Temperature compensation range	0°C to 100°C			
Ambient environment	Temperature: -5°C to 45°C, Relative humidity: 20% to 85% (without dew condensation)			
Power supply	100V to 240V AC ±10%, 50/60Hz, 10VA (max.) or 24V DC ±10%, 5W (max.) (specified when ordering)			
Protective structure	Panel: IP65, Rear case: IP20, Terminal: IP00 (Indoor-use panel installation type)			
Mass	Approx. 400g			
Conforming standards	CE Marking, FCC Part15			
Compatible sensor	FES-series conductivity sensor, cell constant : 1.0/cm			

Sensor

Model	FES-125F	FES-126F
Cell constant	approx. 1.0/cm	
Wetted material	Electrode	Titanium
	Body	PVC
	Packing	FKM
temperature of fluid being measured	0-50°C	0-120°C*
pressure of fluid being measured	0-1.0 MPa	0-1.0 MPa
Cable length	10m (Standard)	
	Use the CT-20EC relay box for further extension. Maximum extension length: 70m	
Installation	1.Submersible type 2.Threaded type ●Use the thred adapter EA-20 .	1.Submersible type 2.Threaded type ●Use the thred adapter EA-40 .
	Flow type holder: EF-20, EF-20P, EF-20S	

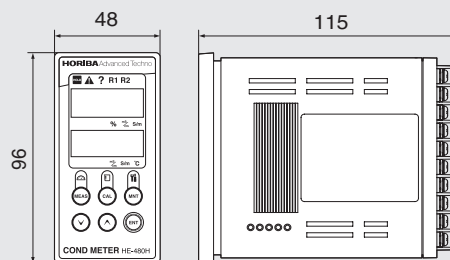
*1. Submersible types can only be used between 0 and 50°C

Flow type holder

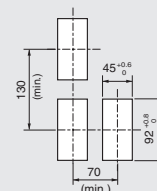
Model	EF-20	EF-20P	EF-20S
Liquid end materials	PVC	PVDF	SUS316
Liquid temperature range	0 to 50°C	0 to 100°C	0 to 100°C
Liquid pressure range	0 to 0.1MPa	0 to 0.1MPa	0 to 0.5MPa
Liquid flow rate	0 to 10L/min		
Connected pipe diameter	Inlet: Rc(PT)1/2, Outlet: Rc(PT)1/2		

External dimensions Unit: mm (in)

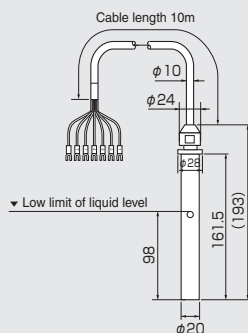
■ Converter HE-480H



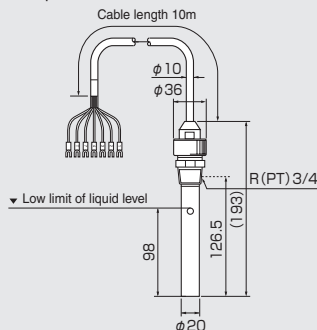
Panel Cut Size



■ Sensor FES-125F / 126F



With thread adaptor



Please read the operation manual before using this product to assure safe and proper handling of the product.

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