

## Installation / Service Instructions

**DS 1900**  
Gas Fireplace

**Important:**

The appliance shall be installed in accordance with;

- This installation instruction booklet
- Local gas fitting regulations
- Municipal building codes
- Electrical wiring regulations
- Any other relevant statutory regulations
- AS/NZS 5601.1:2013 Gas Installations

**WARNING:**

This appliance must be installed by a qualified person.

DO NOT SPRAY AEROSOLS IN THE VICINITY OF THIS APPLIANCE WHILE IT IS IN OPERATION.

DO NOT USE OR STORE FLAMMABLE MATERIALS IN OR NEAR THIS APPLIANCE.

DO NOT PLACE ARTICLES ON OR AGAINST THIS APPLIANCE.

DO NOT MODIFY THIS APPLIANCE.

This appliance is not intended for use by young children or infirm persons unless they have been adequately supervised by a responsible person to ensure that they can use the appliance safely.

Young children should be supervised to ensure that they do not play with the appliance.

Failure to follow these instructions could cause a malfunction of the heater, which could result in death, serious bodily injury, and/or property damage. Failure to follow these instructions may also void your fire insurance and/or warranty.

**Who can install this product:**

Installation must be carried out by a registered installer who, on completion of the installation, must issue a:

AUS: Certificate of Compliance

NZ: Certificates that comply with the latest legislation in accordance with national and/or local codes. If these are not issued then the Escea warranty may be void.

**Warranty Repair and Annual Servicing:**

Warranty repair work must be carried out by a recognised gas fire technician. It is recommended that recognised Escea Gas Fire Technicians are also used to carry out annual servicing requirements (particularly during the warranty period). For contact details of recognised Escea Gas Fire Technicians in your area, or for replacement parts, please contact the retailer from whom the appliance was purchased.

The heater must be installed according to these instructions and in compliance with all relevant: building, gas fitting, electrical and other statutory regulations (eg. AS/NZS 5601). Any shortcomings in the appliance and flue installation will be the responsibility of the installer, and Escea will not be accountable for any such failings or their consequences.

Manufactured by: Escea Ltd, PO Box 5277 Dunedin NZ, Ph: +64 3 478 8220. For contact details of your local Escea distributor or dealer in New Zealand, please visit: [www.escea.com](http://www.escea.com) or email: [info@escea.com](mailto:info@escea.com). From Australia, please visit [www.escea.com.au](http://www.escea.com.au), call AU: 1800 460 832 or WA: 1800 730 140, or email us at [info@escea.com](mailto:info@escea.com)

# DS1900 PRODUCT SPECIFICATION

MODEL NAME		DS1900		
Description of Appliance		Gas Fire Heater		
Star Rating		3 Stars		
A/NZ Approval No.		AS/NZS 5263.1.3:2016		
Gas Type		Natural	Propane	ULPG
Gas input	High	49 MJ/hr	47 MJ/hr	47 MJ/hr
	Low	37 MJ/hr	34 MJ/hr	34 MJ/hr
Inlet Pressure	Max	5 kPa	5 kPa	5 kPa
	Min	1.13 kPa	2.75 kPa	2.75 kPa
Operating Pressure on High		0.82 kPa	1.79 kPa	1.79 kPa
Operating Pressure on Low		0.43 kPa	0.88 kPa	0.88 kPa
Burner Jet Size		LH & RH: 1.95mm Middle: 2.1mm	LH & RH: 1.1mm Middle: 1.4mm	LH & RH: 1.1mm Middle: 1.4mm
Burner Aeration		LH & RH: Closed Middle: Closed	LH & RH: 2 x 4mm Middle: 2 x 12mm	LH & RH: 2 x 6mm Middle: Spacer
Pilot injector		#37	#27	#27
Appliance Dimensions (mm)	Width	2277mm		
	Height	866 mm		
	Depth	380 mm		
Weight	Kg	160 kg		
Ignition System		Electronic Ignition to pilot system Escea PCB		
Ignition Activation		35 secs (approx)		
Flame Safeguard		Flame Rectification		
Consumption		160W @ 0.69A 230V		
Remote controls		Yes		
Timers		Yes		
Clock		Yes		
Function lock / child		Yes		
Temperature control		Yes		
Connections	Electric	240V AC		
	Gas	1/2" BSPF female lower centre of fireplace chassis		
	Flue Type	Aluminium Flexi Flue, and PolyPro, and coaxial rigid duravent		
	Flue Size	75mm and 100mm Flexi Flue & PolyPro, 5" x 8" duravent		
	Spigot Location	Right hand top		
Data badge location		On Chassis Base		

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# A Product Description and Installation Process

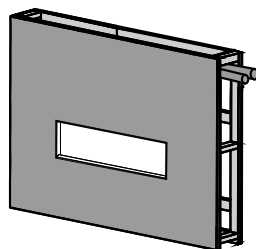
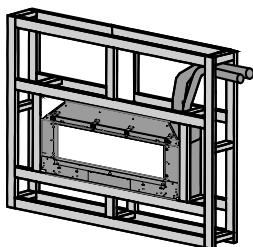
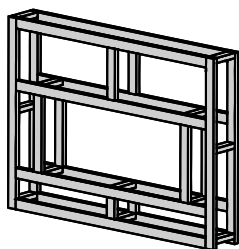
## A1 Product Description

The Escea DS1900 gas fire is a room sealed gas appliance designed to be built into a false cavity. The appliance is flued using co-linear flexible aluminium flue and PolyPro plastic piping beyond 4m. The user will control their fire with the Radio Frequency (RF) remote that will normally be located in its wall mount cradle. In addition to the RF remote the appliance has a single auxiliary On/Off button on the unit. When not in operation it is in a standby mode unless it is physically isolated from the mains supply.

## A2 Recommended Install Process

The following diagram illustrates the steps required to install your gas fire. The sequence in which you choose to do these tasks will vary depending on your individual scenario. Please read these instructions fully before proceeding with the installation.

### False Cavity Installation



**Create the Cavity**

**Install electrical / gas connections, flue system, and fireplace**

**Finish installation and fit fascia**

Section B

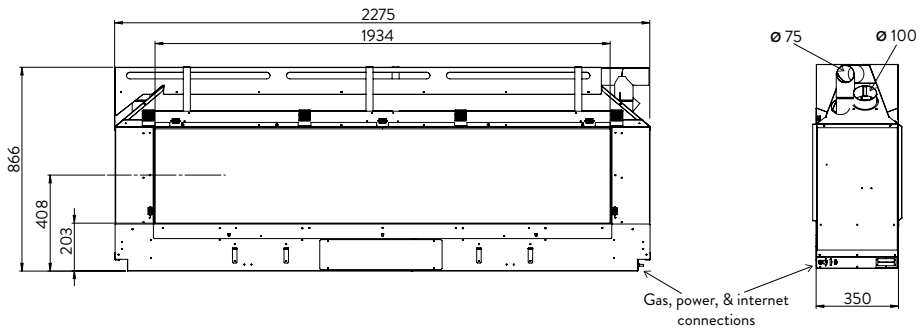
Section C, D

Section F

### A3 Product Dimensions

NOT TO BE MISTAKEN FOR CAVITY DIMENSIONS

All dimensions are in mm.



For more detail, view architectural drawings at [www.escea.com](http://www.escea.com) or [www.escea.com.au](http://www.escea.com.au)

# B Creating the Cavity

## B1 Cavity Shape

The DS1900 is suitable for timber framed cavities.

Most existing masonry cavities will not be suitable.

## B2 Designing the Cavity

The following aspects must be considered when designing this installation:

- Appliance physical size
- Single sided or double sided
- Wall finishing and interaction with appliance
- Positioning of appliance in regards to wall lining (depth into wall)
- Use of a fascia - one side or two sides?
- Exhaust termination aspect – horizontal / vertical and flue configuration
- Flue exhaust fan noise
- Exhaust cowl access for maintenance
- Gas pipe layout
- Gas isolation valve / pressure test point position
- Electrical isolation switch
- Home automation network connections - ethernet cable layout

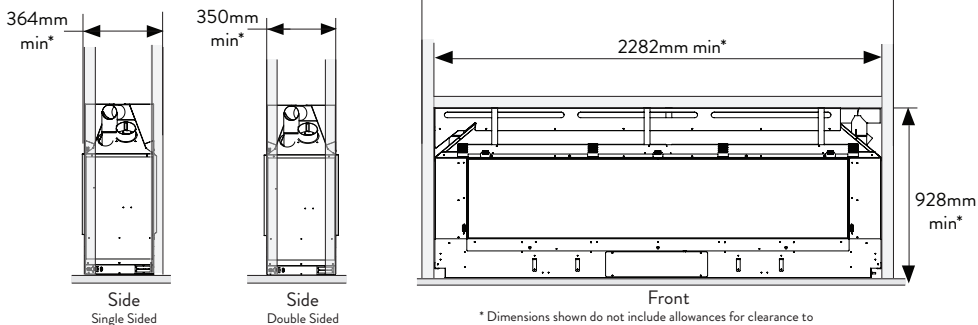
**The DS1900 fire is to be installed prior to any wall lining.  
The wall lining is the very last task to be completed in this installation.**

The cavity and wall linings may be constructed from standard timber framing materials and do not need to be non-combustible.

Do not line the top of the cavity.

It is not necessary to line the sides or back of the cavity.

## Minimum Framing Dimensions



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### B3 Hearth

A hearth is not required.

### B4 Cavity Base

This appliance **MUST** be fully supported on its base, over the entire area of the underside of the appliance. The base must also be level and strong enough to support the total product weight, which is approximately **160kg**.

The fireplace can be recessed into the ground but must maintain clearances detailed in the diagram (shown right) for any combustible flooring materials.

*NOTE: A recessed floor is required to install the fire with the opening less than 200mm above the floor.*



### B5 Wall Lining

Only after all applicable sections up to section F5 on page 42 have been completed is it permissible to commence with the final wall linings detailed in section F6 on page 43. Wall lining cutout dimensions around the glass must be adhered to.

Please refer to section F6 on page 43 for wall finishing dimensions surrounding glass.

### B6 Television & Mantel Clearances

#### Television

The diagram (shown right) shows the recommended minimum clearances for the location of any electrical equipment (such as Plasma TV, LCD TV or home theatre) above a DS Series gas fire. A mantel/recess is not required to comply with our recommendation of TV installation.

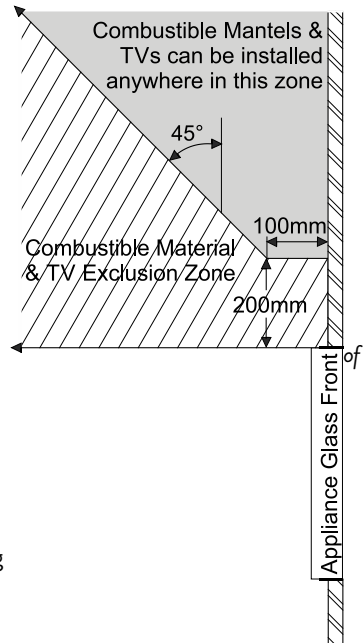
*NOTE: Dimensions are from the top edge of the glass frame.*

*NOTE: The television clearance recommendations are to be treated as a suggestion of a suitable installation only. It is the responsibility of the end user to check the installation instructions their electrical appliances to ensure that the location in relation to the gas fire is suitable. Escea in no way guarantees or takes responsibility that the recommended installation suggestion will be suitable for all electrical or home entertainment appliances.*

#### Mantel

Please refer to the diagram (shown right). Mantels or protruding ledges above the heater must not be installed lower than the dimension shown.

*NOTE: Dimension are from the top edge of the glass frame.*



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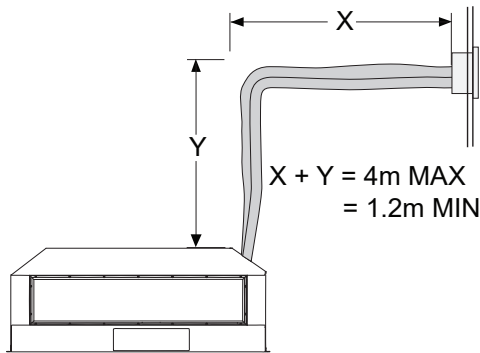
# C Installing the Flue

## C1 Flue Configuration (If less than 4m flue length is required)

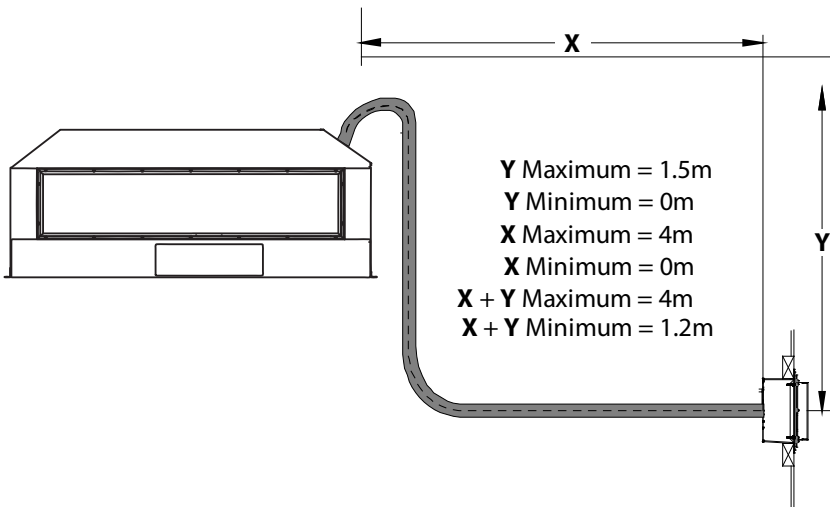
If your flue system is less than 4m long (as shown in diagrams below), then a simple aluminium flexible flue is required. If you wish to install a longer flue run, up to 12m, see section C2 on page 12.

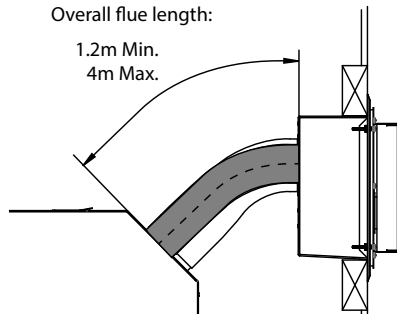
**Horizontally Terminated:** Utilises the Escea horizontal power flue enclosure kit.

The horizontal offset of the terminal can be any amount up to the total flue length listed below. Please consult with Escea's technical staff if your intended flue configuration falls outside of the bounds of the flue configurations shown below.

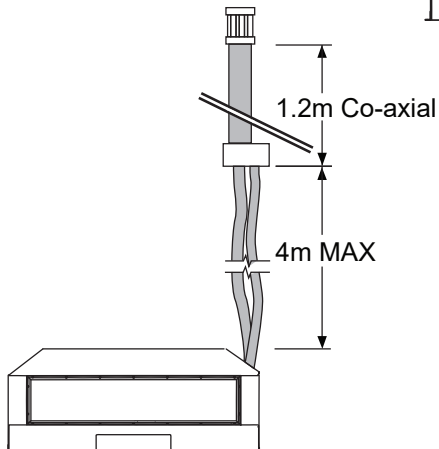
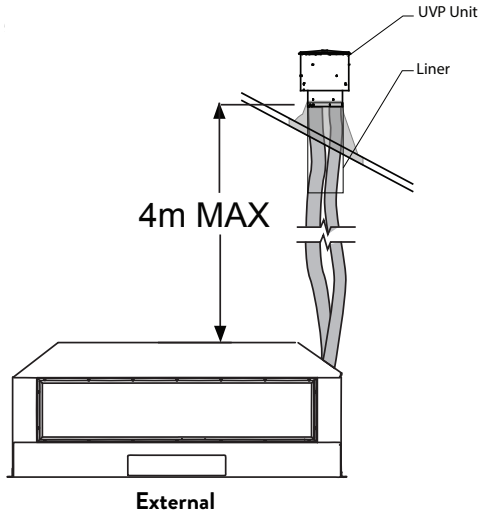
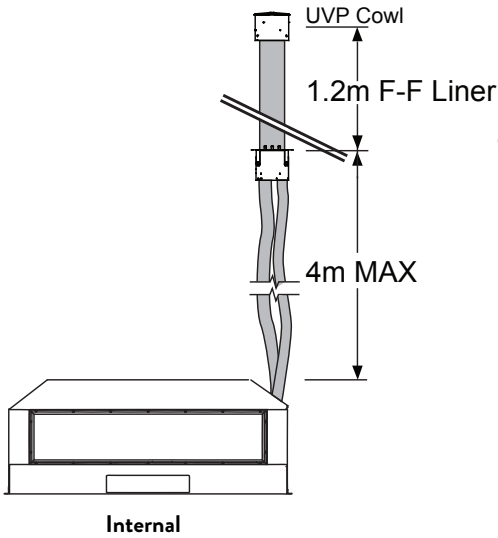


*NOTE: When flueing above the fire, the pipe must slope towards fire - NOT towards the terminal. Also when flueing below the fire, the pipe must slope towards the terminal - NOT towards the fire.*





**Vertically Terminated:** Utilises the Escea universal vertical power flue enclosure kit.

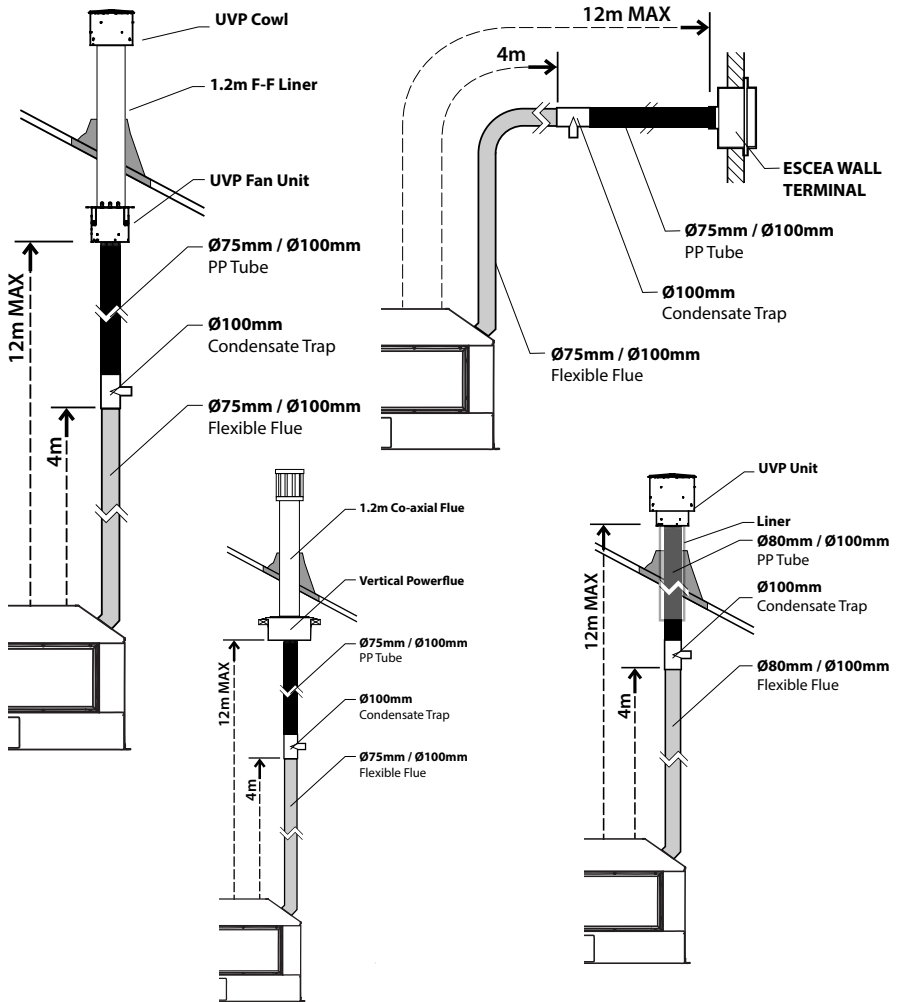


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## C2 Flue Configuration (If more than 4m flue length is required)

If your flue system is greater than 4m long (as shown in diagrams below), then a flexible flue with condensate trap and rigid PolyPro tube flue lengths is required.



**FOR MORE INFORMATION ON INSTALLATION OF THE POLYPRO FLUE, SEE 'POLYPRO FLUE INSTALLATION INSTRUCTIONS' AVAILABLE ON:  
WWW.ESECA.COM  
OR SUPPLIED WITH THE FLUE.**

**FOR POLYPRO COMPONENT GUIDES, THESE ARE AVAILABLE ON:  
WWW.ESECA.COM  
TITLED:  
HORIZONTAL FLUE COMPONENT GUIDE &  
VERTICAL FLUE COMPONENT GUIDE**

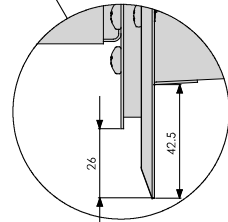
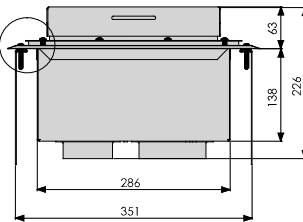
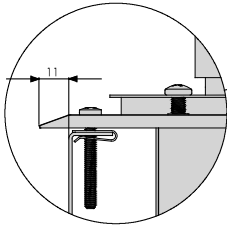
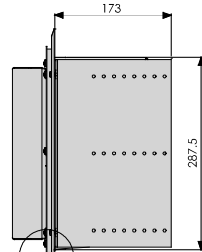
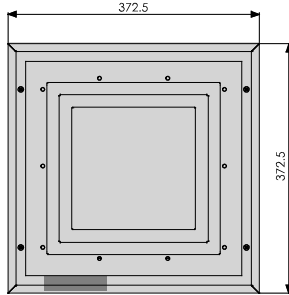
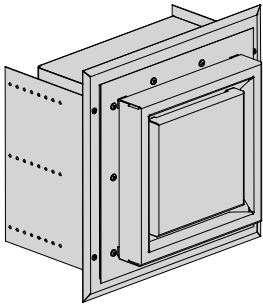
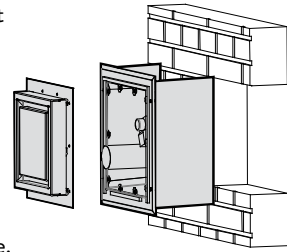
### C3 Installing the Horizontal Powerflue Wall Terminal option

The horizontal powerflue wall terminal must be installed in the correct orientation. This allows for the correct operation of the flue system and prevents the ingress of water.

The horizontal powerflue wall terminal must be weather-tight when installation is complete to prevent damage to the dwelling. It must be installed by a suitably qualified person.

Fit the horizontal powerflue wall terminal into the hole and fix in place, making sure the installation is sealed appropriately to prevent the ingress of water from outside the wall cladding. Take notice of the label on the termination which shows the correct orientation of the terminal.

*Note: It is the responsibility of the installer to ensure the horizontal powerflue wall terminal is installed to all relevant building codes to ensure weather tightness.*

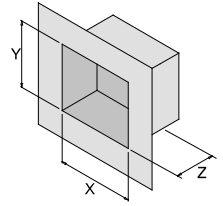


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## Creating the Hole in the Outside Wall

When cutting the hole in the outside wall, be mindful of how the installation of the horizontal powerflue wall terminal will be finished; the installation must be weatherproof.



### Ideal Hole/Cavity Size for Horizontal Powerflue

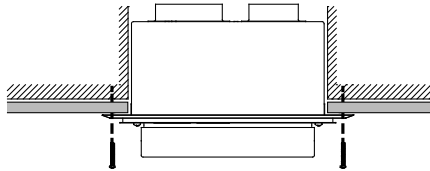
	Without Side Brackets	With Side Brackets
X	298mm	360mm
Y	298mm	298mm
Z	175mm Excluding allowance for flue which exits here	

B

The horizontal powerflue wall terminal can be attached to the wall in two ways:

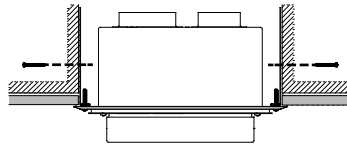
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A) From the front of the terminal:



D

B) By attaching the optional wall terminal installation brackets to the sides of the cavity and attaching the horizontal powerflue wall terminal to these, from the front:



E

Attach the Ø100mm and Ø75mm flexible aluminium flues to the spigots on the rear of the horizontal powerflue wall terminal using the hose band clamps supplied. Plug the powerflue electrical cable into the back of the horizontal powerflue wall terminal.

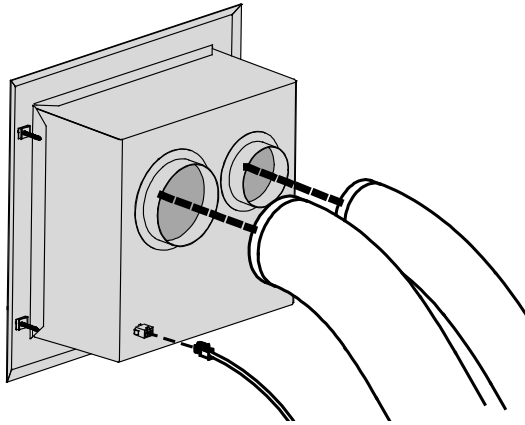
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For information on the PolyPro flue, see the installation manual which is supplied with the flue components.

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Ensure that the electrical cable is firmly secured to the wall terminal or building to prevent damage or disconnection if pulled.

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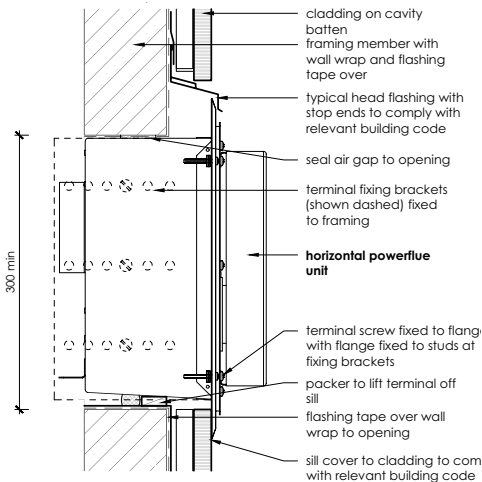
Fit the horizontal powerflue wall terminal into the hole and fix it in place, making sure the installation is sealed appropriately to prevent the ingress of water from outside the wall cladding.

*Note: It is the responsibility of the installer to ensure the horizontal powerflue wall terminal is installed to all relevant building codes to ensure weather tightness. This may necessitate the use of appropriate flashing material where appropriate.*

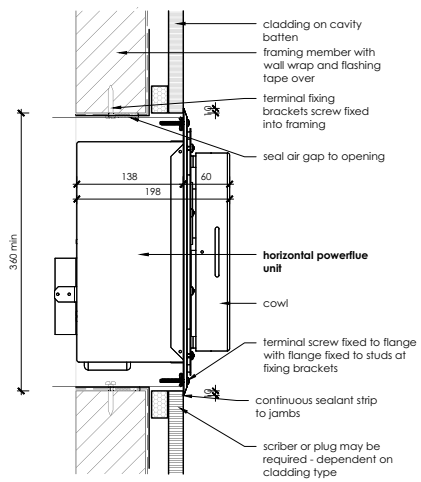
**IMPORTANT:** Ensure that flashings do not restrict the air intake slot around the periphery of the cowl.

### How to Flash the Horizontal Powerflue

The following diagrams are excerpts from the Escea architect drawings and are available in full on our website. These diagrams are recommendations, and your installation must comply with any local or national building codes.



Head and Sill scale 1:5



Jamb scale 1:5

## C4 Installing the Internal Vertical Powerflue

The internal vertical flue option is designed to have the box containing the fan and electricals mounted within the roof space of the house, and the vertical 200mm diameter twin wall flue penetrate through the roof. The standard kit comes with 1.2m of twin wall flue (post fan). Note total combined maximum vertical flue before the fan must be less than 12metres (max 4m Flexi+ max 8m polypro).

Use standard methods to flash the roof penetration, the installation must be weather proof and conform to all local council standards including powered flue roof termination rules.

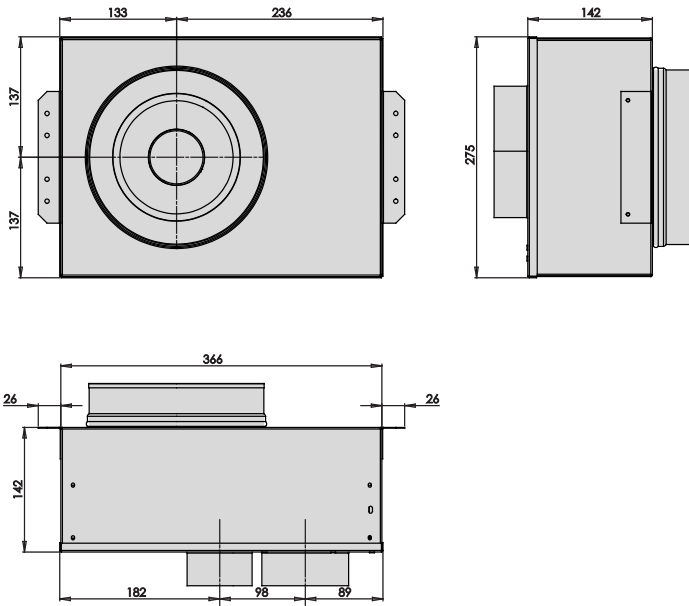
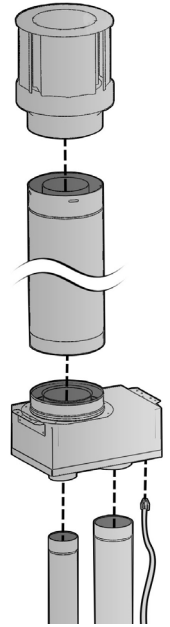
The cowl surround should be fixed in place as shown

Mount the fan assembly box to roof framing using timber or builders strapping, ensuring the flue is vertical and rigidly mounted.

Aim to have the fan box mounted as high as possible, mainly to allow sufficient fall for condensation drainage if the flexi-flue is to run horizontally.

Ensure there is sufficient space below fan box to have access to fit the flexi-flue tubes and to allow flowing bends if required.

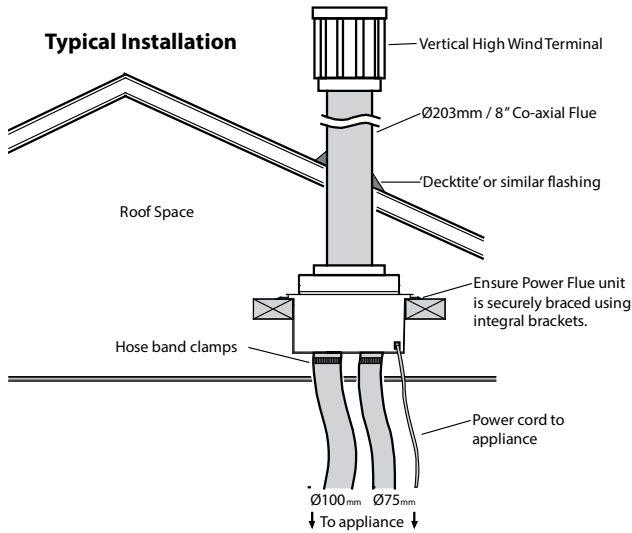
**Note: The vertical powerflue and the flexi flue connections must be installed in a location accessible for service or replacement, a service hatch or removable flashing to allow access may be required.**





The vertically terminated flue kit is intended for use within an accessible roof space or accessible 'chimney' construction. Service access must be provided.

Ensure installation complies with relevant building codes and regulations.



## C5 Installing the Universal Vertical Powerflue (Internal Install)

*Note: For information regarding an external install of the UVP, go to section C7 on page 19.*

The Universal Vertical Powerflue (UVP) internal configuration is designed to have the fan, mounted within the roof space of the house, and the vertical  $\text{Ø}225\text{mm}$  diameter liner, containing a  $\text{Ø}100\text{mm}$  flexi, penetrate through the roof. The UVP internal conversion kit comes with a 1200mm liner that is specific to the internal installation and must always be used.

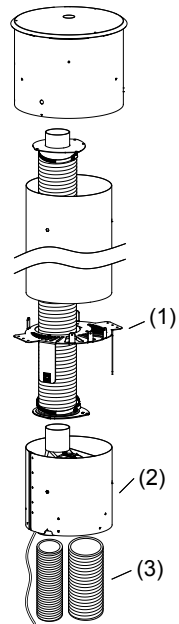
*Note: The flue setup must comply with either section C1 on page 10 or C2 on page 12.*

Use standard methods to flash the roof penetration. The installation must be weatherproof and conform to all local council standards including powered flue termination rules.

Mount the fan mount bracket (1) to the roof framing and strapping using timber ensuring that the flue is rigid and vertical. Ensure that the mounting timber does not obstruct access to the 3xM5 screw threads on the side of the fan unit.

Aim to have the fan enclosure (2) mounted as high as possible, mainly to allow sufficient fall for condensation drainage if the flexi-flue is to run horizontally.

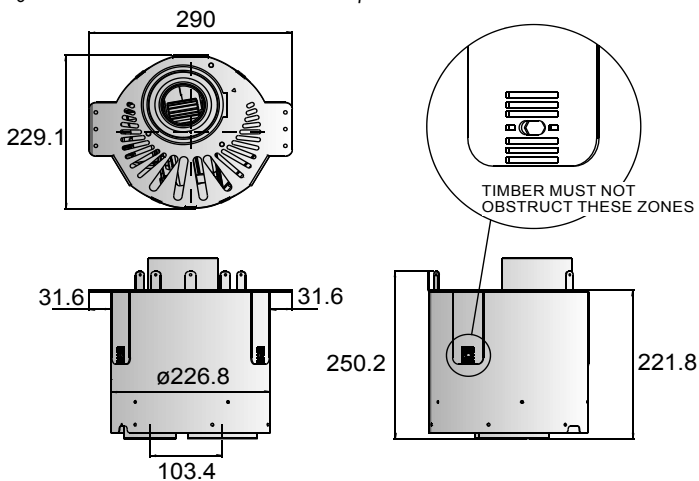
Ensure there is sufficient space below fan enclosure (2) to have access to fit the flexi-flue tubes (3) and allow flowing bends if required.



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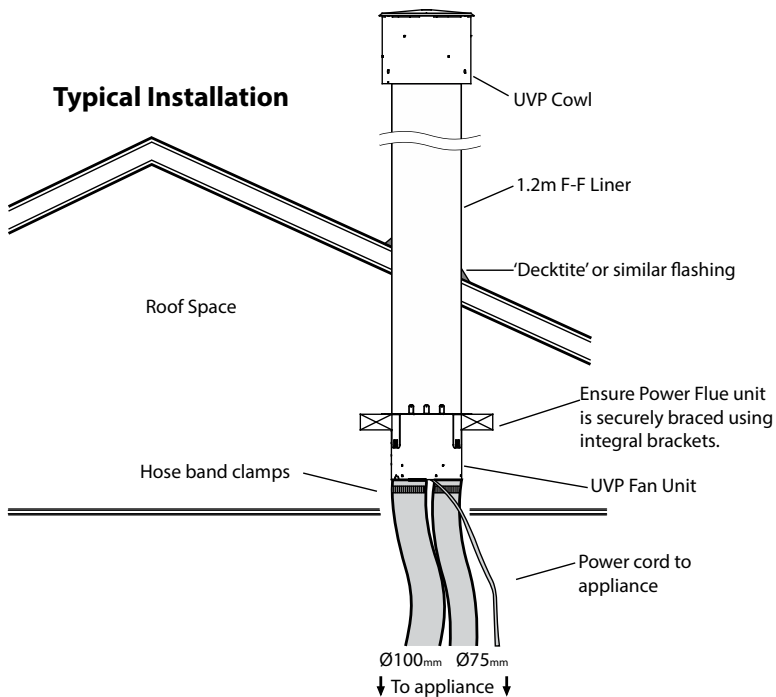
Note: The UVP-Internal and the flexi flue connections must be installed in a location accessible for service or replacement; a service hatch or removable flashing to allow access may be required.

Note: When installing the unit onto a flue liner, ensure the length of flue liner above the roof is the minimum required length. **ENSURE** the Ø25mm restriction plate is installed on the inlet.



The UVP-Internal kit is intended for use within an accessible roof space or 'chimney' construction. Service access must be provided.

Ensure installation complies with relevant building codes and regulations



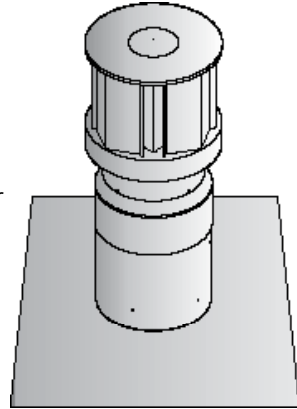
## C6 Installing the External Vertical Powerflue (EVP)

The EVP is designed to have the box containing the fan and electricals mounted externally for installations.

The EVP installation must be weather proof and conform to all local council standards including powered flue roof termination rules.

The cowl surround should be fixed in place as shown.

Depending on the kit purchased, mount the EVP kit to the top of a chimney flashing plate or penetrate the roof with an optional flue liner accessory and fit the EVP kit over the flue liner; sealing the penetration with a decktite or similar flashing. Ensure the terminal is vertical and rigidly mounted and the flexi flue attached below is fixed to the terminal spigots using the supplied hose clamps and is held in place by drilling 3 holes and screwing 3 self tapping screws evenly around each hose band clamp (as shown in the picture below).

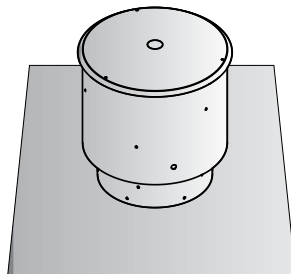


## C7 Installing an Universal Vertical Powerflue (External Install)

*Note: For information regarding an internal install of the UVP, go to section C5 on page 17.*

The UVP is designed to have the enclosure containing the fan unit mounted externally.

The cowl surround should be fixed in place as shown.



Mount the UVP kit to the top of a chimney flashing plate or penetrate the roof with an optional flue liner accessory and fit the UVP kit over the flue liner, sealing the penetration with a decktite or similar flashing. Ensure the terminal is vertical and rigidly mounted, the flexi flue attached below is fixed to

the terminal spigots using the supplied hose clamps. The flexi flue is held in place by drilling 3 holes and screwing 3 self tapping screws evenly around each hose band clamp (as shown in the picture below).

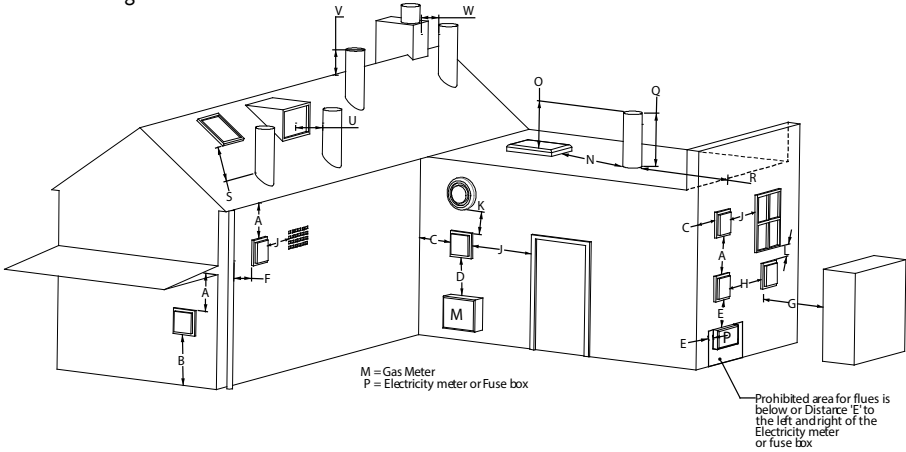
*Note: When installing the unit onto a flue liner, ensure the length of flue liner above the roof is the minimum required length. ENSURE the Ø25mm restriction plate is installed on the Inlet.*



## C8 Installing in Accordance with Relevant Codes

The location of the horizontal powerflue wall terminal must be installed in accordance with AS/NZS 5601 and any other relevant building codes. If possible, avoid installing the horizontal powerflue wall terminal in areas exposed to high winds and extreme weather.

Some of the minimum clearances for a fan assisted wall terminal are listed below; please refer to AS/NZS 5601 Gas installation standard for full guidance on the design of the flue system. Where possible allow a greater clearance.



A	Below eaves, balconies and other projections	200mm
B	From the floor, above a balcony or other surface	300mm
C	From a return wall or external corner	300mm
D	From a gas meter or regulator vent	1000mm
E	From electricity meter or fuse box	500mm
F	From a drain pipe or soil stack	75mm
G	Horizontally from any building structure or obstruction	500mm
H	From any other flue terminal or combustion air intake	300mm
J	Horizontally from any moving window, door, non-mechanical air inlet, or any other opening into a building with the exception of sub floor ventilation	300mm
K	From a mechanical air inlet or spa blower	1000mm
L	Vertically below any moving window, door, non-mechanical air inlet, or any other opening into a building with the exception of sub floor ventilation	300mm
N	Horizontally from a roof light	600mm
O	Vertically from a roof light	500mm
Q	Vertically from a flat roof	500mm
R	Horizontally from a vertical structure	500mm
S	Below a roof window	2000mm
T	Above or either side of a roof window	600mm
U	From a dormer window	1500mm
V	Above the apex of the roof (see note 1 on following page)	300mm
W	From an open flue	1500mm

Notes:

- 1) Should the flue not extend past the apex of the roof, the bottom opening of the flue should extend at least 200mm from the roof (or 300mm in regions with heavy snow).
- 2) The installation of a flue into a carport is not recommended.
- 3) The flue terminal will get very hot when in use. Precautions should be taken to protect people and animals from injury.

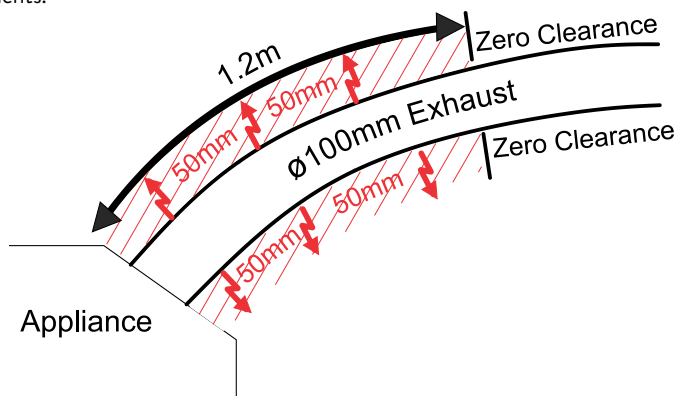
## C9 Running the Flue

**A 50mm clearance to combustibles must be maintained from the exhaust flue for the first 1.2m of flexi flue from the appliance (see diagram below).**

Run the  $\varnothing 100\text{mm}$  and  $\varnothing 75\text{mm}$  flexible aluminium hoses from the cavity to the rear of where the horizontal or vertical powerflue terminal will be installed. Allow enough stretch in the flexible aluminium flue to allow it to protrude through the wall/ceiling/roof/flue liner to enable it to be connected to the powerflue terminal. The flue should be expanded at each end in order for the flue to be attached to the fire/powerflue. It is advisable to secure the flexi flue at regular intervals to prevent vibration, movement and sagging. Steel wire or 'builders strapping' may be used for this purpose.

*Note: The flexible flue is shipped in a 'compressed' form. Extend it to your desired length by stretching.*

For information on running the PolyPro flue, see the installation manual which is supplied with the flue components.



**FOR MORE INFORMATION ON INSTALLATION OF THE POLYPRO FLUE, SEE  
'POLYPRO FLUE INSTALLATION INSTRUCTIONS' AVAILABLE ON:  
[WWW.ESCEA.COM](http://WWW.ESCEA.COM)  
OR SUPPLIED WITH THE FLUE.**

**FOR POLYPRO COMPONENT GUIDES, THESE ARE AVAILABLE ON:  
[WWW.ESCEA.COM](http://WWW.ESCEA.COM)  
TITLED:  
HORIZONTAL FLUE COMPONENT GUIDE &  
VERTICAL FLUE COMPONENT GUIDE**

## C10 Running the Powerflue Electrical Cable

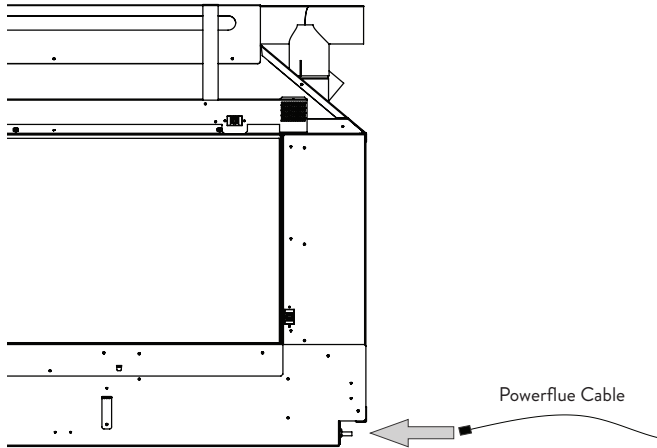
*Note: The powerflue terminal is powered from the appliance and must be connected to the appliance with the supplied electrical cable only.*

*Note: Ensure that the appliance power supply is disconnected before making the connection to the terminal*

The supplied powerflue electrical cable is 7m long; flue extension kits also include a powerflue electrical cable extension.

Run the powerflue electrical cable from the cavity where the appliance will be installed to the hole in the outside wall. Ensure it is not draped over, or in contact with, the outer shell of the appliance or the flues. The cable must be kept clear from any other possible heat sources, sharp edges, or moisture. Fix it appropriately and allow enough cable to be able to pull both the appliance and the powerflue terminal out from their installed positions.

The powerflue electrical cable connects on the lower right hand side of the fire, as shown below.



### END OF SECTION C

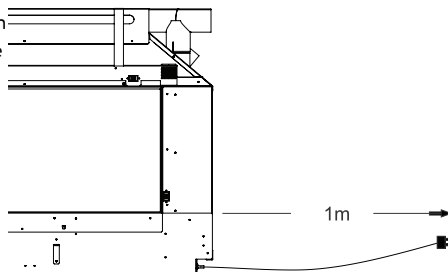
By the end of this section, you should have:

- A weather-tight installed powerflue terminal with clearance as specified by AS/NZ5601
- Reasonable access to the terminal for maintenance purposes
- Flue attached to the powerflue terminal leading back to the appliance with the correct flue clearances
- The electrical cable from the powerflue terminal run back to the appliance cavity in an electrically safe manner

# D Installing the Electricity and Gas to the Appliance

## D1 Power Supply

While the cavity is being created, consideration must be given to the location of an appropriate power supply. An earthed 230/240 volt mains power connection (typically a standard 3 pin outlet) must be available within 1m of the bottom right of the appliance. This connection **must** be accessible after the heater has been fully installed so that the appliance can be safely disconnected from the mains power supply prior to servicing.



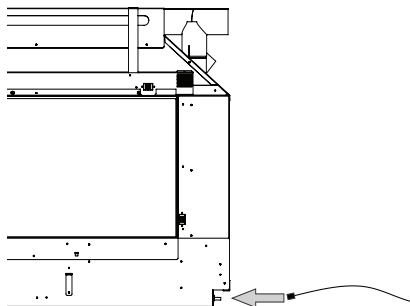
A mains isolation switch (compliant to AS:NZS 5601 Clause 6.2.8) which is accessible from outside the cavity can also be used to disconnect the power.

Regardless of the method used, it **MUST ALWAYS** be possible to safely isolate the electrical supply to the appliance after it has been fully installed.

This appliance must not be located immediately below a socket outlet. This appliance will draw a maximum of 2 Amps from a 230/240V supply. No additional power supply is required for the power flue.

## D2 Network Cable

A 10 metre length of network (ethernet) cable has been supplied. Connect it to the appliance (lower right) and the buildings' modem.



Two network cable access points are available: the primary connection is on the bottom of the RH outer face of the appliance for connecting permanently to the buildings' router; the secondary connection point is located where the AUX button is (shown in section E10) for service technicians to access when the main connection method has not been used and has become inaccessible.

**If you do not wish to connect the fireplace to the modem, the network/ ethernet cable should be run to somewhere accessible by a service technician, such as a cupboard.**



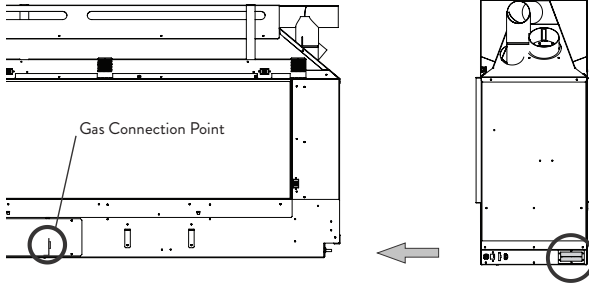
### D3 Gas Pipe Sizing

Gas pipe should be sized as per the requirements of AS/NZS 5601.1. The pipe sizing must be sufficient to deliver the following volume of gas to the heater with all other gas appliances in the home running at the same time:

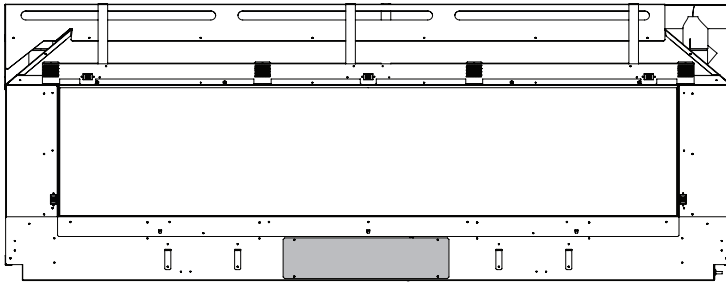
**Maximum DS1900 Gas Consumption = 49MJ/hr**

### D4 Gas Pipe Position

The gas connection is inside the appliance and is 1/2" male BSP on the lower right of the appliance as shown below. Access is through the silicone grommet circled below on the RH side of the chassis.



Access for connecting the gas supply to the gas connection point (shown in the diagram above) should be through the access hatches located on the front and back of the appliance (the front as shaded in the diagram below).



A  
B  
C  
D  
E  
F  
G  
SERVICE

A

B

C

D

E

F

G

SERVICE

## D5 Gas Isolating Valve

A gas isolating valve must be installed in the gas line as close to the appliance as possible. Fix it in a convenient position to allow it to be closed off quickly and easily during normal operation. Take into consideration access to this valve once the wall linings are on. This will also allow for easier servicing in the future.

### END OF SECTION D

By the end of this section, you should have:

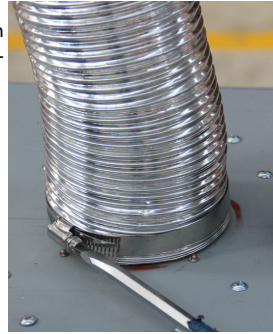
- An unlined cavity with 230/240V AC supply where the appliance can be plugged into an electrical isolating switch that is accessible once the appliance is installed
- A suitably sized gas supply to the right hand side of the appliance with a pressure test point, ready to be connected once installed
- Network cable installed, ready for plugging into appliance, regardless of being connected to Internet router/network

# E Installing the Appliance

## E1 Connecting the Flue

Access the top of the appliance and connect both the inlet flue (Ø75mm ID/85mm OD) and the exhaust flue (Ø100mm ID/110mm OD) to their respective spigots. Tighten the hose clamps onto the spigots. Ensure the flue connection is air tight. Sealant is not required.

**WARNING:** The flue connection **MUST** be secured with the clips provided and **MUST NOT BE USED**. If any of the flue pipe is damaged and integrity compromised then it should not be repaired with tape, it should be replaced.

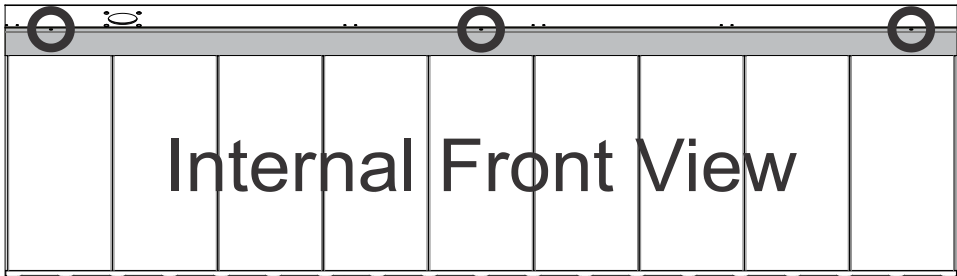


## E2 Installation

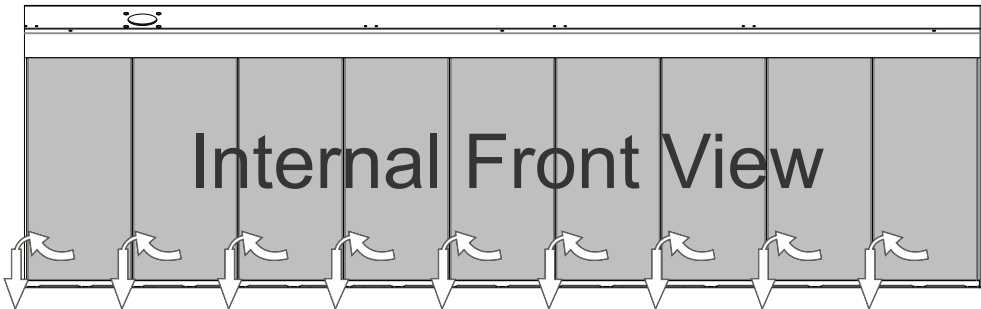
Insert the gas fire into the cavity and fix the appliance down in the correct position using the brackets on each end of the appliance. It is a requirement that this appliance be securely fastened at the base.

## E3 Double Sided conversion

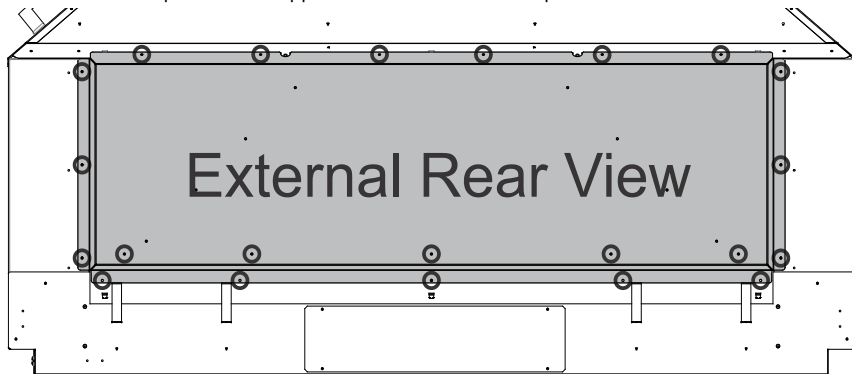
1. Follow sections E5 on page 30, E6 on page 31, and E10 on page 35 to remove the glass, infill, burners, and bottom trim bracket.
2. On the inside of the firebox, slightly loosen the firebox liner bracket (shaded in the diagram below) by loosening—not removing—the 3 screws (circled in the diagram below).



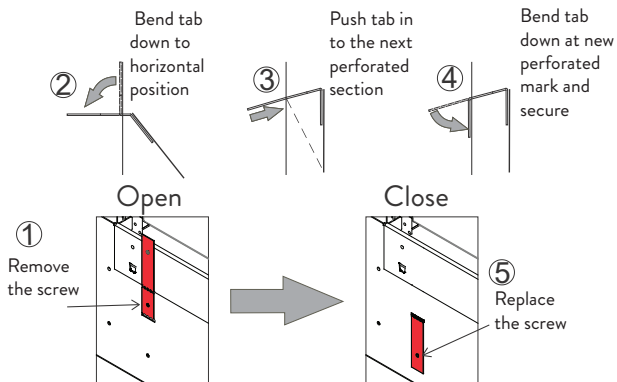
3. Carefully swing the lower edge of each firebox liner towards you and pull down to release each panel (shaded in the diagram below). It may be necessary to slide the firebox liner to the side first.



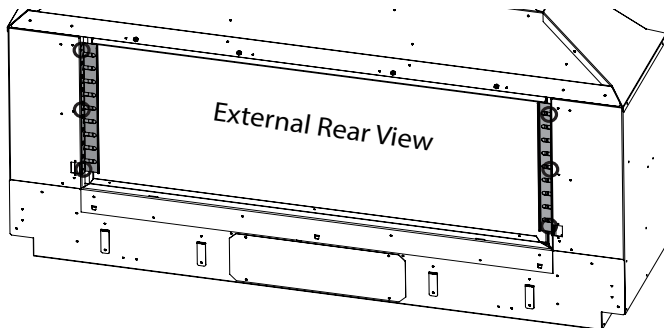
4. Move to the back of the fire for the following steps. Remove the screws (circled in the diagram below) in the back panel of the appliance. Remove the back panel.



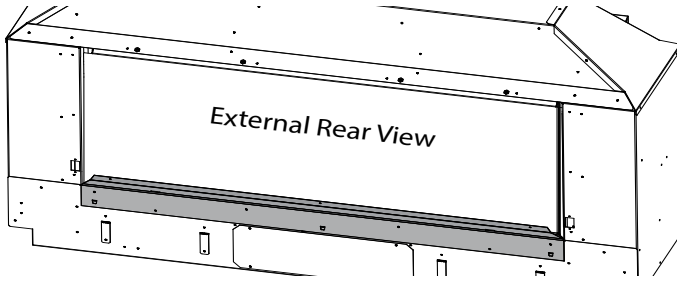
5. On the back of the appliance remove one screw from each of the four red tabs and set each pair of tabs from 'open position' to 'close position' (shown below).



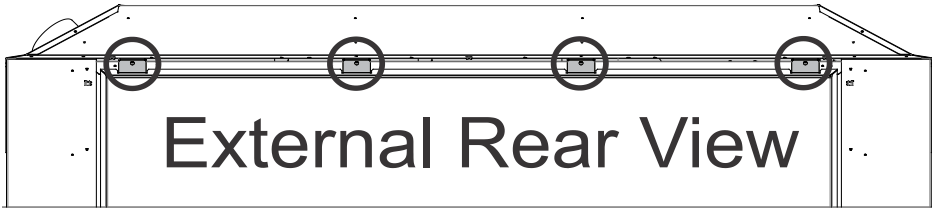
6. Remove the 6 screws in the chassis (shown circled below) and remove the side brackets (shown shaded below) by pulling them in towards the centre of the fire.



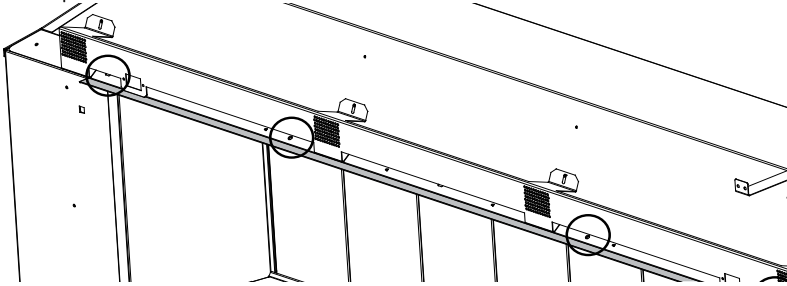
7. Remove the bottom air deflector (shown shaded below).



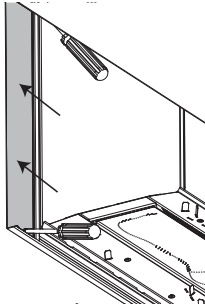
8. Now remove the top bracket by unscrewing the 1/4 turn fasteners (circled below) and allow the panel to lean forward so you may lift the panel out.



9. After removing the components in the previous steps, fix the top trim in place with the black machine screws provided (circled below). The screws are inserted from the inside of the fire.



10. Reinstall the burners and the infill by reversing the steps in E6. Fit the side trims. These are fixed top and bottom with the low profile black self taper screws (see below).

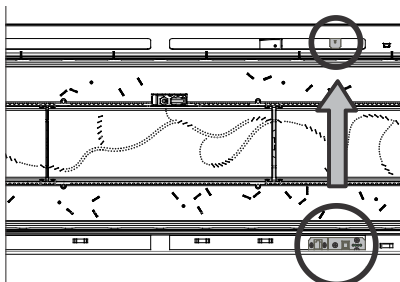


11. Install the fuelbed media as per section F on page 38. Finish the conversion by installing both pieces of glass and both bottom trim brackets.

Note: After any conversion **AIRFLOW MUST NEVER** be coming up the glass from the bottom, it must **ALWAYS EXITING FROM** the top of the glass.

#### **E4 Single Sided Front to Back Conversion (only for single sided fires)**

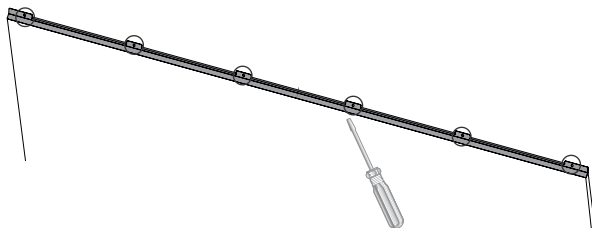
1. Follow section E5 on page 30 and E6 on page 31 to remove the glass, infill, and burners.
2. Remove the rear panels by following steps 2, 3, 4, 6, 7, & 8 from section E3 on page 27 above.
3. Relocate the diagnostic bracket to the opposite side of the appliance by carefully removing the middle screw and feeding it through to the opposite side of the fire (as shown in the diagram below).  
*Note: this step must be completed after preparing the other side of the appliance for either a LH to RH conversion or a double sided conversion.*



4. Carefully remove the bracket in step 2 of section E3 and replace the bracket on the other side of the firebox.
5. Remove the bottom, side and top trim brackets from the front and replace on the rear of the appliance (see steps 9 to 11 from section E3 for more info).
6. Replace all the rear panels (removed in step 2) to the front of the appliance by reversing the procedure in step 2.
7. Using the diagram from step 5 in section E3 above, change the position of the four tabs on the original front side from closed to open. Ensure those on what is now the front are in closed position.

#### **E5 Removing (and Replacing) the Glass**

Remove the glass by unscrewing the six 1/4 turn fasteners located at the top of the glass (circled below) and remove the bracket (shown below shaded grey). Allow the glass to lean towards you and carefully lift it out.

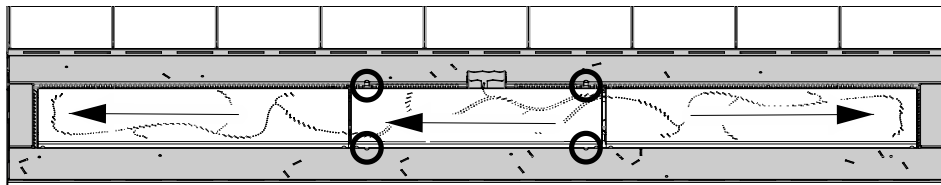


**NOTE:** When replacing the glass, check the channel that the glass sits in for debris that may be sitting on top of the fiberglass tape. Remove any debris prior to placing the glass. If you feel resistance when leaning the glass towards the fireplace, remove it and double check for debris in the glass channel.

**WARNING:** Trying to place the glass with debris in the glass channel may result in the glass breaking.

### E6 Remove the Infill & Burners

Remove the four screws shown in the diagram below. Lift one end of the infill up into the top corner of the firebox and then out towards you, taking care not to scratch the firebox paint and reflective panels. Remove the outer burners first by sliding them away from the centre of the fireplace, followed by the centre burner, which slides out to the left.



### E7 Gas Type Conversion

THIS APPLIANCE IS CONFIGURED TO OPERATE ON NATURAL GAS (NG). For the DS1650, please double check that the configuration of the collars match the fuelbed. For all other fires, if gas type conversion is not required then skip to the next section.

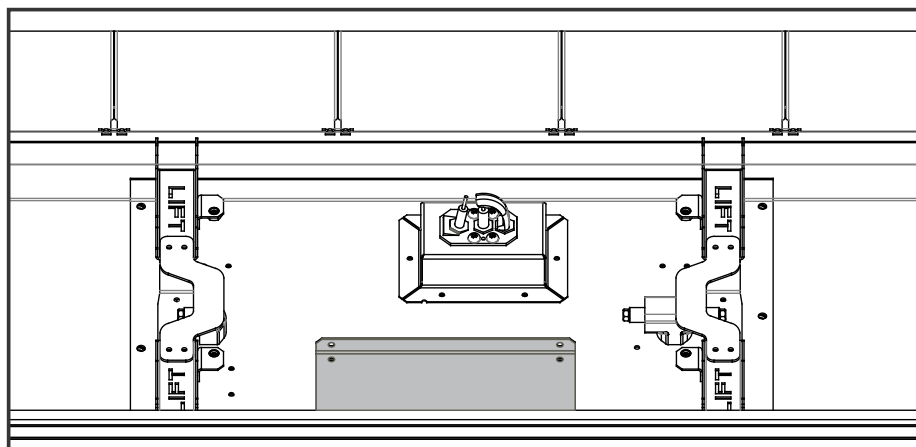
Your gas fire has been supplied with the necessary parts for gas conversion. Follow the steps on the following pages to change from NG to ULPG/Propane or vice versa.

**WARNING:** The regulator that is supplied with the fire **MUST NOT BE REMOVED**.

Removal of the regulator, or replacing it with one not intended for use with this Escea fire, will void the limited appliance warranty.

Turn off power and gas first.

**Step 1:** Remove the 6 screws on the control tray hatch (shown shaded in the diagram below).



Remove the hatch to access the regulator and modulating valve below.

A

B

C

D

E

F

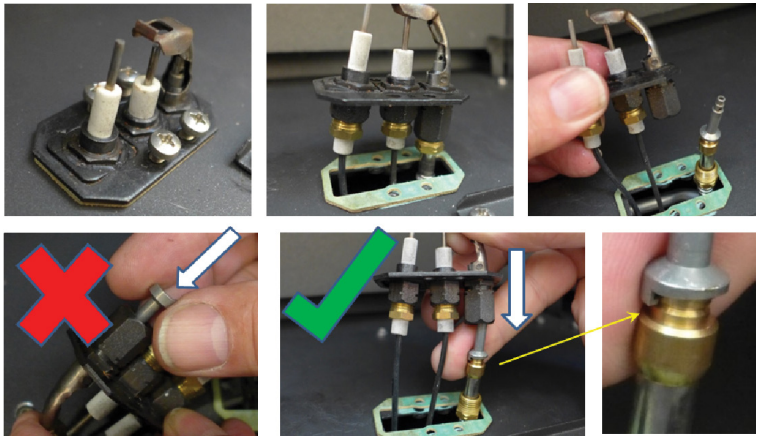
G

SERVICE

A  
 B  
 C  
 D  
 E  
 F  
 G  
 SERVICE

**Step 2:** Change the three main burner jets with the jets supplied in kitset (see tables on next pages).

**Step 3:** Replace the pilot jet (see tables below). *Note: Ensure the pilot jet is joined up to the olive before inserting the jet into the pilot assembly (as shown below).*

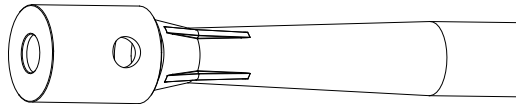


**Step 4:** Screw out the nylon adjuster screw inside the regulator to remove the existing spring. Replace the spring with the purple spring supplied in the conversion kit and reassemble the regulator.

**Step 5:** Stick the new gas type label supplied in the kitset on the underside of the tray hatch. Ensure the serial number and date of manufacture are still visible. Write your name, company (if appropriate) and date of conversion on the new label with permanent marker.

**Step 6:** Replace the hatch (removed in step 1). Take care not to over tighten screws.

**Step 7:** The burner tubes on the underside of all burners have convertible aeration collars. Ensure the aeration collars on all burners are correctly fitted on each burner tube.



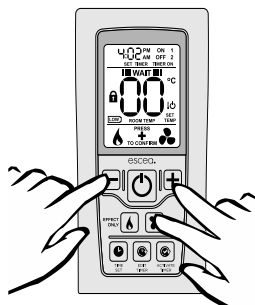
	Burner Jets			Burner Collars	
	Middle Burner	Side Burners	Pilot	Middle Burner	Side Burners
Natural Gas	Ø2.1mm	Ø1.95mm	#37	Fully Closed	Fully Closed
ULPG	Ø1.4mm	Ø1.1mm	#27	Spacer	2 x Ø6mm
Propane	Ø1.4mm	Ø1.1mm	#27	2 x Ø12mm	2 x Ø4mm



## Step 8: Adjusting the electronic controller for gas type

Ensuring the gas is still OFF, Turn the power ON. Insert “AA” size batteries into the remote control. You should now see the time on the remote display showing 0:00.

Press the MINUS, PLUS and FAN BOOST buttons simultaneously (as shown right) until the characters “03” light up on the display. Release the buttons and the remote will count down and display “GO”. The screen will then display all characters. This will put the remote into test mode and the two big temperature digits should begin counting from 0 to 99 repeatedly.



Now hold down the ‘EDIT TIMER’ and ‘ACTIVATE TIMER’ buttons simultaneously; the remote display will show the current configuration of either ‘NG’ for Natural Gas or ‘LP’ for ULPG/Propane. To change this configuration, hold down the ‘EDIT TIMER’ and ‘ACTIVATE TIMER’ buttons simultaneously for 5 seconds. This will now have toggled between gas types.

Once you have chosen the correct gas mode, simply press the ‘⏻’ power button once to exit this diagnostics mode.

## E8 Operating the Appliance

Turn on the fire by pressing the “⏻” power button on the remote. Within a few seconds the appliance will begin its startup sequence with a 15 second purge of the flue fan. After the purge it will attempt ignition. It may take a few attempts to light the first time due to air in the gas line. You may wish to purge the gas line at the valve by bleeding the first test point. This requires a small blade screwdriver.

Once the fire has lit the pilot and main burner you will be able to measure the operating pressure. Set the remote temperature to 40deg by pressing the “+” button and ensure the remote is kept in a cool environment. This will allow maximum gas flow into the appliance.

Ensure all other gas appliances within the house are also operating at maximum.

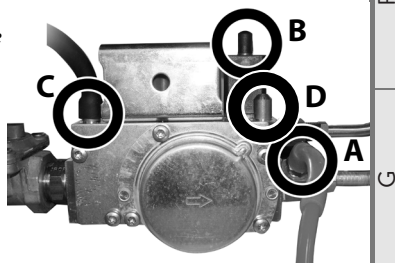
If the operating pressure does not read within 5% of the table (shown below) then remove the cap from the gas pressure regulator within the appliance and adjust the threaded spring stop. Press the ⏻ button again to shut down the fire.

## E9 Checking the Gas Operating Pressure

*Note: Ensure the thermostat control within the remote does not cause the flame to modulate down by increasing the set temperature and keeping the remote in a cool environment.*

Turn on the gas. Turn the power on. Check the inlet pressure upstream of the appliance using the test point installed earlier.

*Note: The regulator that is supplied with the fire MUST NOT BE REMOVED. Removal of the regulator, or replacing it with one not intended for use with an Escea fire, will void the limited appliance warranty and may be dangerous.*



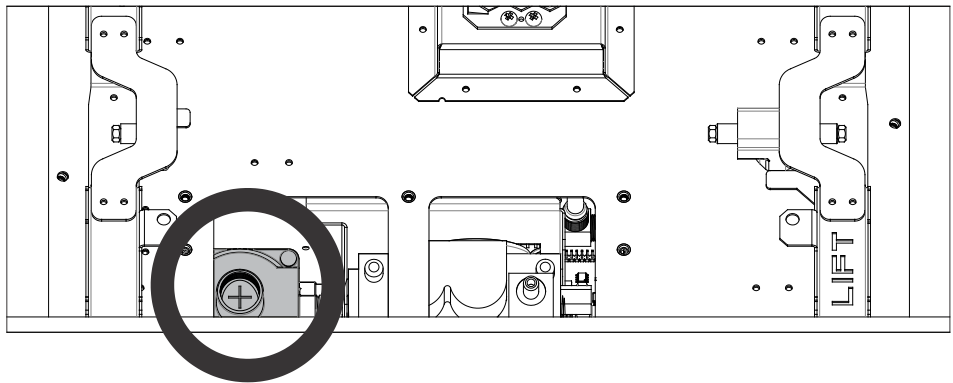
The gas valve (shown right) has manometer test points at A, C, and D. Ignore B.

A  
B  
C  
D  
E  
F  
G  
SERVICE

Gas Pressure Table - DS1900	Gas Type		
	Natural Gas	Propane (AUS)	ULPG (NZ)
Minimum Inlet Pressure - Pre-Regulator	1.13 kPa	2.75 kPa	2.75 kPa
Maximum Inlet Pressure - Pre-Regulator	5.0 kPa	5.0 kPa	5.0 kPa
Operating pressure - Post-Regulator (Point C)	1.0 kPa	2.3 kPa	2.3 kPa
Operating Pressure when on high - (Point A or D)	0.82 kPa ±5%	1.79 kPa ±5%	1.79 kPa ±5%
Operating Pressure when on low - (Point A or D)	0.43 kPa ±5%	0.88 kPa ±5%	0.88 kPa ±5%

Remove the small access hatch found on top of the engine.  
Loosen test point C (shown in the first diagram of this section) and attach a manometer tube in preparation for measuring the operating pressure—post regulator.

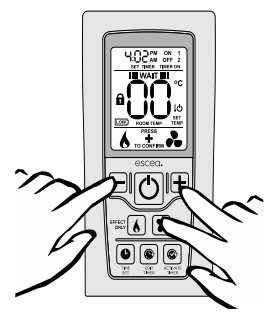
Turn the fire on high and adjust the operating pressure at the regulator (shaded grey in the diagram below)



Once the operating pressure—post regulator—is set, check the operating pressure at test point A or D (shown in the first diagram of this section).

### Changing the Operating Pressure from the Remote

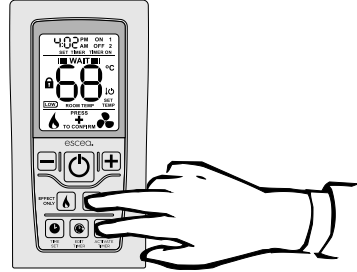
The following instructions **must only be undertaken by a suitably approved person**. Any tampering by an unauthorised person will void the product's warranty and may result in a dangerous condition.



While the remote is in its “OFF” mode with only the time showing on the display, press the MINUS, PLUS and FAN BOOST buttons simultaneously (as shown right) until the characters “03” light up on the display. Release the buttons and the remote will count down and display “GO”. The screen will then display all characters and should be reading 00. This will put the remote into test mode.

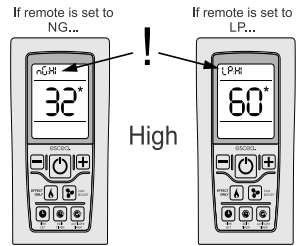
Whilst in test mode: press and hold the “ACTIVATE TIMER” and “FAN BOOST” buttons for 4 seconds to access the gas valve settings. The appliance will automatically turn on while in this mode.

**WAIT. Allow the appliance to fully light all burners before continuing.**

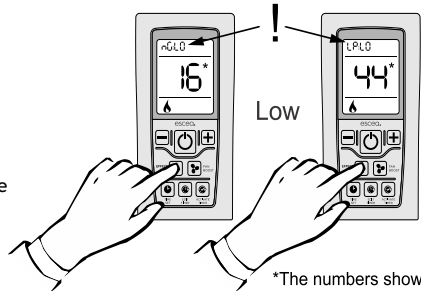


The high setting for the currently set gas type is displayed first (indicated in the clock segments at the top - see ! right). Pressing the plus or minus keys will change the setting up or down respectively, which will change the gas pressure measured at point A or D. The large digits will blink rapidly after the setting is made until the verification is received from the fire.

*Note: The numbers displayed on the remote should only be used to achieve the correct pressure. The numbers by themselves do not represent anything and should not be relied upon.*



Toggle to the low setting is done by pressing the ‘EFFECT ONLY’ button (indicated in the clock segments at the top and by the ‘EFFECT ONLY’ icon at the bottom). Settings are made with the PLUS and MINUS buttons as above. Exit this mode by pressing the on/off button.

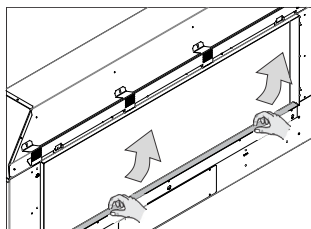


\*The numbers shown above are not targets

### E10 Auxiliary On/Off button

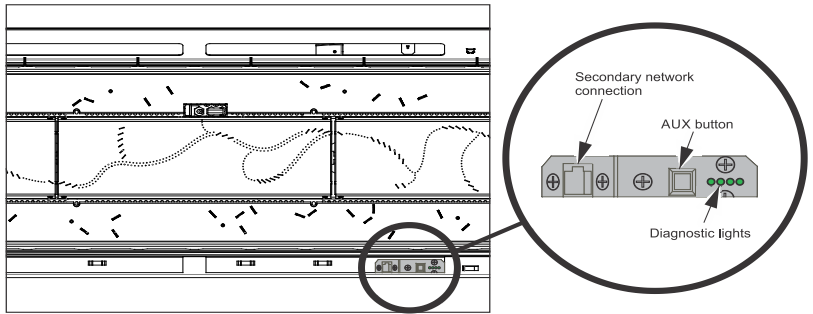
The auxiliary on/off button is used to turn the fireplace on without the remote control and for “teaching” the fireplace to listen for new remote controls. For information on teaching a new remote control, see section S6 on page 52 of the service manual at the end of this document.

To access the auxiliary on/off button, remove the bottom trim bracket by lifting the bracket upwards (as shown in the diagram below).



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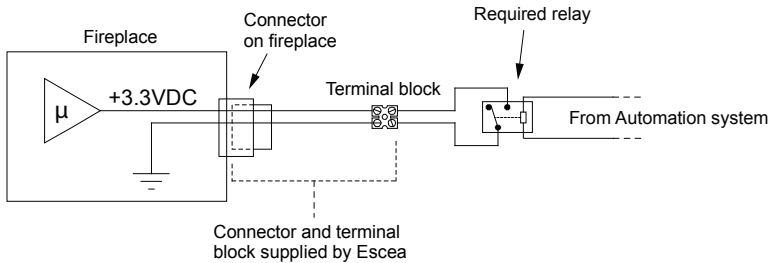
The AUX button location can be seen in the diagram below.



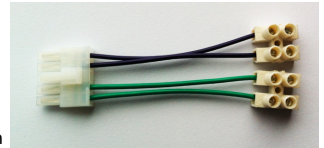
## E11 Home Automation Setup

Escea D-Series fireplaces have a simple interface for connection to a home automation system. This allows the fireplace to be woken up, started, and then shut down. The “Close to Wake” connection (shown below) is essentially taking one of the 3.3 volt DC pins on the fireplace microcontroller and shorting it to ground.

In order to isolate the fireplace from the automation system, a relay needs to be used (as shown). This allows you to keep the fireplace’s 3.3V supply isolated.



The home automation connection can be found in your fireplace accessory pack (shown to the right).



This connects to the fireplace via the lower RH outside panel of the fireplace, next to the primary network cable access point, as shown in section D2 on page 24.

## Home Automation Operation

### Relay closed

The fireplace will start in a medium setting until the remote control talks to the fireplace and picks up the ‘ON’ signal (which can take up to 4 minutes). Once the remote has communicated with the fireplace it will turn on and begin operating thermostatically. The remote will use whatever temperature the user has previously set and cannot be altered by the home automation system. The fireplace will continue to operate while the relay is closed.

*Note: If the fireplace cannot communicate with the remote controller within 10 minutes of the relay contact closure then the fireplace will shut down and return to standby. The remote controller is required to be operating within range of the fireplace for its safe operation.*

#### *Relay open*

If the fireplace is operating with a closed relay then, upon opening the relay contacts, the fireplace will shut down and return the remote controller to its standby mode when it next updates (which can take up to 4 minutes). While the relay is open the fireplace will be in standby mode and available for manual operation by the user.

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## **END OF SECTION E**

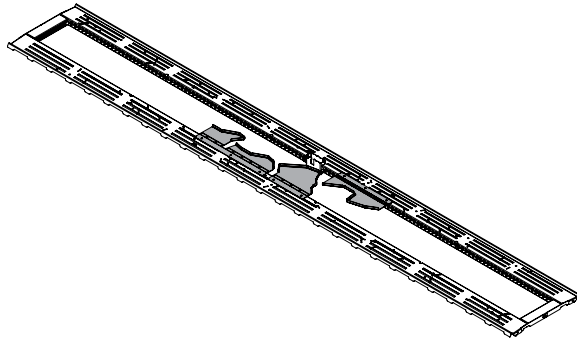
By the end of this section, you should have:

- The appliance installed in the cavity
- Check that red tabs are in the correct position
- The appliance fixed to the cavity base and wall lining
- The appliance plugged into a mains electricity supply
- The appliance gas supply attached and pressure tested with all other gas appliances running

# F Finishing the Installation

## F1 Coal, Crystallite or Driftwood Fuelbed Installation

For the coal fuelbed only, begin by installing the three coal retainers, as shown below. They are installed by placing them on top of the infill and fixing them in place with the screws provided.



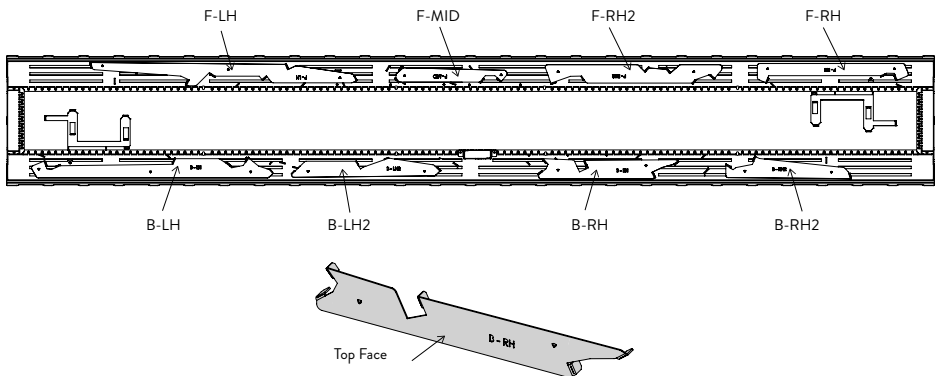
For the crystallite, coal, or driftwood fuel beds, place all the crystallite/coal pieces in a single layer atop the burners and fuelbed tray. Cover the entire area except for the pilot shield, ensuring coverage right up to the edges of the firebox or glass.

If the driftwood fuelbed style has been chosen, follow the above directions for placing the crystallite and then place the driftwood pieces randomly atop the crystallite layer. Ensure the wood pieces are evenly spread out and do not cover the pilot assembly.

Do not heap or mound any fuelbed.

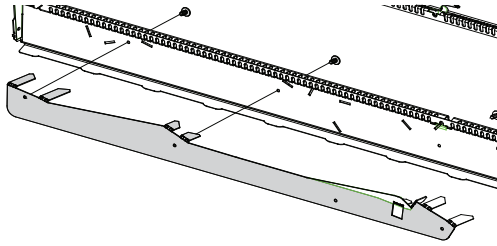
## F2 Log and Woodland Log Fuelbed Retainer Setup

When setting up a log or woodland log fuel bed, you must have the correct retainers present before assembling the fuel bed. The correct retainers are supplied with the fuel bed packaging. First remove the infill by following section E6 on page 31. Place the infill upside down with the hole for the pilot on the side closest to you; this is the back. On your retainers you will see a series of letters that determine where the logs will attach to the infill.



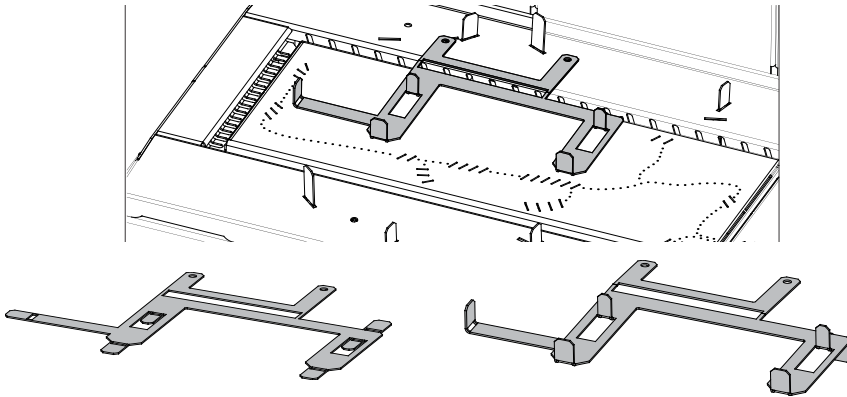
Fold **ALL** the retainer tabs 90° away from you when reading the number and letter on the top face (above right). Assemble all retainers by feeding the tabs, from the **UNDERSIDE (unpainted side)** through the cutouts on the infill and fix in place with screws provided (see below).

Replace the infill and burners in the fireplace.



**For Logs Only:** the final log retainers are placed on **TOP** of the infill and burners to support the end log (number 2 from index). This part comes in flat form and is to be folded as per the image below.

They are then installed on both outer sides of the infill and are fixed in place by 1 screw as below.



### F3 Log Fuelbed Installation

Logs must be located correctly as stated/depicted in this section.

The final layout should replicate the picture shown in Step 3. Place the embers or flakes in a single even layer after the logs have been located correctly (excess embers or flakes should NOT be added if one even layer has been achieved). The embers or flakes must not cover the pilot or pilot guard.

*Note: Improper positioning of any fuelbed media may create carbon build-up and will alter the unit's performance. Malfunctions due to improper fuel media placement will not be covered under warranty.*

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## Log Index

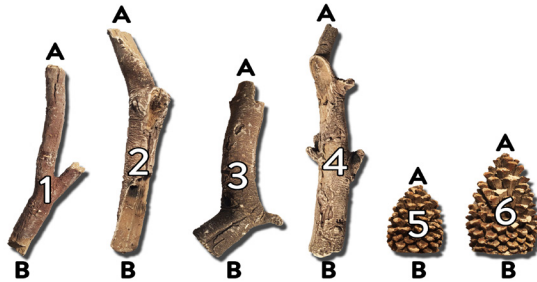


Use the index above as a guide for selecting the correct logs.

## Log Setup DS1900



## F4 Woodland Fuelbed Installation Woodland Log Index



Use the index above as a guide for selecting the correct logs. Place the flakes in a single layer evenly after the logs have been located correctly (excess flakes should NOT be added if one even layer has been achieved). The flakes must not cover the pilot or pilot guard.



# Woodland Log Setup DS1900

Step 1



Step 2



Step 3



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## F5 Flame Picture

An abnormal flame pattern will look long and stringy; it may cause soot to build up inside the firebox.



An abnormal flame pattern will likely be the result of incorrect settings (jet size, burner aeration collar). Check that these are correct before proceeding. If an abnormal flame pattern is still present, please contact Escea.

It is the responsibility of the installer to ensure a correct flame pattern.

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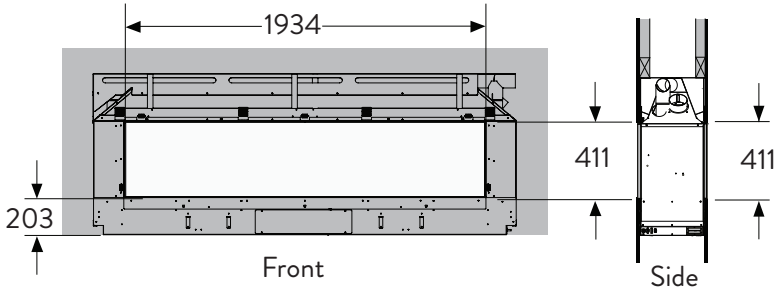
SERVICE

## F6 Wall Linings

The final wall lining can only be commenced after all previous applicable sections have been completed. The appliance must be installed prior to and behind the finished wall surface. Allow clearance for any plasterboard, tiles, or other finishing materials that may be intended for the finished wall surface. The wall board that lines the outside of the opening can be normal plasterboard and does not need to be non-combustible. The plasterboard must protrude beyond the framework as shown in the following diagram.

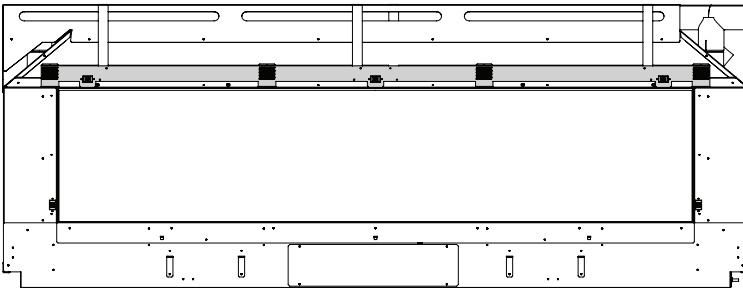
*Note: The final wall lining must not encroach within the specified dimensions in this section. These dimensions indicate the opening required in the wall lining.*

### DS-Series Minimum Wall Lining Dimensions



*Note: The wall lining directly above the appliance will get warm and hence may discolour paint finishes that are susceptible to temperature damage. The heat may also distort vinyl wall coverings. For durability of finishes and surfaces you should contact the relevant manufacturer for their specification and avoid materials with temperature ratings of less than 80deg C.*

The wall lining can be fixed to the gib fixing bracket (shaded below). There are four areas on the bracket (circled below) that can be used for fixing screws.

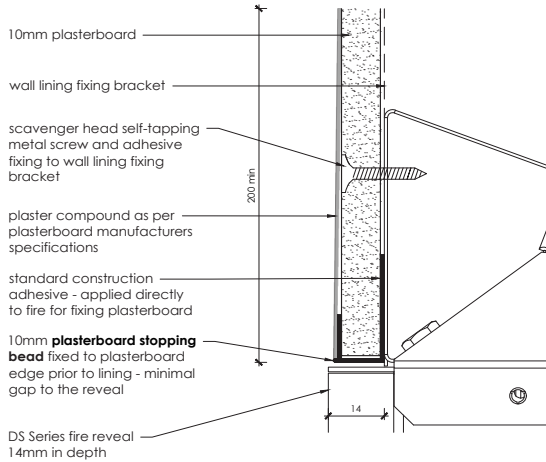


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## Frameless

If not using a fascia, ensure the edge of the wall lining is finished in a tidy manner (for a nice Gib finish we recommend Gib Rondo stopping bead).



**NOTE:** a 20mm or less wall lining must be used when installing a DS Series fireplace **without** a fascia. For wall linings with a total thickness of 10mm or larger, a “Linear Trim” may be purchased to cover any exposed wall lining. A 10mm wall lining is recommended for ease of installation.

## Bevelled Lite Fascia

If using a Bevelled Lite fascia, cutouts will be required in the finished plaster board to allow for the fascia securing pins to attach to the appliance.

**NOTE:** A 13mm wall lining must be used when installing a DS fireplace with a Bevelled Lite fascia; this is the maximum distance the Bevelled Lite fascia can sit off the front face of the fire.

## Linear Trim

For 10mm-20mm wall linings, an optional “Linear Trim” can be used to cover any unwanted exposed wall lining and/or act as a slimline fascia.

## F7 Fitting the Bevelled Lite Fascia

To avoid scratches to the fascia panels of this heater, they must be fitted at the conclusion of the installation process, after wall linings are in place.

**NOTE:** Never rub the fascia.

Step 1: Ensure the plastic spacer is placed on the thread of the studs.



Step 2: Screw and tighten the 4 studs with spacers onto the back of the fascia.



Step 3: Rivet the 4 spring clips onto the bracket on top of chassis of the appliance.



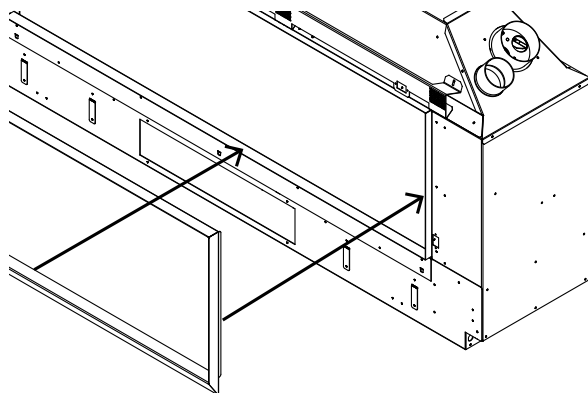
Step 4: After the 13mm thick wall has been finished, the fascia clips onto the appliance.



### Linear Trim

To install the Linear Trim onto the DS Series, slide the bottom of the trim along the gib trim and push it in flush with the wall cladding. It should slide in on all four sides and fit by friction just inside the existing gib trim.

*NOTE: If the friction fit is loose, please use the provided fiber tape along the bottom edge of the linear trim to tighten the fit.*



### F8 Locating Wall Mount Cradle for Wireless Control

The appliance's remote contains the thermostat that will sense and communicate the room temperature back to the heater via radio frequency.

A wall mount cradle has been provided for the wireless control and, where possible, the control should be housed in this cradle.

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The location of this cradle should be decided by taking the following factors into account:

- Simple and convenient access for the user
- Away from air flow and drafts through the room
- The parts of the room that people are likely to spend time
- Away from direct sun light
- A suitable distance away from the heater
- Ideally 1.2m to 1.5m from the floor



The radio frequency signal will go through some walls but for best results Escea suggest that the cradle position is less than 10 metres away from the heater.

The best height to locate the cradle off the ground is about chest height. This gives a good average room temperature and easy access for the user.

Please ensure that cradle is screwed firmly onto the wall using the screws provided.

## F9 Operating the Appliance

If you haven't done so already, insert the supplied "AA" size batteries, being careful of the polarity. "0:00" should now be showing on the remote display.

To turn the fire on, press the 'POWER' button once; within a few seconds the appliance will begin its startup sequence.

*NOTE: The appliance begins its startup with a 15 second pre-start purge, where the combustion fan runs on its own to clear the firebox before it tries to ignite. During the pre-purge the remote will alternately show the remotes "set" temperature and a rotating segment indicator to show that the fire is in start up mode and will try to ignite.*

When the appliance has lit, set the room temperature by pressing the 'PLUS' or 'MINUS' buttons repeatedly until the display is showing the desired temperature. The remote will then revert back to the 'current' room temperature 30 seconds after making the change.

Run the appliance on full for an hour with the windows and doors open in the dwelling. This will ensure any initial smells have the chance to dissipate.

The appliance is turned off by pressing the 'POWER' button once more. The remote will display the time only.

Run the appliance again and check the operation of the thermostat by increasing and decreasing the set temperature. Check that the Effect Only and Fan Boost functions work correctly.

For further operation instructions please refer to the User Guide.

## F10 Normal Operating Sounds and Smells

*Note: Each time the fire is lit from cold the glass may fog up with condensation. This is normal and the condensation will disappear within a few minutes once the glass heats up.*

### Sounds

It is possible that you will hear some sounds from your gas appliance. This is perfectly normal due to the fact that various types of materials are used within your appliance. Listed below are some examples. These are all normal operating sounds and should not be considered as defects in your appliance.

#### Fan:

Escea gas appliances use electric fans to push heated air into the room. It is not unusual for the fan to make a “whirring” sound when ON. This sound will increase or decrease in volume depending on the speed setting of your fan.

#### Gas Control Valve:

As the gas control valves turn ON and OFF, a dull clicking sound may be audible. This is the normal operation of a valve. When the fire is switched off after being run for a while, there may be popping and fluttering noises as the residual gas in the burners burns away. These are normal and are no cause for concern.

#### Unit Body/Firebox:

Different types and thicknesses of steel will expand and contract at different rates resulting in some “cracking” and “ticking” sounds being heard throughout the heating and cool down processes.

### Smells

The first few times the unit is operated, the unit may release an odour and the flames will appear orange due to: the curing of the paint, the burning off of the starch in the gas logs, and the oils in the metal. This is a temporary curing process which will disappear with use.

A deposit on the inside of the glass, caused by the starch in the logs, may appear as a build up after several uses. If this film is not removed, it will bake on and may become difficult to remove. When the glass is cold, remove it (see section E5) and clean the inside with a non-abrasive cleaner.

**DO NOT ATTEMPT TO CLEAN THE GLASS WHILE IT IS HOT.**

**UNDER NORMAL USE NEVER OPERATE THE UNIT WITH THE GLASS REMOVED.**

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# G Installation Checklist

Go through the following checklist to ensure you have installed the appliance correctly

- Correctly sized cavity to suit your fascia and flue configuration
- Correct clearances to combustibles
- An electrical isolating switch to the appliance, accessible after finished installation
- Correctly sized gas supply with a pressure test point, ensuring adequate supply with all other gas appliances in the dwelling running
- Gas type conversion process carried out if required
- A weather-tight installed horizontal or vertical powerflue terminal with clearance as specified by AS/NZ5601.1
- If chosen, reasonable access to the outside face of the horizontal powerflue wall terminal for maintenance purposes and flue attached to the rear of the horizontal powerflue wall terminal leading back to the appliance (or similar for vertical powerflue terminals)
- The electrical cable from the powerflue terminal attached correctly and run back to the appliance cavity in an electrically safe manner
- The appliance fixed to the cavity base
- The appliance plugged into a mains electricity supply
- All gas joints and pressure points leak tested with suitable leak detection solution and drop tests completed on gas pipework
- Fuel bed correctly installed
- Glass correctly fitted
- A fitted fascia
- Operated the fire and verified that it lights reliably and safely
- Appliance functions checked, including thermostat operation, Effect Only, and Fan Boost
- Data label marked up with correct gas type and dated by installer if converted during installation
- Home-owner shown how to operate the appliance correctly
- Warranty card filled in with installer details and appliance serial number
- User Guide made available for end user
- Plumbing Industry Commission Compliance Certificate given to end user

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## IMPORTANT:

- This appliance must be serviced every 12 months.
- Any service operation should be carried out only by a suitably qualified and trained person.
- Gas and electricity supply **MUST** be isolated before any service operation is carried out on this appliance.
- This manual should be left with the appliance.
- Only use **Escea approved** spare parts.
- Spare parts are available from an Escea Distributor or Retailer
- **DO NOT MODIFY THIS APPLIANCE.**

## S1 Annual service procedure



- Isolate power and gas supply to fire.
- Remove front glass and clean inside of glass.
- Remove fuel bed and brush off any soot.
- Clean electrode and pilot hood of any carbon build up and ensure correct gaps between electrode and pilot hood
- Remove burners and blow compressed air through the burner ports.
- Remove jets and clean injector hole with solvent.
- Vacuum any dust from the cavity that houses the fan and from the underside of the fire box around the valve and solenoids.
- Test all joints for gas tightness.
- Reassemble heater and check that operating pressure is correct.
- Check glass sealing tape and replace if necessary.
- Check to make sure that flue system is intact and not in any way blocked.
- Trial heater with several start/stop cycles. Trial fan-boost, Effect Only, and thermostat modes to ensure that all modes function correctly.

To access the product data plate, first remove the fireplace glass, any fuelbed media, the burners, and the firebox base. The data plate is located underneath the controls tray (step 1 of section E6).

## S2 Error Codes

This gas fire has been designed to show error codes to help explain and identify any fault situation that occurs. These codes will appear on the wireless remote control in the form of a large letter “E” with a number beside it. Codes can normally be reset by turning the heater off then on again at the wall.

The following table shows what each code means and possible ways to rectify the situation. In the case of persistent or repeated shutdown errors, action must be taken immediately to find and repair the fault.

Error Code	Suggested action
 Electronics Over Temp	<p>The electronics have gone over temperature.</p> <ul style="list-style-type: none"><li>• Check for excess lint and dust build-up on the PCB/Controller.</li><li>• Check that fascia panels are installed correctly as incorrect installation may result in restricted air flow.</li><li>• Ensure correct gaps are present around glass.</li><li>• Room air fans may be slowed or stalled. Remove firebox, check that fans are plugged in, clean, and free turning.</li></ul> <p><i>Note: This error has a permanent lock out and will require the unit to be reset after the initial error (turning the power to the fire off “at the wall” then on again after a few seconds).</i></p>
 Flame Failure or Power Flue trip	<p>The fire has tried to light three times and failed.</p> <ul style="list-style-type: none"><li>• Check gas supply and check other gas appliances to see if they are affected. If you have two separate LPG cylinders, switch over to the full bottle or contact your gas supplier. You may need to retry igniting the fire a few times after re-establishing gas supply.</li><li>• Check correct gas pressure to the appliance with all other appliances running.</li><li>• Check the electrode placement in relation to the pilot flame. Ensure it is well enveloped in flame as per the diagram in the installation instructions. Ensure no small coals have dropped onto the ignition electrodes between the burners.</li><li>• Ensure the electrode is not contacting any metalwork including the burners and has the correct air gap.</li><li>• Check that the electrical power cable between the appliance and the power-flue wall terminal is connected and not damaged.</li></ul>



Appliance Over  
Temperature  
Sensor Trip

The bimetallic snap disk mounted on the exhaust collector box has tripped.

- Check that fascia panels are installed correctly as incorrect installation may result in restricted air flow.
- Check that fans are plugged in, cleaned, and free turning - room air fans may be slowed or stalled.
- Check the regulator - being set too high may result in excess heat build-up.
- Check flues are securely connected at both ends - if the inlet flue is not connected the appliance may draw warm air from the cavity.
- Check the jets
- Check the red tabs are in the correct orientation (see section E2, step 2).



Valve Solenoid  
Check Failure

The valve solenoids have failed the pre-ignition test. A wire may have dislodged or the valve solenoid is faulty.

- Check that the connections to each solenoid are secure and in place. The connections on the ends of the wires may need to be tightened (e.g. with a pair of pliers) to ensure a robust connection to the valve terminal.
- Disconnect and reconnect the firebox connectors ensuring they are firmly pushed into place.
- One of the solenoids on the valve inside the fire may have failed. If this is the case, the valve will need to be replaced.



Remote Cannot  
communicate with  
fire

The remote cannot communicate with the fire.

- Check if the fire is turned off "at the wall" i.e. a loss of power to the fire or the remote is outside of its effective radio frequency range (too far away from the fire). Typical remote range is 1m to 10m.
- Ensure there is power to the fire by pressing the auxiliary on/off (red) button on the fire, then press the on/off button on the remote to clear the error.



Combustion Air  
Flow Error

Check whether the pressure switch is activating at startup (there is an orange indicator LED in the control tray). If not, check that the pressure switch electrical connection is correct.

- Check that the hoses are connected at both ends. Ensure the hoses are not kinked.
- Ensure the pressure switch is mounted vertically and the diaphragm is operational. The black hose should be connected to the low pressure port and the translucent to the high pressure port
- Check that both flues are securely connected at both ends to the appliance and the powerflue wall terminal and that the flue is not damaged
- Check that the fan inside the powerflue wall terminal is running during startup. This fan may need servicing if it is slowed or stalled.

### **S3 Cleaning the Fuel bed and Glass**

ALWAYS USE GLOVES WHEN HANDLING THE FASCIA AND GLASS.

Follow section E5 on page 29 to remove the glass. Any standard glass cleaner may be used to clean the glass. Use a soft brush to clean the fuel bed media, being careful to replace it according to the instructions in section F1 on page 38, F3 on page 39, or F4 on page 40.

If soot build up on the fuelbed and/or the inside of the glass becomes excessive or regular then one of the following actions may be required:

- Reset the gas pressure - pressure may be too high;
- Reposition the fuelbed - check with specific fuelbed instructions for details;
- Clear any blockage from primary aeration port of burner;
- Check that the flue tube is not damaged or disconnected;
- Check that the exhaust fan is operating and cowl is not blocked in any way.

### **S4 Cleaning the Fascia**

The outside of an Escea Fascia must only be cleaned with a soft microfibre cloth. If heavier cleaning is required for the likes of grease or stubborn fingerprint removal we recommend the use of a dedicated stainless steel cleaner for stainless steel fascias or warm soapy water for powder coated fascias.

#### **NEVER RUB THE FASCIA.**

#### **For Stainless Steel Fascias:**

1. Ensure that the Gas Fireplace is off and that the fascia is cold to the touch.
2. Using the gloves provided with your fascia, a stainless steel cleaner and a clean cloth, apply a small amount of cleaner to the cloth and wipe the fascia with even, straight strokes.
3. Make sure your strokes follow the direction of the grain or brush finish. Wiping across the grain can leave small scratches.
4. The cleaner may leave a very fine film over the fascia, ensure this film is distributed evenly.
5. If the film is applied too heavily and is quite visible, you can remove the excess by gently wiping dry with a microfibre cloth. Ensure your strokes still follow the direction of the grain or brush finish.
6. Ensure that no film is applied to the glass of your Escea Gas Fireplace. If applied accidentally, wipe off with an absorbent microfibre cloth.

#### **For Powder Coated Fascias:**

1. Ensure that the Gas Fireplace is off and that the fascia is cold to the touch.
2. Using the gloves provided with your fascia, gently clean the fascia with a cloth and warm soapy water.
3. Wipe off with an absorbent microfibre cloth.

### **S5 Checking Operating Pressure**

See section E9 on page 33 of this manual.

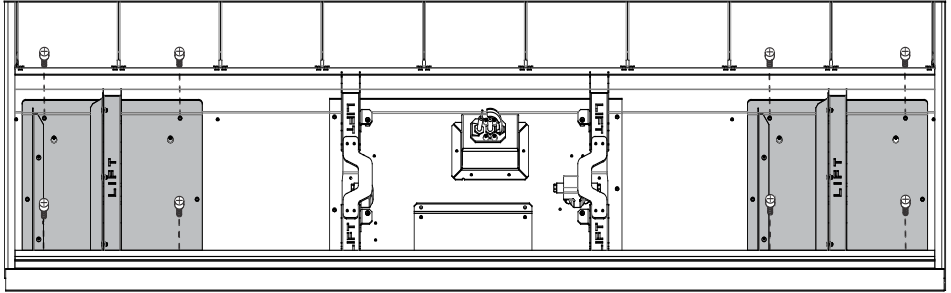
### **S6 Replacing a Remote Control**

If the wireless control becomes lost or damaged, a new one can be ordered from any Escea retail agent. When you have the new remote, the following procedure needs to be followed to “teach” the remote to only communicate with that fire.



ISOLATE THE POWER TO THE FIRE BEFORE STARTING THIS PROCEDURE.

Screw Locations:



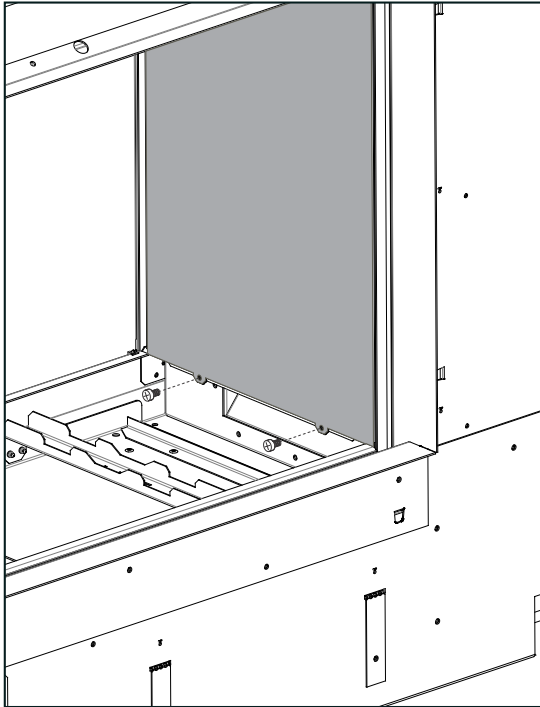
### S10 Removing the Control Tray

ISOLATE THE POWER TO THE FIRE BEFORE THIS PROCEDURE.

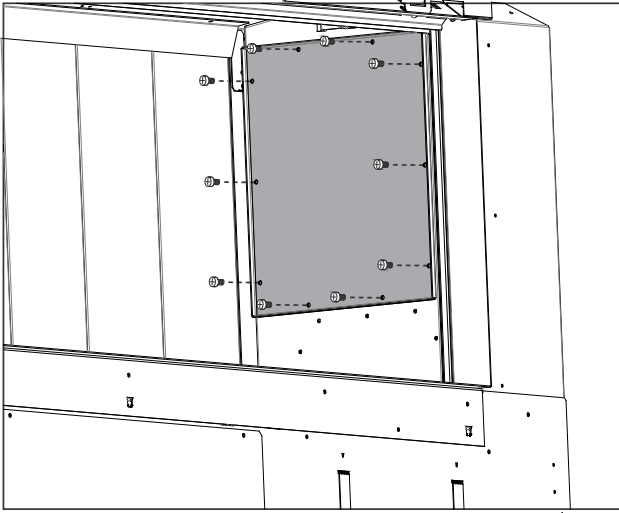
Refer to Step 1 of Section E6

### S11 Pressure Switch Removal

1. With the infill removed, remove the 3 screws in the reflective panel (shown shaded in the diagram below). Carefully remove the panel from the firebox.

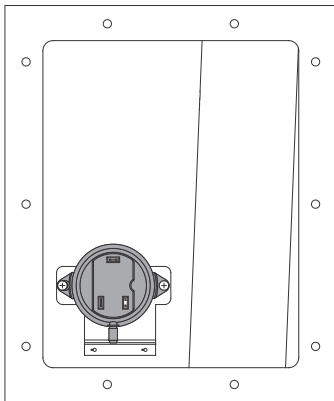


2. Remove the 10 screws (shown in the diagram below) in the access hatch and carefully remove from the firebox.



3. Remove the 2 silicone tubes (making note of which tube goes on each spigot).

Disconnect the two wires from the pressure switch and remove the two screws on either side of the pressure switch to remove it from the bracket. The black hose should be connected to the low pressure port and the translucent to the high pressure port.



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## S12 Replacing the Thermal Cut Out (TCO)

**WARNING - Ensure power is turned off before removing any TCO.**

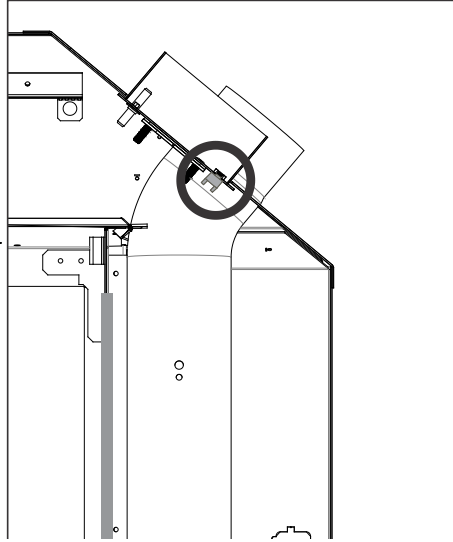
There are two thermal cutouts: one in the LH room fan assembly (60°C) and the other attached to the exhaust manifold (140°C).

B

### Exhaust TCO (140°C)

Access to this TCO by following steps 1 and 2 from section S11.

Reach into the hatch and locate the TCO (circled in the diagram below). The TCO has two wires connected to the main body; remove these. Unscrew the TCO by hand and remove from the firebox.



D

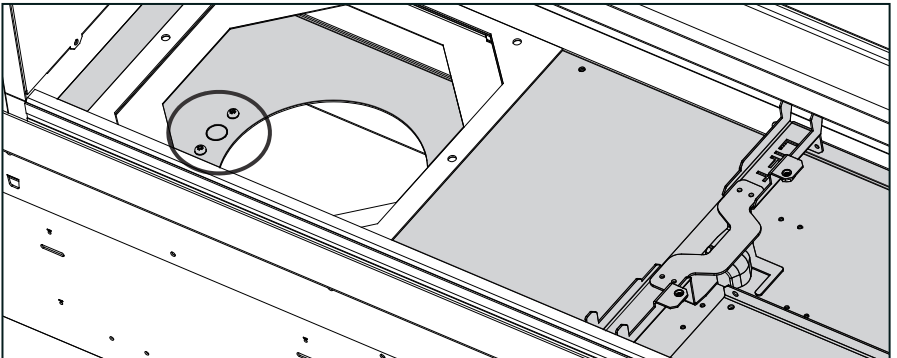
E

### Fan TCO (60°C)

Access to this TCO by following S9 and removing the left hand fan (not exhaust side). Once the fan is removed you will see the TCO (circled in the diagram below). To remove this, unscrew the two visible screws and, once free, remove the two wires connected to the TCO. Remove the TCO from the chassis.

F

G



SERVICE



### S13 Servicing the Horizontal/Universal Vertical Powerflue

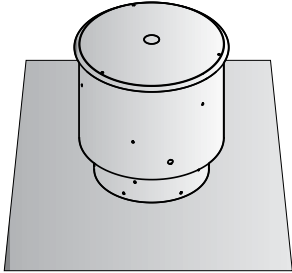
Ensure the power to the powerflue is off by disconnecting the power to the appliance inside. If the appliance has been running, allow the powerflue to cool before attempting to service it.

#### Servicing a Horizontal Powerflue:

If the powerflue needs servicing, the fan can be accessed from the outside of the installation for horizontal termination and accessed from within the roof space for vertical termination.

Undo the screws on the outside of the powerflue box and separate the two parts, giving you access to the fan inside.

Removing this plate gives complete access to the fan for servicing or replacement. Check that all the seals are still intact. Check that the fan electrical terminals, motor, and impeller are not corroded. Ensure there are



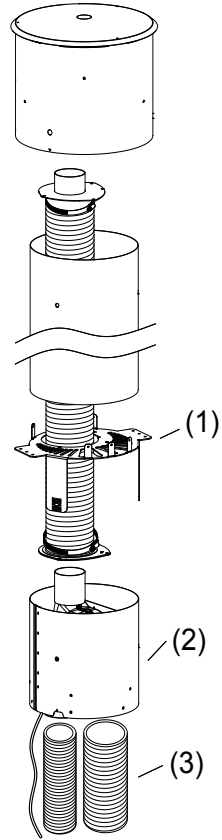
no signs of leakage in or around the terminal.

When reassembling the powerflue, line up the round silicon grommets with the outlet tube of the fan and push the cowl back into place. Ensure all seals are still in place and replace all of the screws to hold the cowl in the correct position.

#### Servicing a Universal Vertical Powerflue:

If the UVP is internally installed remove the unit (2 in the right hand image) and replace the complete fan unit.

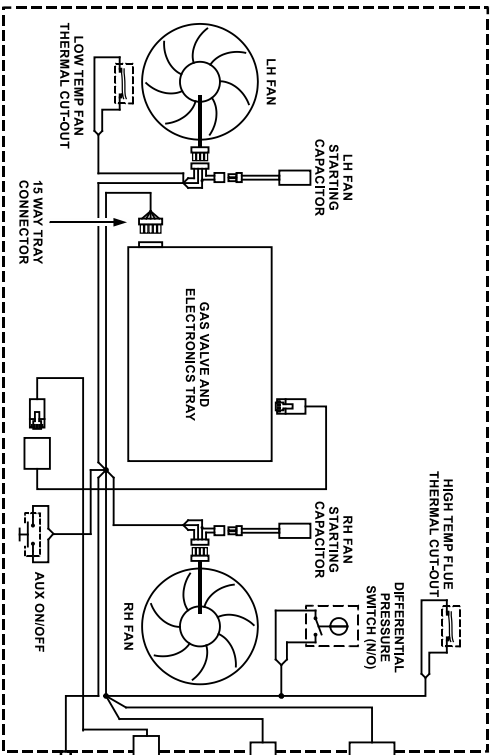
If the UVP is externally installed the cowl/fan unit pictured below is to be completely replaced by removing it from the liner or flashing.



S14 Wiring Diagram

A B C D E F G SERVICE

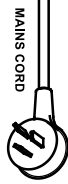
Read the user instructions before use.



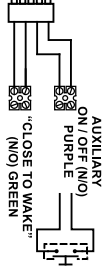
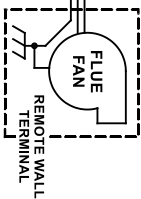
# DS Series

Electrical Schematic

230V-240V AC  
50Hz 2A FUSE  
130 - 140W



NETWORK CABLE



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Part No. 620426\_1

SERVICE	G	F	E	D	C	B	A
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A

B

C

D

E

F

G

SERVICE