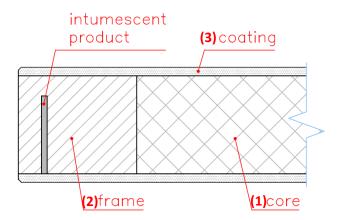


# Interior revolving door, DF30

#### **Structure**

The basic structure consists of a core (1), frame (2) and coating (3).



(1) The core is a chipboard based on flax fibers or wood chips with a density of 400 kg/m<sup>3</sup>.

## **Options**

- Full chipboard, with extra density 600 kg/m<sup>3</sup> (only with door thickness 40 mm)
- (2) Around the core is a frame in (fingerwelded) spruce with a volume density of  $\pm 450 \text{ kg/m}^3$ . The wood is dried to a humidity percentage of 8 to 12 %.

#### **Options**

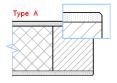
- o Frame in hard wood to choice
- Reinforcement for lock
- o Reinforced post (in case of invisible hinges, bv. multi-point lock, ...)
- Reinforced bottom and/or upper support (for the purpose of a built-in door locker or dropseal, ....)
- (3) At both sides a composite panel with high density fiber (=HDF) is glued under pressure at a temperature of ca. 95°C. The HDF-panel has a thickness of 3 or 5 mm and a density of  $\pm$  900 kg/m<sup>3</sup>.

## **Possibilities of finishes**

#### Coating:

- o <u>HDF pretreated</u>: white ground layer as preparation for painting.
- HPL (High Pressure Laminate): the HDF is glued at both sides with a HPL top coat at choice, minimal thickness 0,6 mm. Before the glueing process the door is calibrated in thickness at both sides by means of a grinding process.
- <u>Veneer</u> (grinded grain 120): the HDF is glued at both sides with a veneer at choice, minimal thickness 0,6mm. Before the glueing process the door is calibrated in thickness at both sides by means of a grinding process.

# Edging

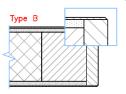


o <u>Type A:</u>

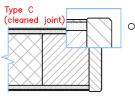
no edging slat (in other words frame wood and HDf is visible sideways)



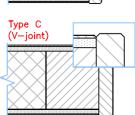
Type B: (overlayed edging slats, only possible with HPL or veneer doors)



Before the coating of the HPL or veneer, a hard wooden edging slat (thickness 8 mm) is glued to the frame at the long sides and/or the upper and bottom side. The coating is covering the edging slats and thus the slats are not visible when the door is closed. Number of slats and type of wood can be freely chosen.

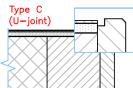


Type C: (visible edging slats)



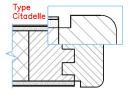
After the coating, a hard wooden edging slat (thickness 10, 12, 15, 20 or 25 mm) is glued to the frame at the long sides and/or the upper and bottom side. The coating ends at the edging slats which means that the slats stay visible when the door is closed. The edging slat protrudes ca. 0,5 mm opposite to the door surface. Number of slats and type of wood can be freely chosen. The connection between the vertical and horizontal slat is straight to straight.

The joint between the edging slat and the coating can be chosen:



- Cleaned joint ( = no visible joint)
- V-joint
- U-joint

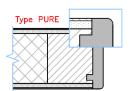
Type Citadelle: (special type of visible edging slats)



After the coating, a hard wooden edging slat (thickness 19 mm) with a double tongue and groove is glued to the frame at the long sides and/or the upper and bottom side. The coating ends at the edging slats which means that the slats stay visible when the door is closed. The edging slat protrudes ca. 0,5 mm opposite to the door surface. Number of slats and type of wood can be freely chosen.

The outer corners of the slats are rounded and the connection between the long sides and cross sides are oblique. The joint

The joint between the edging slat and the coating consists of a U-seam 4 x 4 mm.



#### Type PURE: (Polyurethane finishing)

After the coating, a plastic slat with a thickness of 7 mm and made of a 2 component polyurethane resin is molded to the long sides and/or bottom and upper side by a double tongue and groove connection. The coating ends at the edging slats which means that the slats stay visible when the door is closed. The transition between the coating and the edging slat is jointless and flat with the door surface. The door is 3° slanted before the molding so that the thickness of the PU slats are equal at both sides. The PU-slat is colored in the mass and doesn't need any post processing (varnishing, sanding, ...)



The slats cannot be painted afterwards and are available in following standard colors:

- RAL 9010 (white)
- RAL 7047 (light grey)
- RAL 7037 (mid grey)
- RAL 7024 (dark grey)

Other RAL-colors are available on request.

## **Dimensions**

Standard height: 2015 / 2115 mm

Standard width: 630 to 1230 mm (ascending with 50 mm)

Standard thickness: 40,50 and 60 mm

Customization is possible (limited by Benor attestation)

- thickness 40 mm: maximum height x width of 2300 x 1230 mm
- thickness 50 mm: maximum height x width of 2300 x 1580 mm or 2640 x 1310 mm
- thickness 60 mm: maximum height x width of 3100 x 1580 mm

Maximal door height in case of Pure-edging slats is 2700 mm.

## **Doorweight**

Full chipboard 40 mm : 20 kg/m² (with extra density : 25 kg/m²)

Full chipboard 50 mm :  $27 \text{ kg/m}^2$ Full chipboard 60 mm :  $35 \text{ kg/m}^2$ 

# Fittings<sup>(1)</sup>

- All current hinges (visible and invisible) are applicable (number of hinges to be determined in accordance with door weight)
- All current locks and fittings are applicable
- Drop seal
- Doorhandle or -locker (built-in or built-up)
- Slider- and leverlock
- Grid

# Options (1)

- Rf30-glazing
- Door with top panel
- Door with stroke
- Double revolving doors (with stroke or with built-up batten)
- Door with leadlayer, steel layer or aluminum layer (see separate technical sheets)
- Other : on demand
- (1) types, number, dimensions and instruction conditions must be in accordance with Benor/ATG 1639.



## **Commercial name**

- DF30 Revolving door

## **Technical features**

A Df30 revolving door is a door with a fire resistance of 30 minutes and has a technical approval with certificate **Benor/ATG1639**. Provided that installation has been done according to the instructions the door has an acoustic value of Rw = 27 for door thickness of 40 mm (DCA 1) and Rw = 30 for a thickness of 50 of 60 mm (DCA2).

# **Installation possibilities**

Can be installed in combination with different kind of wooden or metal frames provided that these are mentioned in the Benor ATG 1639.

Standard slacks of 7 mm at the bottom of the door according to Benor-attest (uptil 11 mm possible with extra strip at the bottom of the door).