

Correct firing

Wood-fired ovens with top combustion

Lighting-up without smoke - a new way of lighting-up offers a simple and very effective way of reducing the fire's output of pollutants considerably. With this method, the wood burns progressively from top to bottom. In contrast to firing from below this method permits slower and more controlled combustion over the whole firing process. The combustion gases flow through the hot flame and burn out almost completely.

The fire is lit up at the top and burns down just like a candle!



For which firewood ovens is this lighting-up method suitable?



Für Stückholzfeuerungen
mit **Austritt der Abgase
nach oben**



Open fireplaces
Cooking stoves



Stoves



Storage ovens
Tiled stoves
Soapstone stoves

What do you have to do?



Preparation: To ensure low emissions when firing up, first place four pieces of dry fir-wood with a cross-section of around 3 x 3 cm and a length of around 20 cm along with a starter (e.g. wax-impregnated wood-shavings) In the fireplace.



Start-up module: You can make this so-called start-up module yourself quite simply - it replaces paper and cardboard. You place the four pieces of wood crosswise on top of each other and place the starter in between (red ring).



Stacking the wood in the fireplace: In larger fireplaces such as, for example, open hearths, place the pieces of wood at some distance to each other in a crossed stack; use the thicker pieces below and the thinner ones at the top.



Placing the start-up module: The start-up module is placed on top of the pile of wood (lower pieces of start-up module at right angles to the top logs). Just one match is enough to light the fire.

How do you fill other types of oven?



For **narrow combustion chambers** place the split logs with their ends to the front.



In **narrow and high combustion chambers** fill in the split logs vertically.



For **wide combustion chambers** with little depth fill in the logs with the long side to the front.



In **storage ovens** the logs are filled in with their ends to the front.

Further tips on operation

- Do not overfill the combustion chamber and **read the operating manual**.
- Never restrict combustion by closing the air supply or the chimney flaps.
- Only use single logs or wood briquettes when adding further logs to fire. Place these onto well-glowing embers so that the wood immediately catches fire. Do not restrict air-supply when adding logs (danger of explosion). Do not add logs in storage ovens.
- Only close air flaps when hardly any glowing embers are visible any more so that the oven does not cool down too rapidly. Only close chimney flap if no glowing embers are visible any more.
- Preferably dispose of cold ash along with other rubbish.
- Regular cleaning by the chimney-sweep leads to lower dust emissions.
- You can obtain further information from your chimney-sweep and from the competence centres (municipality, canton) responsible.

See also:

www.holzenergie.ch

www.fairfeuern.ch

www.umwelt-zentralschweiz.ch

What can be burned?



- Untreated wood that has been dried over 1 to 2 years in a protected location.
- Briquettes made of untreated wood.
- The maximum thickness of the pieces of wood should be about 7 to 9 cm.
- Store firewood for at least a day in a heated room. Cold wood burns badly.

Starters are available from retailers as well as from building suppliers and hobby shops.



What should not be burned?



Starters are more suitable for firing-up than paper. Cardboard, wood from one-way and returnable palettes, boxes, crates, wood from old furniture and building renovation as well as wood from demolition and construction sites should not be used in wood-fired ovens.

Exhaust fumes from such materials damage components in the installation and cause harm to our own health as well as to the environment.

The burning of such materials is prohibited.

Smokeless after 15 minutes: Smoke also means fine dust. When correctly operated, log fires burn smoke-free after 15 minutes at the latest. If a wood fire smokes for a longer time, the stipulations of the Ordinance on Air Pollution Control (LRV) are not adhered to. In such cases **the authority responsible can order measurements to be made or other measures to be taken.**

This publication is supported by:

Swiss Federal Office of Energy SFOE and SwissEnergy · Swiss Federal Office for the Environment FOEN · Swiss Association for Wood-fired Ovens SFIH · Swiss Professional Chimney-sweep Association · Swiss Association of Stove-fitters and Tilers VHP · Swiss Cantonal Offices for the Prevention of Air Pollution

EnergieSchweiz

Holzenergie Schweiz · Neugasse 6 · 8005 Zürich
Tel. 044 250 88 11 · Fax 044 250 88 22 · info@holzenergie.ch · www.holzenergie.ch · www.energie-schweiz.ch
Publikation-Nr. 315 · 2008/01