

W-VIZ/S DYNAMIC AND W-VIZ/HCR DYNAMIC INJECTION SYSTEM

28.1

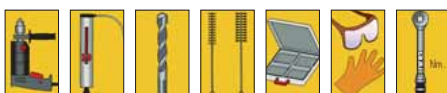
Performance data (according to measurement process I & II, see general construction permit Z-21.3-1909)					
Anchor diameter [mm]	Load cycles [n]	W-VIZ/S dynamic M12 h _{ef} 100	W-VIZ/S dynamic M16 h _{ef} 125	W-VIZ/HCR dynamic M16 h _{ef} 125	W-VIZ/S dynamic M20 h _{ef} 170
Permissible central tensile load ΔN_{perm} [kN] of an individual anchor (individual attachment) without axis and edge influence cracked and uncracked concrete C20/25 ²⁾	1	21.1	29.5	29.5	46.7
	≤ 10 ³	17.9	25.0	25.0	39.7
	≤ 10 ⁴	16.5	23.1	23.1	36.7
	≤ 10 ⁵	15.3	21.3	21.3	33.7
	> 10 ⁶	14.1	19.7	19.7	31.2
Permissible transverse load ΔV_{perm} [kN] of an individual anchor (individual attachment) without axis and edge influence cracked and uncracked concrete C20/25 ²⁾	1	27.2	50.0	50.0	78.4
	≤ 10 ³	21.6	42.5	42.5	71.5
	≤ 10 ⁴	14.2	27.9	27.9	49.0
	≤ 10 ⁵	7.8	13.7	13.7	21.6
	> 10 ⁶	6.1	11.1	11.1	15.6
Permissible central tensile load ΔN_{perm} [kN] of an individual anchor (multiple attachment) without axis and edge influence cracked and uncracked concrete C20/25 ²⁾	1	17.6	24.5	24.5	39.0
	≤ 10 ³	14.9	20.9	20.9	33.1
	≤ 10 ⁴	13.8	19.3	19.3	30.6
	≤ 10 ⁵	12.7	17.8	17.8	28.2
	> 10 ⁶	11.4	16.4	16.4	24.5
Permissible transverse load ΔV_{perm} [kN] of an individual anchor (multiple attachment) without axis and edge influence cracked and uncracked concrete C20/25 ²⁾	1	22.6	42.0	42.0	65.0
	≤ 10 ³	18.0	35.4	35.4	59.5
	≤ 10 ⁴	11.8	23.2	23.2	41.0
	≤ 10 ⁵	6.5	11.4	11.4	18.0
	> 10 ⁶	4.7	8.5	8.5	12.0

Characteristic values										
Minimum component thickness	h _{min} ≥ [mm]	130	170/160 ³⁾	170/160 ³⁾	170/160 ³⁾	230/220 ³⁾				
Minimum axle base cracked concrete uncr. concrete	s _{min} ≥ [mm]	50	80	60	60	60	60	80	80	
Minimum edge spacing cracked concrete uncr. concrete	c _{min} ≥ [mm]	50	55	60	60	60	60	80	80	
Axial spacing	s _{cr,N} [mm]	300		375		375		510		
Edge spacing	c _{cr,N} [mm]	150		190		190		255		
Effective anchoring depth	h _{ef} [mm]	100		125		125		170		
Nom. drill dia.	d ₀ [mm]	14		18		18		24		
Drill hole depth	h ₀ ≥ [in mm]	105		133		133		180		
Through-hole in the component being connected	d _f ≤ [mm]	15		19		19		25		
Torque while installing anchor	T _{inst} = [Nm]	30		50		50		80		
Cleaning brush dia.	D ≥ [mm]	15		19		19		25		

Drill hole cleaning	M12 / M16: Blow out 2x, brush out mechanically 2x, blow out 2x M20: 2 x blow-out with compressed air (6 bar, oil-free), 2 x mechanical brush-out, 2 x blow-out with compressed air (6 bar, oil-free)				
Cleaning Brush (Steel)	Art. No. P.Qty. = 1	0905 499 003	0905 499 004	0905 499 004	0905 499 005
Machine Mount	Art. No. P.Qty. = 1	Hexagon: Art. No. 0905 499 101/SDS-plus Mount: Art. No. 0905 499 102			
Extension	Art. No. P.Qty. = 1	0905 499 111			
Brush Template	Art. No. P.Qty. = 1	0905 499 099			
Blow-Out Pump	Art. No. P.Qty. = 1	Blow-Out Pump: Art. No. 0903 990 001			Compressed-Air Nozzle ⁴⁾ : Art. No. 0905 499 201

Anchor dimensions								
W-VIZ/S dynamic		M12		M16		HCR M16		M20
Effective anchoring depth	h _{ef} [mm]	100		125		125		170
Total length	l [mm]	155	180	195	215	185	210	275
Max. attachment height	t _{fix} [mm]	25	50	30	50	25	50	50
Designation		W-VIZ-A/S dyn M12-25/155	W-VIZ-A/S dyn M12-50/180	W-VIZ-A/S dyn M16-30/195	W-VIZ-A/S dyn M16-50/215	W-VIZ-A/HCR dyn M16-25/185	W-VIZ-A/HCR dyn M16-50/210	W-VIZ-A/S dyn M20-50/275
Anchor bar W-VIZ-A/S dyn. Galvanized steel	Art. No.	0905 481 201	0905 481 202	0905 481 601	0905 481 602	Available on special order	Available on special order	0905 482 001
Packing unit	P.Qty.	10	10	10	10	-	-	5
WIT-VM 100 Mortar Cartridge		Mortar Cartridge, 330 ml (incl. 1 static mixer) Art. No. 0905 440 003					P.Qty. = 1/12	
Number of attachment points/cartridges	Approx. qty.	20	16	13	11	13	11	6
Mortar filling quantity (graduation on cartridge)	[mm]	8	10	12	14	12	14	27
Static Mixer	Art. No. P. Qty = 10	0903 420 001						
Extension for static mixer	Art. No. P. Qty = 10	0903 420 004						

Würth System Components



¹⁾ The part safety coefficients of the resistances regulated in the approval and a part safety coefficient for the effects of fatigue $\gamma_{F,Ed}$ and the fatigue factors γ_{FN} and γ_{FV} have been taken into account. For the combination of tensile and transverse loads, for edge influence and anchor groups, please refer to the Guideline for European Technical Approval (ETAG), Appendix C.

²⁾ The concrete has normal reinforcement. Higher values are possible for higher concrete strengths.

³⁾ The back of the concrete component must be checked to ensure that no chipping has occurred during drilling (see Z-21.3-1909).

⁴⁾ Compressed-air nozzle designed for blow-out gun Art. No. 0714 92 13