



Installation & Operators Manual



**Hydro 857 & 957
Pass through range**

Part number 902.0005
Revision B



Installation and Operation instructions

For '*Classeq*' pass through range of dishwashers.

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1.0 Safety instructions

1.1 Warning :



CAREFULLY READ THESE INSTRUCTIONS, BEFORE INSTALLING AND OPERATING THIS APPLIANCE.

INCORRECT INSTALLATION, ADAPTATIONS OR ALTERATIONS COULD RESULT IN INJURY OR DAMAGE TO PROPERTY.

MALICIOUS DAMAGE, DAMAGE DUE TO NEGLIGENCE, OR FAILURE TO COMPLY WITH THESE INSTRUCTIONS AND LOCAL LEGISLATION, OR UNAUTHORISED TAMPERING WILL INVALIDATE ANY WARRANTY AND RELIEVE THE MANUFACTURER OF ALL LIABILITY

DAMAGE CAUSED DUE TO THE LACK OF, OR INCORRECT USE OF A WATER SOFTNER, OR LIMESCALE DAMAGE WILL NOT BE COVERED BY THE MANUFACTURERS WARRANTY

1.2 Installation :

Installation should only be carried out by a '**Classeq**' approved technician, and in accordance with current regulations and within our instructions.

1.3 Modification :

'**Classeq**' reserves the right to modify either the appliance or the contents of these instructions without notice.

1.4 Operation :

The appliance should only be used by a trained operator as instructed in section 5 of this manual.

1.5 Failure / malfunction :



In the event of a failure / malfunction, the mains electrical and water supplies **MUST** be isolated at the wall and not just at the machine.

1.6 Repairs and spare parts :

The appliance must only be repaired by a '**Classeq**' approved technician, using genuine '**Classeq**' spare parts.

2.0 The appliance

2.1 Unpacking :

Use suitable means and protective equipment to avoid injury whilst unpacking and handling the appliance. Remove all outer packaging and the protective film from the outer panels of the appliance prior to installation.

Ensure all packing materials are disposed of in accordance with local regulations.

2.2 Items included :

The following items are included within the appliance

- 4 x Adjuster feet & associated screws
- 2 x Baskets
- 1 x Cutlery basket
- 1 x Water inlet hose
- 1 x Drain hose (*Already attached to appliance on gravity drain*)
- Bottle weight kits (*if applicable for Rinse Aid and Detergent tubes*)
- 1 x Installation and Operation Instructions (**Must** be left with the customer, as this includes the warranty card, see rear page)

3.0 Installation

3.1 The site :

While removing the machine from its transit pallet, attached the 4 feet provided to the underside of the base (*using the associated screws*), ensure all screws are tight and each of the 4 feet are secure prior to installing the appliance.

Ensure there is sufficient space for the installation, servicing and easy access to all mains isolator switches / valves (*i.e. electricity and water*).

Ensure the surface the appliance is going to be installed onto is adequately stable and capable of supporting the appliance during normal operation, on page 3 are approximate weights of the appliance when empty and fully laden.

Once installed ensure the appliance is stable and secure , with its weight being distributed equally on the 4 feet, also ensure the appliance does not tilt more than 3° in any direction. Any adjustment required should be made by the feet now attached to the appliance.

Status of appliance	Weight
Empty	83 Kgs
Fully laden	130 Kgs

3.2 Electrical connection :

All electrical connections **MUST** be carried out by an authorised technician and in accordance with local and national regulations. As a minimum '**Classeq**' recommends that the following standards are maintained :

- All appliances are connected via a residual current device (R.C.D.) or earth leakage protection device.
- **EN 60204**
Supply isolator switch must have all pole separation of more than 3mm.
- **EN 60335**
The appliance must be connected to an equi-potential (earth leakage) conductor, the connection stud is located at the rear of the appliance (a suitable ring terminal will be required), this is in addition to the earthed electrical supply.

Prior to connecting the appliance, ensure that the voltage and the supply fuse complies with the rating plate and configuration of the mains terminal block within the appliance.

3.2.1 Electrical rating :

Both the '**Classeq**' 'Hydro 857' and 'Hydro 957' can be electrically down rated, such a procedure **MUST** be carried out by a '**Classeq**' approved technician.



WARNING : Electrically down rating of the appliance **WILL** have a detrimental effect on the performance and recovery, as a result '**Classeq**' recommends that such a procedure is only performed as a last resort.

The down / up rating of the appliance is carried out by configuring the terminal block within the appliance .

3.3 Water connection :

The appliance comes with a water supply hose requiring a 3/4" BSP male threaded connection at the mains water supply, upon installation and commissioning all water joints must be checked for leaks and made water tight.

3.3.1 Water supply restrictions :

Water supply constraints must be adhered to :

- Incoming water temperature
 - 4°C minimum
 - 55°C maximum

- Supply water dynamic pressure (*air break machines, minimum water pressure 0.25 bar, all other parameters apply*).
 - 0 to 2 bar Rinse booster pump required
 - 2 to 4 bar No modifications required
 - 4 to 6 bar Flow restrictor required
 - 6 bar plus Pressure reducing valve required

If the above requirements are not adhered to, the performance of the appliance will be impaired

3.3.2 Drainage systems

Appliances are available as either gravity drain or pumped drain, upon installation the waste hose must be configured as shown within this manual, also all installations must be with a running / 'P' trap to ensure hygiene :

All appliances

- On drain pump appliances the flexible drain hose must be securely attached to the waste outlet on the under side of the appliance, on gravity drain appliances this will be already attached.
- The drain hose must slope down from the waste outlet to the drain.
- Ø40mm (Ø1 1/2") standpipe required, must be lower than the baseline of the appliance.
- Drain hose must be a close / tight fit into the drain pipe to reduce odours from the drain system
- To ensure correct drainage, the height range for the drain standpipe **MUST** be with the following from the surface the machine stand on are
 - 0 to 300mm - Gravity drain
 - 0 to 600mm - Drain pump



4.0 Commissioning

4.1 Rinse aid & detergent :

Ensure chemical tubes are attached correctly to the individual chemical pumps (*pumps located behind front lower panel of the appliance*).

At the bottle end of the chemical tubes, fit the bottle weight into the end of the tube

Ensure the correct chemical tubes now go to the corresponding chemical bottles.



WARNING : Only rinse aids and detergents developed for commercial glass and dishwashers are to be used, rinse aids must be suitable for water temperatures down to 40°C.

4.1.1 Rinse aid prime :

If a rinse aid pump system is supplied by '**Classeq**' upon initial installation and if ever the rinse aid runs out the pump will need to be primed

- Switch appliance ON and allow to fill
- Remove the lower front panel (do not to touch any wire connections).
- Depress and hold button located above the chemical pump. You will notice that the pump will run then stop and then run again, please note that this is normal.
- To fully prime, depress the prime switch for approx 1 ½ minutes.
- Replace the front lower panel.

4.1.2 Detergent / Soap prime :

If a detergent / soap pump system is supplied by '**Classeq**' this will self prime itself.

4.1.3 Chemical dosage :

If chemical pumps are supplied by ‘**Classeq**’ they will be preset to nominal settings, if required, the dosing can be increased / decreased to suit the individual site requirements.

The pumps only operate while water is entering the appliance, therefore adjustment will only increase or decrease the delivery rate of the pump and not the operating time

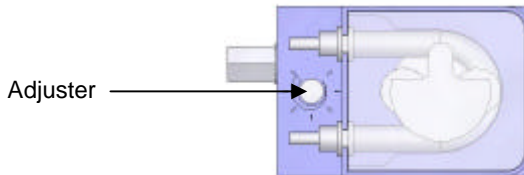
Pre-set values (ml (*millimetres*)

Model	Rinse aid dose	Detergent dose
Hydro 857 & Hydro 957	1.2 ml	8.0 ml

Adjustment of this is via the adjuster screw located on each of the pumps, which are located behind the front lower panel of the appliance.

The adjuster screw is protected by a small round cover this must be removed then replaced once the required adjustment is achieved.

- Increase the flow rate of the pump, rotate the adjuster screw clockwise ↻
- Decrease the flow rate of the pump, rotate the adjuster screw anti-clockwise ↻



Pump	Dose per cycle at division						
	1	2	3	4	5	6	7
Rinse aid dose (ml)	0.7	1.2	2.4	3.0	4.1	5.0	5.8
Detergent dose (ml)	1.2	2.3	3.5	5.8	8.0	10.1	12.0

4.2 Rinse & wash tank temperatures :

Water temperatures on '**Classeq**' range of machines is none adjustable.

Models	Temperatures	
	Rinse water	Wash water
Hydro 857, Hydro 957	80°C	55°C

4.3 Interlock options :

Hydro 857 & 957 ranges have three interlock option, each option allowing cycles to start irrespective of water temperature, Two of the options extend the cycle until the required temperatures are achieved. Selection is achieved by configuring wires located within the machine below the control panel

- **Interlock removed**
Connect the **Black** crimp cover to the **White** socket
- **Quick start (default setting)**
Extends the cycle until the rinse tank is above 55°C
Connect the **Green** crimp cover to the **White** socket
- **Interlock**
Extends the cycle until both tanks achieve their required temperatures
Connect the **Red** crimp cover to the **White** socket

4.4 Demonstration :

'**Classeq**' recommends that prior to leaving the site / installation, the installer demonstrates the following to the end user, as this will ensure the appliance is correctly used and maintained.

- What to do in case of an emergency, i.e. how to isolate the mains electricity and water (*see section 1*).
- Switching the appliance on.
- Operating the appliance.
- Draining down.
- Switch the appliance off.
- Clean the appliance, including removal and replacement of all filters.
- Replenishing and priming of rinse aid and detergent.

Upon completion of the installation and commissioning of the appliance, this manual **MUST** be left with the end user.

5.0 Operation

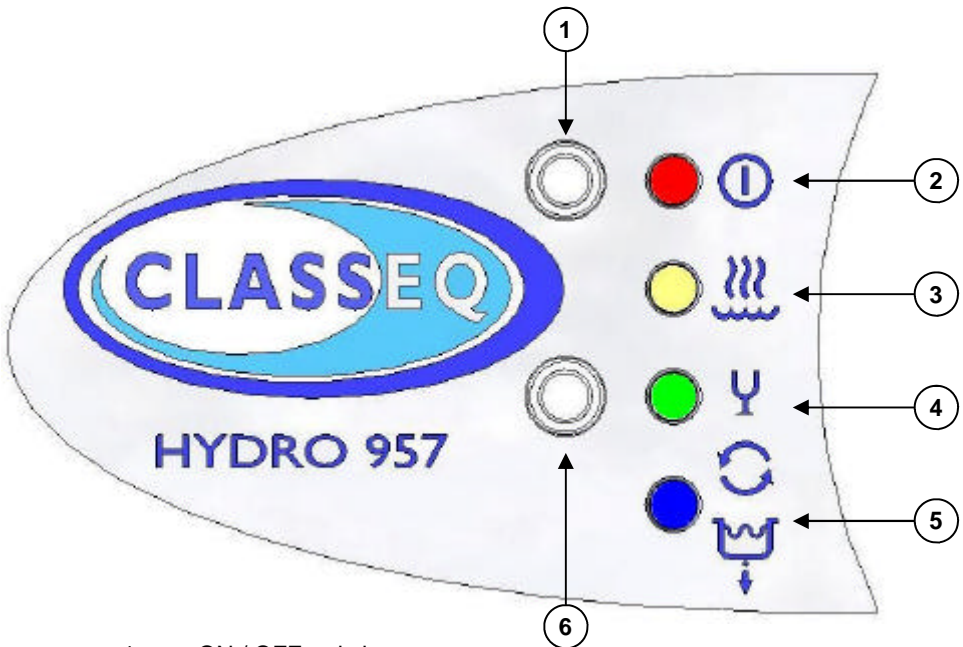
5.1 Machine description :

The design of commercial dishwashing appliances differ from their domestic versions in that they are designed to run nearly continually for many hours.

Commercial appliance, wash results can be effected by external considerations such as incoming water temperature, pressure, hardness and choice of chemicals. '**Classeq**' recommends that your appliance is either connected to a water softener or a softened water supply. For further details on water softeners please contact the supplier of your appliance.

5.2 Controls :

Prior to switching ON, ensure that you are familiar with the controls on the front fascia of the appliance and the location of the isolator for mains electricity and water supply.



1. ON / OFF switch
2. ON / OFF lamp
3. Heating lamp
4. Short / long cycle lamp (*when illuminated short cycle*)
5. Cycle lamp
6. Short / long cycle switch

Please note, appliances fitted with a drain pump, the Cycle lamp double as the drain down lamp

5.3 Switch the appliance on :



Ensure that both the water and electrical supply are connected and switched on, then depress the 'ON/OFF' switch located on the fascia of the machine.

The appliance will now automatically fill and heat, during this process the hood must remain closed, allowing the process to be completed quickly.

5.4 Appliance ready to operate :

The appliance is designed to start once the hood is closed, so there may be occasions when a cycle starts prior to being up to temperature or the cycle extends to allow required temperatures to be achieved.

5.5 Starting a cycle :

To start a cycle, open the hood, load the first basket, ensuring that bottom and top arms rotate freely.



Close the hood, the cycle will now start, during the cycle the 'Cycle' lamp will remain illuminated.



Once the 'Cycle' lamp has gone out (*at the end of the cycle*) open the hood and remove the basket, then reload the machine and repeat as required

5.6 Draining :

During normal operation your appliance will automatically drain away any excess water.

'Classeq' recommends if your appliance is not being used for a prolonged period the machine must be completely drained down.

It is also recommended that the appliance is completely drained and cleaned at least once in every 24 hour period, this will help to maintain hygiene within the appliance.

5.6 Draining (cont.) :

Gravity drain appliances

- Switch appliance OFF at fascia.
- Remove the main wash filters and drain plug from wash chamber
- Your appliance should now drain under gravity.
- Once completed replace the drain plug and filters.
- Now isolate mains water and electricity at the wall.

Drain pump appliances

- Switch appliance OFF at fascia.
- Open and close the hood.
- The 'Cycle' lamp will remain illuminated while the drain cycle is in progress (3 minutes), once completed the 'Cycle' lamp will go out
- DO NOT open the hood while in the drain down cycle is in progress
- DO NOT isolate the appliance while in the drain down cycle.
- Once fully drained and the 'Cycle' lamp has gone out isolate both the mains electrical and water supplies at the wall

Note !



Once empty '**Classeq**' recommends that the mains water and electricity supplies are isolated at the wall and the machine be cleaned as instructed in section 6 of this manual



For hygiene reasons '**Classeq**' recommends once the appliance has been fully drained the hood is left open to assist the natural drying process of the wash chamber, also the wash chamber, filters, wash / rinse arms and hood are cleaned as stated in section 6

6.0 Cleaning

6.1 Prior to cleaning :



Switch off and isolated electrical supply before cleaning the appliance

WARNING



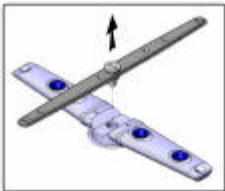
DO NOT use cleaning agents that contain CHLORINE, BLEACH or HYPOCHLORITE.

DO NOT use STEEL WOOL, WIRE BRUSHES or any other abrasive materials.



DO NOT jet wash or hose pipe the appliance down either internally or on the exterior

6.2 Internal cleaning :



Remove the top and bottom wash and rinse arms from the appliance. Once removed, wash in warm soapy water, ensuring all debris is removed. Before reassembling rinse the arms in cold clean water to remove any soap residue.

Remove all the filters from within the appliance and wash in warm soapy water, ensuring all debris is removed. Rinse in cold clean water to remove any soap residue.

WARNING

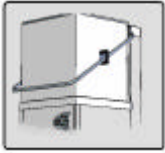


Before cleaning the wash chamber, ensure all sharp items, such as broken glass or other items which could cause injury are removed carefully



Before wiping the inside of the wash chamber ensure all debris is removed and the chamber is clean. Reassemble all filters and wash arms.

6.3 Exterior cleaning :



Wipe the exterior of the appliance with a damp sponge (NOT WET)

Once dry, clean using a STAINLESS STEEL cleaning agent

7.0 Trouble shooting

- Before placing a service call , please check the following:
- Check the appliance is connected to the mains water and electricity supply and both are turned on.
- Check levels of chemicals within the rinse aid and detergent bottles.
- Check the drain / stand pipe is correct for the appliance (refer to section 3.3.2 of this manual).

NOTE

In the event of a service call being made under Warranty, and it is found that the fault(s) are due to non-observance of instructions in this manual, the call will be charged at current rates.

7.1 Appliance does not fill : Appliance does not start : Appliance does not rinse :

- Check water supply is turned ON.
- Check water supply hose is not trapped or kinked.
- Check that the appliance is switched ON.
- Drain appliance fully, then try again to fill the machine, drain as per instructions 5.6 of this manual..

7.2 Appliance fills slowly :

- Check water supply tap is fully open.
- Check water supply pressure, should be above 2 bar, if not ask your dealer to install a booster pump to increase water pressure.
- Check and clean rinse jets (located on the rinse arms within the appliance).
- Check water supply hose is not trapped or kinked.
- Remove and clean any pressure regulator or reducer in the water supply if faulty replace.

7.3 Appliance not heating :

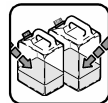
- Drain appliance fully, then try again to fill the machine, drain as per instructions 5.6 of this manual and refill and check for heating.
- Check the temperature of the mains water, as variations in water temperature will affect the heating of the appliance.
- Check the water in the wash chamber is at the correct level.

7.4 Appliance not draining :

- Check and clean all filters within the appliance.
- Check that the stand pipe / drain is not clogged / blocked.

7.5 Poor wash results :

- Check and replenish chemicals, ensure they are a good quality, if required check with your dealer / agent.
- Check and clean wash and rinse jets on wash arm assembly.
- Clean filters within appliance and check that they are fitted correctly.



- Check water supply is ON and fully open.
- Rinse dishes of any food debris before placing into the dishwasher.
- Glasses may need to be renovated.
- If glasses are 'Blooming' you may need a water softener, call your dealer to advise on size of water softener required.
- If a water softener is fitted, replenish the salt within the softener, as per the water softener instructions.

7.6 Overfilling :

- Drain appliance fully, drain as per instructions 5.6 of this manual. Refill and check level.
- Check and clean all filters within the appliance.
- Check stand pipe / drain height is configured correctly shown in section 3.3.2. of this manual
- Check that the stand pipe / drain is not clogged / blocked.
- If the appliance continues to overfill isolate both the mains electricity and water, before call a service technician.

7.7 Will not switch ON :

- Check and reset circuit breaker in the sites fuse board, if the circuit breaker continues to trip isolate the appliance at the mains electricity before calling a service technician.

7.8 Will not switch OFF :

- Immediately isolate the appliance at the mains electricity before calling for a service technician.

