

MBS | MBZ

SELF-TAPPING SCREW FOR MASONRY



- Electrogalvanized carbon steel
- Suitable for dense and semi-hollow materials
- Fastening of doors and windows
- The countersunk head (MBS) allows PVC and aluminium window frames to be installed without damaging the frame
- The cylindrical head (MBZ) is able to penetrate and remain embedded in timber frames
- Strength values in different substrates tested in cooperation with the Institute for Window Technology (IFT) in Rosenheim
- The HI-LOW thread allows for safe fastening even near the edges of the support, thanks to the reduced tension induced on the material
- Through fastening

SERVICE CLASS	SC1 SC2
MATERIAL	Zn ELECTRO PLATED electrogalvanized carbon steel



MBS



MBZ

CODES AND DIMENSIONS

MBS - countersunk screw

CODE	d ₁ [mm]	L [mm]	pcs.
MBS7552	7,5 TX 30	52	100
MBS7572		72	100
MBS7592		92	100
MBS75112		112	100
MBS75132		132	100
MBS75152		152	100
MBS75182		182	100
MBS75212		212	100
MBS75242		242	100

MBZ - cylindrical head

CODE	d ₁ [mm]	L [mm]	pcs.
MBZ7552	7,5 TX 30	52	100
MBZ7572		72	100
MBZ7592		92	100
MBZ75112		112	100
MBZ75132		132	100
MBZ75152		152	100
MBZ75182		182	100
MBZ75212		212	100
MBZ75242		242	100

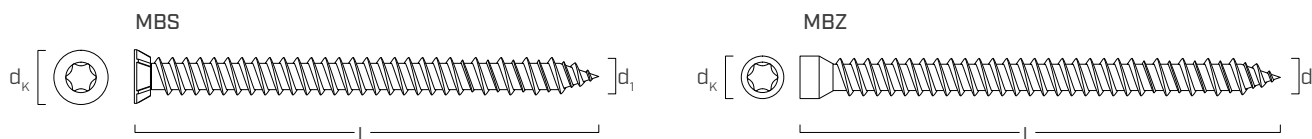


FIELDS OF USE

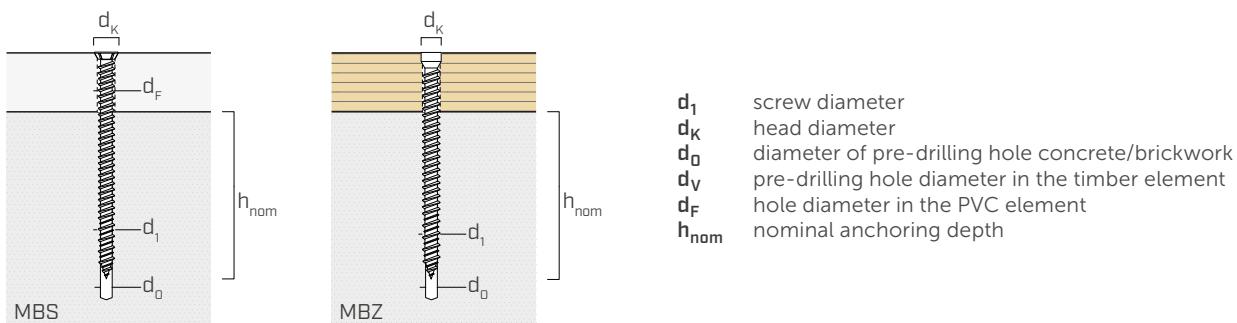
Fastening of timber (MBZ), PVC and aluminium (MBS) window frames on the following supports:

- solid and perforated brick
- solid and perforated concrete
- lightweight concrete
- autoclaved aerated concrete

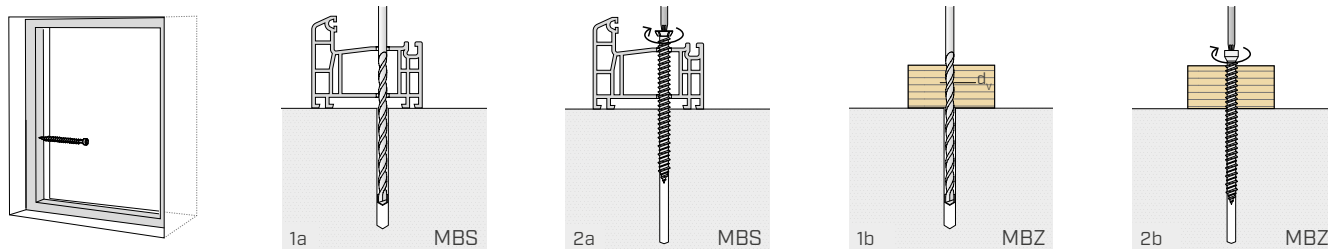
■ GEOMETRY AND PARAMETERS OF INSTALLATION



		MBS	MBZ
Nominal diameter	d₁	7,5	7,5
Head diameter	d _k	10,85	8,4
Diameter of pre-drilling hole concrete/brickwork	d ₀	6,0	6,0
Pre-drilling hole diameter in the timber element	d _v	6,2	6,2
Hole diameter in the PVC element	d _F	7,5	-



■ INSTALLATION



■ STRUCTURAL VALUES

BRICKS

		pull-out	compression	shear	shear with lever arm ⁽¹⁾
Type of support	h_{nom,min} [mm]	N_{Rk,p} [kN]	N_{Rk} [kN]	V_{Rk} [kN]	V_{Rk,b} [kN]
Solid brick	40	0,31	9,02	2,93	2,14
Hollow brick	60	– (2)	0,13	1,33	0,57

Characteristic values tested at IFT ROSENHEIM®.

⁽¹⁾The screws were tested considering a lever arm of b = 20 mm.

⁽²⁾Value not available.

CONCRETE

Type of support	h_{nom,min} [mm]	N_{Rk,p} [kN]
Concrete ⁽³⁾	30	0,89
Lightweight concrete	80	0,17
Autoclaved aerated concrete	80	0,11

The recommended withdrawal values are obtained considering a safety coefficient of 3.

⁽³⁾C20/25 grade concrete.