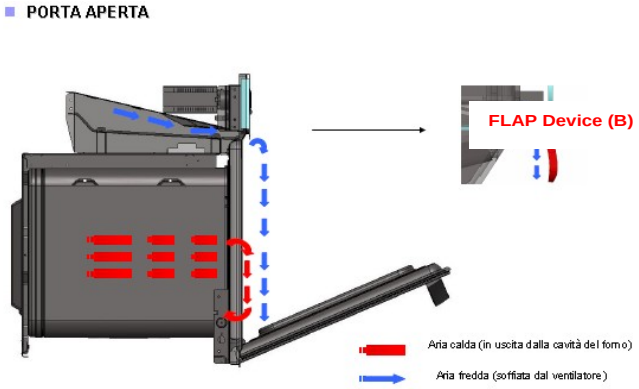
FLAP Air Barrier Module for domestic ovens & cookers

Description

The "air flow deviator" called FLAP, is an air barrier module used on built in and free standing ovens that uses the existing cooling air flow (fig. 1), at normal speed or at a higher speed, to create a hot air barrier (A) between the oven cavity (hot) and the surroundings (room temperature).
The separation barrier or hot air blade is obtained by deviating the original hot air flow downwards (Fig. 2) by means of a device "air flow deviator" (B) that is activated instantaneously when the door is opened and deactivated the same way every time the door is closed.
In all built in ovens and cookers every time the door is opened to inspect cooking progress the oven heat escapes and mixes with the external ambient creating a number of inconveniences such as:

- Hot air blasts.
- Heat dispersion with consequent lengthening of cooking time.
- Increase in consumption of electricity / energy.
- Superficial cooking and glazing non homogenous.



Technical description

The flap device is positioned beneath the control panel.
The **FLAP** is made of a support on which the air flow deviator is hinged in three or more points.
The air flow deviator (B), moves around the support by means of a door detector tooth, every time the oven door opens and closes.
The air flow deviator (B) is positioned open or closed by the door detection tooth and assisted by recall springs.
The air flow deviator (B) becomes effective as soon as the door is opened directing the hot air downwards creating a barrier effect between the oven cavity and the external ambient which helps diminish the loss of heat from the cavity.

FIG. 1
Original cooling air flow

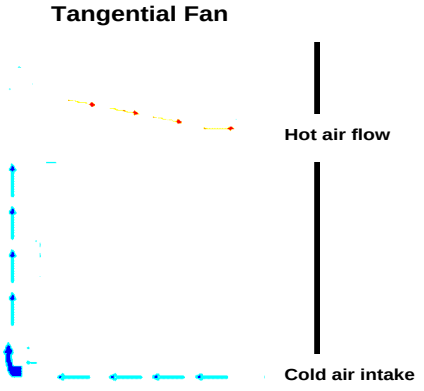
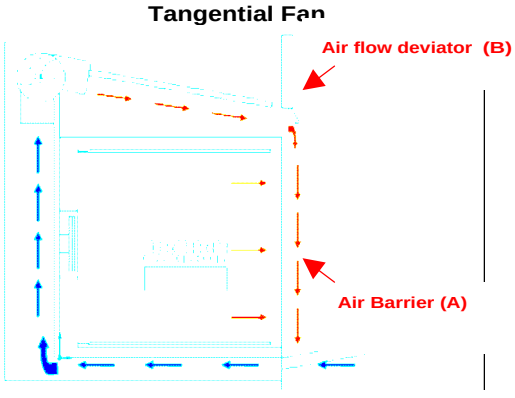


FIG. 2
Cooling air flow with FLAP device



METEOR sas
Via S.Anna, 3
I-31010 MARENO DI PIAVE (TV)
Phone +39.0438.4939
Fax +39.0438.493929
info@meteoritaly.com
www.meteoritaly.com
Part.IVA 04255770267