

Multifunctional Pumps

Product HS code for import custom use: 8413709990

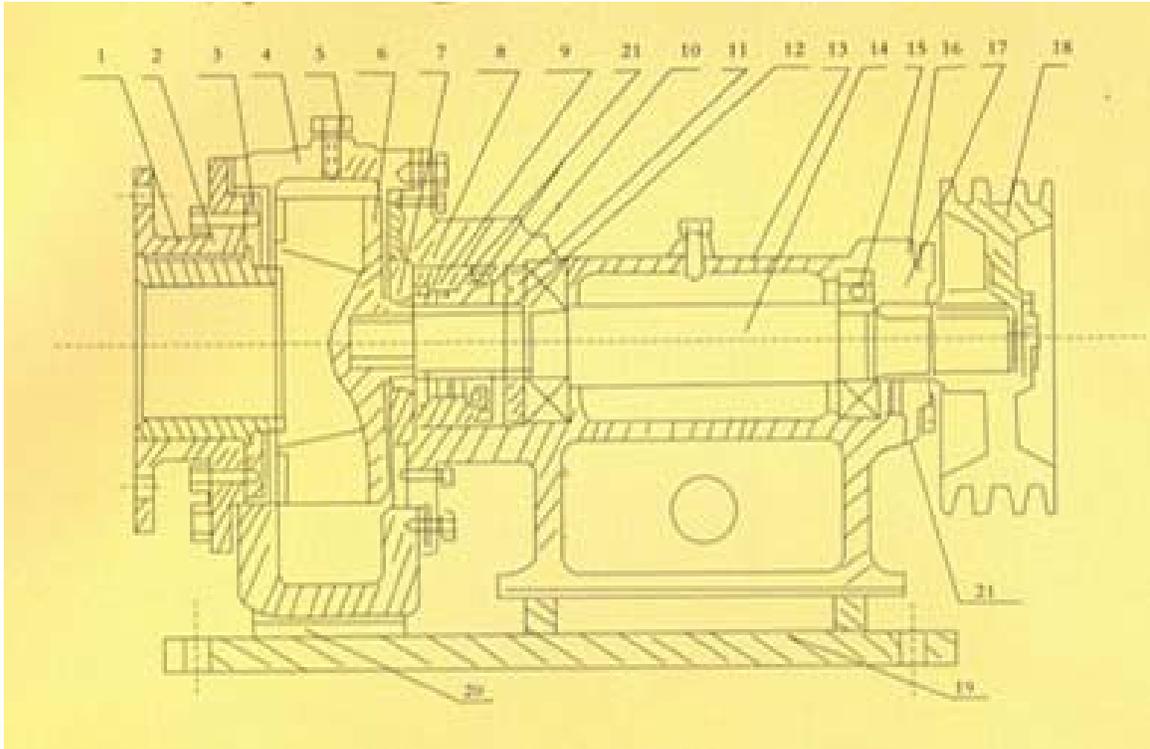
Our Multifunctional Pump is widely used in Sand field, mining, mineral processing, ceramics and cement factories for pumping sand, stone, water, mud, Semi-liquid objects and all kinds of liquid materials except acids and alkalis.



Main use:

- In sand fields of vertical height 8~20 meters for sand pumping.
- In mining factories for slag and ore pulp pumping.
- River clean-up.
- Fishponds cleanup

Structure:



1. Pump cover	8. O-shaped washer	15. Bearing
2. Larynx pipe	9. Friction plate	16. Back hearing sleeve
3. Front liner	10. Adjuster	17. Bearing cover
4. Pump shell	11. Front bearing cover	18. Belt pulley
5. Air-bleed nail	12. Front bearing sleeve	19. Supporting block
6. Vane wheel	13. Pump stand	20. Bearing shim
7. Rubber bowl	14. Pump bearing	21. Oil sealing

Models and Technical information

				
50PMS	75PMS	100PMS	125PMS	150PMS
				
200PMS	250PMS	300PMS	350PMS	500PMS

Note: 1. Prices EXW Wuzhou: consult us.

2. Pump accessories, if any requirement, please consult us.

Model	Working capacity (per hour)	Lifting distance (meters)	Power request (KW)	Spindle speed (rpm/min.)	Max. distance of water pumping	Max. size for stone pumping	Machine weight (kgs)
50PMS	Water:20MT Sand: 5MT	12~20	3~7	1800~2900	7M	15mm	45
75PMS	Water:100MT Sand: 30MT	21	15	1800~2500	7M	20mm	100
100PMS	Water:150MT Sand: 40MT	20	22	1800~2500	7M	30mm	150
125PMS	Water:200MT Sand: 50MT	21~25	15~30	800~1500	6M	40mm	400
150PMS	Water:300MT Sand: 60MT	21~25	22~55	800~1500	6M	70mm	500
200PMS	Water:400MT Sand: 80MT	8~20	40~112.5	500~1000	6M	100mm	1100
250PMS	Water:350MT Sand: 100MT	5~15	40~120	450~600	6M	120mm	1200
300PMS	Water:400MT Sand: 150MT	5~15	90~150	400~550	6M	180mm	1500
350PMS	Water:600MT Sand: 250MT	5~15	120~210	350~550	6M	200mm	2500
500PMS	Water:800MT Sand: 400MT	7	210	250~350	6M	320mm	3500

Installation procedure and Use guidance:

1. To confirm the belt pulley diameter of the electric motor/diesel engine by way of calculation below:

$$\text{Engine belt pulley diameter} = \frac{\text{Pump spindle speed} \times \text{Pump belt pulley diameter} \times 1.05(\text{Slippage Index})}{\text{Engine spindle speed}}$$

2. To confirm the center distance between the Pump belt pulley and the Engine belt pulley by following the principle:

$$2(A + B) < x < 5(A + B)$$

X means Center distance between Pump belt pulley and Engine belt pulley.

A means Pump belt pulley diameter.

B means Engine belt pulley diameter.

3. If you are using the pump for river sand/stone drawing, the most efficient way is to install the pump and engine both inside the ship cabin and set the pump shell level lower than the river water level, this is the way we called it "Self-filling installation", which is the best way for drawing solid materials because before pumping starts, the river water comes into the pump naturally when the water level is higher than pump shell level, in this situation you can get the strongest pumping power.
4. In case there is no chance to put the pump shell level lower than river water level, you could also install the pump and engine outside the ship cabin e.g. Prow or Poop of the ship, bamboo raft or iron drum etc. but in this way you need 2 persons for pump starting. Firstly, one person takes the pump sucking head over the pump shell level and fill the pump full of water, the 2nd step is to throw the sucking head in the river once the other person starts the pump engine, then the water pumping starts, then coming up next is the sand pumping. This way we called it "Passive filling installation".
5. Also you could install the pump and engine on a solid plain ground for mud or ore slurry pumping, If the pump is 2 meters higher than the water level of the working area, to control well the pump you are requested to add a valve in the end-side of the sucking pipe.

Notice:

1. To have a strongest power of pumping, the pump must be vacuum(full filled with water) before starting.
2. Before using please make sure the pump was installed in a rotating direction same as the Arrow marking on the pump, otherwise an opposite rotating will lead to a shedding of the vane wheel and a damage of the pump bearing and the bearing cover. Especially when you are using Electric motor for power supply, you need to make sure the rotating direction is correct before putting on the transmission belt.
3. In case the sucking pipe was blocked by sand or stone during the use, please disassemble the pipe for cleanup instead of forcibly running the pump, otherwise the pipe might be broken under the strong pressure. Also you can never manually lift up or step on the pipe to avoid the damage of the pipe movement under big pressure.
4. After using for a time period, in case there is any oil/water leakage found from the pump stand, you need to make a Counterclockwise rotation of the adjusting screw to allow the friction plate (inside the Adjuster) and the rubber bowl (on vane wheel) more tighten to each other till your feeling of a tight rotation of the belt pulley. In case the leakage happens again, you will have to change a new rubber bowl, a new front and back bearing sleeve and a new oil sealing.
5. To make a good sealing performance, please install the rubber bowl with the big side opened to the friction plate. You could only start the pumping when the pump shell is filling with water, otherwise the rubber bowl will be damaged due to lack of lubrication.
6. In case the pump will be stopped for a long period, please let out all the water inside and greasing the bearings before storage.

Power supply Options

Note:

Below are 2 different power supply which are given as an example, please consult us and precise your enquiry in case you need Electric motor or Diesel engine with bigger power supply.

"China YANGXIAO" Electric Motor	"China CHANGCHAI" Diesel Engine
	
Model YL-100L-2 (Induction motor)	Model R175B
220V/50Hz, 3.8KW/5.2HP	Horizontal, Single cylinder, water cool, 4-stroke
Spindle Speed 2800rpm/min.	Spindle Speed 2600rpm/min., 4.85KW
1set/20kgs/carton, 40*24*27cm/carton	1set/60kgs/carton, 58.9*34.2*46.5cm
Price: consult us	Price: consult us
Remark: Same model but 5KW, same price.	Diesel consumption: Max. 281.5g/KW.h
	Starting mode: Manual
	Oil tank: 4L Lubricating oil tank: 2L
	Cooling water tank: 6L

Pump Packing: Naked package.