

AquaCMD Digitizing Computer 102-003

The AquaCMD provides a digital readout for Price-type AA and Pygmy current meters. It eliminates use of the headphone and stopwatch while it is a simplified version of the AquaCalc 5000 flow computer. The AquaCMD not only counts the revolutions, calculates and displays velocity in feet per second or meters per second, but time, revolutions and velocity are all simultaneously displayed on the LCD display.

The AquaCMD can be used with no modification or retro-fit of a standard Price-type current meter. Just plug it into the same connector you have for your headphone and immediately start reading velocity, revolutions and time.



The AquaCMD can be used with wading rods or cable suspended systems. It uses the same advanced CMOS circuitry as the AquaCalc 5000 which has proven itself in the USGS to be the accepted standard.

Features:

- Directly compatible with any existing Price-type current meter. No retrofit or modification required.
- Advanced CMOS circuitry with crystal based timing for accu- rate and reliable measurements.
- Display simultaneously shows velocity, revolutions and time. No need to wait until the end of a measurement cycle.
- Easy to read 32 characters LCD display reading 4 significant figures.
- Uses a single 9 V battery with power conserving standby circuitry for long battery life.
- Sealed membrane buttons and water resistant sealed circuitry.

Physical Characteristics:

- Size: 7" x 4" x 1" (18 cm x 10 cm x 3 cm)
- Weight: 1 lb. (.4 kg)
- Velocity Range: 0 to 25 ft/sec. (0 to 7.6 m/sec.)
- Temperature Range: -20 degrees C to +70 degrees C
- Display Resolution: 0.001



INSTRUCTIONS FOR USE

- 1. Press the ON/SELECT button to turn the unit on.
- 2. Press ON/SELECT button to cycle through the type of meter used and measurement types. The choices are:
 - a. 1-1: AA Current Meter/English Measurement
 - b. 1-2: AA Current Meter/Metric Measurement
 - c. 2-1: Pygmy Current Meter/English Measurement
 - d. 2-2: Pygmy Current Meter/Metric Measurement
- 3. Press the COUNT/STOP button to confirm your selection of meter and measurement type. From here, the selection process will focus on the timer settings.
- 4. Press the ON/SELECT button to cycle through the amount of time desired for counting. Default counter time is 40 seconds.
- 5. Press the COUNT/STOP button to begin the counting process.

NOTE: when the COUNT/STOP button is pressed, the count LCD will go blank and the timer LCD will set itself to ZERO. This signifies that the timer is waiting for the first signal from the water. Timing will start when the signal is received. If you decide to change a setting while waiting for the first count, simply press the ON/SELECT button to be taken to Step #2.

6. When the timer has reached the timer limit, it will continue timing until the final signal is received.

NOTE: if timer is set to start at zero in Step #2, you must press the COUNT/STOP button for it to signal to get the last signal, and then stop timing.

7. Press the COUNT/STOP button to calculate the formula and display VELOCITY.

NOTE: you may also press the ON/SELECT button to skip the calculation and start another timing.