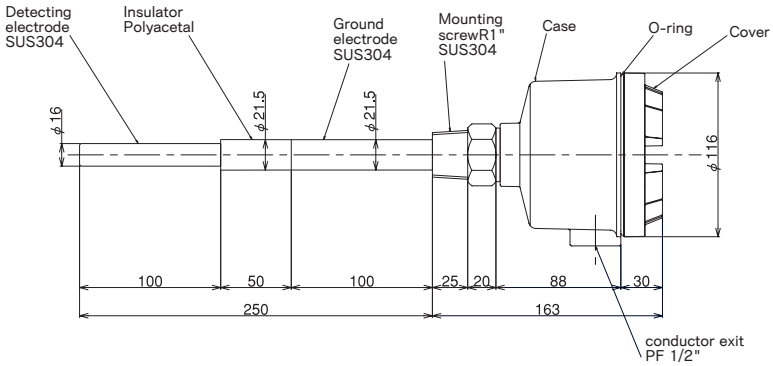
CAPACITANCE TYPE LEVEL SENSORS

CA-A1SA

Capacitance type level sensors consist of ground and electrodes and an electronic circuit, enabling electrodes to function as capacitors.
Conditions determining the capacitor capacity include shape, dimensions, and layout If conditions other than relative permittivity (*1) of the object measured are the same, the capacitor capacity depends on the relative permittivity of the object measured. Taking the capacity of air measured by the sensor as the reference, we identity differences among measured objects having different relative permittivity. If we take 1 of 2 measured objects having different relative permittivity as a reference, we can discriminate between the 2 objects. The discrimination signal is provided as output.
*1. Relative permittivity(specific inductive capacity or dielectric constant) is the ratio of the electrical capacity,the space between capacitor electrodes is filled with an insulator(dielectric), to the electrical capacity when the material is removed to make a vacuum and the value is a constant determined by the type of substance.



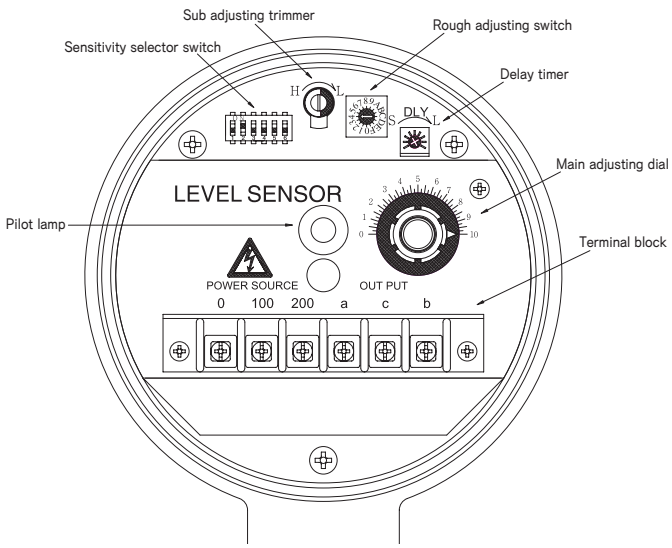
FEATURES

Selectable sensitivity with dip switches, high, normal, low and extra-low, easy calibration. Robustness against electrostatic stability, wide variety probe design

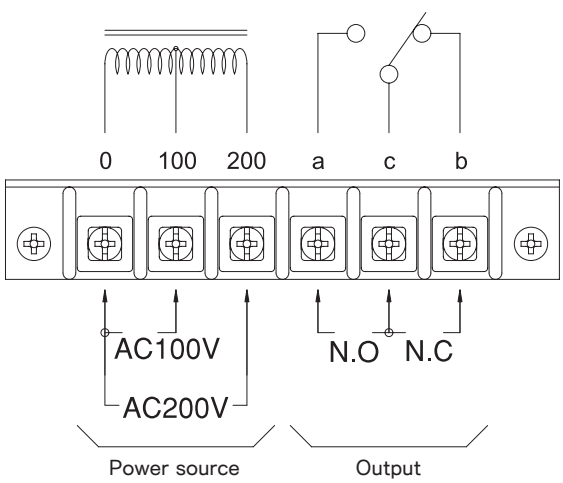
Supply voltage	100V/200V AC±10%(50/60Hz)
Mounting	Threaded with R1"
Power consumption	2.0VA
Output	1C relay 250V AC,3A(resistance load) 30VDC,3A(resistance load)
Working pressure	980kPa
Protection	IP65
Painting color	Munsell 10YR 7.5/14

Stable detection at	High sensitivity : 0.5～10pF Normal sensitivity : 2～20pF Low sensitivity : 5～100pF Extra=low sensitivity : ≥20pF	Use DIP=switches to Select sensitivity zone on initial setting.
Allowable temperature	Outside the tank -10～60℃ Inside the tank -20～80℃	
Timer function	On=delay timer setting from 0 to about 10 sec. (variable)	

AMPLIFIER

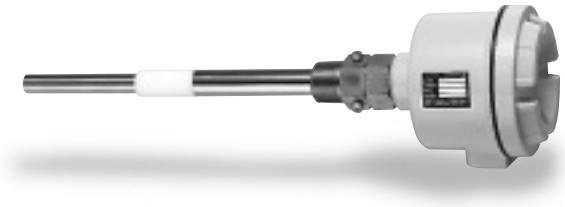


WIRING



CA-A3SA

Sliding sleep version



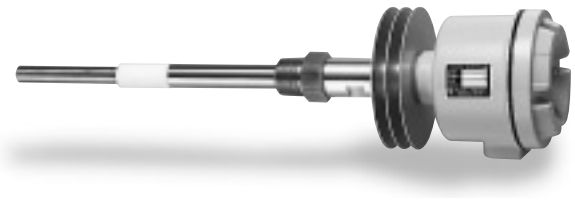
CA-A1WA

High level point for solids

CA-B1SA

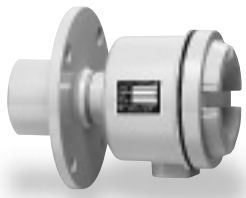
Max.150℃

High Temp. version



CA-A4XA

Low level point for solids



ORDER CODE

C □-□□□-□□□

Probe length/unit cm
L-250-025
L-2000-200
L-10m-A00

Probe type	
SA	Standerd probe
WA	Cable probe 5 ϕ
WB	Cable probe 8 ϕ
XA	Flat face
FA	Coated teflon
SZ	Special probe
GA	Heavy-duty probe
WZ	Special Cable probe
XZ	Special Flat face
FZ	Special Coated probe

nections	
1	Screw mount PT 1B
2	Screw mount PT 3/4B
3	Sliding Screw mount PT 3/4B
4	Standerd Flange mount JIS5K65A Aluminum
5	Ferrule flange mount 2S
6	Ordered size Screw mount
7	Ordered size Screw mount Screw & Flange
8	Ordered size & material Flange mount
9	Ordered size Ferrule flange mount

Medium temperature version	
A	80℃
B	150℃
C	200℃
D	Special temperature

Amplitire spec	
A	Standard AC100/200V
D	Standard DC24V
F	OTHER

INSTALLATION