

SPECIFICATIONS

Model Numbers	6R72 - Standard length (15" transom) 6RL72 - 5" longer (20" transom)	Propeller drive pin	Part Number 307949, 3/16" x 1-25/64" stainless steel
*Horsepower (B.I.A. - certified)	6 hp at 4500 rpm	Propeller	8" diameter x 7-1/4" pitch, 2 blade
Full throttle operating range	4000 - 5000 rpm	Speed control	Twist-grip, synchronized throttle and spark
Tank test with test wheel	4000 rpm Part Number 380757	Gear shift control	Forward, neutral, and reverse
Engine type	2 cylinder, 2 cycle, alternate firing	Weight (without fuel tank)	Model 6R72 - 51 pounds Model 6RL72 - 52 pounds (Fuel tank weight 11 pounds net)
Bore and stroke	1-15/16" bore x 1-1/2" stroke	Fuel capacity	6 gallons
Piston displacement	8.84 cubic inches	Starter	Manual, self-rewinding
Piston ring sets (3 per set)		Ignition	Flywheel magneto
standard	Part Number 378432	Spark plug	AC-M44C, Champion J6J, - 14mm
.030" oversize	Part Number 384336	Spark plug gap	.030 inch
Diameter of ring	1.9375 in. (standard)	Spark plug torque	17-1/2 - 20-1/2 Foot-pounds
Width of ring	.0935 - .0925 in.	Breaker point gap	.020 inch
Lbs. compression recommended when compressed	2 to 4 lbs.	Condenser Capacity	Part Number 580321 .18 - .22 Mfd.
Piston less rings standard	Part Number 376994	Part No. 580416 Coil Test Specifications -	
.030" oversize	Part Number 384335	Old Stevens Tester	
Crankshaft size top journal	.8080 - .8075 in.	Switch	Index Reading
center journal	.8080 - .8075 in.	A	2.0 - 2.5
bottom journal	.8080 - .8075 in.	New Stevens Tester Model No. M.A.-75	
Connecting rod crank pin	.6690 - .6685 in.	Switch	Index Adjustment
Carburetion	Single barrel, float feed, low-speed adjustment	A	22
Float level setting	Flush with rim of casting	Merc-O-Tronic	
Carburetor orifice plug	Hole size .044"	Operating Amperage	Primary Resistance Min. - Max.
Inlet needle seat	.053" to .050". Use a #55 drill as gage	1.4	.45 - .55
Cooling system	Vari-Volume (combination positive displacement and centrifugal pump) Thermostatically controlled	Secondary Continuity Min. - Max.	35 - 45
Propeller gear ratio	15:26	Graham Tester Model 51	
		Maximum Secondary	Maximum Primary
		Coil Index	Minimum Coil Test
		Gap Index	
		5500	1.2
		75	33
			70

*Horsepower established at sea level. Allow 2% reduction per 1000' above sea level.

CLEARANCE CHART

POWER HEAD		LOWER UNIT	
Piston ring gap	.015 Max. - .005 Min.	Gearcase head and propeller shaft	.0020 Max. - .0010 Min.
Piston ring groove clearance	.0035 Max. - .0010 Min.	Bearing housing bushing to drive-shaft	.0030 Max. - .0015 Min.
Cylinder and piston	.003 Max. - .0018 Min.	Propeller shaft in front gear bushing	.0015 Max. - .0005 Min.
Crankshaft bushings		Propeller shaft to reverse gear bushing	.0015 Max. - .0005 Min.
Upper	.0025 Max. - .0015 Min.	Front gear to gearcase bearing	.0022 Max. - .0010 Min.
Center	.0025 Max. - .0015 Min.	Rear reverse gear bushing	.0020 Max. - .0005 Min.
Lower	.0025 Max. - .0015 Min.	Propeller hub on shaft	.009 Max. - .007 Min.
Connecting rod bearings			
Piston end	.0010 Max. - .0003 Min.		
Crankshaft end	Needle bearing		
Piston and wrist pin loose end	.0007 Max. - .0000 Min.		

TORQUE CHART

POWER HEAD		Pull at propeller shaft to overcome reverse lock*		120-140 pounds	
Connecting rod screws	60-66 Inch-pounds	Slip clutch propeller	70 Foot-pounds		
Flywheel nut	40-45 Foot-pounds	*Standard length lower unit.			
Cylinder head screws	60-80 Inch-pounds	STANDARD SCREWS			
Crankcase to cylinder screws		Inch-Pounds		Foot-Pounds	
Upper	60-80 Inch-pounds	No. 6	7-10		
Center	60-80 Inch-pounds	No. 8	15-22		
Lower	60-80 Inch-pounds	No. 10	25-35	2-3	
Spark plugs	17-1/2 - 20-1/2 Foot-pounds	No. 12	35-40	3-4	
		1/4"	60-80	5-7	
		5/16"	120-140	10-12	
		3/8"	220-240	18-20	
LOWER UNIT		NOTE			
Side mount nuts - upper and lower	150-170 Inch-pounds (12-14 Foot-pounds)	When tightening two or more screws on the same part, DO NOT tighten screws completely, one at a time. To avoid distortion of the part, first tighten all screws together to one-third of specified torque, then to two-thirds of specified torque, then torque down completely.			
Lower mount housing to pilot shaft screws	72-96 Inch-pounds	NOTE			
Pilot shaft to steering bracket screws	60-80 Inch-pounds (5-7 Foot-pounds)	Re-check torque on cylinder head screws and spark plugs after motor test has been completed and motor has cooled comfortable to touch.			
Pull at propeller shaft for tilt up lower units*	25-30 pounds				