# Serie YCB-LKB

**BOMBAS DE ENGRANES** 

GEAR PUMPS







#### **Features & Applications**

- Smooth and efficient operation with low noise and long life.
- Media temperature up to 80℃ and viscosity any point between 5~1500 cst.
- Overload protection with pressure differential safety valve, 1.5 times the rated pressure. However, safety valve is not recommended to be used as pressure relief valve.
- Soft packing and mechanical seals available for choice.

YCB series gear pumps apply to pumping non-corrosive lubricating oil or similar liquid without solid particles and fibres at temperatura below 80 °C and with the viscosity of  $5x10-6\sim1.5x10-3m^2/S$  (5-1500cSt).

It can be applied as delivering pump or booster pump in oil delivery system, as a fuel pump for delivery, pressurization and injection in fuel supply system and in all industry fields as lubricating oil pump.

YCB series gear pumps are mainly composed of gears, shafts, pump body, pump cap, bearing sheaths and shaft-end seals, etc. The gears are adoped doublé circular sinusoid teech shape, which makes the gears less wear on gear surface, stable rotation, low noise, long service life and high efficiency, due to no sliding on the gear teeth during gear meshing. This kind of pump has got rid of traditional design astrict and come into a new decade in designing and application.

The pump is designed with safety valve for protecting against overload. The full return flow pressure of the safety valve is 1.5 times higher than the rated exhaust pressure of the pump. It can be also adjusted within the allowance of exhaust pressure range according to actual working condition. But please note the safety valve can't be applied as pressure-reducing valve for long time. You may install pressure-reducing valve separately on pipe-line if needed.

There are two kinds of shaft-end seals, mechanical seal and packing seal, which can be chosen according to the customer's requirement or application condition.



## Performance Parameters

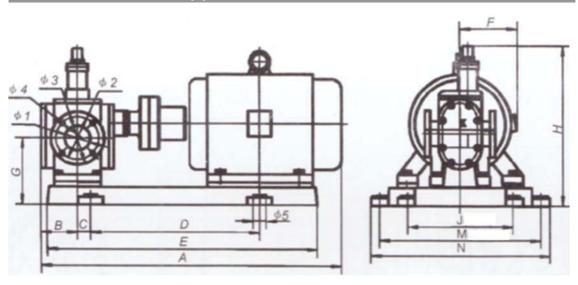
Type	Capacity	Speed	Pressure	(NPSH)r	Efficiency	Motor						
	m³/h	r/min	MPa	m	η %	Hz	Power KW	Туре				
YCB0.6-0.6	0.6	910	0.6	5.5	60	50	0.75	Y90S-6				
	1.0	1390				50	0.75	Y80L2-4				
	0.7	1130				60	0.75	Y90S-6				
	1.2	1710				60	0.75	Y80L2-4				
YCB0.6-1.6	0.6	910	1.6	7.0	70	50	1.1	Y90L-6				
	1.0	1400				50	1.5	Y90L-4				
	0.7	1130				60	1.1	Y90L-6				
	1.2	1710				60	1.1	Y90S-4				
YCB1.6-0.6	1.6	910	0.6	5.5	63	50	0.75	Y90S-6				
17. 10.00	2.5	1400				50	1.1	Y90S-4				
	1.9	1130				60	1.1	Y90L-6				
	3.0	1710				60	1.5	Y90S-4				
YCB1.6-1.6	1.6	940	1.6	7.0	71	50	2.2	Y112M-6				
1	2.5	1440			111111	50	4	Y112M-4				
	1.9	1150				60	2.2	Y112M-6				
	3.0	1750				60	4	Y112M-4				
YCB3.3-0.6	3.3	940	0.6	5.0	60	50	1.5	Y100L-6				
100000000000000000000000000000000000000	5.0	1420	11000		101	50	2.2	Y100L1-4				
	4.0	1150				60	1.5	Y100L-6				
	6.0	1730				60	2.2	Y100L1-4				
YCB3.3-1.6	3.3	960	1.6	7.0	72	50	5.5	Y132M2-6				
	5.0	1440				50	7.5	Y132M-4				
	4.0	1170				60	4	Y132M1-6				
	6.0	1750				60	7.5	Y132M-4				
YCB4-0.6	4.0	940	0.6	5.0	60	50	1.5	Y100L-6				
	6.0	1420				50	2.2	Y100L1-4				
	4.8	1150				60	2.2	Y100M-6				
	7.2	1730				60	3	Y100L2-4				
YCB4-1.6	4.0	960	1.6	7.0	72	50	5.5	Y132M2-6				
	6.0	1440				50	7.5	Y132M-4				
	4.8	1170				60	5.5	Y132M1-6				
	7.2	1750				60	7.5	Y132M-4				
YCB8-0.6	8.0	960	0.6	5.0	61	50	3	Y132S-6				
	12.0	1440				50	5.5	Y132S-4				
	9.6	1170				60	4	Y132M1-6				
	14.4	1750				60	5.5	Y132S-4				
YCB8-1.6	8.0	970	1.6	7.0	75	50	11	Y160L-6				
	12.0	1460				50	15	Y160L-4				
	9.6	1170				60	11	Y160L-6				
	14.4	1760				60	15	Y160L-4				
YCB10-0.6	10.0	960	0.6	5.0	62	50	4	Y132M1-6				
	15.0	1440	The state of the s			50	5.5	Y132S-4				
	12.0	1170				60	5.5	Y132M2-6				
	18.0	1750				60	7.5	Y132M-4				
YCB10-1.6	10.0	970	1.6	7.0	76	50	11	Y160L-6				
	15.0	1470	5-40-40	11 (11 (11 (11 (11 (11 (11 (11 (11 (11		50	15	Y160L-4				
	12.0	1170				60	11	Y160L-6				
	18.0	1770				60	18.5	Y180M-4				
YCB20-0.6	20.0	970	0.6	5.0	68	50	7.5	Y160M-6				
	24.0	1170				60	7.5	Y160M-6				
YCB25-0.6	25.0	970	0.6	5.5	69	50	11	Y160L-6				
	30.0	1170				60	11	Y160L-6				
YCB30-0.6	30.0	970	0.6	5.5	65	50	11	Y160L-6				
	36.0	1170				60	11	Y160L-6				



## Performance Parameters

Type	Capacity	Speed	Pressure	(NPSH)r	Efficiency		otor	
	m³/h	r/min	MPa	m	η %	H z	Power KW	Туре
YCB40-0.6	40.0 48.0	970 1180	0.6	5.5	66	50 60	15 15	Y180L-6 Y180L-6
YCB50-0.6	50.0	970	0.6	5.5	66	50	22	Y200L2-6
1CB30-0.0	60.0	1180	0.0	5.5	00	60	22	Y200L2-6
YCB60	60.0	970	1.0	5.5	65	50	30	Y225M-6
	73.0	1180				60	37	Y250M-6
YCB80	80.0	970	0.6	5.5	65	50	22	Y200L2-6
	97.0	1180				60	30	Y225M-6

## **Appearance& Dimensions**



Pump Type	m³/h	A	В	C	D	E	F	G	Н	J	K	М	N	ø1	ø2	ø3	n×ø4	n×ø5	Weight
YCB0.6-0.6	0.6	506			280	421	421 155	150	232	232		222	252	.05			4×M10	4×%14	
YCB1.0-0.6	1.0	486.5	50	22.5	264	405	150		217	136	125	207	237	ø25	Ø75	Ø 100			38.5
YCB1.6-0.6	1.6	5.17	00	27.5	202	455	455	115		450	450 450	50 000	22 252		-400	-4400			40
YCB2.5-0.6	2.5	547	63	27.5	303	455	155		243	156	150	222		ø32	Ø90	ø 120			43
YCB3.3-0.6	3.3	044	70	25	344.5 544.	544.5		) 127.6	5 298	198	98 180	200	266 298	ø40		ø 130		4×816	65
YCB5.0-0.6	5.0	644	76	35		544.5						266			Ø700				
YCB4.0-0.6	4.0	007 F	00	40	240	346 557	180					050	000						
YCB6.0-0.6	6.0	667.5	82		340							256	288	ø50	8770	Ø 140	4×ø14		66
YCB8.0-0.6	8.0	705	404	_	200	044		140	396	6 218	218 220		32 364			0 % 160			447
YCB12-0.6	12	795	101	50	382	644						220			-1400				117
YCB10-0.6	10	849	***	50	430	690	210					332		965	130				
YCB15-0.6	15	808	111		392	652													
YCB20-0.6	20	1009	131.5	00.5	566	845		405.0		070		380	416	ø80	ø150	ø 190			216
YCB25-0.6	25	1100	146.5	29.5	603	603 904	255	100.8	471.5	270	260	385	421		-1470	-1010	4 xø18	4 x Ø18	223
YCB30-0.6	30	1125	147	35	646	954		196	517	295	275	400 43	436	Ø100	Ø1/U	ø210			288
YCB40-0.6	40	1214	161	42.5	673	1023	285	212	562	315	300	425	461	ø125	ø200	ø240	8xg18	4×ø18	364
YCB50-0.6	50	1300	159	52.5	680	1080	310	237	590	340	300	476	536	ø125	ø200	ø 240	8x%18	4×ø18	



## MARINE VERTICAL GEAR PUMP LKB SERIAL PUMP





Capacity: Max.325m3/h

Different pressure: Max. 1.0 MPa

Temperature: Max. 150"C

Shaft sealing: Gland packing or Mech. sealing

	1	Fraguesa	š -	П	recoure /N	(ha) @20a	ot		
	Speed	Frequenc	Capacity		ressure (N	ipa) @∠uc 0.8		NPSH	Suc/Dis.
Туре	rpm	У	m3/h	0.4	0.6	1.0	l m	mm	
	.a.Jenina	Hz	2/4/06/08 2/1		Power of		127,600		
LKB 75	740	50	75	18.2	25	31.5	37.9		
LIND 75	890	60	90	21.8	30	37.8	45.5		150
LKB 100	980	50	100	24.2	33.4	42	50.5	1	150
LKB 100	1180	60	120	29	40	50.4	60.6		
LKB 110	740	50	110	26.6	36.7	46.2	55.6	1	
LKB 110	890	60	132	31.9	44	55.4	66.7		
LKB 125	980	50	1250	30.2	41.7	52.5	63.2		200
LND 123	1180	60	150	36.3	50	62.9	75.8		200
LKB 150	980	50	150	36.3	50	62.9	75.8	6	
LKB 130	1180	60	180	43.5	60	75.5	90.9	l °	
LKB 175	740	50	175	42.3	58.4	73.4	88.4	1	
LKB 1/5	890	60	210	50.8	70	88.1	106.1	1	250
LVP 225	980	50	225	54.4	75	94.4	113.7	1	250
LKB 225	1180	60	270	65.3	90	121.6	136.4	1	
LVP 250	740	50	250	60.4	83.4	104.9	126.3		
LKB 250	890	60	300	72.5	100	125.8	151.6	1	300
LVD 225	980	50	325	78.5	108.4	134.2	164.2		300
LKB 325	1180	60	390	94.2	130	163.6	197		



#### MARINE VERTICAL GEAR PUMP LHB SERIAL PUMP



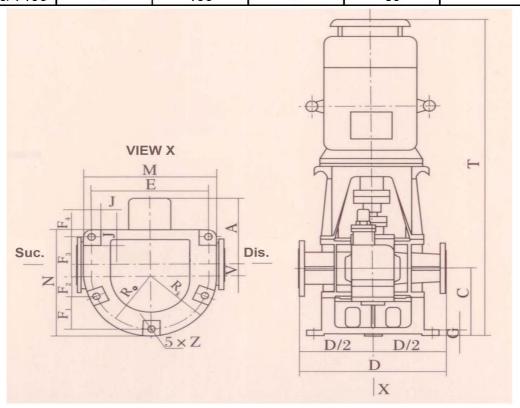
Capacity: Max.100 m3/h

Different pressure: Max. 0.6 MPa

Temperature: Max. 80"C

Shaft sealing: Gland packing or Mech. sealing

			Pressure				
Size	Suc./Dis.	60	HZ	50	Mpa		
		1180rpm	900rpm	970rpm	720rpm	ivipa	
LHB 0.6	Ф25/Ф25	0.72	=	0.6	-		
LHB 1.6	Ф32/Ф32	1.92	.=	1.6	-		
LHB 10	Ф65/Ф65	12	=	10	-		
LHB 20	Ф100/Ф80	24	<u>.</u>	20	=		
LHB 25	- Ψ100/Ψ60	30	=	25	-		
LHB 30	Ф125*Ф100	36		30	•	0.6	
LHB 40		48		40	7	] 0.0	
LHB 50		61	<u> </u>	50	1		
LHB 65	Ф150/Ф125	=	65	₩:	55		
LHB 80			80	<b>3</b> =0	65	]	
LHB 90		i <del>.a</del>	90		75	]	
LHB 100	Ф200/Ф150	÷	100	<b>=</b>	85	]	





Size	Motor Frame								Dime	nsion (	mm)							
Size	WOLOI FIAMLE	Α	С	D	E	F1	F2	F3	F4	G	J	RK	M	N	RO		V	Z
LHB 0.6	Y90S	134	120	230						15			220	205	111		12	Ф14
LIIB 0.0	Y100L	134	120	230						15			220	205	111		12	Ψ14
LHB 1.6	Y90S	,	120	240	174	52.5	50	50	22.5	20			200	197				Ф15
LHB 10	Y132M		143	280	275	135	67.5	67.5	40	25	80		320	355				Ф22
LHB 20	Y160M	250	253	500	400	125	75	150	25	20	60	225	450	400	200	1201	45	
LHB 25	Y160L	250	253	500	400	125	75	150	25	20	60	225	450	400	200	1246	45	
LHB 30	Y160L	268	265	500	400	125	75	150	25	20	60	225	450	400	200	1259	45	Ф23
LHB 40	Y180L-6	354	300	620	510	160	95	200	25	25	70	280	560	505	255	1404	53	
LHB 50	Y200L-6	354	300	620	510	160	95	200	25	25	70	280	560	505	255	1404	53	
LHB 65	Y225M		330	720	620	200	110	235	30		70	335	670	600	310		62	
LHB 80	Y250M		350	720	620	200	110	235	30		70	335	670	600	310		62	Ф24
LHB 90	Y280S		350	720	620	200	110	235	30		70	335	670	600	310		62	
LHB 100	Y280S		417	780	680	215	125	250	30		80	370	740	650	340		70	Ф28