# SPECIFICATION SHEET

# IMMERSION TYPE pH/ORP SENSOR WITH ULTRASONIC CLEANER

UHC-7C

This sensor is a immersion type pH/ORP electrode holder combined with ultrasonic cleaner.

The sensing section of the electrode is continuously irradiated by ultrasonic waves and the cavitation effect prevents fouling build-up.

Maintenance work such as calibration with standard solutions can be easily carried out by simply detaching the electrode holder.

## Standard Specifications

Product Name	: Immersion type pH/ORP sensor with ultrasonic cleaner			
Model	: UHC-7C			
Measurement Objec	t:pH/ORP			
Cleaning Method	: Continuous irradiation of ultrasonic waves			
Ultrasonic Frequency	/: Approx. 80kHz			
Ambient Temperature	e : -5 to 50 ℃			
Sample Conditions				
Temperature	: -5 to 80°C (no freezing. The range			
	depends on the combined holder.)			
Pressure	: Atmospheric			
Electric conductivity	/ : 100μS/cm or more			
Power Requirements	s : 100V AC 50/60Hz			
Power Consumption : Approx. 15VA				
Wetted Materials	: SUS316, fluororubber (FKM)			
	Polypropylene (In the case of HC-763)			
Weight	: Approx. 5kg			
Construction	: Rainproof type (IP55)			
Paint colour	: Metallic silver and blue			
Combination	: Mounting bracket			
equipment	ZC-1 or ZC-2			
	Mounting flange (open flange)			
	ZFK-1 or ZFK-2			



Sample temperature for typical combination of holder and electrode

Holder	Holder material	Integrated pH electrode*		Integrated ORP electrode
	material	Model 5600	Model 5601	Model 260□
HC-703C	PVC	-5 to 60°C	_	-5 to 60°C
HC-763	Polypro- pylene	-5 to 70°C	-5 to 80°C	-5 to 70°C

Note. The sensing tip is always cleaned by ultrasonic cleaner. In the case of ORP electrode, ultrasonic cleaner affects the measurement value.

Especially in the case of ORP control under sewerage/ wastewater treatment, this possibility is high. In this conditions, PHC-7D Pulse Air Jet Cleaner is recommended.





# Voltage transformer unit (step-down transformer)

The following step-down transformer is required when a power supply voltage of more than 100VAC is applied to the cleaner-equipped detector:

Model	: ZP-30 (installed on-site)		
Primary voltage	: 240/220/200/120/115/110VAC		
Secondary voltage : 100VAC			
Capacity	: 35/140/500VA		
Cable port	: 2 cable glands for a ø6 - 12 cable		
Case material/construction : Polycarbonate, IP65			
Mounting	: Mounted on a 50A pole		





- \*1. Please separately order step down transformer (ZP-30 for 35VA) in the case power supply is higher than 100V.
- \*2. When oscillator is separated, cable (12Ø 10m, from oscillator to a detector) is supplied (including holder length).
- \*3. For the model with titanium vibrator and PP support pipe, the max.combination holder length is 2m. This is limited to the separation type oscillator.
- \*4. The max. length is 3m for the holder made of PP, and 4m for the made of clear PVC. For a requirement exceeding 4m, the drop-in type holder of NOS-electrode (KCI-non supply, customs. Spec) is applicable.
- \*5. If you consider using old type electrode (6462 or 5700), please notice us.
- \*6. Standard painting of oscillator: primer and topcoat-melamine resin, average film thickness 30µm or greater. Anti-corrosion painting: primer and middle coat-epoxy resin, top coat-polyurethane resin, average film thickness -100 µm or greater.
- \*7. Ceramic serge arrester (easy type) is attached to power supply line.

## Typical Installation



The required length of electrode holdler is L+ (500 to 1000), where L: distance from the water surface

#### <Note>

To be able to draw up the cleaner for its functional check, bundle the power cable by a length equivalent to the total length of the cleaner.



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Please read the operation manual carefully before using products.