

Information Sheet No 23 CONVERSION OF APPLIANCES

The conversion of a gas appliance requires a specialised level of understanding.

The incorrect conversion of appliance, especially an open flued gas appliance, can lead to serious injury or death. Appliances shall only be converted if they are certified for use on the type of gas required and a manufacturer's conversion kit or procedure is available. It is imperative that when converting appliances, the manufacturer's conversion procedure is strictly applied and that the appliance is tested when complete.

- replace the main burner and/or injector
- replace surface combustion tiles*
- replace pilot burners and/or injectors**
- replace gas valves
- set air to gas ratios
- fit regulators and install springs
- set appliance operating pressures with a correctly calibrated instrument
- adjust thermostat by pass rates to burners
- adjust turn down gas rates to burners
- re-program or replace microprocessor units
- check for gas leaks
- analyse combustion products with a correctly calibrated instrument

A gasfitter may need to perform a number of the following tasks to convert an appliance:

* Some flueless room heaters may need burner tile replacement.

**Oxygen Depletion Pilots (ODP) must be fitted in accordance with conversion procedures.

Testing the appliance is part of the conversion procedure.

COMBUSTION LEVELS FOR OPEN FLUED APPLIANCES

An open flued appliance does not have a dedicated flue and expels its combustion products directly into the surrounding air space.

A critical part in testing an appliance after conversion is as a quantitative analysis of the combustion products. **This may not be included as part of the conversion procedure;** however, the gasfitter is responsible for ensuring combustion levels are compliant to the relevant Australian Standards.

You must not convert or commission an open flued appliance if you cannot ensure combustion levels are within Australian Standards for that class of appliance.

Example:

AS 4553 *Gas Space Heating Appliances, Vitiation and Emission Tests*

Clause 5.11.6 "The CO/CO₂ ratio for indoor flueless space heaters shall not exceed 0.002 when operating on available gas at manufacturer's specified test point pressure."

If further information is required, please contact Gas Standards and Safety on 1300 366 322