Your vision, automated

MCOM600GWLR

TELEMETRY PIEZOMETER

MCOM600GWLR is a high-precision Ground Water Level Recorder (GWLR) that combines a submersible pressure transducer with a data logger for remote monitoring of water levels. The unit records water level fluctuations, stores up to one year of data, and transmits information to a server via GPRS/4G/3G/2G. Designed for industrial, agricultural, and environmental applications, it features robust SS316L construction, IP68 protection for the probe, optional solar-powered operation, and long-term stable performance for accurate and reliable water level monitoring.

MCOM600GWLR

➢ FEATURES

1. Supports all types of 4G SIM cards.
2. The data transmission mode is 4G/3G/2G (auto-switchable).
3. Supports all types of M2M SIMs.
4. Small antennae included with the device. High gain antennae optional, in case of low connectivity.
5. One Serial Port for RS232 or RS485 for external device interface.
6. Five LED indicators provide status for power, server connection, GPRS connection, SIM registration or network, 4G indication
7. Media compatibility: Liquids or gasses compatible with SS316L stainless steel
8. Overload pressure: the basic range of 2 times
9. Pressure Output: 4~20 mA/ RS485.
10. Accuracy ±0.05% FS
11. Water level measurement: Measuring Ranges 0...4m, 10m, 20m, 40m, and 100m.
12. Pressure resolution: 0.01% FS
13. Output signal: 4-20 mA/RS485
14. Adjustment: Zero and span internally
15. Overall accuracy: 0.2% of adjusted span, temperature compensated
16. External load(max.): 550 Ohm/24 V to 1400 Ohm/40 V DC
17. Protection grade: IP68 (cable/SS tube) IP66 (electr. housing)
18. Process temperature: -10 degree Celsius to +70 degree Celsius
19. Temperature sensitivity: +/- 0,015%/K
20. Wetted parts: 316L SS
21. Material cable: Polyethylene (PE)
22. Measuring sensor: SS 316 with strong diaphragm for long life & long term stability (<0.1%/year)
23. Type of protection Communication unit: IP54
24. Probe: IP68

➢ PERFORMANCE PARAMETERS

- Operating Temperature:-20 to 85°
- Compensated Temperature: 5 to 95% RH
- Input Voltage: 12-34 VDC
- Power Consumption: Idle: 100 mA @ 12 V, Data Link: 500 to 1000 mA (peak) @ 12V

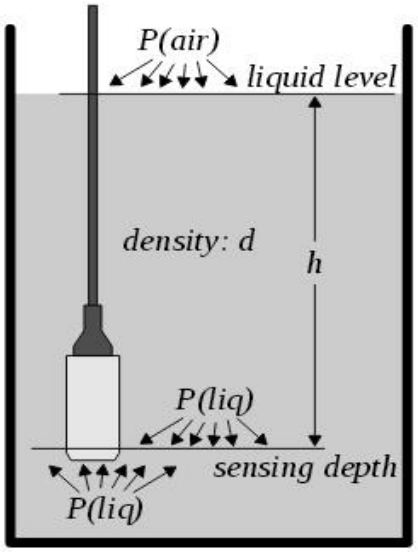
➢ CELLULAR INTERFACE

- Standards: GSM/GPRS/EDGE/UMTS/HSPA/FDD LTE
- GPRS/EDGE: 850/900/1800/1900 MHz
- HSUPA: 900/2100 or 850/1900 MHz optional, DL/UL 7.2/5.76 Mbps, fallback to 2G.
- HSPA+: 850/900/1900/2100 or 900/2100 or 850/1900 MHz optional, DL/UL 14.4/5.76 Mbps, fallback to 2G, FDD LTE: 800/900/1800/2100/2600 MHz or 700MHz (B17 or B13) optional, DL/UL 100/50 Mbps, fallback to 3G/2G.
- SIM: 1 x (3V & 1.8V)
- Antenna Interface: SMA Female, 50 ohms impedance.32-bit high performance microcontroller MCU

➢ WORKING PRINCIPLE

Pressure P(liq) on any surface and container walls at depth h, by the liquid of density d, is

$$P(liq) = d \times g \times h + P(air)$$



➢ SETTING

- **To set wire length**
  1. Press SW1
  2. select wire length by pressing SW3
  3. Increase , decrease length by using SW2 and shift digit by using SW1
  4. Press SW3 for save Setting
  5. After success length updated press SW4 for exit
- **To set calibration coefficient**
  1. Press SW1
  2. Press SW2
  3. Select calib coeff by pressing SW3
  4. For shifting press SW2 select pressure in bar
  5. Press SW3 for save pressure in bar
  6. After success length updated press SW4 for exit

➢ APPLICATIONS

1. Industrial Water Level Monitoring
2. Agricultural bores
3. Ground Water Elevations.
4. Wells

MODERN COMMUNICATION TECHNOLOGY
Sr. No. 23, Plot No. 1, Hissa No. 3/1, Behind Wadekar Industries, Narhe, Pune-411041, Maharashtra (India)
Email Id. ravi@mcomtechnology.com , Web: -www.mcomtechnology.com
CONTACT: +91 9405134829, 7769827105, 9595383766