



ENGINE SPECIFICATIONS

STANDARD FEATURES	Manufacturer / Model	JOHN DEERE 4045HFS72 , 4-strokes, Turbo , 4 X
	Cylinder Arrangement	L
	Displacement	4.5L [274.6C.I.]
	Bore and Stroke	127mm [5.0in.] X 106mm [4.2in.]
	Compression ratio	17 : 1
	Rated RPM	1500 Rpm
	Piston Speed	6.35m/s [20.8ft./s]
	Max. stand by Power at rated RPM	83kW [111BHP]
	Frequency regulation, steady state	+/- 0.5%
	BMEP	14.77bar [214psi]
Governor : type	ELEC	
EXHAUST SYSTEM	Exhaust gas flow	281.67L/s [597cfm]
	Exhaust temperature	509°C [948°F]
	Max back pressure	750mm CE [30in. WG]
FUEL SYSTEM	110% (Stand By power)	21.68L/h [5.7gal/hr]
	100% (of the Prime Power)	19.32L/h [5.1gal/hr]
	75% (of the Prime Power)	14.76L/h [3.9gal/hr]
	50% (of the Prime Power)	9.97L/h [2.6gal/hr]
	Max. fuel pump flow	88.24L/h [23.3gal/hr]
OIL SYSTEM	Total oil capacity w/filters	17L [4.5gal]
	Oil Pressure low idle	1.38bar [20.0psi]
	Oil Pressure rated RPM	2.75bar [39.8psi]
	Oil consumption 100% load	0.05L/h [0.0gal/hr]
	Oil capacity carter	16L [4.2gal]
THERMAL BALANCE	Heat rejection to exhaust	62.76kW [3569Btu/mn]
	Radiated heat to ambient	10.12kW [575Btu/mn]
	Heat rejection to coolant	N/A
AIR INTAKE	Max. intake restriction	300mm CE [12in. WG]
	Engine air flow	125.00L/s [265cfm]
COOLANT SYSTEM	Radiator & engine capacity	8.5L [2.246gal]
	Max water temperature	105.00°C [221°F]
	Outlet water temperature	N/A
	Fan power	4.57 kW
	Fan air flow w/o restriction	N/A
	Available restriction on air flow	20mm CE [0.8in. WG]
	Type of coolant	Gencool
	Thermostat	82-94 °C
GAS SYSTEM	HC	0.43 g/KW.h
	CO	1.05 g/KW.h
	Nox	5.46 g/KW.h
	PM	0.198 g/KW.h