

Reagentless Free Chlorine Analyzer Detector

CD-36D
CLR-21-A

The model CD-36D is for controlling and monitoring the free chlorine in a faucet feed line or water in a swimming pool. The instrument features compact and light weight system, sample-saving and easy maintenance. Measured value is transmitted via 4~20mADC output.

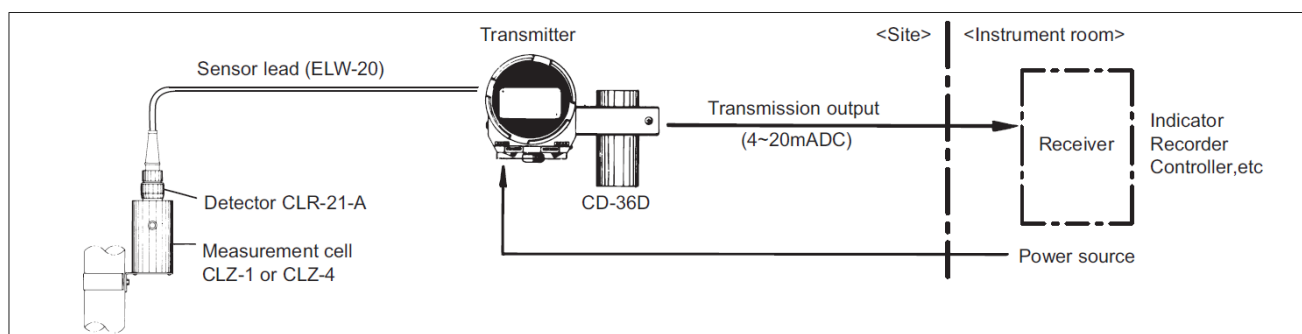
Standard Specifications

Product name : Reagentless Free Chlorine Analyzer
 Model : CD-36D
 Combined detector : CLR-21-A (with no lead)
 Electrode lead wire : ELW-20, standard length 1.5 m
 Measurement cell : CLZ-1 (standard) or CLZ-4 (with valve)
 Measurement object : Free chlorine, such as drinking water or swimming pool water
 Measurement method : Polarograph
 Electrode cleaning : Cleaning of beads using the rotation of the swing rotary method
 Measurement range : Either of the following (switchable by internal switch)
 (1) 0~1 mg/L (2) 0~2 mg/L (3) 0~3 mg/L
 Linearity : within ± 0.1 mg/L (with chlorine standard solution at 0~2 mg/L range)
 Repeatability : within ± 0.1 mg/L (with chlorine standard solution at 0~2 mg/L range)
 Indication : Liquid crystal digital reading
 Indication range : 0.00~about 4.90 mg/L; minimum reading of 0.01 mg/L
 Temperature compensation range : 0~40°C
 Calibration method : Set to the analytical value of, for instance, the DPD method
 Sample water conditions : pH; 5.5~8.6 pH (variation within 1pH)
 Electrical conductivity; 8mS/m or more (CLZ-2 should be used if electrical conductivity is low)
 Temperature; 0~40°C (no freezing)
 Pressure; 0.01~0.15MPa
 Measurement cell flow rate; 50~200 mL/min.
 Ambient temperature and humidity : 0~50°C and 85%(RH) or lower



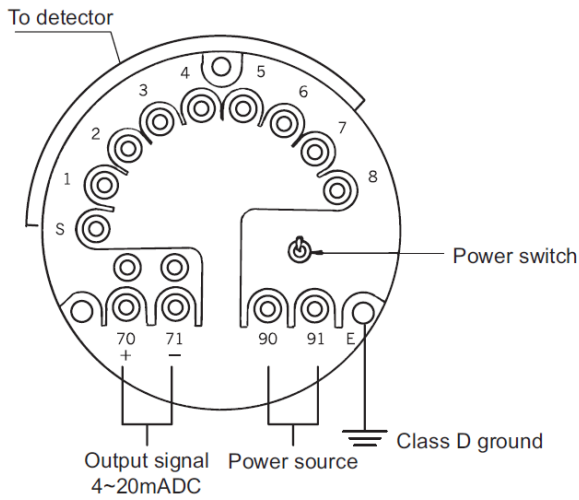
Output : 4~20mADC (load resistance; 600Ω or under) ground insulation type
 Power source : Either of the following (designation necessary)
 (1) 100VAC 50/60Hz (2) 110VAC 50/60Hz
 (3) 115VAC 50/60Hz (4) 120VAC 50/60Hz
 (5) 200VAC 50/60Hz (6) 220VAC 50/60Hz
 (7) 240VAC 50/60Hz
 Power consumption : Approximately 10 VA
 Cable entry : G 3/4 (PF 3/4) 3 locations
 Providing one is used for electrode lead wire
 Pipe connection : CLZ-1; Sample water inlet...Rc 1/4 (PT 1/4)
 Drain outlet; Rc 1/4 (PT 1/4)
 CLZ-4; Sample water inlet...Rc 1/2 (PT 1/2)
 Drain outlet; Rc 1/2 (PT 1/2)
 Structure : Indoor unit
 Construction : Transmitter; IP55
 Detector; IP52
 In order to use the product outdoors, the detector must be rain proofed.
 Mounting : 50 A (external diameter; 60.5 mm), with pipe installation
 Materials/Surface finish : Transmitter; AC4C (cast aluminum), metallic silver and blue coating
 Detector; A1050P (aluminum pipe), Equivalent to Munsell 5PB8/1 (Wetted part:PVC, SUS304)
 Flow cell; Acrylic resin (CLZ-1), Acrylic resin, PVC (CLZ-4)

System configuration

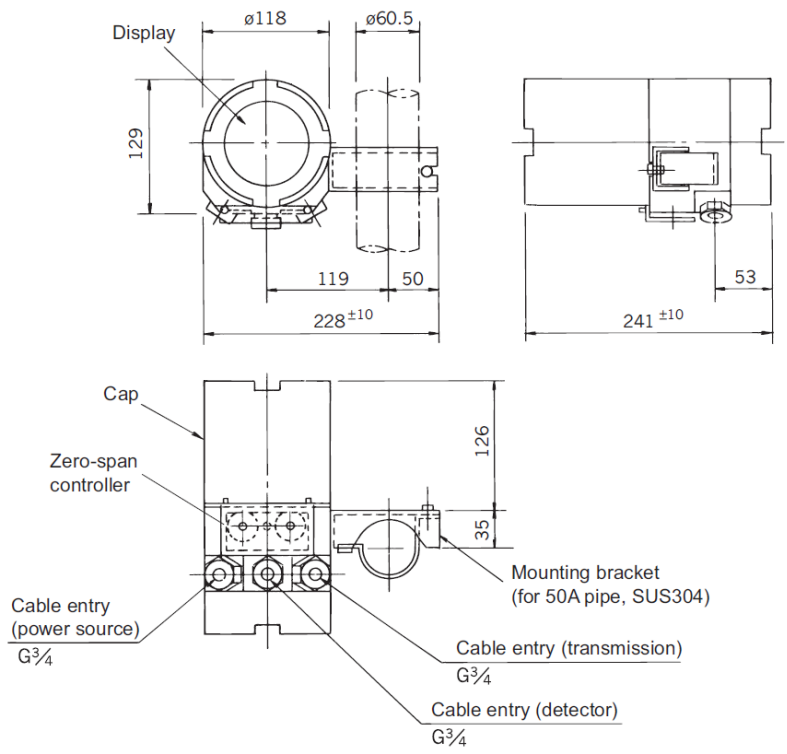


Weight : Transmitter; Approx. 3.5 kg
 Detector; Approx. 2 kg
 Flow cell; Approx. 1.5 kg (CLZ-1),
 approx. 2.5 kg (CLZ-4)

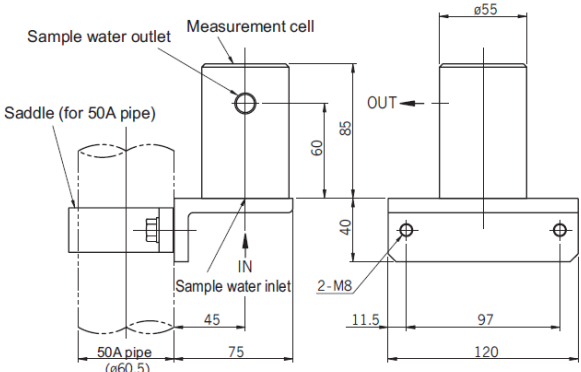
Terminal Connection Diagram



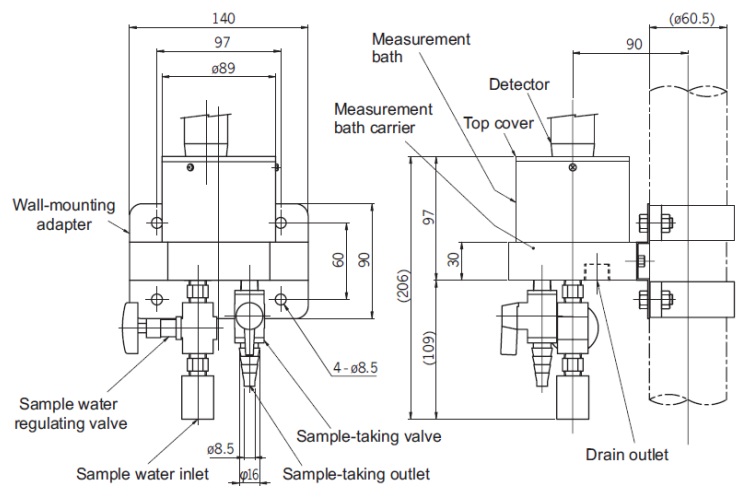
Dimensions Unit : mm



● Measurement cell
 Model : CLZ-1

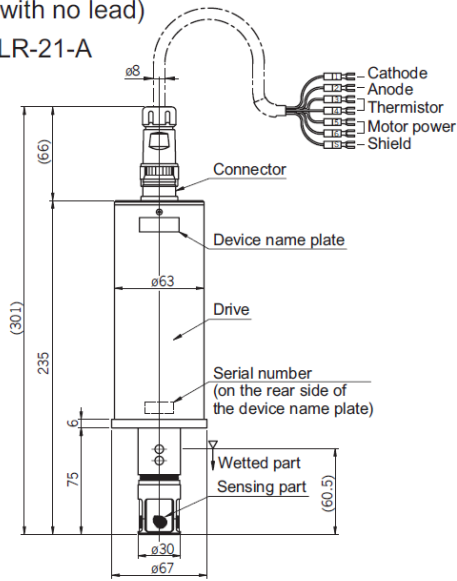


Model : CLZ-4



● Detector (with no lead)

Model : CLR-21-A

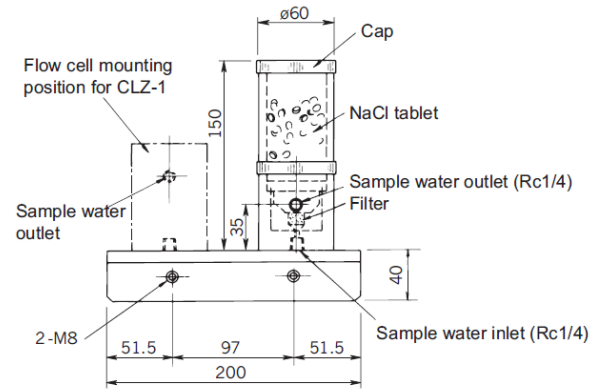


Optional

● Column for pure water measurement

Model : CLZ-2

This is an adaptor that adds NaCl to increase the electrical conductivity of the sample water (less than $80\mu\text{s}/\text{cm}$) and enable stable measurement of free chlorine in sample water.

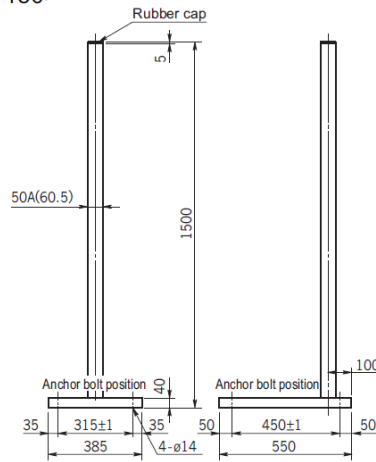


● Pole stand

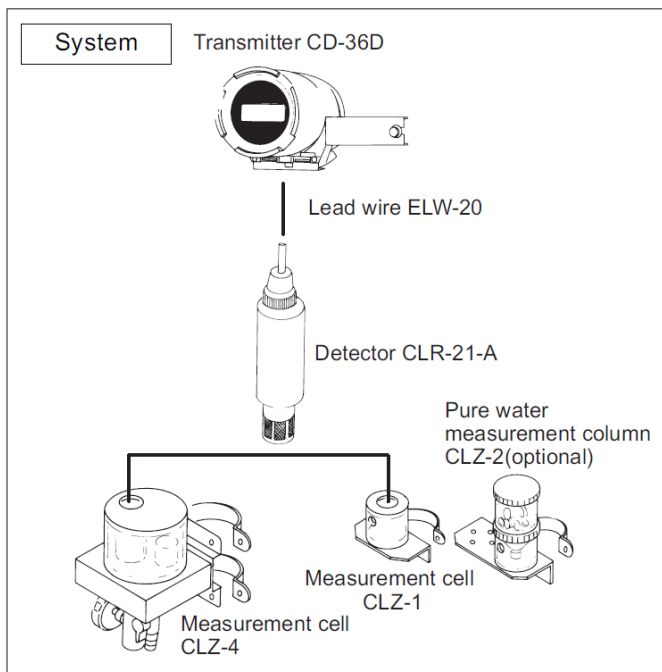
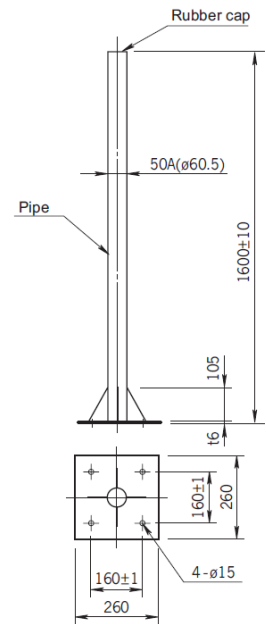
Model : B-150 or ZB-1

This is the frame for mount the transmitter (CD-36D) and the detector (electrode and measurement cell).

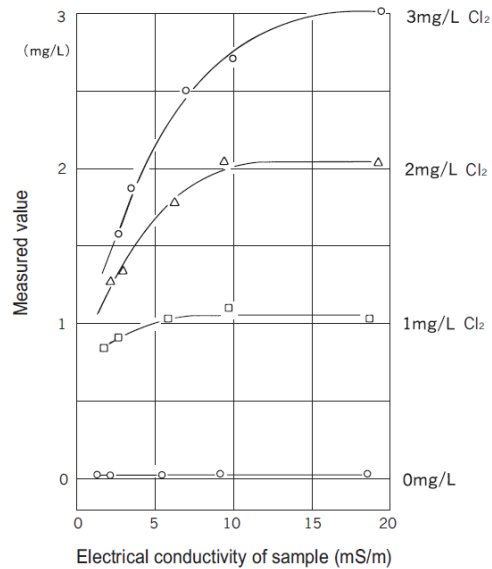
<B-150>



<ZB-1>



Electric conductivity characteristics of Cl₂ sensor



● Since tap water generally has an electrical conductivity of about 20 mS/m and that value rarely fluctuates, no serious influence will occur. But when the level goes below 10 mS/m, the device will show a reading smaller than it actually is, and therefore there occurs a substantial problem when measurement is for 2 mg/L or more.



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Do not operate products before consulting instruction manual.

<http://www.toadkk.co.jp/english>

Information and specifications are for a typical system and are subject to change without notice.