



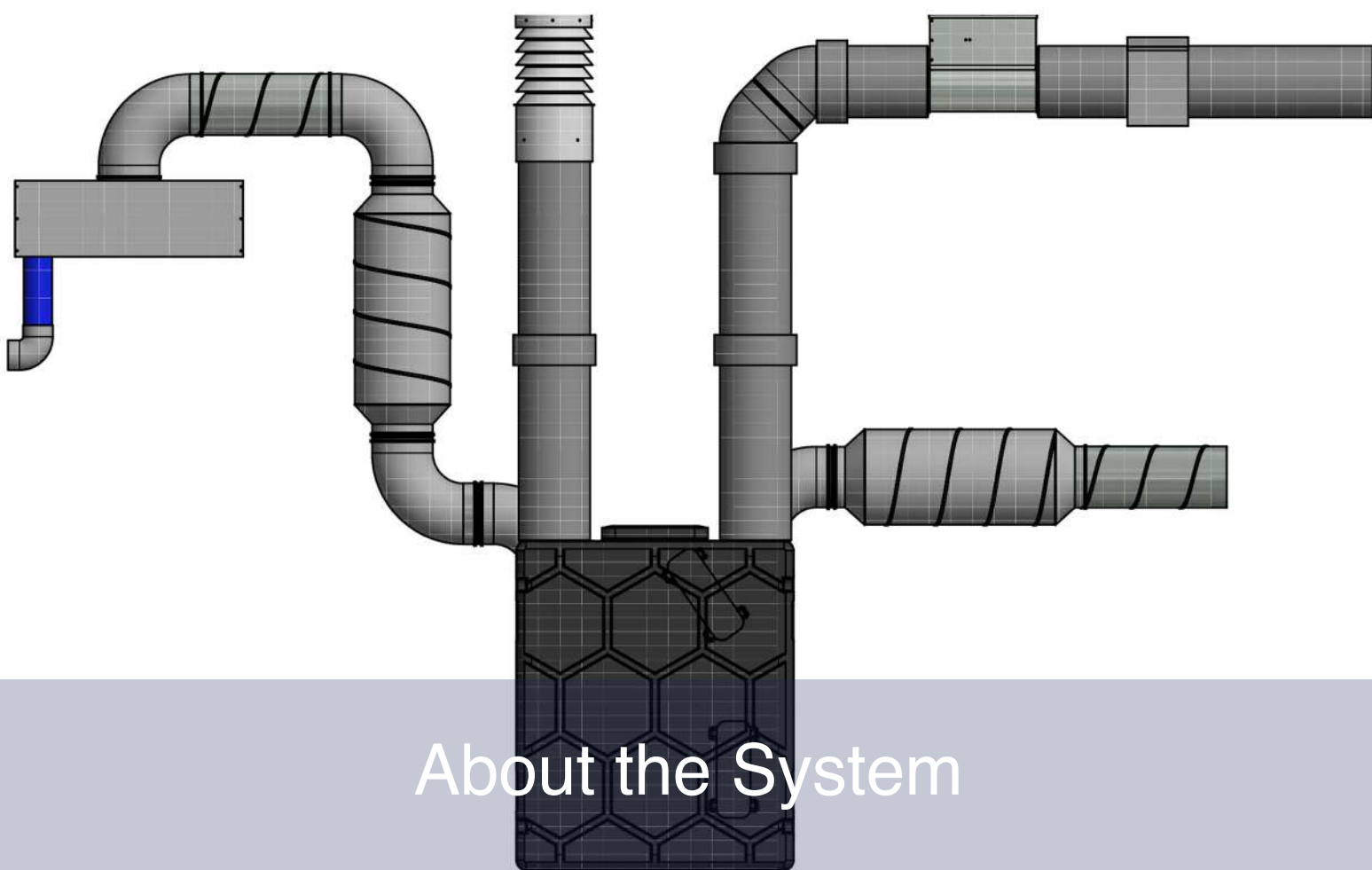
PASSIVE  
HOUSE  
SYSTEMS

**MAINFRANKEN**

LÜFTUNG SERIES

# **EPP DUCTS AND FITTINGS**





The EPP duct system is made of expanded polypropylene. The system has a number of design and installation advantages: low weight, quick installation (no additional connectors or screws required), no additional insulation is required since the material itself is already an insulator, easy to cut using hand tools, no thermal bridges. Thermal conductivity:  $\lambda=0.039$  [W / m \* k].

#### **Dimensions:**

Ducts and fittings are available in the following diameters (inner): Ø125 and Ø150. The ducts are sold in 1000mm length.

The wall thickness is 15mm (standard version, graphite color).

The inner diameter of the EPP duct system fits the size of standard spiral ducting.

#### **Installation:**

The EPP ducts and fittings are connected using a female coupling which is supplied separately.

EPP is easy to process, each 90° bend can easily be cut in half, giving two 45° bends.

The ducts fit directly into the connectors of the PHS heat recovery units and into the PHS MEV unit and distribution boxes (manifolds).

# EPP Duct

## Specification

Round ventilation duct made of expanded polypropylene (EPP). The most important features of the product are: rigid construction, low weight, easy assembly (female coupling on each element) and good thermal insulation. EPP ducts, used, for example, as sections of the supply and exhaust ventilation systems with heat recovery, do not require additional insulation. The system eliminates the formation of thermal bridges.

EPP ducts are manufactured in 1000 mm sections and diameters 125 and 150 mm. The standard wall thickness is 15mm (gray colour).

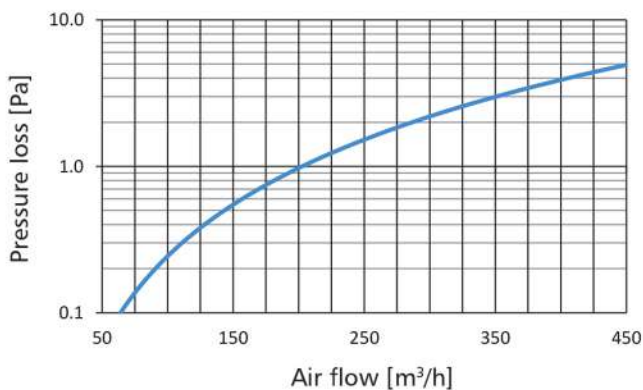


## Technical Data

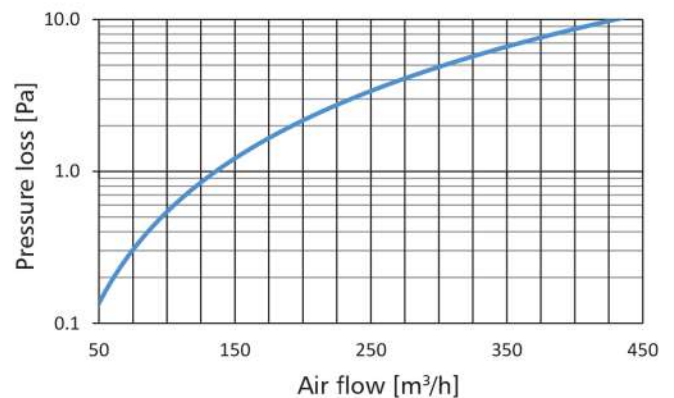
Thermal conductivity:	0.039 W / m * K
Airtightness class:	C
Surface roughness:	0.077 mms, Humidity as standard

Code	Diameter	Wall thickness	Length
HRV008E2	125mm	15mm	1000mm
HRV007F2	150mm	15mm	1000mm

Measurement: **inner diameter: 150mm, length: 1m,**  
temp: 28.5°C, P<sub>atm</sub>: 1004 mBar, ρ (density): 1.159 kg/m<sup>3</sup>



Measurement: **inner diameter: 125mm, length: 1m,**  
temp: 25°C, P<sub>atm</sub>: 1004 mBar, ρ (density): 1.173 kg/m<sup>3</sup>



# EPP 90°/45° Bend

## Specification

90° ventilation bend made of expanded polypropylene (EPP).

Bends are produced in diameters 125 and 150 mm. The standard wall thickness is 15mm (gray).

The 90° bend can be cut in half along the extrusion, forming two 45° bends.

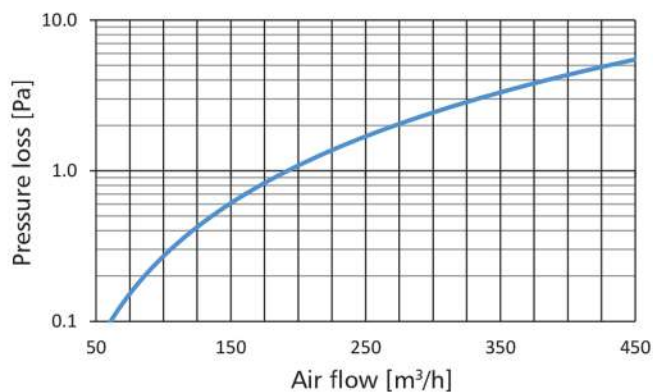


## Technical Data

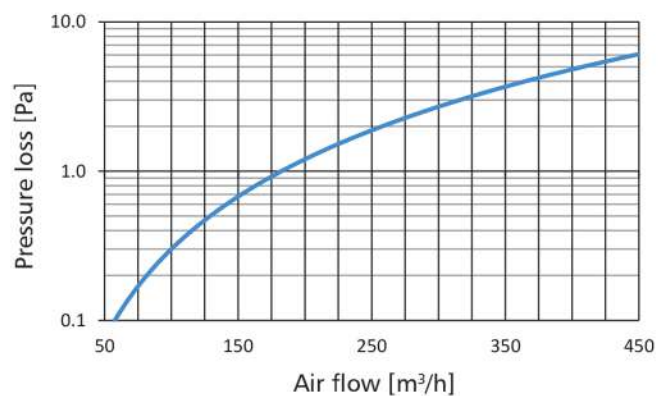
Thermal conductivity:	0.039 W / m * K
Airtightness class:	C
Surface roughness:	0.077 mms, Humidity as standard

Code	Diameter	Wall thickness	Angle
HRV008E2	125mm	15mm	90 deg
HRV007F2	150mm	15mm	90 deg

Measurement: inner diameter: 125mm, angle: 90°, temp: 25°C, P<sub>atm</sub>: 1004 mBar, ρ (density): 1.173 kg/m<sup>3</sup>



Measurement: inner diameter: 150mm, angle: 90°, temp: 28.9°C, P<sub>atm</sub>: 1004 mBar, ρ (density): 1.158 kg/m<sup>3</sup>



# EPP Female Coupling

## Specification

Female coupling made of expanded polypropylene (EPP) for connecting ducts and fittings.

The female couplings are produced in the following diameters: 125 and 150 mm.

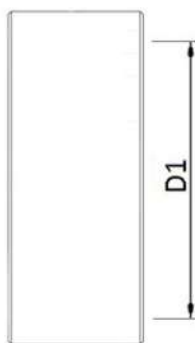
## Technical Data

Thermal conductivity:	0.039 W / m * K
Airtightness class:	C
Surface roughness:	0.077 mms, Humidity as standard

Code	Diameter	Wall thickness
HRV008E2	125mm	15mm
HRV007F2	150mm	15mm



## Dimensions



## Assmebly Method



# EPP T-Piece

## Specification

EPP Pipe made of expanded polypropylene (EPP) for connecting ducts and fittings.

The female couplings are produced in the following diameters: 150mm.

The terminations are female so no connectors are required.

## Technical Data

Thermal conductivity:	0.039 W / m * K
Airtightness class:	C
Surface roughness:	0.077 mms, Humidity as standard

Code	Diameter	Wall thickness
HRV007F4	150mm	15mm



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