

Sapphire nozzle 165



Properties and advantages

- Long lifetime
- Constant jet quality
- High-power and focused water jet
- Needle jet with high energy density
- Easy to install and disassemble
- Swiss Quality

Applications

- Automobile and aircraft industry
- Construction industry
- Mining
- Chemical industry
- Iron, steel and metal industries
- Energy industry
- Beverage industry
- Glass, porcelain and ceramic industries.
- Lumber industry
- Municipal operations
- Agriculture
- Mechanical and apparatus engineering
- Offshore deployment
- Shipbuilding

Description

The sapphire nozzle type 165 can be used with the optional steel Inox seal up to an operating pressure of 2500 bar. With the brass seal, an operating pressure of 1000 bar is permitted. This nozzle is used in industrial cleaning or general surface treatment. The sapphire and the nozzle body are manufactured and processed in-house. The nozzle has a cone seal and has a sealing angle of 44°.

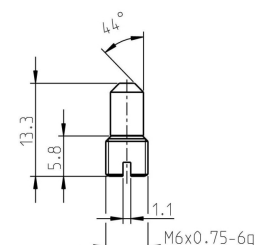
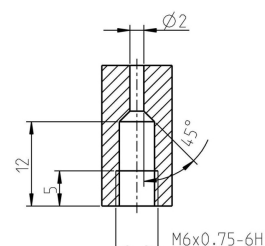
The heart of the nozzle, its the sapphire that is completely manufactured by mvt AG, thus ensuring a consistent and high quality. All sapphire are checked for scratches, cracks and flow.

This product is compatible with the following brands or products:

- Type O

ART. NO. (1)

31185__



CHARACTERISTICS	TYPE
	165
Operating pressure (bar)	max. 2500
Operating temp. (°C)	max. 150°

Performance

ART. NO.	NOZZLE SIZE IN US GAL/MIN AT 40 PSI	NOZZLE ØD MM	PRESSURE IN PSI / BAR						
			psi 2900	psi 7250	psi 10875	psi 14500	psi 21750	psi 29000	psi 36250
			bar 200	bar 500	bar 750	bar 1000	bar 1500	bar 2000	bar 2500
			FLOW RATE IN L/MIN						
31185.0100	0002	0.10	0.064	0.100	0.122	0.141	0.171	0.196	0.217
31185.0125	0003	0.125	0.100	0.157	0.191	0.220	0.267	0.306	0.340
31185.0150	0004	0.15	0.143	0.226	0.275	0.316	0.385	0.441	0.489
31185.0175	0006	0.175	0.195	0.307	0.375	0.431	0.523	0.600	0.666
31185.0200	0008	0.20	0.255	0.401	0.489	0.563	0.684	0.784	0.870
31185.0250	0012	0.25	0.399	0.627	0.764	0.879	1.068	1.224	1.359
31185.0300	0018	0.30	0.574	0.903	1.101	1.266	1.538	1.763	1.957
31185.0350	0024	0.35	0.781	1.229	1.498	1.723	2.094	2.400	2.664
31185.0400	0031	0.40	1.020	1.605	1.957	2.251	2.735	3.134	3.479
31185.0450	0040	0.45	1.291	2.031	2.477	2.848	3.461	3.967	4.403
31185.0500	0049	0.50	1.594	2.507	3.058	3.517	4.273	4.897	5.436
31185.0550	0059	0.55	1.929	3.034	3.700	4.255	5.170	5.925	6.578
31185.0600	0071	0.60	2.296	3.611	4.404	5.064	6.153	7.052	7.828
31185.0650	0083	0.65	2.694	4.238	5.168	5.943	7.221	8.276	9.188
31185.0700	0096	0.70	3.125	4.915	5.994	6.892	8.375	9.598	10.655
31185.0750	0110	0.75	3.587	5.642	6.880	7.912	9.614	11.018	12.232
31185.0800	0125	0.80	4.081	6.419	7.828	9.002	10.939	12.536	13.917
31185.0850	0142	0.85	4.607	7.247	8.838	10.163	12.349	14.152	15.711
31185.0900	0159	0.90	5.165	8.124	9.908	11.394	13.844	15.866	17.614
31185.0950	0177	0.95	5.755	9.052	11.039	12.695	15.425	17.678	19.625
31185.1000	0196	1.00	6.377	10.030	12.232	14.066	17.091	19.588	21.746
31185.1100	0237	1.10	7.716	12.136	14.801	17.020	20.681	23.702	26.312
31185.1200	0283	1.20	9.183	14.443	17.614	20.255	24.612	28.207	31.314
31185.1300	0332	1.30	10.777	16.950	20.672	23.772	28.885	33.104	36.750
31185.1400	0384	1.40	12.498	19.658	23.975	27.570	33.499	38.393	42.621
31185.1500	0441	1.50	14.348	22.567	27.522	31.649	38.456	44.073	48.928

Gasket Sold Separately

ART. NO.	MATERIAL	MAX. PRESSURE (BAR)
10025	Steel Inox	2500
10024	Brass	1500

Instructions

When manually operating high pressure guns and lances the repulsive force on the axis should not exceed 250N! If the repulsive force exceeds 150N, a support / body armour is required!

	< 150 N
	< 250 N
	> 250 N