

P715-3

Output Ratings		
Voltage, Frequency	Prime	Standby
400V, 50 Hz	650.0 kVA / 520.0 kW	715.0 kVA / 572.0 kW
	- / -	- / -

Ratings at 0.8 power factor.

Please refer to the output ratings technical data section for specific generator set outputs per voltage.

Prime Rating

These ratings are applicable for supplying continuous electrical power (at variable load) in lieu of commercially purchased power. There is no limitation to the annual hours of operation and this model can supply 10% overload power for 1 hour in 12 hours.

Standby Rating

These ratings are applicable for supplying continuous electrical power (at variable load) in the event of a utility power failure. No overload is permitted on these ratings. The alternator on this model is peak continuous rated (as defined in ISO 8528-3).

Standard Reference Conditions

Note: Standard reference conditions 25°C (77°F) Air Inlet Temp, 100m (328 ft) A.S.L. 30% relative humidity.

Fuel consumption data at full load with diesel fuel with specific gravity of 0.85 and conforming to BS2869: 1998, Class A2.

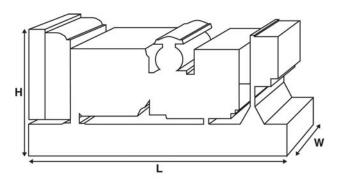




Image for illustration purposes only.

Ratings and Performance Do	ıta		
Engine Make & Model:		Perkins® 2806A-I	E18TAG2
Alternator manufactured for FG Wilson by:		FG Wilson	
Alternator Model:		EG355L-560N	
Control Panel:		PowerWizard 1.1+	÷
Base Frame:		Heavy Duty Fabric	ated Steel
Circuit Breaker Type:		3 Pole MCCB	
Frequency:		50 Hz	60 Hz
Engine Speed: rpm		1500	-
Fuel Tank Capacity: litres (US gal)		1132 (29	99.0)
Fuel Consumption: I/hr (US gal/h	hr)		
(100% Load)	- Prime	127.6 (33.7)	-
	- Standby	142.0 (37.5)	-

Available Options

FG Wilson offer a range of optional features to tailor our generator sets to meet your power needs. Options include:

- Upgrade to CE Certification
- A wide range of Sound Attenuated Enclosures
- A variety of generator set control and synchronising panels
- Additional alarms and shutdowns
- A selection of exhaust silencer noise levels

For further information on all of the standard and optional features accompanying this product please contact your local Dealer or visit: www.FGWilson.com

Dimensions an	d Weights			
Length (L) mm (in)	Width (W) mm (in)	Height (H) mm (in)	Dry kg (lb)	Wet kg (lb)
3900 (153.5)	1461 (57.5)	2156 (84.9)	4454 (9819)	4522 (9969)
Dry = With Lube	Oil	Wet = With Lube	e Oil and Coolant	

Ratings in accordance with ISO 8528, ISO 3046, IEC 60034, BS5000 and NEMA MG-1.22. Generator set pictured may include optional accessories.

Engine Technical Data		
No. of Cylinders / Alignment:		6 / In Line
Cycle:	4 Stroke	
Bore / Stroke: mm (in)		145.0 (5.7)/183.0 (7.2)
Induction:		Turbocharged Air To Air Charge Cooled
Cooling Method:	thod: Water	
Governing Type:		Electronic
Governing Class:		ISO 8528 G2
Compression Ratio:		14.5:1
Displacement: I (cu. in)		18.1 (1104.5)
Moment of Inertia: kg m² (lb/in²)		7.05 (24091)
Engine Electrical System	:	
- Voltage / O	Ground	24/Negative
- Battery Charge	r Amps	70
Weight: kg (lb)	- Dry	2050 (4519)
	- Wet	2158 (4758)

Performance		50 Hz	60 Hz
Engine Speed: rpm		1500	-
Gross Engine Powe	er: kW (hp)		
	- Prime	584.0 (783.0)	-
	- Standby	628.0 (842.0)	-
BMEP: kPa (psi)			
	- Prime	2577.0 (373.7)	-
	- Standby	2771.0 (401.9)	-

uel Systen	า			
uel Filter	ype: Eco Replaceable Element			
lecommen	ded Fuel:	C	lass A2 Diesel c	or BSEN590
uel Consu	mption: I/hr (US g	al/hr)		
	110%	100%	75%	50%
Prime	Load	Load	Load	Load
50 Hz	142.0 (37.5)	127.6 (33.7)	94.8 (25.0)	66.0 (17.4)
60 Hz	-	-	-	-
		100%	75%	50%
Standby		Load	Load	Load
50 Hz		142.0 (37.5)	104.0 (27.5)	71.5 (18.9)
60 Hz		-	-	-

(Based on Class A2) sp gr avity Э,

Air Systems	50 Hz	60 Hz
Air Filter Type:	Non Ca	nister
Combustion Air Flow: m ³ /min (cfm)		
- Prime	37.0 (1307)	-
- Standby	40.0 (1413)	-
Max. Combustion Air Intake Restriction: kPa (in H ₂ O)	6.4 (25.7)	-

Cooling System	50 Hz	60 Hz
Cooling System Capacity: I (US gal)	68.5 (18.1)	-
Water Pump Type:	Centr	rifugal
Heat Rejected to Water & Lube Oil:		
kW (Btu/min) - Pri	me 202.0 (11488)	-
- Stan	dby 219.0 (12454)	-
Heat Radiation to Room: Heat radiated from engine and alternator		
kW (Btu/min) - Pri	me 68.9 (3918)	
- Stan	dby 77.8 (4424)	
Radiator Fan Load: kW (hp)	9.0 (12.1)	-
Radiator Cooling Airflow: m ³ /min (cfm)	373.2 (13179)	-
External Restriction to Cooling Airflow: Pa (in H ₂ O)	125 (0.5)	-

Designed to operate in ambient conditions up to 50°C (122°F). Contact your local FG Wilson Dealer for power ratings at specific site conditions.

Lubrication System	
Oil Filter Type:	Eco, Full Flow
Total Oil Capacity: I (US gal)	62.0 (16.4)
Oil Pan: I (US gal)	53.0 (14.0)
Oil Type:	API CH4 / CI4
Oil Cooling Method:	Water

Exhaust System	50 Hz	60 Hz
Maximum Allowable Back Pressure: ^{kPa} (in Hg)	6.9 (2.0)	-
Exhaust Gas Flow: m³/min (cfm)		
- Prime	106.0 (3743)	-
- Standby	114.0 (4026)	-
Exhaust Gas Temperature: °C (°F)		
- Prime	555 (1031)	-
- Standby	553 (1027)	-

Alternator Physical Data	
Manufactured for FG Wilson by:	FG Wilson
Model:	EG355L-560N
No. of Bearings:	1
Insulation Class:	Н
Winding Pitch Code:	2/3 - R16
Wires:	6
Ingress Protection Rating:	IP21
Excitation System:	SHUNT
AVR Model:	EVC600i

Alternator Operating Data	
Overspeed: rpm	2250
Voltage Regulation: (Steady state)	+/-1%
Wave Form NEMA = TIF:	50
Wave Form IEC = THF:	2.0%
Total Harmonic content LL/LN:	3.0%
Radio Interference:	-
Radiant Heat: kW (Btu/min)	
- 50 Hz	32.8 (1865)
- 60 Hz	-

Alternator Performance Data:		50	Hz	60 Hz		
Data Item	415/240V	400/230V	380/220V			
		230 V				
Motor Starting	1740	1450	1488			
Capability* kVA	1763	1650	1488			
Short Circuit	200	200	200			
Capacity** %	300	300	300			
Reactances: Per Unit						
Xd	2.327	2.504	2.775			
X'd	0.106	0.114	0.126			
X"d	0.083	0.089	0.099			

Reactances shown are applicable to prime ratings. *Based on 30% voltage dip at 0.4 power factor and SHUNT excitation. **With optional permanent magnet generator or AREP excitation.

Output Ratings Technical Data 50 Hz					Output Ratings Technical Data 60 Hz				
Voltage	Prime:		Standby:		Voltage	Prime:		Standby:	
	kVA	kW	kVA	kW		kVA	kW	kVA	k
415/240V	650.0	520.0	715.0	572.0					
400/230V	650.0	520.0	715.0	572.0					
380/220V	650.0	520.0	715.0	572.0					
230 V	650.0	520.0	715.0	572.0					

Documentation

A full set of operation and maintenance manuals and circuit wiring diagrams.

Generator Set Standards

The equipment meets the following standards: BS5000, ISO 8528, ISO 3046, IEC 60034, NEMA MG-1.22. FG Wilson is a fully accredited ISO 9001 company.

Warranty

All prime equipment carries a one year manufacturer's warranty. Standby equipment, limited to 500 running hours per year, has a two year manufacturer's warranty. For details on warranty cover please contact your local Dealer, or visit our website: FGWilson.com.

Dealer contact details:

FG Wilson manufactures product in the following locations:

Northern Ireland • Brazil • China • India • USA

With headquarters in Northern Ireland, FG Wilson operates through a Global Dealer Network. To contact your local Sales Office please visit the FG Wilson website at www.FGWilson.com.

FG Wilson is a trading name of Caterpillar (NI) Limited.