Title: Gazco Riva2 800 & 1050 Gas Fires – Installation and Servicing issues resulting in Glass Panel Failure

Date issued: 19 July 2013

Gazco Ltd., has become aware of two of incidents where installation and servicing issues have resulted in a delayed cross-lighting within the appliance causing the glass to break. This Safety Alert has been issued to raise awareness of Registered Businesses and Engineers who may encounter unmodified versions of this range of gas fires during the course of their work. This Safety Alert only applies to natural gas versions of these models.

Introduction
Gazco Limited has recently been made aware of two incidents involving Riva2 800 (natural gas) fires, where, although in both cases the products fully complied with all CE requirements, installation and servicing issues resulted in delayed cross-lighting between the pilot and main burner, resulting in the glass panel breaking.

Hazard
Following the two incidents, Gazco limited have carried out extensive tests and identified that in circumstances where a delayed cross-lighting of the fire arises in excess of 90 seconds, after the gas input has commenced, there is a risk that the glass panel can break. These circumstances are well outside of the CE testing requirements for a 60 second delayed ignition test. Where the appliance performs within the standard there is no risk of the glass breaking.

Issues
The reasons for the delayed cross-lighting in the two incidents investigated have been due to multiple installation and servicing failures. Gazco wishes to draw attention to these failures, especially as one breakage was on a gas fire installed in a gas fire showroom.

The reasons were:

a. Low gas operating pressure, below the level required for domestic installations. (On one installation in question the operating pressure at the inlet to the appliance was found to be only 15mbar)

b. Restricted pilot, resulting in a very low pilot flame

c. Blocked cross-lighting ports on the burner, these are the five ports nearest the pilot;

d. The pilot was reversed and pointing in the wrong direction;

e. Missing screws from the glass frame, which increases the likelihood of the glass breaking as it is essential all screws on the frame are in place to ensure the glass cannot move before the explosion relief flaps have been activated.

Even though all Gazco Limited products conform to all CE requirements, Gazco remains concerned that these installation/servicing issues can, in the case of multiple issues, as outlined above, have the potential to cause the glass to break on the above range of gas fires.
Modification
Gazco therefore has decided to take the following action:

i) Gazco is redesigning the explosion relief on new Riva2 800 and 1050 products, so as to be able to withstand a delayed cross-lighting of a duration far in excess of that required by the current standards, and all future production will have this enhancement.

ii) Gazco has developed a modification to be fitted to all existing Riva2 800 and 1050 models, so that the appliance will determine if there is a delayed cross-lighting and turn the appliance off within 60 seconds, should this situation arise. This is achieved by the addition of a second thermocouple at one end of the main burner.

iii) Gazco has informed Trading Standards and the Health and Safety Executive (HSE) of their concerns with regard to the European Standards as they are currently drafted, and the future need for these Standards to address the issue of delayed cross-lighting, through potential multiple installation/servicing faults.

Field modification exercise
Gazco is conducting an exercise involving the modifications of all currently installed Natural Gas models (LPG appliances are not affected) within this range of gas fires, where current installation addresses are known to the manufacturer. The current combined population of these appliances in the UK is 1,119. Already modified appliances can be recognised by the presence of an additional label identifying the appliance as having been modified, which is attached to the appliance data badge, which is located beneath the lower decorative glass trim as indicated in Figure 2 in the “Riva2 800 & 1050 – Product Safety Inspection Instructions for appliance owners and users (PR1949 Issue 1)” attached as Appendix 1.

No other models of Gazco gas fires, nor LPG models, are affected by this exercise.

Action required
Where a Registered Business or engineer encounters a natural gas version of one of these gas fires, while working on the appliance, they are asked to be vigilant in the checking of the 5 items listed as ‘a – e’ in ‘Issues’ above. Also, if it is identified, or an engineer becomes aware of any unmodified versions of these gas fires, as can be confirmed by checking the data badge, please contact Gazco Limited (details below) who will then make arrangements for the appliance to be modified. In the mean time, provided all of the checks are confirmed as correct, the appliance can be left operational. Alternatively, if no work is being carried out on the appliance, providing the customer is able to carry out the 3 visual checks, as identified in the ‘Product Safety Inspection instructions’ (see Appendix 1), again, the appliance can be left operational. The customer should be advised to make contact with Gazco Limited (details below), who will then make arrangements for the appliance to be modified. Should any of the checks fail, unless the faults can be corrected at the time of the visit, the appliance should be dealt with following the guidance as detailed in the ‘Gas Industry Unsafe Situations Procedure’ and made safe until such time as the faults are corrected.

Riva2 800 & 1050 Product Safety Inspection Instructions
Gazco have produced a document entitled “Riva2 800 & 1050 – Product Safety Inspection Instructions for appliance owners and users (PR1949 Issue 1)”, (copy attached as Appendix 1), which sets out some of the simple tests the owners and end users can carry out on their appliances to ensure they are correctly installed. This should be read in conjunction with this Safety Alert.

Note: These Owner and User instructions do not cover tests which should only be carried out by an appropriately qualified Gas Safe registered engineer, such as checking the gas pressure and ensuring the burner ports are not blocked.

Further information
For further details, or to notify details of identified unmodified appliances, please contact: Gazco Limited, Osprey Road, Sowton Industrial Estate, Exeter, Devon, England, EX2 7JG.
Telephone: (01392) 261905 Fax: (01392) 261951 or email: Riva2@gazco.com
Riva2 800 & 1050
Product Safety Inspection Instructions for appliance owners and users

**IMPORTANT**

THE OUTER CASING, FRONT AND GLASS PANEL BECOME EXTREMELY HOT DURING OPERATION AND WILL RESULT IN SERIOUS INJURY AND BURNS IF TOUCHED.

This product contains a Heat resistant glass panel. This panel should be checked before carrying out any work or using the appliance. If any damage is observed on the front face of the glass panel (scratches, scores, cracks or other surface defects), the glass panel must be replaced and the appliance must not be used until a replacement is installed. Under no circumstances should the appliance be used if any damage is observed, the glass panel is removed or broken.

It is essential that ALL of the screws that retain the glass frame are replaced and tightened correctly. Under no circumstances should the appliance be operated if any of these screws are loose or missing.
Product Safety Inspection Instructions

Product Safety Notice

Following two reported incidents with Riva2 800 and 1050 appliances arising from multiple installation and servicing failures, Gazco is requesting owners of the Riva2 800 & 1050 models to undertake some basic safety checks to ensure the correct operation of the appliance and that it has been installed, serviced and maintained correctly.

If the product has been serviced within the last 12 months it is unlikely that any of these problems will be experienced, but Gazco recommend the following inspections are carried out to establish that the appliance is safe to use:

1. Ensure all the screws on the glass window frame are present and fitted correctly.
2. Observe the ignition sequence to ensure the appliance lights correctly.
3. Check the Pilot Unit to determine that the Pilot flames are not reduced or obstructed and the pilot burner is in the correct orientation.

These instructions will detail step by step the process for reassuring you that the appliance does not have any of these installation/servicing faults.

If the appliance has any of these faults or there are any doubts as to the outcome of these safety checks, turn the appliance off and contact Gazco on 01392 261905 if you are in the UK and +44 1392 261908 if you are outside the UK to speak to our Technical Customer Service Team.

1. Glass Frame Check

The screws that secure the glass frame to the appliance stop any movement in the viewing panel in the event of any pressure being expelled. They are located behind the side and bottom decorative trims that surround the glass.

1.1 The side trims are decorative metal strips that are held in place by magnets.

To remove the side trims, lever the top out of the channel and pull down to release, see Diagram 1.

1.2 Lift out the slotted trim from the bottom of the appliance in the same manner, see Diagram 2.

1.3 With the decorative trims removed it is possible to view the glass window frame, which is held in place by screws.

Riva2 800 models have 10 screws.
Riva2 1050 models have 9 screws.
See Diagram 3 for location.

1.4 Ensure that a screw is present in all fixing slots (10 in the Riva2 800 and 9 on the Riva2 1050).

For your ease we have enclosed 10 replacement screws with these Product Safety Instructions.

The appliance Data Badge is attached to the bottom trim so take care when removing to avoid scratching the finish.

Your serial number on the letter you have received with these instructions can be checked as it is recorded on the Data Badge. Please advise Gazco if these are not the same.

UNDER NO CIRCUMSTANCES SHOULD THE APPLIANCE BE USED IF ANY OF THE GLASS FRAME RETAINING SCREWS ARE LOOSE OR MISSING. THIS COULD RESULT IN THE GLASS BREAKING AND CAUSING SERIOUS PERSONAL INJURY TO ANYONE IN FRONT OF THE GLASS.
Product Safety Inspection Instructions

1.5 If all screws are present and secure, perform the remaining safety checks and replace the decorative trims.

2. Ignition & Cross Lighting

It is essential to make sure the appliance ignites and cross-lights correctly in order to function safely and efficiently. This can be performed by visually observing the Pilot flame and listening to the lighting sequence.

To do this:

2.1 Initiate the ignition sequence for the appliance by pressing the OFF button and the UP button simultaneously.

— Several clicks and audible beeps will be heard as the fire begins the ignition process.

— The Pilot burner will light in 5 - 10 seconds.

— It should now be possible to hear the valve motor turning.

— Check that the main burner ignites after 5 seconds from hearing the motor turn.

The fuel bed should ignite in the high flame position with an even spread of flames across the whole fuel bed.

2.2 If this sequence is successful return the appliance to the 'Stand By' position by holding the down button to decrease the flame until only the Pilot Flame remains.

IF THIS SEQUENCE IS NOT SUCCESSFUL, TURN THE APPLIANCE OFF BY PRESSING THE OFF BUTTON AND CONTACT GAZCO BEFORE USING THE APPLIANCE AGAIN.

IT IS ESSENTIAL YOU DO NOT ATTEMPT TO RE-IGNITE THE APPLIANCE IF IT DOES NOT LIGHT IN THE DESCRIBED TIMESCALES.

IF ON ANY SUBSEQUENT ATTEMPT TO IGNITE THE APPLIANCE IT DOES NOT LIGHT AS OUTLINED ABOVE THEN TURN THE APPLIANCE OFF BY PRESSING THE OFF BUTTON AND CONTACT GAZCO BEFORE USING THE APPLIANCE AGAIN.

3. Pilot Flame & Burner Orientation

3.1 With the appliance in Pilot Only mode check the length and thickness of the Pilot Flame.

The Pilot Burner is located behind the front log of the fire bed and is perfectly visible when up close to the appliance viewing panel, see Diagram 4.

3.2 Without logs on the fuelbed a Pilot Unit fitted in the correct orientation faces away from the front of the appliance, see Diagram 5.

We DO NOT recommend end users remove the logs but this can be checked during a service by an appropriately qualified GasSafe engineer.

3.3 A normal Pilot Flame should be a tall and thin, blue flame with occasional yellow tips see Diagram 6.
3.4 A reduced Pilot Flame will be short and fat, see Diagram 7.

3.5 A Pilot that has been fitted in the reverse position will hardly be visible and have a flame that points forward, being obscured by the front log, see Diagram 8.

3.6 If the Pilot Flame shows signs of obstruction or is in the incorrect orientation switch off the appliance immediately by pressing the OFF button on the remote control and contact Gazco before attempting to relight.