

# TOGE TSM BC

Parapet anchor for fastening of scaffolding and formwork in renovation areas

### Authorized Approval

Our parapet anchors have a general technical approval / general type approval (Z.21.8-2048). This approval guarantees that the anchors meet the highest safety and quality standards.

### Frost proof

Sealing the borehole prevents water penetration and frost damage in winter.

### High Loads

High load bearing capacity in cracked and non-cracked concrete.



### Fast and safe installation

The optimized thread enables a quick and easy embedment process.

### Immediate Load

Immediately loadable directly after installation.

### Sustainable

Reusability of the fastening part.

## Approval

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General technical approval Z-21.8-2048.

### Base Materials

Application in cracked and non-cracked concrete of strength classes from C20/25 to C50/60.



## Technical characteristics

### Installation of parapet anchor with connector M24 according to Z-21.8-2048

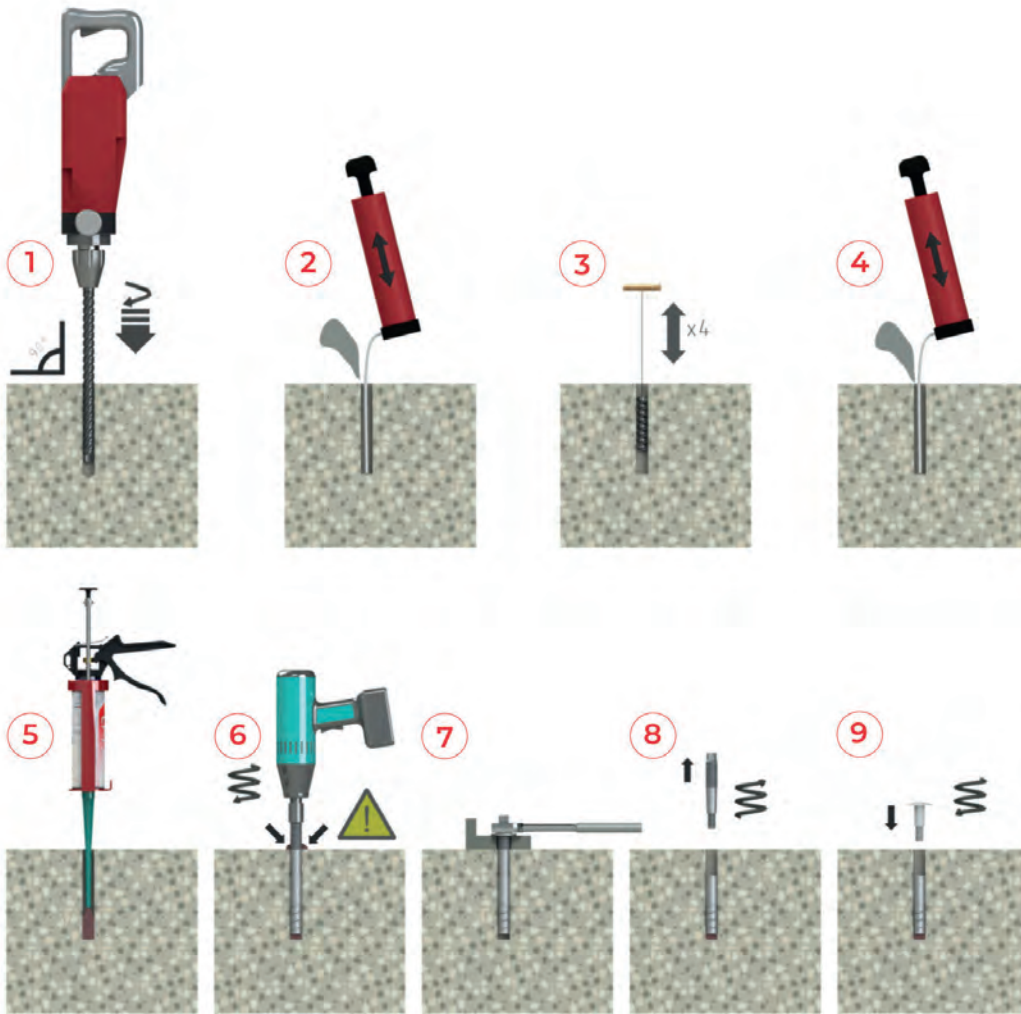
Anchor size		TSM BC 22
Length of female threaded sleeve	L [mm]	75
Length of connector	L [mm]	190
Nominal diameter of drill bit	$d_o$ [mm]	22
Depth of drill hole	$h_o \geq$ [mm]	160
Effective anchorage depth	$h_{ef}$ [mm]	150
Diameter of clearance hole in the fixture	$d_f \leq$ [mm]	28
Installation torque (for metrical thread)	$T_{inst}$ [Nm]	80
Minimum edge distance	$C_{min} \geq$ [mm]	225
Minimum spacing	$S_{min} \geq$ [mm]	450
Minimum basement thickness	$h_{min} \geq$ [mm]	200
Hexagon drive for mounting the screws	SW [Nm]	17
Permissible tension load in cracked concrete C20/25 <sup>1) 2)</sup>	$N_{Rd,c} \geq$ [kN]	48,7
Design value of shear force for steel failure without lever arm <sup>1) 2)</sup>	$V_{Rd,s}$ [kN]	69,3
Rated torque of the tangential screwdriver	T [Nm]	$\leq 650$

### Installation of parapet anchor with connector GW15 according to Z-21.8-2048

Anchor size		TSM BC 22
Length of female threaded sleeve	L [mm]	75
Length of connector	L [mm]	75
Nominal diameter of drill bit	$d_o$ [mm]	22
Depth of drill hole	$h_o \geq$ [mm]	160
Effective anchorage depth	$h_{ef}$ [mm]	150
Diameter of clearance hole in the fixture	$d_f \leq$ [mm]	17
Installation torque (for metrical thread)	$T_{inst}$ [Nm]	80
Minimum edge distance	$C_{min} \geq$ [mm]	225
Minimum spacing	$S_{min} \geq$ [mm]	450
Minimum basement thickness	$h_{min} \geq$ [mm]	200
Hexagon socket drive for mounting the screws	SW [Nm]	12
Permissible tension load in cracked concrete C20/25 <sup>1) 2)</sup>	$N_{Rd,c} \geq$ [kN]	48,7
Design value of shear force for steel failure without lever arm <sup>1) 2)</sup>	$V_{Rd,s}$ [kN]	33,4
Rated torque of the tangential screwdriver	T [Nm]	$\leq 650$

<sup>1)</sup> To determine the permissible load, the partial safety factor from the approval was taken into account on the resistance side.

<sup>2)</sup> The specified values apply regardless of center and edge distances.



- 1) Drill a hole perpendicular to the concrete surface.
- 2) Thoroughly blow out the borehole.
- 3) Brush the borehole 4x.
- 4) Thoroughly clean the borehole again.
- 5) Inject composite mortar.
- 6) Screw in screws with an impact screwdriver. After reaching the screw-in depth, the composite mortar must emerge at the concrete surface.
- 7) Fix the attachment.
- 8) After work, the screw-in aid can be easily unscrewed.
- 9) Seal the hole left behind with the screw cap.