

# **G3441/G3641/G3941 G3441R/G3641R/G3941R G3641FR/G3941FR Griddles**



## **INSTALLATION and SERVICING INSTRUCTIONS**

**This appliance must be installed and serviced by a competent person as stipulated by the Gas Safety (*Installation & Use*) Regulations.**

### **IMPORTANT**

The installer must ensure that the installation of the appliance is in conformity with these instructions and National Regulations in force at the time of installation. Particular attention **MUST** be paid to:

**Gas Safety (Installation & Use) Regulations  
Health And Safety At Work etc. Act  
Local and National Building Regulations  
Fire Precautions Act**

Detailed recommendations are contained in Institute of Gas Engineers published documents:  
**IGE/UP1, IGE/UP/2  
BS6173 and BS5440**

The appliance has been CE-marked on the basis of compliance with the Gas Appliance Directive for the Countries, Gas Types and Pressures as stated on the data plate.

**WARNING: TO PREVENT SHOCKS, ALL APPLIANCES WHETHER  
GAS OR ELECTRIC, MUST BE EARTHED.**

On completion of the installation, these instructions should be left with the Engineer-in-Charge for reference during servicing. Further to this, The Users Instructions should be handed over to the User, having had a demonstration of the operation and cleaning of the Appliance.

**IT IS MOST IMPORTANT THAT THESE INSTRUCTIONS BE CONSULTED BEFORE INSTALLING  
AND COMMISSIONING THIS APPLIANCE. FAILURE TO COMPLY WITH THE SPECIFIED  
PROCEDURES MAY RESULT IN DAMAGE OR THE NEED FOR A SERVICE CALL.**

### **PREVENTATIVE MAINTENANCE CONTRACT**

In order to obtain maximum performance from this unit we would recommend that a maintenance contract be arranged with **SERVICELINE**. Visits may then be made at agreed intervals to carry out adjustments and repairs. A quotation will be given upon request to the contact numbers below.



### **WEEE Directive Registration No. WEE/DC0059TT/PRO**

At end of unit life, dispose of appliance and any replacement parts in a safe manner, via a licensed waste handler.

Units are designed to be dismantled easily and recycling of all material is encouraged whenever practicable.

### **Falcon Foodservice Equipment**

#### **HEAD OFFICE AND WORKS**

Wallace View, Hillfoots Road, Stirling. FK9 5PY. Scotland.

#### **SERVICELINE CONTACT**

Phone: 01438 363 000

Fax: 01438 369 900

T100765 Ref. 7

# IMPORTANT INFORMATION

## Warranty Policy Shortlist

Warranty does not cover :-

- Correcting faults caused by incorrect installation of a product.
- Where an engineer cannot gain access to a site or a product.
- Repeat commission visits.
- Replacement of any parts where damage has been caused by misuse.
- Engineer waiting time will be chargeable.
- Routine maintenance and cleaning.
- Gas conversions i.e. Natural to Propane gas.
- Descaling of water products and cleaning of water sensors where softeners/ conditioners are not fitted, or are fitted and not maintained.
- Blocked drains
- Independent steam generation systems.
- Gas, water and electrical supply external to unit.
- Light bulbs
- Re-installing vacuum in kettle jackets.
- Replacement of grill burner ceramics when damage has been clearly caused by misuse.
- Where an engineer finds no fault with a product that has been reported faulty.
- Re-setting or adjustment of thermostats when unit is operating to specification.
- Cleaning and unblocking of fryer filter systems due to customer misuse.
- Lubrication and adjustment of door catches.
- Cleaning and Maintenance
  - Cleaning of burner jets
  - Poor combustion caused by lack of cleaning
  - Lubrication of moving parts
  - Lubrication of gas cocks
  - Cleaning/adjustment of pilots
  - Correction of gas pressure to appliance.
  - Renewing of electric cable ends.
  - Replacement of fuses
  - Corrosion caused by use of chemical cleaners.

# SECTION 1 - INSTALLATION

UNLESS OTHERWISE STATED, PARTS WHICH HAVE BEEN PROTECTED BY THE MANUFACTURER ARE NOT TO BE ADJUSTED BY THE INSTALLER.

## 1.1 MODEL NUMBERS, NETT WEIGHTS and DIMENSIONS

Model	Width (mm)	Depth (mm)	Height (mm)	Weight (kg)
G3441 / R	400	770	455	65
G3641 / R / FR	600	770	455	90
G3941 / R / FR	900	770	455	127

## 1.2 SITING

The appliance may be installed on a non-combustible surface, counter top, or alternatively on the purpose made stand supplied by Falcon.

Installation should be made in accordance with local and/ or national regulations applying at the time. A competent installer MUST be employed.

The griddle plates can be installed to within 150mm of a combustible wall at the back and sides and a clear space of 900mm should be allowed between the top of the flue outlet and any overlying combustible surface.

**Important** - If the unit is to be installed in suite formation with other matching appliances of the DOMINATOR PLUS series, the instructions for all units must be consulted to determine the necessary clearance to any combustible rear wall or overlying surface. Some appliances require greater clearance than others and the largest figure quoted in the individual instructions will therefore determine the clearance for the complete suite of adjoining appliances.

## 1.3 VENTILATION

Adequate ventilation whether natural or mechanical, must be provided to ensure fresh air is available for ventilation and removal of combustion products.

Recommendations for Ventilation of Catering Appliances are given in BS5440 : 2. Furthermore, to ensure sufficient room ventilation, guidance on the volume of ventilation air required for different types of catering equipment is provided in the table.

Appliances are to be installed with sufficient ventilation to prevent the occurrence of unacceptable concentrations of substances harmful to health in the room in which they are installed.

For multiple installations, requirements for individual appliances should be added together.

The appliance flue discharges vertically through the grill at the hob. There must be no direct connection of the flue to any mechanical extraction system or the outside air. Siting the appliance below a canopy is the ideal arrangement.

## 1.4 GAS SUPPLY

The incoming service must be of sufficient size to supply full heat input without excessive pressure drop. A gas meter will be installed in the system by the gas supplier. Alternatively, if an existing meter is to be utilised, this should be checked, preferably by the supplier to ensure that it is adequate to deal with the rate of gas supply required. This is particularly important when a number of units i.e. a 'suite', is being installed.

Installation pipework must be fitted in accordance with IGE/ UP/ 2.

The size of the pipework supplying the appliance must be no less than inlet connection R $\frac{1}{2}$  ( $\frac{1}{2}$ " BSP external taper).

If flexible tube is used, the gas supply tubing or hose shall comply with national requirements in force. These will be periodically examined and replaced as necessary.

An isolating cock must be located close to the appliance to allow shutdown during an emergency or routine servicing.

After installation, the complete installation must be checked for gas soundness as specified in IGE/ UP/ 1.

## 1.5 ELECTRICAL SUPPLY

Not applicable to these appliances.

## 1.6 WATER SUPPLY

Not applicable to these appliances.

## 1.7 HEAT INPUTS

There is a single burner on a G3441, two burners on a G3641 and three on a G3941.

Model	kW (net)	Btu/hr (gross)
G3441	5.3	19,900
G3641	11	41,300
G3941	16.5	62,000

## 1.8 INJECTOR SIZES Main Burner

Model	Natural Gas	Propane Gas
G3441	Ø1.95mm	Amal 190
G3641	Ø1.95mm	Amal 190
G3941	Ø1.95mm	Amal 190

### Pilot Burner

Model	Natural Gas	Propane Gas
G3441	No. 36	No. 19
G3641	No. 36	No. 19
G3941	No. 36	No. 19

## 1.9 GAS PRESSURES

### Burner Pressure

Gas type	mbar	inches w.g
Natural Gas	15	6
Propane Gas	37	14.8

### Supply Pressure

Gas type	mbar	inches w.g
Natural Gas	20	8
Propane Gas	37	14.8

### 1.9.1 Natural Gas Burner Pressure

Natural gas appliances are supplied with an adjustable governor, this should be set to provide a burner pressure of 15mbar (*6 inches w.g.*).

The pressure test point is located below the bottom right unit, it is accessible without removing any panels.

## 1.10 BYPASS RATE SETTING

The bypass rate has been factory set and no adjustment is available. Replacement Copreci bypass screws are required for gas conversions as detailed in table below.

Model/Mark	Natural Gas	Propane Gas	kW (net)
G3441	Copreci 81	Copreci 52	2.3
G3641	Copreci 81	Copreci 52	2.3
G3941	Copreci 81	Copreci 52	2.3

## SECTION 2 - ASSEMBLY and COMMISSIONING

### 2.1 ASSEMBLY

#### 2.1.1 Unpacking

Remove any packing material etc. and ensure that burners are correctly located over injectors and located properly at rear.

#### 2.1.2 Positioning

Position unit and level using feet adjusters. If it is to be mounted on a purpose floor stand, refer to instructions supplied with stand. The griddle is now ready for connection to gas supply.

### 2.2 CONNECTING TO THE GAS SUPPLY

With unit in position (see Section 1.2) connect to gas supply in accordance with Section 1.4 of these instructions. For Natural Gas applications, governor supplied must be fitted and must be adequately supported and accessible to facilitate adjustment.

DO NOT fit a governor on Propane gas installations. Purge installation and check gas tightness see IGE/UP/1.

### 2.3 CONNECTION TO AN ELECTRICITY SUPPLY

Not applicable to these appliances.

### 2.4 CONNECTION TO A WATER SUPPLY

Not applicable to these appliances.

### 2.5 PRE-COMMISSIONING CHECK

#### 2.5.1 Setting the Gas Pressure

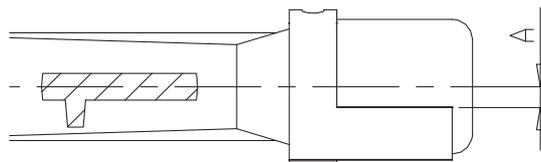
Connect a suitable pressure gauge to pressure test point and check pressure is as stated in Section 1.9.

All burners on natural gas appliances must be lit when pressure is set to 15 mbar at the supplied governor.

#### 2.5.2 Aeration Setting (not G3441)

Burner aeration is factory set, but if adjustment is required it may be achieved by means of the shroud at the burner inlet. Check that burner flames remain stable during ignition, cross lighting and operation of thermostatic control. Yellow tipping of flames is not acceptable on natural gas models, however a small yellow tip is acceptable on propane.

**Note:** Griddle plate must be tilted as detailed in Section 3.1.2. Care must be taken as plate is very heavy.



Gas Type	Dimension 'A'
Natural	5mm
Propane	fully closed

#### 2.5.3 Aeration Setting (G3441)

Replace shroud as per gas type.

#### 2.5.4 Gas Tightness

After installation, the engineer responsible should check that all connections are gas sound and ensure that unit is operating satisfactorily before leaving premises.

### 2.6 INSTRUCTION TO USER

After installing and commissioning appliance, please hand User Instructions to user or purchaser and ensure the person(s) responsible understands the instructions for lighting, cleaning and correct use of appliance. It is important to ensure that location of gas isolating cock is made known to user and that procedure for operation during an emergency is demonstrated.

Advise User that unit and installation should be SERVICED and INSPECTED REGULARLY as recommended on title page of this document.

## SECTION 3 - SERVICING and CONVERSION

### Important

BEFORE ATTEMPTING ANY SERVICING, ENSURE THAT ISOLATING COCK IS TURNED OFF AND THAT IT CANNOT BE INADVERTENTLY TURNED ON.

AFTER ANY MAINTENANCE TASK, CHECK THE APPLIANCE TO ENSURE THAT IT PERFORMS CORRECTLY AND CARRY OUT ANY NECESSARY ADJUSTMENTS AS DETAILED IN SECTION 1.

After carrying out any servicing or exchange of gas carrying components - **ALWAYS CHECK FOR GAS TIGHTNESS!**

Take care when removing griddle plates they are heavy items.

**G3441 Griddle plate – 23kg**

**G3641 Griddle plate – 35kg**

**G3941 Griddle plate – 53kg**

### 3.1 GAS CONVERSION

For conversion to NATURAL GAS, add correct governor and set burner pressure.

For conversion to PROPANE GAS, remove governor from gas circuit.

Conversion kits with full fitting instructions are available upon request.

Other considerations CHANGE INJECTORS CHANGE BY-PASS SCREW

CHANGE BURNER AERATION SETTING (3641/3941)

CHANGE BURNER AERATION SETTING (3441)

Refer to Section 2.5.2. CHANGE DATA PLATE

#### 3.1.1 Removal of Control Panel

- a) Remove jug and control knobs.
- b) Remove 3 x fixings from below hob rail.
- c) Undo but do not remove fixings below control panel.
- d) Draw panel underside out from fixings and tilt until upper tabs come free.
- e) Remove ignition cables from spark igniters.
- f) Replace in reverse order.

#### 3.1.2 Removal of Griddle Plate

- a) Remove control panel as detailed in Section 3.1.
- b) Undo fixings for griddle plate capping channel and remove capping channel.
- c) Lift griddle from seal and pull it forward approx. 50mm.
- d) Tilt front of plate up and support it at both ends.
- e) Remove thermostat phial clamping plates.
- f) Feed thermostat phials through phial holes.
- g) Remove griddle plate from the appliance.
- h) Replace in reverse order.

#### 3.1.3 Change of burner Injectors

- a) Remove steel griddle plate as detailed in Section 3.1.2.
- b) Remove burners.
- c) Remove Injectors.
- d) Fit replacement injectors.
- e) Replace burners.
- f) Replace steel griddle plate.

#### 3.1.4 Change of Pilot Injector

- a) Remove control panel as detailed in Section 3.1.1.
- b) Remove pilot pipe from pilot assembly.
- c) Remove pilot injector from pilot pipe.
- d) Fit replacement injector to pilot pipe.
- e) Replace pilot pipe.
- f) Replace control panel.

### 3.1.5 Change of Bypass Screw

- a) Remove control panel as detailed Section 3.1.1.
- b) Remove bypass screw from thermostat.
- c) Fit replacement bypass screw to thermostat.
- d) Replace control panel.

### 3.2 THERMOCOUPLE

To remove proceed as follows:-

- a) Remove control panel as detailed in Section 3.1.1.
- b) Undo tubing nut at pilot assembly and gas control.
- c) Manoeuvre thermocouple clear.
- d) Replace in reverse order.

When fitting a replacement thermocouple, coil excess in a similar manner to original and take care not to bend capillary to less than 12mm radius.

### 3.3 THERMOSTAT

To remove thermostat, proceed as follows:-

- a) Tilt griddle plate up and remove thermostat phial as detailed in Section 3.1.2.
- b) Undo nut fixing burner feed pipe to control.
- c) Remove thermocouple nut.
- d) Remove pilot pipe from control.
- e) Remove bolts retaining control to float rail.
- f) Manoeuvre control to removal pilot tubing nut.
- g) Withdraw thermostat and phial.

Replace thermostat and re-assemble in reverse order.

When replacing control, ensure sealing gasket is in a serviceable condition and check for gas tightness.

To clean and lubricate tap, proceed as follows:-

**Note** - Plugs and bodies are machined in pairs and are therefore not interchangeable. Always clean one tap at a time.

- g) Remove front securing plate fixings while holding plate against internal spring pressure.
- h) Withdraw plate carefully, complete with operating spindle.
- j) Withdraw exposed rod, spring, brass washer and sealing washer, taking care not to lose any small parts.
- k) Withdraw plug and clean with a soft rag. Also wipe mating hole in control body. Ensure grease does not block plug hole and in particular the holes within tap body as this may reduce gas rate.

Sparingly regrease plug with an approved heat resistant grease. Re-assemble strictly in reverse order, taking care with central pin assembly i.e. fit spring to pin first then brass washer and finally rubber sealing washer. When inserting into plug, ensure sealing washer fits snugly into recess in bottom of hole in plug.

When reassembling operating spindle, ensure niting pin engages in plug slot. When replacing control, ensure sealing gasket is in a serviceable condition and check for gas soundness. Take care not to bend thermocouple capillary to less than 12mm radius.

### 3.7 GOVERNOR

This applies to NATURAL GAS APPLIANCES ONLY.

The type of governor supplied is maintenance free. Check blue dust cap that covers vent is fitted and in good condition as this protects breather hole.

## SECTION 4 - SPARE PARTS

When ordering spares, always quote the appliance type and serial number.

This information will be found on the data plate.