

## Safety and Maintenance of Wood Burning Appliances

### Safety

While solid fuel burning appliances may save fuel and add charm, they have become the largest source of heating related fires in U.S. homes today. According to the Consumer Product Safety Commission (CPSC), solid fuel burning appliances cause about 5 to 10 percent of all residential home fires.

Some of the major causes are:

- Inadequate clearances from the unit to combustibles, such as walls, ceilings, floors and furniture
- Excessive creosote (a black substance that looks like liquid tar or small black flakes which burns easily) buildup in the chimney
- An improperly installed or poorly maintained chimney
- Improper installation and maintenance of the appliance itself

Some basic precautions you should follow when using your unit include:

- Read the instruction manual that came with your appliance. If you do not have one, ask a dealer who sells your type of unit for another copy or contact the manufacturer.
- Never use any type of flammable or combustible liquid to start a fire. This includes gasoline, kerosene, lighter fluid and other flammable liquids.
- Never burn plastics, garbage or wood that has been treated with a preservative, paint or other chemicals. These materials can cause corrosion in the heater, the vent and in chimneys, or produce dangerous toxic gases that could be harmful to you and your family. It is best to avoid smoky fires and use only well-seasoned wood.
- Children should be taught not to touch or play around the stove.
- Burn only the wood or solid fuel recommended by the manufacturer and according to their specifications.
- When cleaning ashes out of the unit, put them in a metal container that has a metal lid. Place the container on a concrete floor or other non-combustible surface away from other combustible materials outside your home. Do not place the ashes in a paper sack or cardboard box; there may still be a hot ember that could ignite the container. Embers may stay hot for several days.
- Protect your home with a smoke detector and carbon monoxide detectors. Place detectors throughout the house as the manufacturer recommends. Make sure the unit is UL listed or Factory Mutual (FM) approved, and that they are tested regularly.
- Place a multi-purpose fire extinguisher in the same room as the solid fuel burning unit. The fire extinguisher should be UL listed or Factory Mutual (FM) approved and have a minimum rating of 2A-10B:C. The extinguisher should be checked regularly.

### Maintenance

Solid fuel units require more maintenance than other types of heating systems and regular maintenance is vital to their efficiency and safe operation.

Although professional maintenance is recommended at least annually, there are some areas you should review on a regular basis:

- Look for cracks or breaks in the joints or welds of the unit. If you find any, have a qualified professional repair them immediately. Discontinue using the unit until the repairs are made and the problem is corrected.
- Check the condition of your firebrick liner in your stove (if applicable). If the liner appears to be wearing out, replace it immediately and discontinue use until the liner is replaced.
- A stovepipe can deteriorate and should be replaced if it is suspected of burning out. Be sure that the joints are securely fastened together with screws.