

Remote Display  
for  
**AQUA LOGIC**®  
Automation and Chlorination



(model AQL-WW-PS-8 shown above)

**Installation/Operation Manual**

for model

AQL-WW-PS-4  
AQL-WW-PS-8  
AQL-WW-PS-16

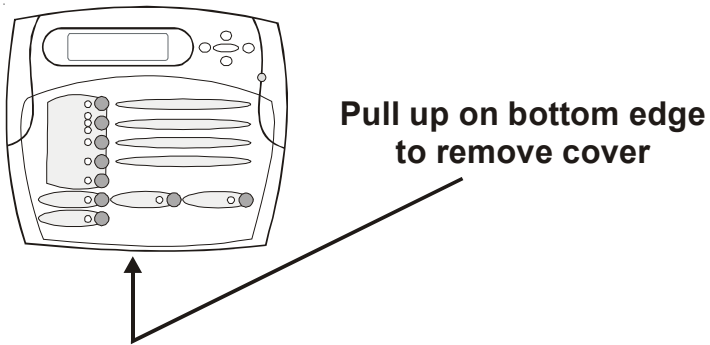
**COMPATIBILITY:** This display/keypad is compatible with all Aqua Logic PS-4/8/16 systems running main software r2.00 or higher.

## INSTALLATION

### Mounting

The AQL-WW-PS-4/8/16 Aqua Logic Remote Display/Keypad must be mounted indoors or in a weather protected area (rain should never hit the display/keypad). Up to 3 remote display/keypads can be installed. The display/keypad is designed to mount onto a standard electrical utility box (same size as used for a triple light switch) or can be mounted directly onto any wall surface. When selecting a location, note that the wire to the Aqua Logic main unit must be less than 500 feet long. Follow the steps below:

1. Remove display/keypad baseplate from the cover by lifting up on the cover at the lower end of the keypad as shown below.



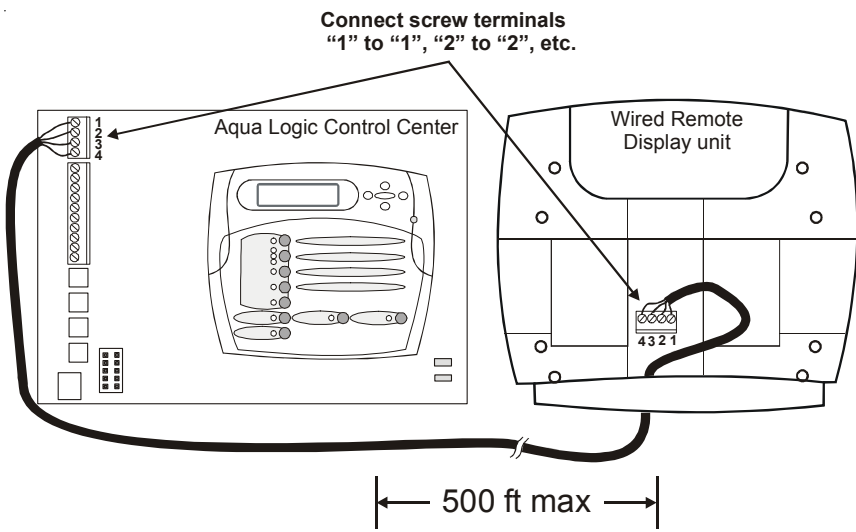
2. Screw the baseplate in the desired position (screws supplied by installer).

### Wiring

The Aqua Logic main unit can connect to a maximum of 3 remote display/keypads.

Use four conductor cable (typically phone cable) to connect the remote display/keypad with the Aqua Logic Control Center as shown on page 2. The maximum wiring distance is 500ft. (160m). Note that the terminals on both the Aqua Logic main unit and the remote display/keypad are numbered: Connect 1 to 1, 2 to 2, etc. Refer to diagram on the top of the following page.

If multiple remote display/keypads are installed: Never connect more than 2 wires to any terminal block. Two remotes can be wired back to the Aqua Logic main unit or the second display/keypad (and third, if applicable) can be “daisy chained” with one display/keypad wired to the next. The maximum wire run from the Aqua Logic main unit to the furthest remote display/keypad is 500 ft. (160m).



## OPERATION

When power is turned on, all the LED indicators will flash briefly, the display back-light will illuminate, and the following display will appear for a short period of time:

Goldline Aqua Logic  
Display r3.00

The "r3.00" is the software revision level. The actual revision level for your display/ keypad may be different.

Refer to the Aqua Logic Operation Manual for complete operating instructions.

# TROUBLESHOOTING

## 1. **Display/keypad not functioning (no display, no LEDs illuminated)**

If the display/keypad located on the main unit is working correctly, the most likely cause is that wires 1 and 4 are either open circuited or reversed. Check wiring. If none of the displays are working, check that 120V power is being applied to the main control and that the 3A fuse (violet) is not blown.

## 2. **Display backlight turns off after a period of time**

The display backlight should always illuminate when you press any key on the unit. If it turns off after a period of time, you can stop this by pressing the menu key (possibly multiple times) until "Settings Menu" appears. Next press the "<" or ">" key (possibly multiple times) until "Display Light" appears. At this point, pressing either "+" or "-" will allow you to select either "Always On" or "On for 60 sec.". After you have selected the desired operation, press the "Menu" button to lock in your setting. Note that this selection applies to this display/keypad only. Repeat the process of each display/keypad in the system.

## 3. **Display backlight always on**

The display backlight should always illuminate when you press any key on the unit. If it remains on after 60 seconds have elapsed since the last button push, you can stop this by pressing the menu key (possibly multiple times) until "Settings Menu" appears. Next press the "<" or ">" key (possibly multiple times) until "Display Light" appears. At this point, pressing either "+" or "-" will allow you select either "Always On" or "On for 60 sec.". After you have selected the desired operation, press the "Menu" button to lock in your setting. Note that this selection applies to this display/keypad only. Repeat the process for each display/keypad in the system.

## 4.

Communication Err 1  
call 888-921-7665

The display/keypad received data from an Aqua Logic-P-4 system or an Aqua Logic-PS-4 system running software earlier than r2.00. This keypad is not compatible with these Aqua Logic systems. Another cause for this problem may be that the local display/keypad in the main Aqua Logic control unit is not connected or not functioning. If this is the case, connect and/or replace the local display/keypad and then cycle power to the Aqua Logic off and then back on to reset the system. Call the Goldline Tech support department (Monday through Friday, from 8AM to 8PM eastern time) for further assistance.

## 5.

Communication Err 2  
call 888-921-7665

The display/keypad is not receiving any communication from the Aqua Logic main control unit. The most likely cause of this problem is a broken wire or "open circuit" in wires "2" and/or "3" in the cable between the display/keypad and the Aqua Logic main control unit. If you are unable to find the problem, contact the Goldline Tech support department Monday through Friday, from 8AM to 8PM eastern time.

6.

Communication Err 3  
call 888-921-7665

The display/keypad is receiving data from the main Aqua Logic control unit however that data contains errors and is unusable. The most likely cause of this problem is that wires "2" and "3" in the cable between the control unit and the display/keypad are crossed. If you are unable to find the problem, contact the Goldline Tech support department Monday through Friday, from 8AM to 8PM eastern time.

7.

Display Error 1  
call 888-921-7665

Display Error 2  
call 888-921-7665

An internal problem has occurred in the display/keypad. Remove the display/keypad from the wall mount base (see diagram on page 1) and write down the model number and serial number of the display/keypad. Next, call the Goldline Tech support department (Monday through Friday, from 8AM to 8PM eastern time) to find out how to obtain a replacement display/keypad.



**LIMITED WARRANTY** Goldline warrants its Aqua Rite, Aqua Rite Pro, Aqua Trol, Aqua Logic and Pro Logic products (products with Goldline part numbers starting with AQ-RITE-, AQ-RT-PRO, AQ-TROL-, AQ-LOGIC-, AQL-P-, AQL-PS-, AQL-CL-, PL-P-, PL-PS-, and HPC-2) to be free from defects in material or workmanship, under normal use and service:

For **three years** from the date of the initial system installation on private, residential swimming pools within the USA or Canada and **one year** from the date of initial system installation on commercial installations, installations outside of the USA or Canada and for any replacement parts or accessory products, provided they are installed in accordance with the Goldline installation instructions and specifications provided with the product. If written proof of the date of the initial system installation is not provided to Goldline, the manufacturing datecode on the Aqua Rite, Aqua Rite Pro, Aqua Trol, Aqua Logic and Pro Logic electronics unit will be the sole determinant of the date of the initial system installation.

For residential installations in USA or Canada: If a product is defective in workmanship or materials and is removed and returned freight prepaid within three (3) years after the date of the initial system installation, Goldline will, at its option, either repair or replace the defective product and return it freight prepaid.

For commercial installations, installations outside the USA and Canada, and accessory products and replacement parts: If a product is defective in workmanship or materials and is removed and returned freight prepaid within one (1) year after the date of the initial system installation, Goldline will, at its option, either repair or replace the defective product and return it freight prepaid.

Contact any Goldline dealer or contact Goldline at 61 Whitecap Drive, North Kingstown, RI 02852 for warranty service. The costs incurred in removal and/or reinstallation of the product are NOT covered under this warranty. Some states do not allow limitations on how long an implied warranty lasts, so the above limitation may not apply to you.

**WARRANTY EXCLUSIONS:**

1. Material supplied or workmanship performed by others in process of installation.
2. Damage resulting from improper installation including installation on pools larger than the product rating.
3. Problems resulting from failure to operate the product(s) in accordance with the recommended instructions contained in product's owners manual(s).
4. Problems resulting from failure to maintain pool water chemistry in accordance with the recommendations in the owners manual(s).
5. Problems resulting from tampering, accident, abuse, negligence, unauthorized repairs or alternations, fire, flood, lightning, freezing, external water, degradation of natural stone used in or immediately adjacent to a pool or spa, war or acts of God.

**DISCLAIMER. THE EXPRESS LIMITED WARRANTY ABOVE CONSTITUTES THE ENTIRE WARRANTY OF GOLDLINE WITH RESPECT TO ITS POOL AUTOMATION AND CHLORINATION PRODUCTS AND IS IN LIEU OF ALL OTHER WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. THIS WARRANTY GIVES YOU SPECIFIC LEGAL RIGHTS, AND YOU MAY ALSO HAVE OTHER RIGHTS WHICH VARY FROM STATE TO STATE. IN NO EVENT SHALL GOLDLINE BE RESPONSIBLE FOR ANY CONSEQUENTIAL, SPECIAL OR INCIDENTAL DAMAGES OF ANY NATURE WHATSOEVER, INCLUDING, BUT NOT LIMITED TO, PERSONAL INJURY, PROPERTY DAMAGE, DAMAGE TO OR LOSS OF EQUIPMENT, LOST PROFITS OR REVENUE, COSTS OF RENTING REPLACEMENTS, AND OTHER ADDITIONAL EXPENSES, EVEN IF THE SELLER HAD BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES. SOME STATES DO NOT ALLOW THE EXCLUSION OF LIMITATION OF INCIDENTAL OR CONSEQUENTIAL DAMAGES, SO THE ABOVE LIMITATION OR EXCLUSION MAY NOT APPLY TO YOU.**

**NO WHOLESALE, AGENT, DEALER, CONTRACTOR OR OTHER PERSON IS AUTHORIZED TO GIVE ANY WARRANTY ON BEHALF OF GOLDLINE.**

**THIS WARRANTY IS VOID IF THE PRODUCT HAS BEEN ALTERED IN ANY WAY AFTER LEAVING THE FACTORY.**

## ELECTROLYTIC CHLORINE GENERATOR BASIC POOL MAINTENANCE REQUIREMENTS

	TEST	IDEAL RANGE	ADJUSTMENT REQUIRED
WEEKLY	Free Chlorine	1.0 - 3.0 ppm	Turn output dial up to increase, down to decrease -OR- increase or decrease pump filtration time.
	pH	7.2 - 7.6	Too high - add muriatic acid Too low - add soda ash.
MONTHLY	Alkalinity	80 - 120 ppm	Add baking soda to increase. Add acid as required to decrease.
	Salt	2700 - 3400 ppm	Add salt as required to increase.
QUARTERLY	Stabilizer	60 - 80 ppm	Add cyanuric acid to increase.
	Calcium	200 - 400 ppm	Add calcium to increase. Drain and add water to decrease.
	Electrolytic Cell	inspect & clean	Refer to section in manual.

### Questions?

Refer to **[www.goldlinecontrols.com](http://www.goldlinecontrols.com)** for latest manual revisions, additional information and helpful service. Or, you may visit your local Authorized Goldline Dealer or call 888-921-POOL (7665) for assistance.



A HAYWARD COMPANY

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