

HERTZ VACUUM PUMPS



APPLICATIONS

Food & beverage, chemical, plastic, textile, brick & tile, glass & ceramic, medical, pharmaceuticals, paper, leather, mine and others.



ADVANTAGES

Safe and efficient operation, able to pump every kind of gas and vapors, works quiet and reduced vibration, Minimum maintenance with high efficiency, Low investment and operating cost, Inner lubrication is not necessary, The gases which are pumped may be saturated steam, With suitable liquid there is no cleaning problem, There is not any disorders because there is only one moving part, There is no leakage with mechanical seal design pumps, Can be used for different applications with proper selection of construction materials and service liquid.

TECHNICAL DATA

Monoblock Vacuum Pumps

MODEL	INLET & OUTLET	ABSOLUTE	mbar	400	200	100	80	60	40	33	SERVICE LIQUID (l/min)
		VACUUM	torr	300	150	75	60	45	30	25	
		POWER (kW)	mmHg	-460	-610	-685	-700	-715	-730	-735	
			Speed (rpm)	SUCTION CAPACITY (m ³ /h)							
HMVP 120/030	G 1"	0.75	2850	24	24	23	22	20	18	15	4
HMVP 120/050	G 1"	1.5	2850	52	50	45	40	36	30	25	6
HMVP 145/050	G 1 1/2"	2.2	2850	80	74	65	58	50	45	40	8
HMVP 200/055	DN 40	2.2	1450	72	74	77	78	77	75	65	13
HMVP 200/065	DN 40	3	1450	105	106	108	108	107	100	80	15
HMVP 200/085	DN 40	4	1450	134	137	141	140	132	115	95	16
HMVP 230/090	DN 50	5.5	1450	190	193	195	190	185	175	165	18
HMVP 230/120	DN 50	5.5	1450	210	218	220	217	210	200	185	20
HMVP 270/110	DN 65	7.5	1450	280	282	280	275	270	240	205	23
HMVP 270/155	DN 65	11	1450	382	364	347	332	312	280	270	25

Two Stage Vacuum Pumps

MODEL	INLET & OUTLET	ABSOLUTE	mbar	400	200	100	80	60	40	33	SERVICE LIQUID (l/min)
		VACUUM	torr	300	150	75	60	45	30	25	
		POWER (kW)	mmHg	-460	-610	-685	-700	-715	-730	-735	
			Speed (rpm)	SUCTION CAPACITY (m ³ /h)							
HMP 145/080	DN 32	3	1450	54	54	54	53	48	40	30	6
HMP 185/080	DN 40	4	1450	105	108	105	97	85	70	50	12
HVP 200/120	DN 40	5.5	1450	150	155	145	140	130	110	90	14
HVP 200/170	DN 40	5.5	1450	180	190	190	185	165	140	110	16
HVP 230/120	DN 50	11	1450	260	270	270	250	215	190	175	30
HVP 230/160	DN 50	11	1450	330	350	345	325	290	240	200	35
HVP 230/220	DN 50	15	1450	370	420	450	430	360	300	240	45
HMP 230/160	DN 50	11	1450	330	350	350	340	300	240	200	35
HMP 230/200	DN 50	15	1450	390	440	440	420	360	290	225	40
HMP 250/160	DN 65	15	1450	430	460	470	450	390	330		40
HMP 250/200	DN 65	18.5	1450	490	530	540	520	440	360		45
HMP 250/240	DN 65	22	1450	540	590	610	590	500	400		50
HVP 275/160	DN 80	18.5	1450	620	650	610	590	485	410		50
HVP 275/220	DN 80	22	1450	730	760	740	700	590	480		60
HVP 275/260	DN 80	30	1450	820	860	840	790	680	530		65

Single Stage Vacuum Pumps

MODEL	INLET & OUTLET	ABSOLUTE	mbar	400	200	100	80	60	40	33	SERVICE LIQUID (l/min)
		VACUUM	torr	300	150	75	60	45	30	25	
		POWER (kW)	mmHg	-460	-610	-685	-700	-715	-730	-735	
			Speed (rpm)	SUCTION CAPACITY (m ³ /h)							
HMVT 275/220	DN 100	15	1450	630	640	620	580	540	450		50
HMVT 275/260	DN 100	18.5	1450	710	730	710	680	630	550		55
HMVT 275/300	DN 100	22	1450	800	830	810	785	720	650		60
HMVT 410/260	DN 125	30	980	1100	1115	1050	1015	950	880		85
HMVT 410/320	DN 125	37	980	1350	1365	1330	1310	1260	1200		90
HMVT 410/400	DN 125	45	980	1670	1700	1700	1690	1670	1600		100
HMPT 520/400	DN 200	55	735	2100	1900	1600					150
HMPT 520/530	DN 200	75	735	2800	2600	2100					170
HMPT 520/600	DN 200	90	735	3600	2700	2700					210

1. HERTZ KOMPRESSOREN reserves its rights to make changes in its products and specifications without prior notice.

GENERAL FEATURES

- Plates are stainless steel,
- Safe and efficient operation,
- Able to pump every kind of gases and vapors,
- Works quiet and reduced vibration,
- No need to lubrication,
- Low operation and investment cost,
- Minimum maintenance with high efficiency,
- No metallic contact of the rotating parts,
- Able to use every medium with wide material alternatives,
- Able to pump less liquid with gases,
- Provide % 100 leakproofing with mechanical seal,



MONOBLOCK VACUUM PUMPS

- Monoblock design, with out coupling,
- Shaft does not contact with the medium,



TWO STAGE VACUUM PUMPS

- Classic design, long life,
- Not any cavitation problem,
- Compression of pumped gases are approximately isothermal,

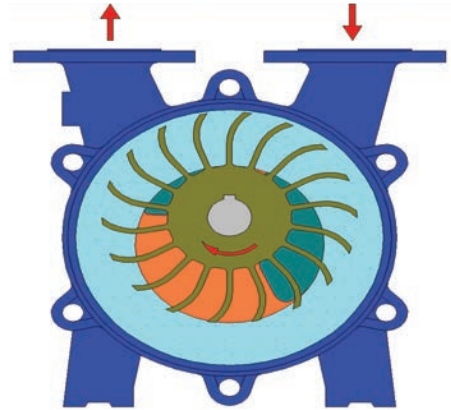
SINGLE STAGE VACUUM PUMPS

- High suction capacity,
- Lower energy Consumption,

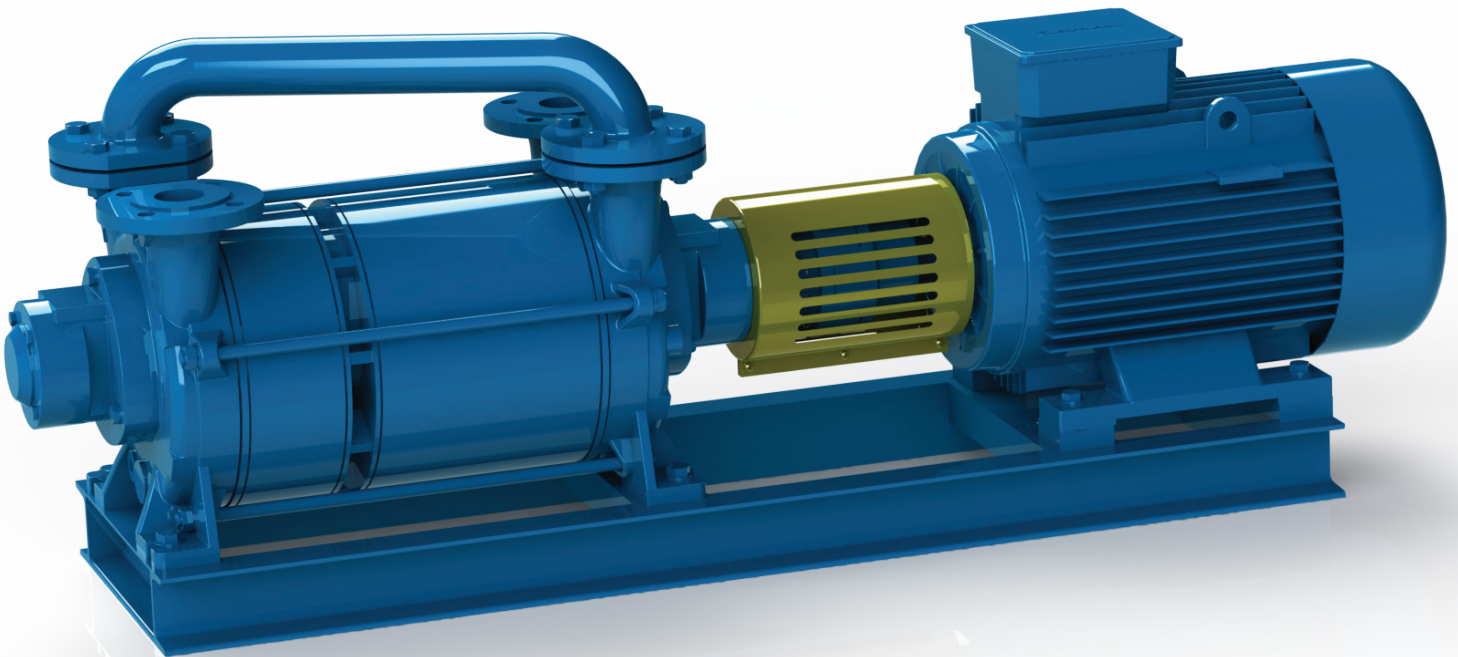


WORKING PRINCIPLE

Liquid ring vacuum pumps are suction pumps. While the moving part, (the shaft and the impellers) which are mounted eccentric from the center axis of the pump casing. As the rotor, the shaft and the impellers turns the liquid in the pump casing forced outwards by centrifugal force. A liquid ring forms along the body wall. Because of the eccentricity of the rotor the cells between pump casing and the rotor blades are filled with liquid at different amounts. The cells which are in the top position are completely filled with liquid and as the impeller rotates through half a revolution the liquid is replaced by gas. As rotation continues the liquid forces the gas through the discharge port. This cycle is repeated for each cell of the impeller and results in a steady flowing source of vacuum.



TYPES		CASING	SHAFT	IMPELLER	SEALING
STANDARD PRODUCTION	NORMAL	GGG 40 Sfero Casting	SAE 4140	G-CuSn 9	Soft Packing Mechanical Seal
	MECHANICAL	GGG 40 Sfero Casting	AISI 304	G-CuSn 9	Soft Packing Mechanical Seal
OPTIONAL	BRONZE	G Cu Sn 9 Bronze	SAE 4140 AISI 304	G-CuSn 9	Soft Packing Mechanical Seal
	STAINLESS	AISI 304 St. Steel AISI 316 St. Steel	AISI 304 AISI 316	AISI 304 AISI 316	Soft Packing Mechanical Seal



hertz
KOMPRESSOREN

HERTZ KOMPRESSOREN GLOBAL
export@hertz-kompressoren.com
www.hertz-kompressoren.com

HERTZ KOMPRESSOREN GmbH
Kronacherstr. 60, 96052 Bamberg
Phone: +49 951 96 43 13 88 Fax: +49 951 96 43 13 50
info@hertz-kompressoren.de

OOO HERTZ INDUSTRIAL SYSTEMS
142700 Russia, Moscow Province Leninskiy District,
Vidnoe City Belokamennoe St. 10/2
infom@hertz.energy

HERTZ KOMPRESSOREN USA Inc.
3320 Service St. Charlotte, NC 28206 USA
Phone : +1-704-579-5900 Fax : +1-704-579-5997
info@hertz-kompressoren.us

DALGAKIRAN UKRAINE
Kiev, 03062 Business Center "Nivki City" Pobedy av., 67
Building "G", Of. 309-310 // Phone: +38 (044) 581 13 77
Fax: +38 (044) 501 54 74 // info@dalgakiran.com.ua