

KT series metal diffusion pump



Introduction:

EVP KT series oil diffusion pump is the main equipment for obtaining high vacuum(10^{-1} - 10^{-5} Pa) with high pumping speed from 2800 L/s to 130000 L/s.

Advantage:

- 1) The pump equipped with observation window, oil filling and discharge port, pump oil temperature control and over heated protection device, and cooling water high temperature alarming device.
- 2) The heater of diffusion pump is composed by several heating rods, parallely connected, which allow the rod being changed with pump running and help to shorten the heating time and increase heating efficiency.
- 3) Low oil return. Without water cooling plate, the oil return is 1×10^{-3} mg/cm²·min for normal diffusion pump oil, and 1×10^{-4} mg/cm²·min for 275 silicone oil.
- 4) The manufacturing process takes stretching technology which helps to lessen weld joint, increase intensity, and lower the air leakage.

Application:

The oil diffusion pump is widely used in vacuum coating, vacuum furnace, electronics, chemical industry, aviation, aerospace, metallurgy, material, biological medicine, atomic energy, space exploration and other high-tech fields, also it possesses high praise in titanium sponge field.

Specification:

Item	unit	KT-200	KT250	KT300	KT320	KT-400	KT-500	KT-600	KT-630	KT-800	KT-900	KT-1000	KT-1200	KT-1400	KT-1600	
Ultimate pressure	Pa	5×10^{-5}														
Capacity	L/s	2800	3500	4600	5000	8500	12000	17500	20000	30000	40000	50000	60000	90000	130000	
Fore pump pressure	Pa	40														
Fore pump speed	L/s	15	15	30	30	70	150	300	600	600	600	1200	1200	1200	2500	
Back-flow rate	mg/(cm ² ·min)	$\leq 3 \times 10^{-2}$														
Heating time	min	≤35	≤40			≤45		≤50	≤60	≤65	≤70	≤80		≤90		
Heating power	kw	1.6-1.8	2.2-2.4	2.4-3	4~5	4~5	6~8	8~9	9~11	13-13.5	14-16	17-20	28-30	38-40	48-50	
Voltage	V	220					380									
Oil Model	/	KS-3														
Oil volume	L	0.55	1-1.4	1-1.6	1.4-1.8	3~4	4	6~7	7~8	12~14	14-15	15-16	22	38	50	
Cooling water consumption	L/h	300	350	400	420	500	600	800	850	1200	1350	1500	2600	3400	4300	
Inlet diam	mm	200	250	300	320	400	500	600	630	800	900	1000	1200	1400	1600	
Outlet diam	mm	65	65	80	80	100	100	150	160	200	200	300	300	320	320	