

HWP-K Series

Condensate Lift-Pump Kit

Ducted Water Cooled R410A Packaged Air Conditioners

Installation Instructions

GENERAL

The HWP Series Condensate Lift-Pump has been designed to remove condensate from the unit in tight installations where a well sloped drain line (minimum 1 in 50 gradient) is not immediately feasible.

Models	Kit
HWP 35-59	Item no. 507-003-009
HWP 77-275	Item no. 507-003-010
HWP 290-445	Item no. 507-003-011

Note: The HWP unit's drain exit must be at the opposite end to the compressor (ie standard orientation).

COMPONENTS

1. Condensate Lift-Pump (c/w box cover HWP 35-59 only).
2. Self-adhesive insulation (HWP 77-275 only)
3. Two self-tapping screws
4. Plastic hose and securing pipe clamp

5. Drain pipe plug: HWP 35-225: 19mm; HWP 290-445: 25mm.

Check that all items of the kitset are supplied and that no damage has occurred to the items.

INSTALLATION

If your unit is an HWP 36/48/59, go straight to Figure 3 for instructions, otherwise proceed as follows:

1. Remove the drain tray from the base of the air conditioner.

HWP 35-58 only:

Remove and discard the drain cover (see Fig.1); four screws. Remove the drain shield; four screws. Retain the eight screws.

HWP 77-445 only:

Cut away a minimum amount of fibre-glass insulation where indicated in Fig.2.

Re-insulate exposed area with self-adhesive insulation supplied.

2. Attach pump brackets, as shown, with the two self tapping screws supplied.

HWP 35/47/58 only:

Remove two 19mm long self-tapping screws from back side of pump kit. Position kit and fix using the same two 19mm screws (see Fig.1).

Remove the drain shield (four screws).

HWP 79-275 CEKS only:

Re-orientate the pump -90° from that shown in Fig.2, so that the PVC hose does not run alongside the electric elements.

3. Remove insulation from inside 19 dia. hole located immediately above pump.
4. Pass one end of the plastic hose supplied through the 19 dia. hole from inside the unit.

5. Attach other end of plastic hose to pump's discharge nozzle and secure using clamp supplied.
6. Adjust hose to ensure NO contact with sharp edges and clear of heater elements (if fitted).
7. To maximise pump efficiency keep hose length as short as possible. Cut off any excess length of hose. Refer also Fig.3.
8. Route pre-wired five core cable to electrical box and connect to terminals as per appropriate wiring diagram, see overleaf.

9. Ensure five core cable is kept clear of sharp edges, the drain tray and heater elements (if fitted).

HWP 35/47/58 only:

Refit drain shield removed earlier ensuring it slides over the pump kit box folds. Fix drain shield to pump kit using two screws supplied. Re-attach drain shield to coil channel and fan deck

Fig. 1 HWP 35, 47, 58

Dwg Ref. 507-003-025

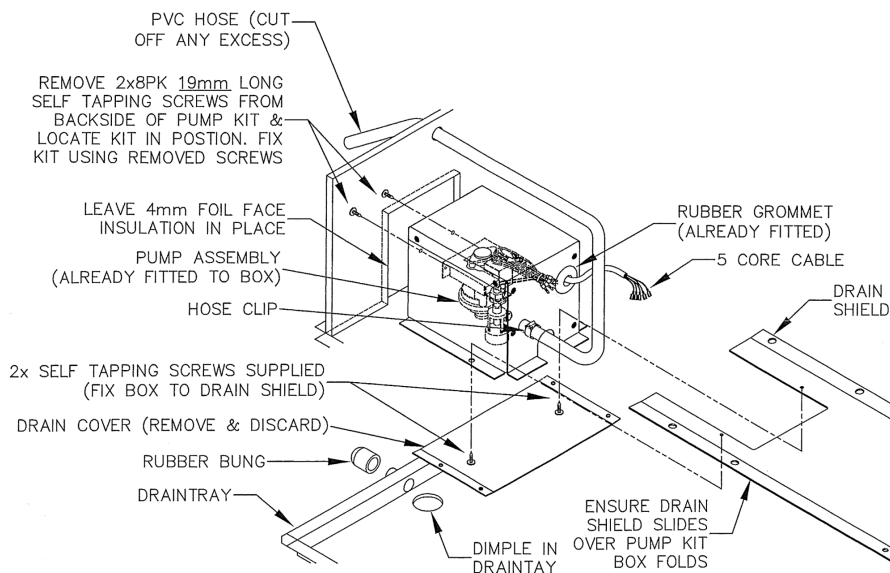
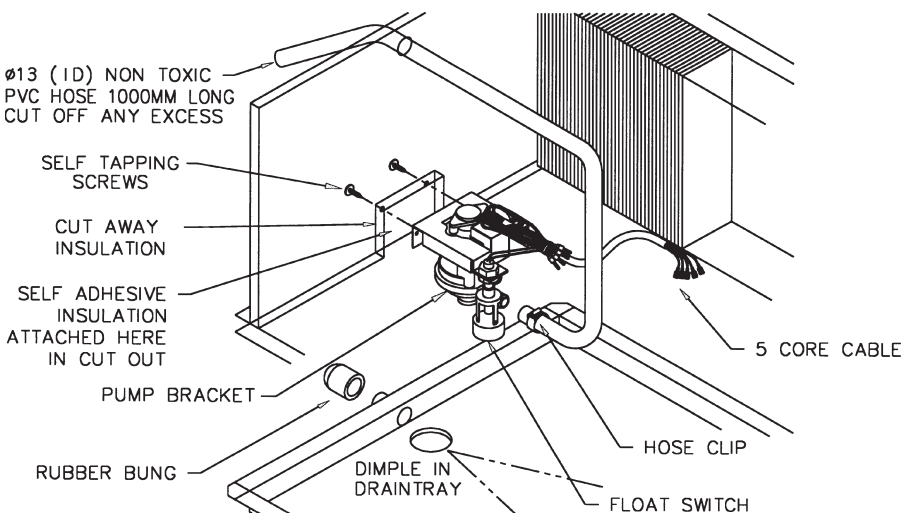


Fig. 2 HWP 77-445

Dwg Ref. 507-003-021



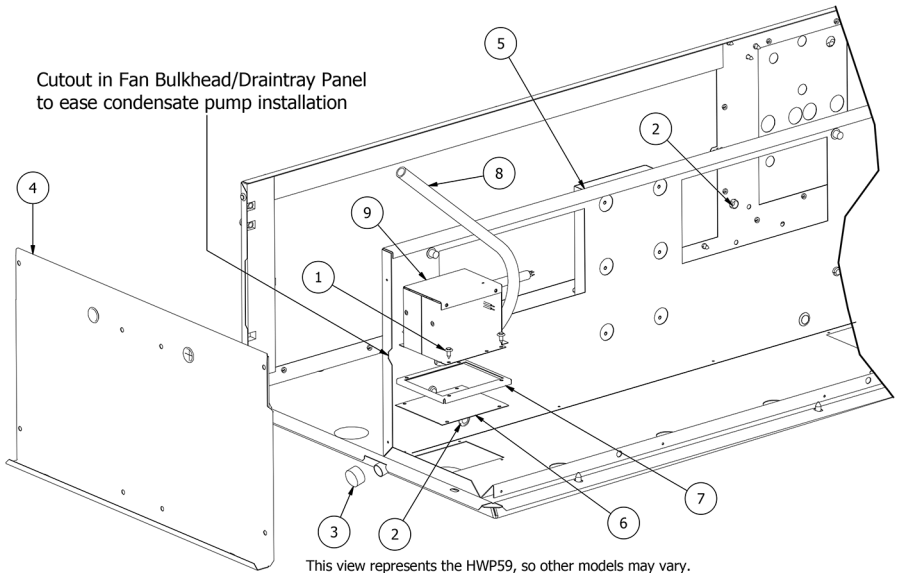
Note: Drain hose must be installed away from any electric elements.

using eight screws removed earlier (step 1).

Fig. 3 HWP 36, 48, 59

Dwg Ref. 507-003-025/2

10. Ensure drain tray is clean before refitting to unit. **Note:** Dimple and drain outlet on drain tray must be directly under pump.
11. Seal off 19 or 25 mm dia. drain stub on drain tray with the appropriate plug supplied and silicone type sealant.
12. Connect plastic hose to client's drain system.



The drain line must be maintained at least 19 mm ID along its full length. Check pump operates and drain clears when commissioning the unit.

OPERATION

The Condensate Lift-Pump is wired to run when the compressor is operating. A float switch is included for safety. If the pump fails or blockage occurs, then the float switch will turn off the compressor, thus preventing flooding.

NOTE

The manufacturer reserves the right to make changes in specifications at any time without notice or obligation.

Installation:

1. Remove the fan access panel ④.
2. Remove and throw away the pump undercover ⑥ but retain the four screws ①
3. Route the pump power cable through grommets ② and into electrical box via the side grommet.

4. Install condensate pump ① onto condensate attachment bracket ⑦ using the four retained screws from step 2.
5. Install hose ⑧ through fan access panel ④.
6. Follow steps 3 to 12 on page 1 of this document. When complete, re-install fan access panel ④.

Fig. 4 Condensate Lift-Pump Wiring

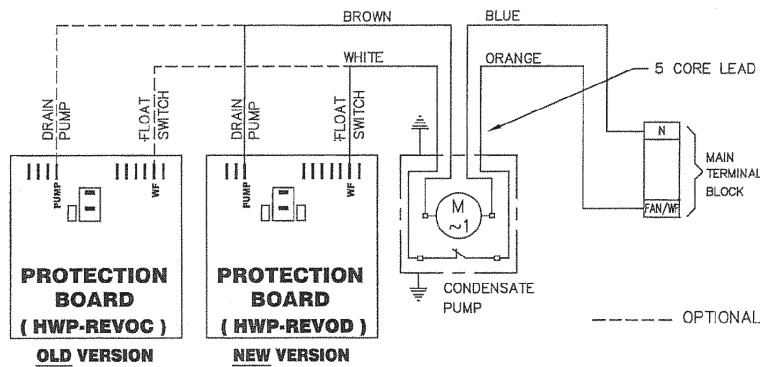
Note: Read these diagrams in conjunction with the appropriate HWP unit's wiring diagram.

Dwg Ref. 507-014-008

Diagram shows control section to insert float switch connection points.

HWP with Protection Board

Original wire connecting FAN terminal and FLOAT SWITCH to be removed.



HWP with SAT-2 Thermostat

Original wire connecting COMMON terminal and FLOAT SWITCH to be removed.

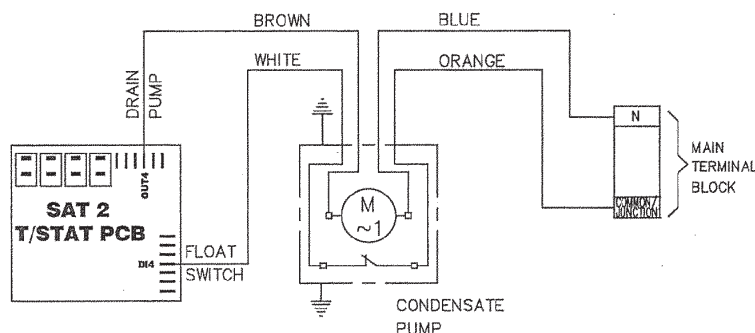
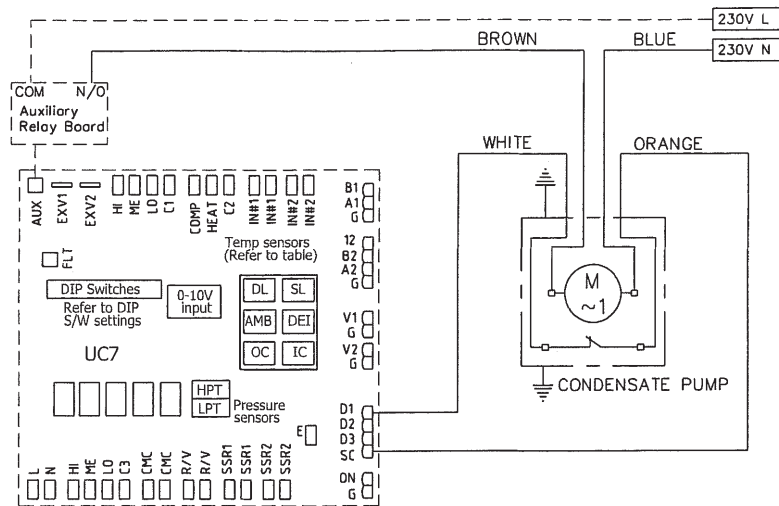


Fig. 4 Condensate Lift-Pump Wiring (cont'd)

HWP with UC7 Controller



HWP with UC8 Controller

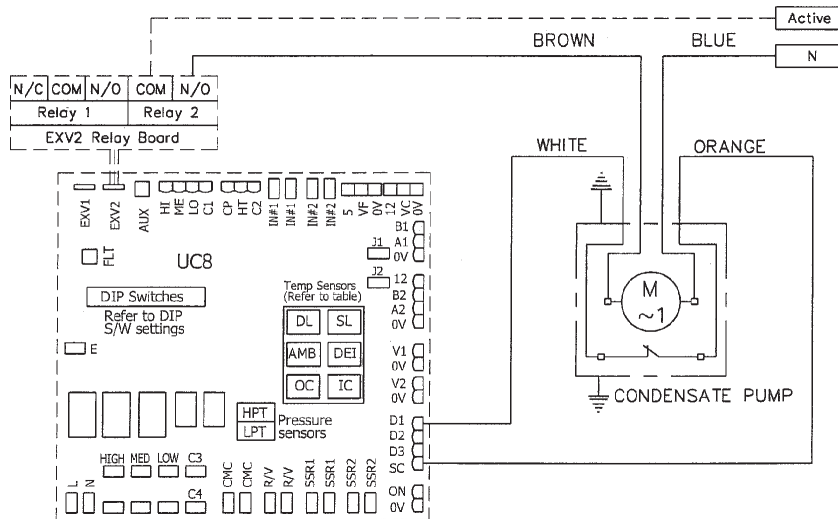


Fig. 5 Flow Rate of Condensate Pump

Lower Heads of Water give better performance. Beware, loose debris in the drain tray could clog the pump intake, reducing performance.

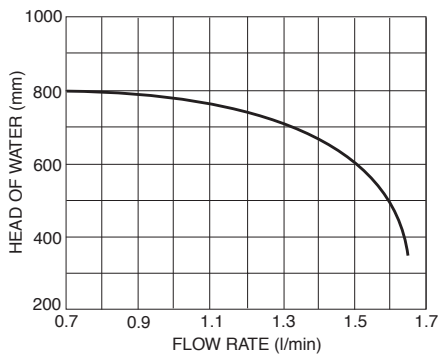
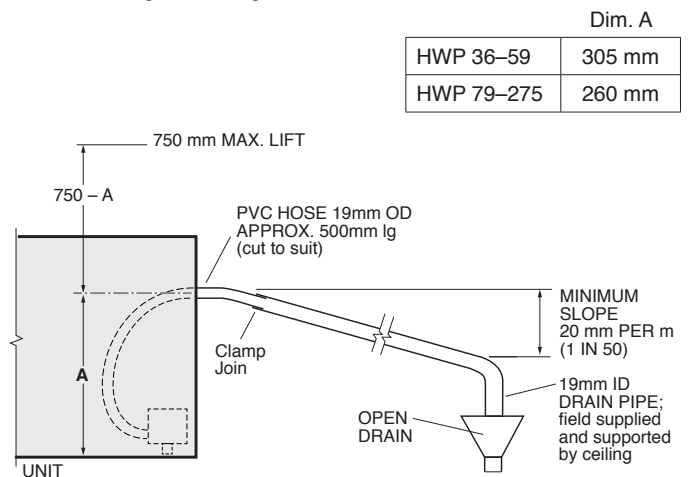


Fig. 6 Condensate Drain

The drain line must be maintained at least 19 mm ID along its full length.



	Dim. A
HWP 36–59	305 mm
HWP 79–275	260 mm

Not to Scale



This pamphlet replaces the previous issue
no. 3884 dated 09/18.
Figure 6 update.