



THREE SCREW PUMP



Application

1. 3G three-screw pump

3G three-screw pumps can be divided into horizontal and vertical. Whether it is horizontal or vertical, in terms of self-priming performance, there are single-suction three-screw pumps and double-suction three-screw pumps. The material is mainly cast iron. Materials such as ductile iron and cast steel are used for temperature and medium conditions. Application: 3G three-screw pumps are mainly used in ships, fuel oil transportation, hydraulic engineering, petroleum and petrochemical and other industries.

2. SN three -screw pump

Application: SN three-screw pump can transport lubricating liquid (mechanical oil, lubricating oil, heavy oil, etc.), low lubricating liquid (light diesel oil, heavy diesel oil, thin oil), viscous liquid (various synthetic rubber liquid and artificial rubber liquid, emulsion, etc.). Mainly used in machinery industry, heating equipment, chemical petroleum, food industry, shipbuilding and other fields.

3. SM three -screw pump

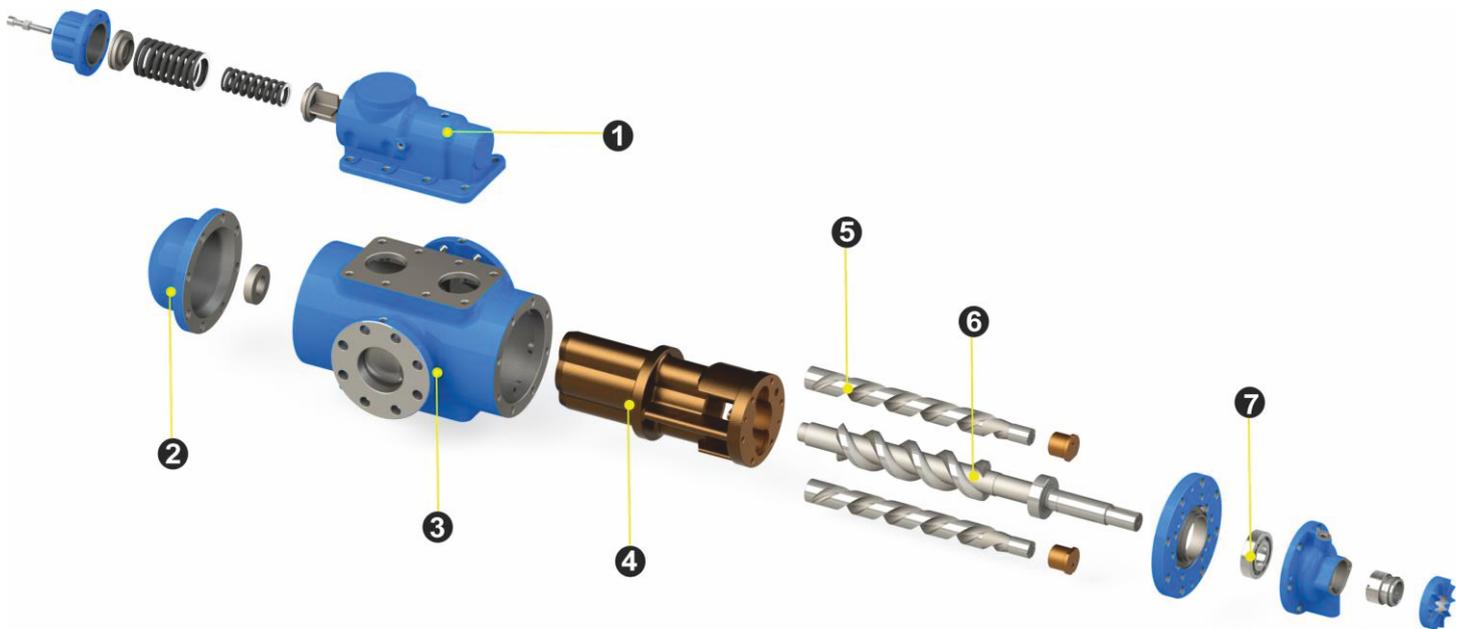
The structure of SM three-screw pump is similar to that of SN series. The pressure of SN series three-screw pump can reach 4Mpa, and the pressure of SM series three-screw pump can reach 10Mpa. In high pressure service, the SM series is preferred.

Application fields: It can be used as fuel injection, fuel supply and delivery pumps; it can also be used as hydraulic, lubrication and remote control motors; it can also be used as loading, delivery and liquid pumps in the petroleum and petrochemical industry and food industry; more applications on ships, can be Do transfer pumps, ballast pumps, lubricating oil pumps and hydraulic pumps, etc.



THREE SCREW PUMP

Pump Design



- 1>Safety valve HT200, QT450-10
- 2>Glanding HT200, QT450-10
- 3> Bushing ZL109, ZCuSn5Pb5Zn5, ZCusn10P1, wear-resistant ductile iron
- 4>Pump body HT200, QT450-10, ZG270-500
- 5>Auxiliary screw 16MnCrS5, 40Cr, 45, 38CrMoAl
- 6>Main screw 16MnCrS5, 40Cr, 45, 38CrMoAl
- 7>Bearing GCr15, SUS440C



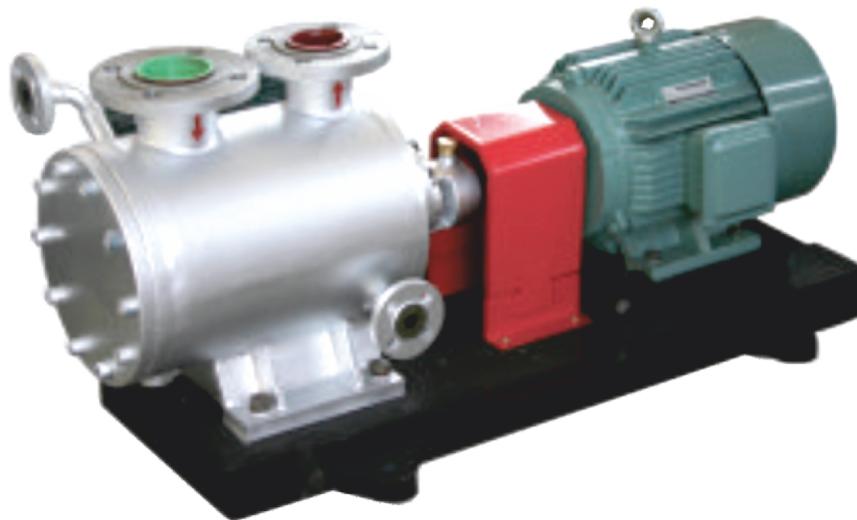
TRIPLE SCREW PUMP & TWIN SCREW PUMP

FEATURES

- Separate Screw and Shaft Assembly.
- Combination of material possible for screw & shafts.
- Independent Material of construction for Screw & Shaft respectively.
- Replacement needed for damaged part only.
- Change in performance characteristics possible by changing screws only.
- Change in pump design possible from long shaft to small shaft and Vice versa.
- Compact Design.
- Extremely good suction capability.
- Various Combinations Of Materials available.
- Pumps With Replaceable Liners.
- Partial/Full Heating Jacket Available In Various Designs.
- Different Sealing Arrangements Possible.
- Low NPSH Requirement.
- Casing Available in different Cast And Fabricated Design.
- Low maintenance cost.

APPLICATIONS

- Triple Screw Pumps with external or internal bearing are available in horizontal or vertical constructions, with or without heating arrangements and have single mechanical seals for shaft sealing.
- They handle all neutral lubricating liquids, have a compact space saving design and are self priming. Due to the precise manufacture of the screws and their profile, the possibility of getting a high suction lift is ensured. They operate continuously and run noiselessly.



**Specification Parameters**

Type	Pressure MPa	Flow		Speed r/min	NPSH m	Efficiency η%	Power kw
		m ³ /h	L/min				
25×4-46	1	0.8	13	1450	4	62	0.75
	2.5	0.6	10			60.6	1.5
	1	2	33	2900	4.5	59.4	1.5
	2.5	1.6	26			69	3
30×4-46	1	1.6	26	1450	4.5	63.5	1.1
	2.5	1.2	20			61	2.2
	1	3.6	60	2900	5	60	2.2
	2.5	3.2	53			69	4
36×4-46	1	2.8	46	1450	4.5	66	2.2
	2.5	2.4	40			66.5	4
	1	6.5	108	2900	5	60.5	4
	2.5	6	100			72	7.5
42×4-46	1	4.8	80	1450	5	62	4
	2.5	4.2	70			73	5.5
	1	10.5	175	2900	5.5	61	5.5
	2.5	10	166			72	15
45×4-46	1	6.3	106	1450	5	70	3
	2.5	5.9	99			74	7.5
	1	13.5	225	2900	5.5	60	7.5
	2.5	13	217			75	15
60×4-46	1	15.5	255	1450	5	71.3	11
	2.5	14.5	245			74	15
	1	32	533	2900	5.5	63	18.5
	2.5	31.5	525			77	37
70×2-46	0.6	24	400	1450	5	71	7.5
	1	23.5	390			75	11
	1.6	22.5	370			76	15
70×4-46	1	24.5	408	1450	5	72.5	18.5
	2.5	23.5	392			79	30
80×2-46	0.6	36.5	608	1450	5	72	11
	1	35	594			75.5	18.5
	1.6	34.5	575			76.5	22
80×4-46	1	37	617	1450	5.5	72	30
	2.5	35	590			78.1	45
100×2-46	0.6	72.5	1208	1450	5	73	22
	1	71	1183			77	37
	1.6	60.5	1158			79	45
100×4-46	1	72.5	1208	1450	5.5	73	55
	2.5	70	1165			78.5	75
S100×3-27	0.6	72	1196	1450	6	62	22
	1.6	70	1160			72	55
	2.5	69	1145			74	75
S120×3-27	0.8	123	2055	1450	6	74.5	55
	1.5	120	2010			76	90
	2.5	115	1920			78.5	132