



Inis Airc
6kw Room-heating Stove
User and installation manual.

EN



The instruction satisfies relevant local, national and European Standards

Dear Buyer!

Thank You for purchasing our company's article and for the confidence in products of JSC Biokaitra.

We wish you success in use of it!

JSC BOKAITRA"

The stove "Inis Airc " is designed for heating residential and public areas. This stove contains a modern construction and ensures long term usage while using it properly. The Stove "Inis Airc" conforms to LST EN 13240 standard requirements. Stove "Inis Airc " conforms to environment, economic and manufacturing requirements.

NOTICE! Before installation and operation of the Fireplace-Stove, please read this manual. This will help you to properly install and the most effectively use the product purchased and to avoid accidents. When buying Fireplace-Stove, please read terms of warranty, make sure Certificate of acceptance is filled in completely and correctly

Congratulations on the purchase of your new Inis Airc room-heating stove. We here at Inis Stoves truly love building high quality stoves for our customers. The stove we produced for you was not just an appliance to us; we hope that you will see it as a focal point in your home. When fitted and operated correctly, you should enjoy many years, trouble free warmth from your Inis Airc stove.

Please read the user manual fully before operating the stove.

As a general recommendation to all home owners, Inis Stoves highly recommend the use of fire alarms and carbon monoxide alarms in your home to protect you and your family from harm.

Stove features.

As per fig 1, the single door is opened by turning the handle clockwise over 90 degrees to just beyond vertical. Although the door handles have been designed to be operated with bare hands, when burning at full output over extended periods, a kitchen glove is mandatory.

fig1

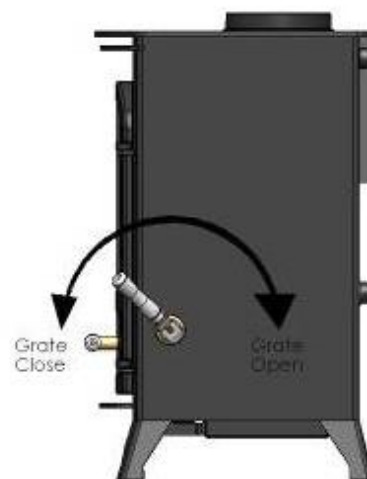


fig 2

To riddle the grate, use the riddling hand tool and gently oscillate the riddler back and forth. Avoid using excessive force to avoid damaging the riddling mechanism. Normally fireplace doors should be closed at all times except when re-wood log sling, de-ashing and when igniting the stove. If excess fuming to the room results at any time when the doors are opened, they should be closed immediately. The stove has been designed for ease of use by the operation of only one air control knob. This adjustment knob is found on the left side of the stove and to increase the air turn clockwise and to close turn anti-clockwise. Inis Airc has a damper fitted to the underside of the stove and the damper has been set at the factory. The plate should close fully when the dial is closed and set to position 1. If however for any reason the damper needs to be adjusted for proper closing, this can be achieved by loosening the two nuts on the damper assembly as shown in Fig4, the damper plate can then be positioned so that it is closed when the damper dial is in the closed position. The two locknuts must then be retightened securely. To help with keeping the stove glass clean, load the wood logs toward the

back of the stove when lighting and fire the stove at a high rate and avoid prolonged periods at a very low setting. The Inis Airc stove is fitted with a grate which can also be riddled with the doors closed for cleanliness and safety. To achieve this use the riddling/ash pan removal tool as shown in Fig2 as above.

First firing

When the stove is used for the first number of times the process of curing the paint will occur. To do this a small fire using only kindling wood should be lit for approximately 20 minutes, allow the stove to cool slightly then repeat the small fire using only kindling wood for another 20 minutes. The final action to cure the paint is to put on a strong fire before the stove has cooled down, at full output for at least one hour. The stove paint will emit fumes which are non-toxic but a window should be opened to avoid fume build up during the curing process. Before you operate the stove, consult with the installer that all the relevant work has been carried out correctly and that they have ignited a small fire in the stove and it is operating correctly. Check that all relevant local, national and European Standards have been adhered to when installing the stove.

1. Inis Stoves is dedicated to the principal using **wood logs** in all our Stoves. We recommend using wood logs in the stove.
2. Never use unsuitable and non-recommended fuels, including liquid fuels in the stove and don't use the stove as an incinerator.

3. When in operation, the stove will be hot and care should be taken to avoid injury.
4. Never attempt to modify the stove in any way and always use genuine Inis Stove spare parts.
5. Never place combustible or non-combustible materials near, in or around the stove that will interfere with the proper heat convection and air supply to the stove. The stove surround should be fireproof. Never leave the stove wood logs too close to the stove.
6. For safe and efficient operation of the stove, regular cleaning of the stove and chimney is essential. Dirty surfaces within the stove will lead to poor heat transfer to the room and will waste your money.
7. Care should always be taken when emptying the ash pan of the stove. Hot ashes should never be put in a plastic dust bin, bag or container. Ideally, empty the ash pans when the ashes are cold.
8. Heating during adverse weather conditions. In certain cases, e.g. when ambient temperature is above 15°C, the weather is rainy and damp, or when a wind is gusty etc., the chimney draught might be worse than usual. In such cases a minimum amount of fuel should be used in the fireplace and the initial air supply valve should be fully opened.

Fuel

Inis Stoves recommend that wood logs be used to **fuel** the stove. Other fuels however **can't** be burned in the stove. Using wood logs to **fuel** the stove, the grate should be in the closed position. Excessive riddling should be avoided and a good ash layer on the grate is recommended. When using wood logs, please ensure that the wood has moisture content below 20%. Well-seasoned and kiln dried wood logs will achieve this. Burning wood logs with a higher moisture content will result in much reduced heat output and a build-up of heavy tar deposits in the stove and chimney. To **refuel** the stove the firebox should be well filled without **fuel** falling out over the fire bar against the doors. By operating the stove in this way, **refuelling** should only be needed every 45 minutes at full output and the stove will operate most efficiently and cleanly this way. Once the stove is fully hot the control knob can be used to adjust the firing rate down to the required output. Fill the firebox up but do not have wood logs overflowing over the fire bar. Never burn household waste in the stove. Never burn petroleum coke in this stove as it will invalidate the guarantee.

Lighting the fire

The key to quickly and easily lighting of the stove is the ample use of kindling wood. If too little kindling is used, the fire will be slow to start and will produce excessive smoke and deposits on the glass.

The grate should be put in the open position, Firelighters or well crumpled paper should be surrounded with small pieces of kindling toward the back of the grate.

Light the fire and with the door lock engaged but the door slightly ajar let the fire light up. After the kindling is well alight add larger pieces of wood logs to the fire and after a few more minutes this wood logs should be well alight. The stove can be fully loaded now and a bright high temperature fire should result. The stove's output will normally not require adjustment down until after approximately half an hour as the stove will take this time to fully heat up.

Slow burning

Your Inis Airc is capable of slow burning making overnight burning possible at a reduced output. To achieve overnight burning, open the damper fully until the fire is burning rapidly. Fill the firebox with a full charge of wood logs and let it ignite fully. When the fire is burning brightly, the stove damper can then be closed down. With the damper almost fully closed and the correct draft in the chimney, an 8-12 hour burn time is possible. For more heat output over a shorter time span the damper can be opened up as necessary. To avoid excessive blackening of the glass the damper will be left slightly open. To revive the fire after overnight burning, **refuel** the firebox with a small amount of wood logs, open the damper fully and riddle the grate.

Ash clearance

The stove has one ash pan designed for ease of handling. The ash pan should be emptied before it is over filled to protect the grate from overheating especially when burning mineral wood logs as the ash is an excellent insulator and excess build-up of ash will cause grate damage.

Stove cleaning and maintenance

Regular cleaning of the stove is essential for safe and efficient operation of the stove.

During the heating season it is recommended to clean the stove weekly. Inspect on a regular basis the condition of the door seals and if found to be worn replace immediately.

Only clean the stove when it is fully cold. A Pair of gloves should be used when cleaning the stove and care should be taken to avoid injury as a number of the stove components are quite heavy.

The throat plate assembly is removed by pulling the centre clip forward (See Fig 3 below). The left and right vermiculite throat plate sections can then be slip out by sliding them one at a time toward the centre while lowering the sections. When the vermiculite sections are withdrawn the steel throat plate section can be carefully pulled forward and slid toward the centre of the stove. Access to the flue outlet is now possible for cleaning. If the top flue outlet is used, the chimney can be cleaned up through the stove.

When the throat plate assembly is re installed, cleaning of the fire box/grate assembly can be done.

Firstly, the grate side plates are removed by moving the front end of the plate up and toward the centre of the stove, once it is lifted up, it can be disengaged from the rear plate. After withdrawal of both side plates, lift the rear plate up and remove. At the point a vacuum cleaner can be used to Hoover out all the vents and areas at the back of the firebox, (never clean the stove if it is still hot!!!).

Inis Stoves highly recommends annual servicing of the stove as the service engineer will ensure correct and thorough cleaning of the entire stove.

Inspect all internal parts of the stove and replace if needed. Only Inis Stoves or an approved agent should modify the stove.

To clean the paint of the stove we recommend the use of soapy water or mild detergents. Avoid using abrasive material on the paint of the stove.

If the stove is to be unused for a prolonged period of time, for instance over the summer months, the stove should be fully cleaned and a lubricant applied to all moving parts. The damper may be left slightly open to facilitate a little air movement through the stove and avoid moisture build up. Avoid excess opening of the damper as this will result in excess heat loss through the stove up the chimney. After a prolonged period being unused, inspect the chimney before use to ensure no blockage has occurred. Also ensure that the air vent to the room of the stove is clear.

Trouble shooting

NOTE: Excess fume emission to the room must not be tolerated.

Fire burns very rapidly and rewood log sling periods are not being met.

- 1 Chimney draw is very high, chimney damper may be required.
- 2 Wood logs load too small for damper setting.
- 3 Door seals are worn.
- 4 Adjust damper for proper fire control

Fire will not burn properly

- 1 Chimney draught is too low
- 2 Damper is closed
- 3 Excessive horizontal flue used in rear flue connection
- 4 Ash covering all air ways into firebox
- 5 Chimney and/or stove blocked
- 6 Wood logs is wet
- 7 No Vent present in room

Stove emits fumes

- 1 Chimney blocked
- 2 Door seals require replacing
- 3 Excess down drafts in chimney
- 4 Chimney draught below 10Pa.

Glass blackens excessively

If the stove is fitted correctly and the correct lighting and operation of the stove is adhered to, blackening of the glass should always burn off after a period of full output. A poor draw and or the use of wet or improper wood logs will often lead to excessive glass blackening.

Chimney fire

If the stove and chimney are kept clean, no fire should occur. If however it does happen, close the stove damper fully, close the stove doors tightly. Only once the fire in the stove and chimney has gone out should the stove be opened and the stove and chimney cleaned thoroughly. If the fire is substantial and doesn't extinguish, the fire brigade should be called. After a bad chimney fire, expert help should be sought to have the chimney examined for any damage before the stove is used again.

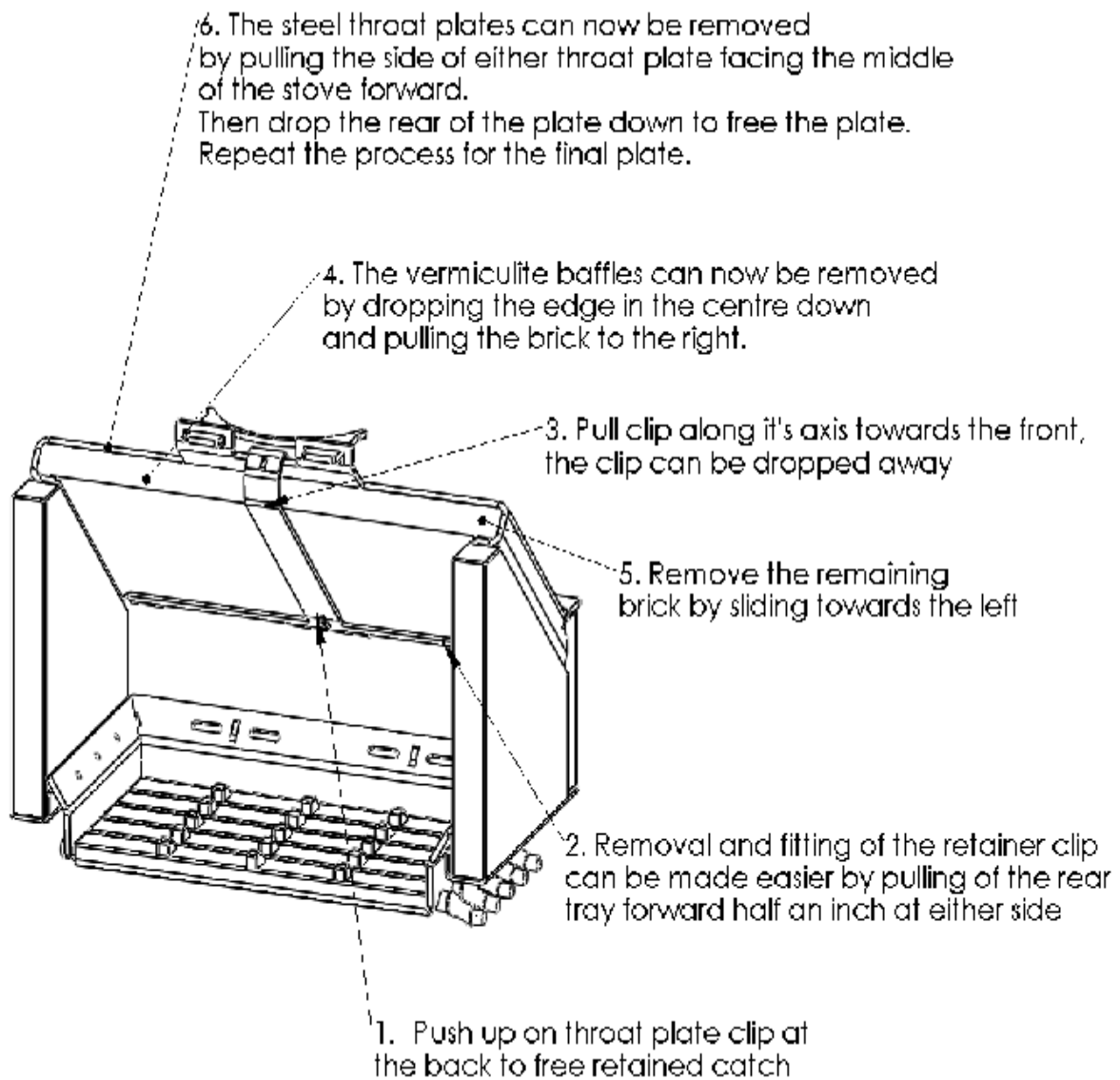


Fig 3

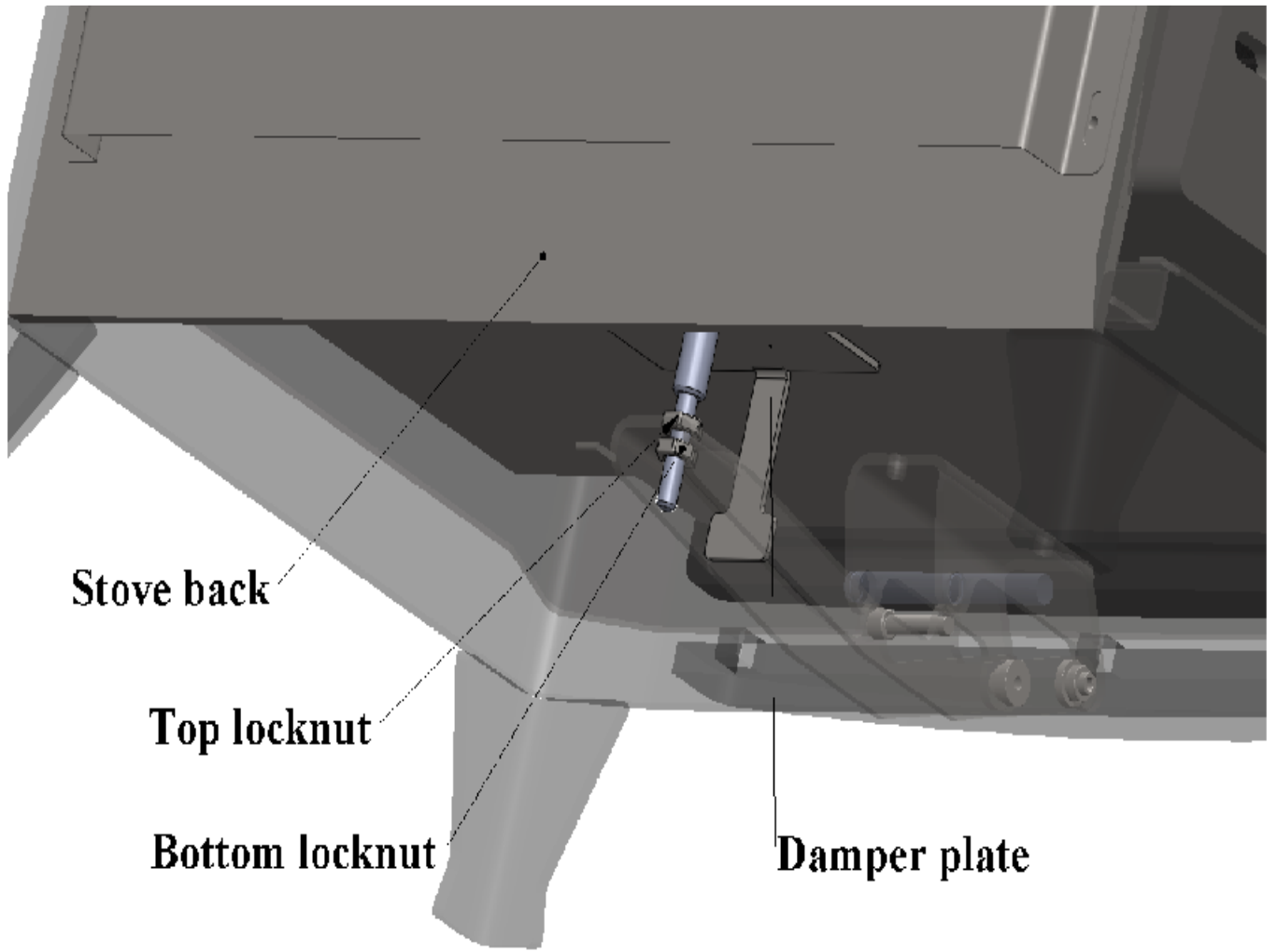


Fig 4

Technical specifications

Name	Units	Inis Airc
Fuel used *		wood logs
Max. measurements of wood logs	mm	300x100x150
Efficiency at nominal heat output	%	71.2
Nominal heat output	kW	6
CO concentration (at 13% O ₂)	%	0.2
Flue spigot outside diameter	mm	134
Minimal chimney draught at nominal heat output	Pa	10
Average flue gas temperature at nominal heat output	°C	340
Combustion gas flow	g/s	6.7
Burning time of the fuel load at nominal heat output	h	0.7 ÷ 1
Fuel consumption	kg/h	2
Measurements		
Height	mm	560
width	mm	458
depth	mm	340
Weight , no more than	kg	90
* the time it takes for one load of fuel to burn completely depends on the type of fuel , humidity, amount of fuel in one load , and other factors		

The fireplace is designed for intermittent operation, i.e. normally a new load of fuel is loaded after the previous one has burned completely.

Installation Instructions

The wooden crating the stove was shipped in can be cut up for wood logs in the stove. Take great care to avoid damaging the damper mechanism on the underside of the stove when removing the stove from its shipping crate and moving it into position.

Health and Safety precautions

Please ensure that the installation of the stove complies with all the requirements of the relevant Health and safety at work acts applicable. Some materials used in fire cement are caustic and contact with the skin should be avoided. In case of contact with the skin wash with plenty of cold water. If any structural work is required for installation please take note of the possible presence of asbestos. If the presence of asbestos is found to be the

case please contact a registered asbestos removal firm.

Proper air supply must be insured to the room into which the stove is to be installed. A permanent vent opening with a minimum free area of 75 cm sq must be present and care should be taken to ensure this vent cannot be blocked. Under no circumstances should there be an extracting fan in the same room as the stove, to avoid the possibility of combustion gases being drawn into the room.

Room must be equipped with air inlet grill to prevent blocking the air supply.

This stove is not suitable for a shared flue arrangement. In addition to installation instructions supplies, the requirements of BS.8303 and BS.6461 Parts 1&2; 1984 must be fulfilled. Also all local authority bylaws and domestic building regulations including those referring to national and European Standards regarding the installation of

solid wood logs burning appliances, flues and chimneys must be observed.

Hearth and Fire Surround

If the installer has any doubts as to the positioning of the stove and necessary fire proofing etc, expert advice should be sought before any work begins.

The stove must be placed onto a fire proof hearth of at least 12mm in depth and no combustible materials is used unless adjacent fireproofing fitted. The stove positioning and hearth size are governed by building regulations for class 1 appliances. The hearth must extend 300mm to the front of the stove, and by 150mm to the sides of the stove. The installation must allow good air circulation around the stove to maximise heat transfer to the room and to avoid the fireplace overheating. To achieve this, at least an air gap of 450mm back of the stove and 600mm on the side of the stove. The fireplace shall be installed on a fireproof surface that is strong enough to bear the weight of the item. When fireplace installed on a non-fireproof floor, at least 1mm thick metal sheet or any other insulation material must be placed underneath it. Building regulations should also be checked in this regard.

Chimney

A draft test should always be performed prior to the fitting of the stove to ensure that a proper draw in the chimney is present. A chimney height of at least 4m from the top of the stove must be used. The chimney diameter must be at least 125mm. The chimney must be in good condition, be cleaned and free from cracks and blockages.

The chimney must not have too great a cross sectional area and if it is, the chimney should be lined with a suitable flue liner for solid wood logs. All chimneys and or flues used must be sealed for the best possible performance.

If a chimney is not present, then a prefabricated block chimney or twin walled flue can be installed. The draught in the chimney must be at least 10 Pa .And if there is an excessive draw in the chimney a draught stabiliser should be fitted. If any doubt exists please contact a chimney expert.

Connection to flues

When installing the stove to the chimney care should be taken to assure that the chimney can be swept and soot removed properly and easily. If the stove is to be connected using the top flue outlet the chimney can be swept through the stove, however for rear flue outlet connections, it will most often require the fitting of a soot door. A number of flue and soot door arrangements are possible and the advice of a qualified chimney expert should be sought. Horizontal sections of flue should be avoided or at least kept to a minimum. Horizontal flue sections from the stove and on any part of the flue pipe should be 127-203.2 mm MAXIMUM! The flue collar must be sealed using fibre cement and properly bolted to the stove. The blanking plate must be removed and fire cement applied to the sealing face before refitting.

Soot doors

Where the flue is installed from the rear flue outlet, the use of a soot door is necessary for proper sweeping of the chimney and removal of the soot. Adequate access to the soot door is necessary. The soot door may be placed in the existing block work or on a suitable register plate between the flue pipe and the chimney.

System controls

The stove is controlled by the single control dial on the left hand side of the stove. Please check the user manual for proper operation.

Initial firing pre-check

Before firing the stove for the first time points to check for after installation are,

1. Inspect the ash pit and firebox of the stove to ensure all the various grate components and fire bricks did not become dislodged during transport and fitting.
2. Check that the chimney is sound and clear.
3. The room has vents as described above.
4. That all door seals etc are correct and present.

5. That the damper is operational and working properly.
6. That all installation guidelines have been adhered to.
7. That all local national and European guidelines and laws have been followed.

Initial firing

The first fire should be quite small to ensure prompt extinguishing of the fire in the event of a problem. The user manual contains details on how to create a fire in the stove.

Issues to check for once the stove is alight are,

1. That no fumes are being emitted into the room,
 2. That a window is open in the room to remove fumes from the paint on the stove being emitted. Please see the paint curing procedures in the user manual.
- Once a fire has been present for at least a half hour check that the damper mechanism and riddling mechanism are operational.

Commissioning and handover.

Once the initial fire and the correct operation of the stove have been established, the user must be instructed on the proper operation and maintenance of the stove.

Answer any queries or issues the user may have and seek advice from Inis Stoves with regard to any issue you may not be in a position to answer. Advise the user to fill out and post the guarantee card that came with the stove.

Package Contents

- | | |
|--------------------------|---------|
| 1. Fireplace | : 1unit |
| 2. Heat resistant gloves | : 1pair |
| 3. Instruction manual | : 1unit |
| 4. Wooden pallet | : 1unit |

Inis Stoves 2010.