

WOMA[®] HIGH-PRESSURE PUMPS

Reliable and powerful plunger pumps from 250 – 4.000 bar.



WATER AS A TOOL

WOMA high-pressure plunger pumps are characterised by their solid construction and excellent workmanship. The diverse range of pumps offers the right high-pressure pump for almost every high-pressure application, especially in the field of high-pressure water jet technology. Among the numerous options available for WOMA pumps is the Twin-Concept. In the range of gearbox sizes 150 to 700, this concept allows a second pump of a smaller or equal size to be connected to the free end of the drive shaft. In addition, all pumps apart from the 3-series are available as ATEX versions on request.

WOMA also offers a large selection of accessories ranging from pressure gauges, switching and regulating devices, through to various safety devices. The WOMA experts will always be glad to help you choose the right pump, regulating devices and accessories. Our application engineers will also advise you on site: together we will work with you to determine the ideal settings for pumps, devices and accessories to solve the individual application task.



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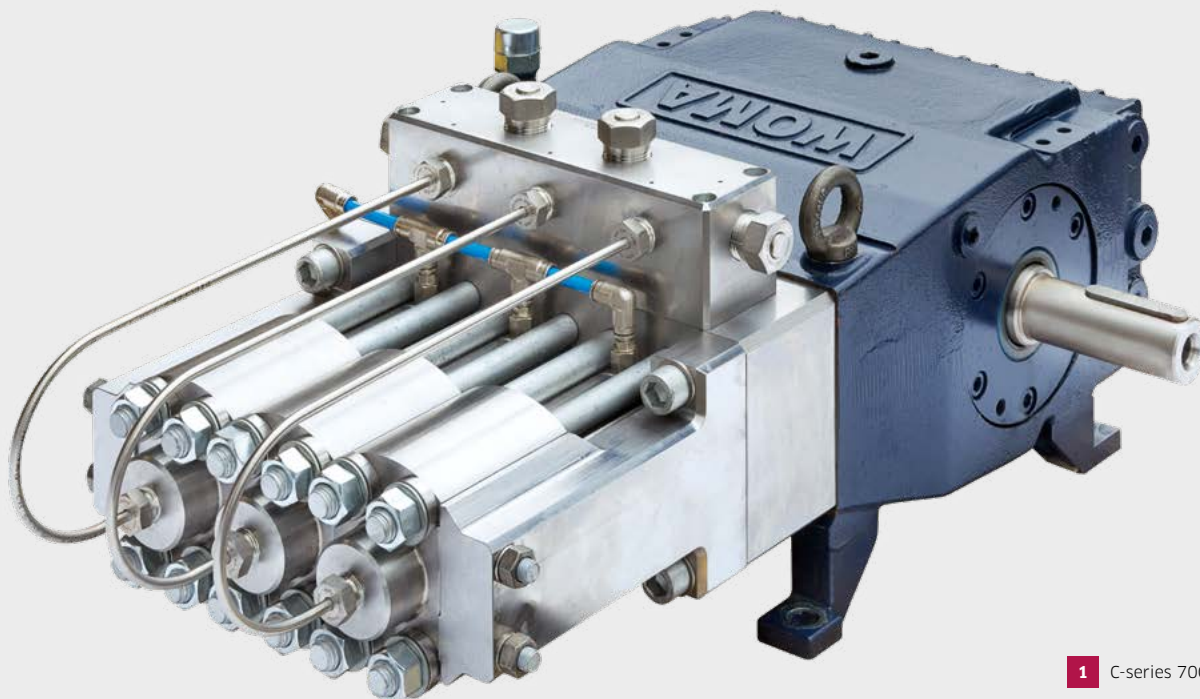


**4,000
BAR**

C-SERIES (4,000 BAR)

Power packs for water jet cutting.

The high-pressure plunger pump from the C-series delivers the highest pressure level in the WOMA pump portfolio. This pump has been specially developed for water jet cutting applications.



1 C-series 70C

Energy efficiency and productivity are the two greatest influencing factors that determine success and failure in water jet cutting. Featuring a water section that is a totally new development specially adapted to the needs of the water jet cutting sector, together with the proven and durable 70 gearbox end of the WOMA pumps, the 70C highpressure pump combines these two requirements to perfection.

The pump is capable of delivering pressures up to 4,000 bar in continuous operation. The pressure and flow rate can be infinitely controlled with a variable drive, for instance for making first cuts. Inside the

pump, high- quality materials are used for the plunger, valves and seals in cartridge design which promise a long service life. If any wear occurs in one of the three individually constructed high-pressure strands, it can be easily detected at the leakage holes and, thanks to the single strand and cartridge design, the high-pressure strand that needs to be serviced can be dismantled in just a few minutes. A new cartridge is quickly and easily installed, and the pump is immediately ready for use again. The subsequent overhaul of the removed cartridge, parallel to the running pump operation, is also carried out quickly and with inexpensive spare parts.

TECHNICAL DATA

Performance variants 70C

Pinion shaft		Crank shaft	P9		P9		P9	
750 1/min	870 1/min		4,000 bar		3,500 bar		3,000 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min
1,00		870	35	4,7	32	5,0	29	5,3
1,00		750	30	4	28	4,3	25	4,5

**3,000
BAR**



M-SERIES (3,000 BAR)

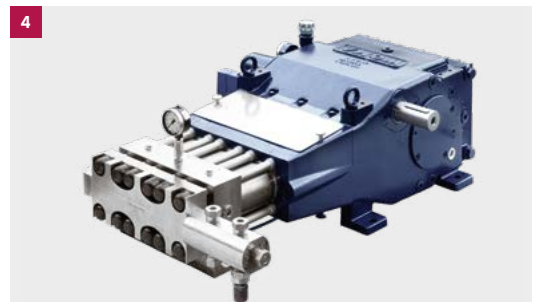
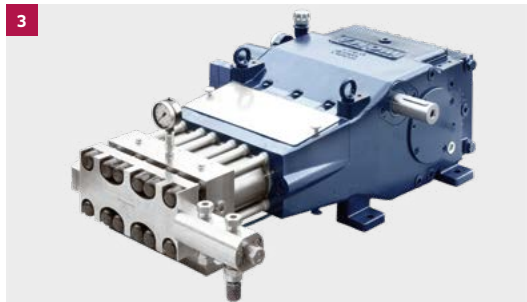
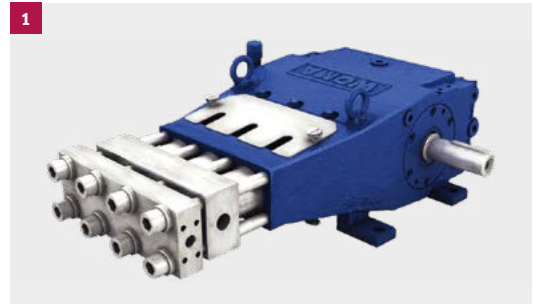
Power packs with extremely high pressures.

Complemented by the wide range of WOMA water tools, the M-series high-pressure plunger pump with its operating pressures of up to 3,000 bar is the right choice for cutting, dismantling or decoating work.

The M-series offers a suitable high-pressure pump for applications requiring especially high pressures.

The range extends from the compact 70M with a required driving power of 45 kW through to the 1000M Boxer pump, which demands a corresponding driving power of 713 kW. What all the pumps from the M-series have in common is extreme stability on account of their premium quality materials in combination with accurate manufacturing and a well thought-out design.

The robust carbide plungers are guided in precise guide rings, cooled by the sealing water system, and protected against dirt or damage for a long service life. The proven central valve design is decisive for the outstanding efficiency of the M-series.



- 1 M-series 70M
- 2 M-series 150M
- 3 M-series 190M
- 4 M-series 250M
- 5 M-series 330M
- 6 M-series 400M
- 7 M-series 550M
- 8 M-series 1000M

TECHNICAL DATA

Performance variants 70M

Pinion shaft		Crank shaft	P10				P12			
1,500 1/min	1,800 1/min		3,000 bar				2,500 bar			
Gear ratio		1/min	kW		l/min		kW		l/min	
1,00		825	33		6,0		45		9,8	
1,00		750	30		5,5		41		8,9	

Performance variants 150M

Pinion shaft		Crank shaft	P12		P14		P16		P18	
1,500 1/min	1,800 1/min		3,000 bar*		2,500 bar		2,000 bar		1,500 bar	
Gear ratio		1/min	kW		l/min		kW		l/min	
2,96		507	69		12		83		17	
3,69		488	67		12		80		17	
3,69		407	56		10		67		14	
4,57		394	54		9		64		14	
4,57		328	45		8		54		11	
			62		16		62		16	
			60		22		60		22	

Performance variants 190M

Pinion shaft		Crank shaft	P15		P16		P18		P20	
1,500 1/min	1,800 1/min		3,000 bar		2,800 bar		2,500 bar		2,000 bar	
Gear ratio		1/min	kW		l/min		kW		l/min	
4,25		424	99		18		106		20	
4,25		353	83		15		89		17	
			102		22		102		22	
			103		28		103		28	

Performance variants 250M

Pinion shaft		Crank shaft	P15		P16		P18		P20	
1,500 1/min	1,800 1/min		3,000 bar		2,800 bar		2,500 bar		2,000 bar	
Gear ratio		1/min	kW		l/min		kW		l/min	
3,57		504	118		21		126		25	
3,04		493	115		21		124		24	
3,57		420	98		18		105		20	
			121		26		121		26	
			123		33		123		33	

Performance variants 330M

Pinion shaft		Crank shaft	P18		P20		P22			
1,500 1/min	1,800 1/min		3,000 bar		2,500 bar		2,000 bar			
Gear ratio		1/min	kW		l/min		kW		l/min	
4,23		426	196		35		207		45	
4,23		355	163		29		172		38	
			172		38		172		38	
			172		47		172		47	

Performance variants 400M

Pinion shaft		Crank shaft	P18		P20		P22			
1,500 1/min	1,800 1/min		3,000 bar		2,500 bar		2,000 bar			
Gear ratio		1/min	kW		l/min		kW		l/min	
2,96		507	233		42		246		54	
3,60		500	230		42		243		53	
3,60		417	191		35		203		44	
			202		55		202		55	

Performance variants 550M

Pinion shaft		Crank shaft	P22		P24		P26		P28	
1,500 1/min	1,800 1/min		3,000 bar		2,500 bar		2,500 bar		2,000 bar	
Gear ratio		1/min	kW		l/min		kW		l/min	
3,30		455	336		61		343		75	
4,60		391	289		53		295		65	
3,96		379	280		51		286		63	
4,60		326	241		44		246		54	
			288		63		288		63	
			275		75		275		75	

Performance variants 1000M

Pinion shaft		Crank shaft	P22		P24		P26		P28	
1,500 1/min	1,800 1/min		3,000 bar		2,500 bar		2,000 bar		1,800 bar	
Gear ratio		1/min	kW		l/min		kW		l/min	
3,00		500	685		126		700		154	
3,69		488	668		122		683		150	
4,23		426	583		107		596		131	
3,69		407	558		102		569		125	
4,23		355	486		89		496		109	
			479		132		479		132	
			506		155		506		155	

Cleaning of ships and buoys

The cleaning applications of ships and buoys in ultra-high pressure water jetting are manifold. Starting with the simple surface cleaning, over to the removal of algae, shells and other deposits up to the color removal - WOMA offers for each task the suitable solution.



Concrete repair

With the help of ultra-high pressure technology, concrete can be removed quickly and safely. When concrete is removed using ultra-high pressure water jets, it creates only very minimal vibrations in the building. The steel reinforcement is exposed with pinpoint accuracy and without damage.



Paint Removal

For the removal of paints and multi-layer paints on ship walls, the ultra-high-pressure solutions with the right water tools, such as the use of the WOMA Magnet Lizard, are the best choice.



**1,500
BAR**



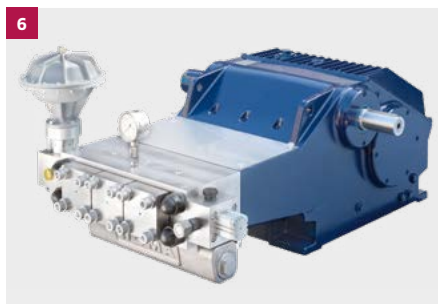
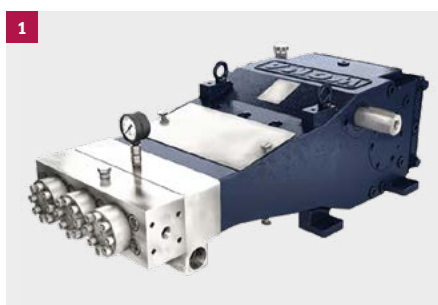
Z-SERIES (1,500 BAR)

Power packs for industrial cleaning.

Energy efficiency and resource conservation are challenges in industrial cleaning and decoating that can be capably handled by the WOMA Z-series.

With operating pressures up to 1,500 bar and nominal flow rates up to 744 l/min, the Z-series is extremely flexible in a broad range of application areas. In particular as the centrepiece of the WOMA EcoMaster ZWG with an integrated intermediate gear, these high-pressure pumps are the general purpose solution for almost every application.

Good plunger guidance ensures a long service life for the sealing system. The pumps are fitted with plungers made of different materials depending on the requirements. Pumps with an operating pressure from 1,000 bar, for example, have robust carbide plungers for an exceptionally long service life. The central valve design of the pump results in a particularly efficient volumetric efficiency and, together with the low servicing costs, contributes to the remarkably low operating costs offered by the Z-series in this performance segment.



- 1 Z-series 150Z
- 2 Z-series 190Z
- 3 Z-series 250Z
- 4 Z-series 330Z
- 5 Z-series 400Z
- 6 Z-series 550Z
- 7 Z-series 700Z
- 8 Z-series 1000Z

TECHNICAL DATA

Performance variants 150Z

Pinion shaft		Crank shaft	P19		P20		P22		P26		P30		P35	
1,500 1/min	1,800 1/min		1,500 bar		1,250 bar		1,000 bar		750 bar		570 bar		420 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
2,96		507	103	37	97	42	95	52	101	73	103	99	104	136
	3,69	488	100	36	93	40	91	50	97	71	99	95	100	130
		407	83	30	78	34	76	41	81	59	83	79	83	109
	4,57	394	80	29	75	33	74	40	78	57	80	77	81	105
		328	67	24	63	27	62	33	65	47	67	64	67	88

Performance variants 190Z

Pinion shaft		Crank shaft	P24		P26		P28		P30		P35	
1,500 1/min	1,800 1/min		1,500 bar		1,300 bar		1,150 bar		1,000 bar		720 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
	4,25	424	138	50	142	59	146	70	147	81	147	112
		353	115	42	118	49	122	58	123	67	122	93

Performance variants 250Z

Pinion shaft		Crank shaft	P24		P26		P28		P30		P35	
1,500 1/min	1,800 1/min		1,500 bar		1,300 bar		1,150 bar		1,000 bar		720 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
	3,57	504	164	60	168	71	174	83	175	96	174	133
		493	160	58	165	69	170	81	171	94	171	130
	3,04	420	137	50	140	59	145	69	146	80	145	111

Performance variants 330Z

Pinion shaft		Crank shaft	P26		P28		P30		P35		P45		P50	
1,500 1/min	1,800 1/min		1,500 bar		1,300 bar		1,150 bar		850 bar		500 bar		400 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
	4,23	426	222	81	225	95	231	110	236	152	234	257	232	319
		355	185	67	188	79	192	92	197	127	195	214	193	266

Performance variants 400Z

Pinion shaft		Crank shaft	P26		P28		P30		P35		P45		P50	
1,500 1/min	1,800 1/min		1,500 bar		1,300 bar		1,150 bar		850 bar		500 bar		400 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
	2,96	507	264	97	268	113	275	131	281	182	278	306	276	380
		500	261	95	265	112	271	129	277	179	274	302	272	375
	3,60	417	217	79	221	93	226	108	231	149	229	252	227	312

Performance variants 550Z

Pinion shaft		Crank shaft	P30		P35		P40		P45		P50	
1,500 1/min	1,800 1/min		1,500 bar		1,300 bar		1,000 bar		800 bar		650 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
	3,30	455	340	124	405	171	413	227	423	291	428	362
		391	293	107	349	147	356	196	364	250	368	312
	3,96	379	283	104	337	143	344	189	352	242	356	302
		326	244	89	291	123	297	163	303	209	307	260

Performance variants 700Z

Pinion shaft		Crank shaft	P30		P35		P40		P45		P50	
1,500 1/min	1,800 1/min		1,500 bar		1,300 bar		1,000 bar		800 bar		650 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
	3,30	545	408	149	486	206	496	273	507	349	513	435
		522	390	143	465	197	474	261	485	334	491	416
	3,30	455	340	124	405	171	413	227	423	291	428	362

Performance variants 1000Z

Pinion shaft		Crank shaft	P30		P35		P40		P45		P50	
1,500 1/min	1,800 1/min		1,400 bar		1,100 bar		850 bar		700 bar		560 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
	3,00	500	651	256	707	354	723	469	760*	598	756	744
		488	635	250	690	345	705	457	741	584	737	726
	3,69	426	554	218	602	301	615	399	646	509	643	633
		407	529	208	575	288	588	381	618	486	614	605
	4,23	355	462	181	502	251	513	332	539	424	536	527

Tank and container cleaning

Tanks and containers must be periodically cleaned from the inside to remove all contaminants. The tank washing heads from the TankMaster series ensure optimum interior cleaning results with minimal cleaning times.



Pipe cleaning

Pipes are the lifeblood of plants in all areas of industry and must therefore always be free from deposits. The cleaning of pipes with high pressure water is also possible in hard to reach places.





**1,000
BAR**

Y-SERIES (1,000 BAR)

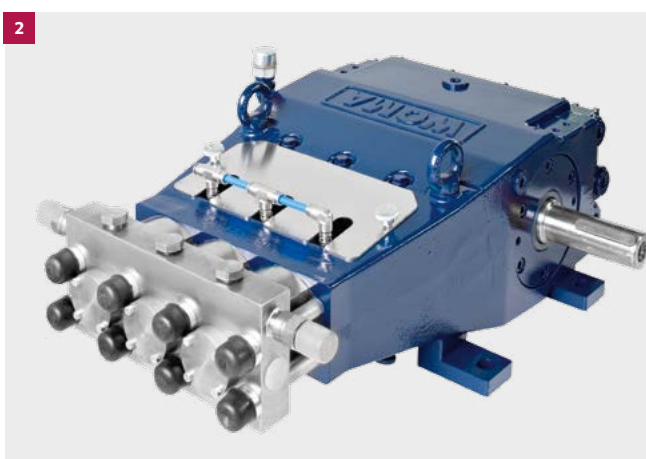
Power packs for compact superstructures.

The high-pressure pumps from the Y-series are exceedingly compact. Their small size and low weight make them especially suitable for use in high-pressure units.

With its operating pressures of up to 1,000 bar, the Y-series is outstandingly suited to many different cleaning tasks, e.g. in the chemical industry, oil and gas industries, as well as for marine applications.

Depending on the media being used, the standard carbide plunger in the 70Y pump can be replaced by a media-resistant ceramic plunger. It is also possible to fit the pump with a suction valve lift for unpressurised circulation of the water within the pump head.

The newly developed 30Y high-pressure pump extends the performance spectrum of the Y-series even further. With a required driving power of 30 kW, it is capable of pumping up to 16.7 l/min at 1,000 bar, yet still offers favourable purchase and operating costs.



1 Y-series 30Y
2 Y-series 70Y

TECHNICAL DATA

Performance variants 30Y

Pinion shaft		Crank shaft	P15		
750 1/min	1,000 1/min		1,000 bar		
Gear ratio		1/min	kW		l/min
1,00		1,000	31		16,7
1,00		750	23		12,5

Performance variants 70Y

Pinion shaft		Crank shaft	P15		P16		P18		P20	
750 1/min	1,000 1/min		1,000 bar		1,000 bar		850 bar		700 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
1,00		1,000	41	22	47	25	50	32	52	40
1,00		750	31	16	35	19	38	24	39	30



750
BAR

2-SERIES (750 BAR)

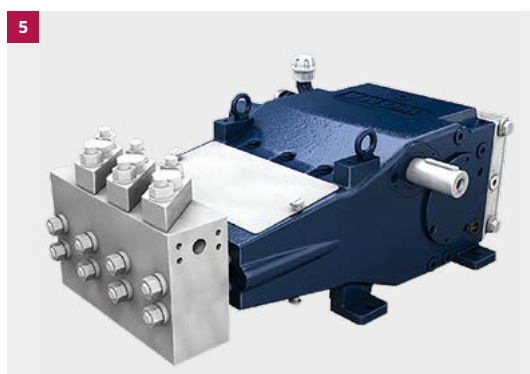
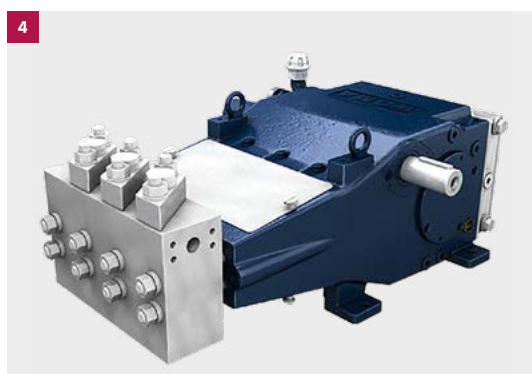
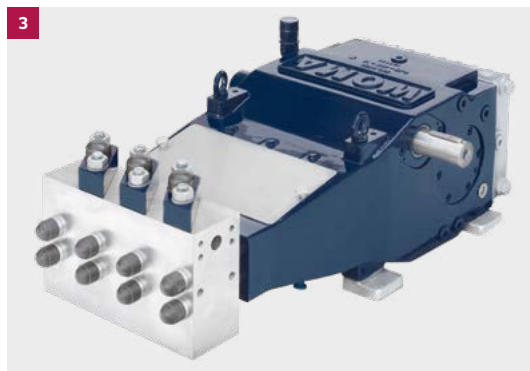
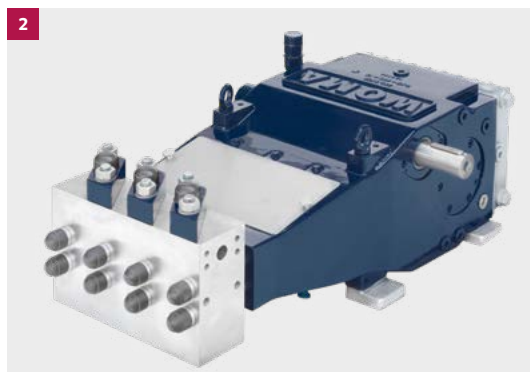
Power packs for especially harsh environments.

The robust, yet inexpensive high-pressure pumps from the 2-series generate up to 750 bar. This makes them the pump of choice in particular for cleaning pipes, tube bundles and containers.

Regardless of how harsh the day-to-day working conditions may be, the pumps from the 2-series are ideally equipped to handle them, and in doing so offer outstanding value for money. They are particularly easy to maintain and offer a long service life. The 2-series pumps are fitted as standard with ceramic plungers, which are extremely resistant to alkaline and acidic liquids. Specially coated steel plungers that are extremely hard-wearing and highly resistant to temperature shocks are available as an option. The plungers are additionally protected against contamination and damage by the newly integrated sealing water system.

On customer request the 2-series is also available with increased inlet pressure.

- 1** 2-series 702
- 2** 2-series 1002
- 3** 2-series 1502
- 4** 2-series 1902
- 5** 2-series 2502



TECHNICAL DATA

Performance variants 702

Pinion shaft		Crank shaft	P20		P24		P26		P30		P35		P40		P45	
750 1/min	1,000 1/min		650 bar		450 bar		400 bar		300 bar		220 bar		170 bar		135 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
1,00		1,000	48	39	49	57	51	68	51	91	52	125	52	165	53	209
1,00		750	36	29	37	43	38	51	39	68	39	94	39	123	40	157

Performance variants 1002

Pinion shaft		Crank shaft	P22		P26		P35		P40		P45	
1,500 1/min	1,800 1/min		750 bar		550 bar		300 bar		230 bar		180 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
3,00		500	54	38	56	54	57	102	58	134	57	171
3,63		496	54	38	56	54	57	101	57	133	57	169
3,63		413	45	31	47	45	47	84	48	111	48	141

Performance variants 1502

Pinion shaft		Crank shaft	P26		P30		P35		P40		P45	
1,500 1/min	1,800 1/min		750 bar		565 bar		415 bar		320 bar		250 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
2,96		507	99	70	101	96	103	133	105	175	104	224
3,69		488	95	68	97	92	99	128	101	169	100	215
3,69		407	79	56	81	77	83	106	84	140	84	179
4,57		394	77	55	79	74	80	103	81	136	81	174
4,57		328	64	45	66	62	67	86	68	113	68	145

Performance variants 1902

Pinion shaft		Crank shaft	P30		P35		P40		P45	
1,500 1/min	1,800 1/min		750 bar		650 bar		500 bar		400 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
4,25		424	110	78	131	108	134	144	137	184
4,25		353	92	65	109	90	112	120	114	153

Performance variants 2502

Pinion shaft		Crank shaft	P30		P35		P40		P45	
1,500 1/min	1,800 1/min		750 bar		650 bar		500 bar		400 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
3,57		504	131	94	156	129	159	171	163	219
3,04		493	128	91	153	126	156	167	159	214
3,57		420	109	78	130	107	133	143	136	182



Tank- and silo cleaning

The internal cleaning is the central task of tank and silo care. To disturb the production process as little as possible, a quick and thorough cleaning is crucial. The dense spray pattern of the TankMaster tank washing heads guarantees optimum cleaning results with minimal cleaning time.



Heat exchanger cleaning

The heat exchange processes in heat exchangers often lead to the formation of stubborn deposits, which, depending on the type, harden and reduce the flow or even completely block them. Regular and residue-free cleaning with high pressure is therefore essential for the necessary process efficiency and safety.



A photograph of an industrial setting, likely a steel mill. In the foreground, there is a bright yellow-orange molten metal slab being processed. The background shows complex machinery, including pipes, railings, and structural beams, all illuminated by a warm, orange glow from the molten metal. A green banner in the top left corner contains the text '400 BAR'.

**400
BAR**

ARP-SERIES (400 BAR)

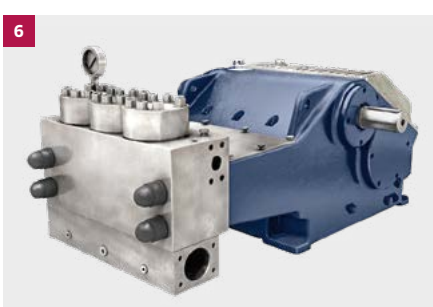
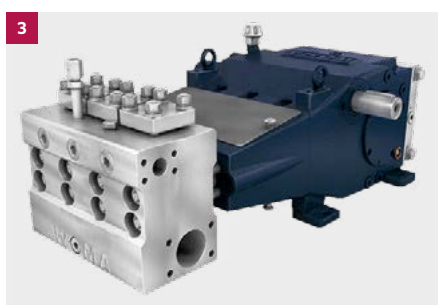
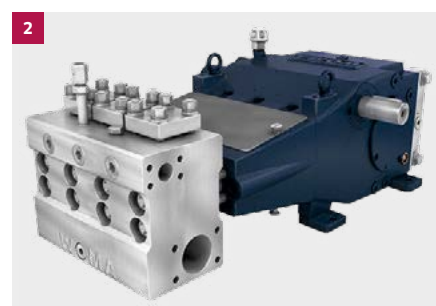
Power packs for high flow rates and contaminated water.

In descaling or sewer cleaning, the water is often contaminated. All the better that the WOMA portfolio offers the right selection of pumps for these conditions.

The ARP-series produces operating pressures of up to 400 bar and nominal flow rates of up to approx. 1,680 l/min.

ARP stands for Abrasive Resistant Pump. It is specially designed to handle long operating times, even when pumping contaminated media with granular or fibrous solids up to 300 µm. The pump can be serviced directly on site without dismantling the pump head. Up to gearbox size 250, the pump head of the ARP-series is available either as an inexpensive cast variant, or as a particularly robust design made of stainless steel. If required, super duplex steels can also be used for maximum durability.

If the system also pumps media into an open consumer, the optional suction valve lift is an economical and space-saving alternative to a bypass valve.



- 1** ARP-series 150ARP
- 2** ARP-series 190ARP
- 3** ARP-series 250ARP
- 4** ARP-series 330ARP
- 5** ARP-series 400ARP
- 6** ARP-series 550ARP
- 7** ARP-series 1000ARP

TECHNICAL DATA

Performance variants 150ARP

Pinion shaft		Crank shaft	P40		P45		P50		P55		P60	
1,500 1/min	1,800 1/min		320 bar		250 bar		200 bar		170 bar		140 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
2,96		507	105	175	104	224	103	277	107	337	105	402
	3,69	488	101	169	100	215	100	267	103	324	101	387
3,69		407	84	140	84	179	83	222	86	270	84	323
	4,57	394	81	136	81	174	80	216	83	262	82	312
4,57		328	68	113	68	145	67	180	69	218	68	260

Performance variants 190ARP

Pinion shaft		Crank shaft	P50		P55		P60		P65	
1,500 1/min	1,800 1/min		320 bar		250 bar		250 bar		210 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
	4,25	424	136	229	130	279	155	332	153	392
4,25		353	114	191	108	233	129	277	128	326

Performance variants 250ARP

Pinion shaft		Crank shaft	P50		P55		P60		P65	
1,500 1/min	1,800 1/min		320 bar		250 bar		250 bar		210 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
	3,57	504	162	273	155	332	184	396	182	466
3,04		493	159	267	151	325	180	387	178	456
3,57		420	135	227	129	277	153	330	152	389

Performance variants 330ARP

Pinion shaft		Crank shaft	P55				P65			
1,500 1/min	1,800 1/min		340 bar				240 bar			
Gear ratio		1/min	kW		l/min		kW		l/min	
	4,23	426	240		380		239		537	
4,23		355	200		317		200		447	

Performance variants 400ARP

Pinion shaft		Crank shaft	P55				P65			
1,500 1/min	1,800 1/min		340 bar				240 bar			
Gear ratio		1/min	kW		l/min		kW		l/min	
2,96		507*	286		453		285		640	
	3,60	500	282		447		281		631	
3,60		417	235		372		234		526	

Performance variants 550ARP

Pinion shaft		Crank shaft	P60		P65		P70		P75	
1,500 1/min	1,800 1/min		400 bar		400 bar		330 bar		290 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
3,30	3,96	455	384	518	451	608	435	710	440	819
	4,60	391	331	446	388	523	374	611	379	705
3,96		379	320	431	376	506	362	592	367	682
4,60		326	276	371	324	436	312	509	316	587

Performance variants 1000ARP

Pinion shaft		Crank shaft	P60		P65		P70		P75	
1,500 1/min	1,800 1/min		390 bar		330 bar		285 bar		250 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min	kW	l/min
3,00		500	766	1.059	765	1.251	770	1.458	778	1.679
	3,69	488	747	1.033	747	1.220	751	1.422	759	1.638
	4,23	426	652	901	651	1.065	655	1.241	662	1.429
3,69		407	623	861	622	1.017	626	1.185	633	1.365
4,23		355	543	751	543	887	546	1.034	552	1.191

Hydromechanical descaling

Hydromechanical descaling is mainly used where the uncompromising quality of hot rolling products is required. For proper descaling, the correct volume flow and pressure as well as the distance and angle of attack of the nozzle beam are of crucial importance.

**Sewer cleaning**

In the sewer cleaning dirty media are common. For pumps of the ARP series, conditions with granular or fibrous solids up to 300µm are no problem.





**250
BAR**

3-SERIES (250 BAR)

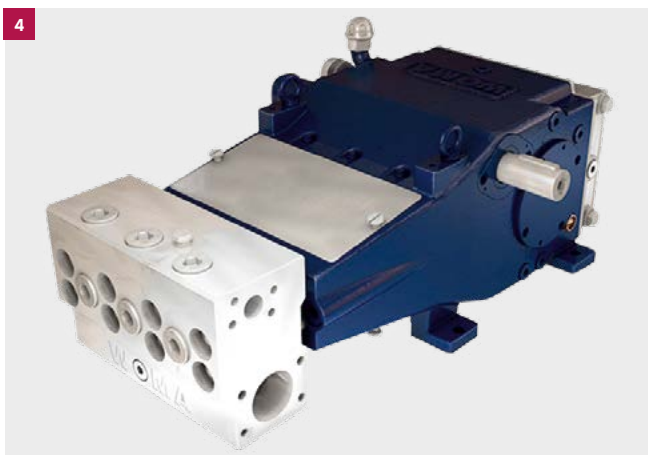
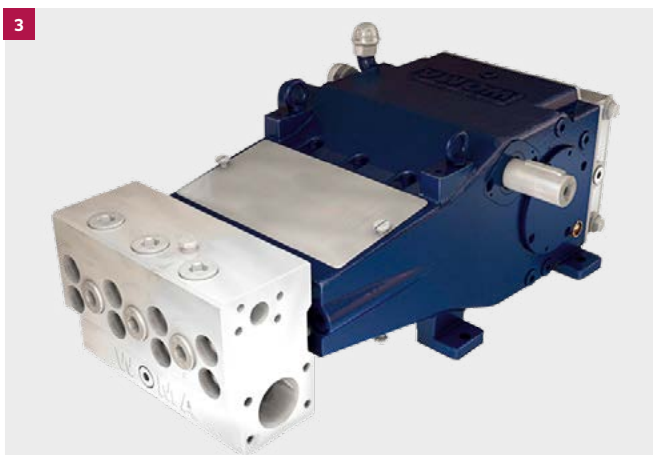
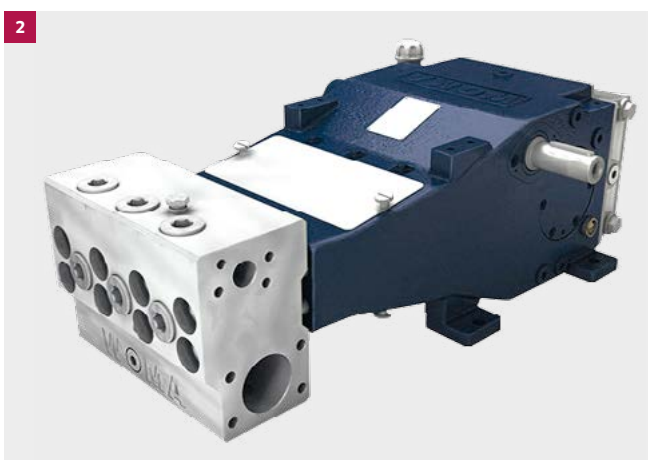
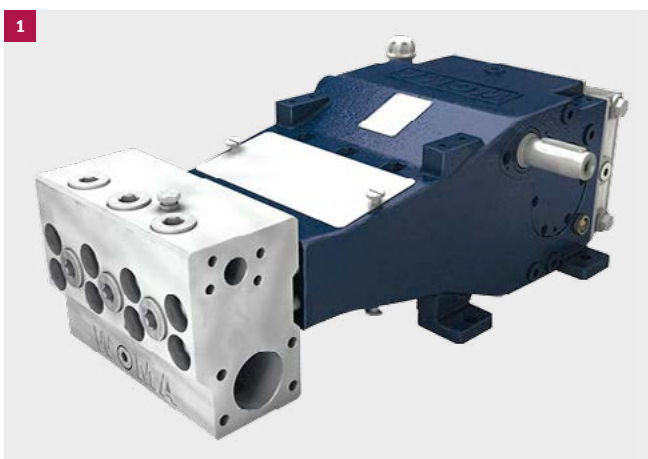
Power packs for cleaning and rinsing.

A low price, inexpensive servicing, durable and service-friendly. With these characteristics, the 3-series scores particularly well in sewer and pipe cleaning.

Good does not have to be complicated. The simple principle of the 3-series with its proven WOMA components makes the pump a reliable companion for all high-pressure applications up to 250 bar. The pump can be adapted with simple means to accommodate the prevailing requirements.

The sealing system of the 3-series is particularly easy to service since it has very few wearing parts. As an alternative to the corrosion-resistant stainless steel pump head, an inexpensive version made of cast iron is available for the 1503 to 2503 series. Coated steel plungers are optionally available for even greater resistance to wear and thermal shock compared to the standard, media-resistant ceramic plungers.

- 1** 3-series 1003
- 2** 3-series 1503
- 3** 3-series 1903
- 4** 3-series 2503



TECHNICAL DATA

Performance variants 1003

Pinion shaft		Crank shaft	P50		P55	
1,500 1/min	1,800 1/min		150 bar		125 bar	
Gear ratio		1/min	kW	l/min	kW	l/min
3,00		500	59	211	60	257
	3,63	496	59	210	59	254
3,63		413	49	175	49	212

Performance variants 1503

Pinion shaft		Crank shaft	P50		P55		P60	
1,500 1/min	1,800 1/min		200 bar		170 bar		140 bar	
Gear ratio		1/min	kW	l/min	kW	l/min	kW	l/min
2,96		488	103	277	107	337	105	402
	3,69	407	100	267	103	324	101	387
3,69		407	83	222	86	270	84	323
	4,57	394	80	216	83	262	82	312
4,57		328	67	180	69	218	68	260

Performance variants 1903

Pinion shaft		Crank shaft	P50		P55	
1,500 1/min	1,800 1/min		250 bar		250 bar	
Gear ratio		1/min	kW	l/min	kW	l/min
	4,25	424	107	231	130	279
4,25		353	90	192	108	233

Performance variants 2503

Pinion shaft		Crank shaft	P50		P55	
1,500 1/min	1,800 1/min		250 bar		250 bar	
Gear ratio		1/min	kW	l/min	kW	l/min
	3,57	504	128	275	155	332
3,04		493	125	269	151	325
3,57		420	107	229	129	277



You need more than just a high-pressure pump?

We also have suitable system solutions, tools and accessories for every application:

Cleaning with up to 1,500 bar

WOMA high-pressure cleaning solutions are used in the chemical and process industries around the world. Our high pressure guns and TankMaster cleaning heads will completely remove all paint residues, impurities, resins and caking from tanks and containers. We also offer suitable products and solutions for pipe and heat exchanger cleaning that deliver perfect results.

Abtragen mit bis zu 3,000 bar

For ultra-high-pressure removal, we offer the right solutions for a wide range of industries and applications. For the removal of paints, rust products and anti-corrosion coatings with manual and controlled water tools, the right products are available for your tasks. In addition, WOMA high-pressure solutions can be used for emission-free decontamination and selective removal of concrete.

Cutting with up to 4,000 bar

WOMA cutting tools are widely used in the construction industry. The cutting of reinforced concrete, steels or ceramics takes place with construction site-suitable abrasive tools. It is also easy to disassemble containers, technical systems or building constructions. The water tools generate no heat at the cutting edges and work dust-free and with very less vibration.

With our experience to the right solution

You need advice and support for your application? Our experts in application technology can draw on decades of cross-industry experience and will find the right water tool and the right parameters for your task.



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