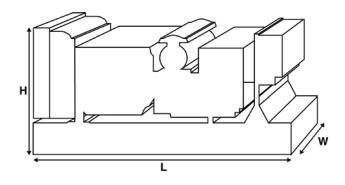


Output Ratings						
Voltage, Frequency	у	Prime	Standby			
400/230V, 50 Hz	kVA	2250	2500			
,	kW	1800	2000			
480/277V, 60 Hz	kVA					
400/2// 1,00112	kW					



Ratings at 0.8 power factor.

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



Dimensions and Weights				
Length	mm	6038 (237.7)		
Width	mm	2196 (86.5)		
Height	mm	2900 (114.2)		
Weight (Dry)	kg	12980 (28616)		
Weight (Wet)	kg	13380 (29498)		

Ratings in accordance with ISO 8528, ISO 3046, IEC 60034, BS5000 and NEMA MG-1.22.

Generator set pictured may include optional accessories.

### **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.

FG Wilson offer a range of optional features to allow you to tailor our generator sets to meet your power needs. Options available 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



Engine Make		Perkins			
Engine Model:		4016-61TRG3			
Alternator Make		Leroy Somer			
Alternator Model:		LL9324P			
Base Frame:		Heavy Duty Fabricated S	Steel		
Circuit Breaker Type:		Options Available			
Frequency:		50 HZ	60 HZ		
Engine Speed: RPM	rpm	1500			
Fuel Tank Capacity:	litres (US gal)	N/A (N/A)			
Fuel Consumption Prime		470.6 (124.3)			
Fuel Consumption Stanc	dby litres (US gal)	528.4 (139.6)			
Engine Technical	Data				
No. of Cylinders		16			
Alignment		60deg Vee			
Cycle		4 STROKE			
Bore	mm (in)		160 (6.3)		
Stroke	mm (in)	190 (7.5)			
Induction			TURBOCHARGED AIR TO WATER CHARGE COOLED		
Cooling Method		WATER			
Governing Type		ELECTRONIC			
Governing Class		ISO 8528			
Compression Ratio		13.0:1			
Displacement	L (cu. in)	61.1 (3730)			
Moment of Inertia:	kg m² (lb/in²)	20.72 (70803)			
Voltage		24			
Ground		Negative			
Battery Charger Amps		55			
Engine Weight Dry	kg (lb)	5570 (12280)			
Engine Weight Wet	kg (lb)	5847 (12890)			
Engine Performa	nce Data	50 Hz	60 Hz		
Engine Speed	rpm	1500			
Gross Engine Power Prim	ne kW (hp)	1975 (2648.5)			
Gross Engine Power Star	ndby kW (hp)	2183 (2927.4)			
BMEP Prime	kPa (psi)	2584.8 (374.9)			
BMEP Standby	kPa (psi)	2857.2 (414.4)			



<b>Fuel System</b>					
Fuel Filter Type:			Replaceable Eler	ment	
Recommended Fuel:			Class A2 Diesel		
Fuel Consumption at		110 % Load	100 % Load	75 % Load	50 % Load
50 Hz Prime:	I/hr (US gal/hr)	528.4 (139.6)	470.6 (124.3)	350.8 (92.7)	244.5 (64.6)
50 Hz Standby	I/hr (US gal/hr)	=	528.4 (139.6)	389.2 (102.8)	266.9 (70.5)
60 Hz Prime	I/hr (US gal/hr)				
60 Hz Standby	I/hr (US gal/hr)	-			

(Based on diesel fuel with a specific gravity of 0.86 and conforming to BS2869 classA2,EN590  $\,$ 

Air System		50 Hz	60 Hz
Air Filter Type:			Replaceable Element
Combustion Air Flow Prime	m³/min (cfm)	160 (5650)	
Combustion Air Flow Standby	m³/min (cfm)	175 (6180)	
Max. Combustion Air Intake Restriction	kPa	3.7 (14.9)	
Cooling System		50 Hz	60 Hz

Cooling System		50 Hz	60 Hz	
Cooling System Capacity	l (US gal)	400 (105.7)		
Water Pump Type:			Centrifugal	
Heat Rejected to Water & Lube Oil: Prime	kW (Btu/min)	757 (43050)		
Heat Rejected to Water & Lube Oil: Standby	kW (Btu/min)	830 (47201)		
Heat Radiation to Room*: Prime	kW (Btu/min)	204.2 (11613)		
Heat Radiation to Room*: Standby	kW (Btu/min)	236.8 (13467)		
Radiator Fan Load:	kW (hp)	77 (103.3)		
Radiator Cooling Airflow:	m³/min (cfm)	2184 (77127)		
External Restriction to Cooling Airflow:	Pa (in H2O)	250 (1)		

<sup>\*:</sup> Heat radiated from engine and alternator

Oil Cooling Method:

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:		Spin-On, Full Flow		
Total Oil Capacity:	I (US gal)	238 (62.9)		
Oil Pan Capacity:	l (US gal)	213 (56.3)		
Oil Type:		API CG 15W-40 CH4		

WATER

<b>Exhaust System</b>		50 Hz	60 Hz	
Maximum Allowable Back Pressure:	kPa (in Hg)	4 (1.2)	'	
Exhaust Gas Flow: Prime	m³/min (cfm)	477 (16845)		
Exhaust Gas Flow: Standby	m³/min (cfm)	525 (18540)		
Exhaust Gas Temperature: Prime	°C (°F)	475 (887)		
Exhaust Gas Temperature: Standby	°C (°F)	560 (1040)		



<b>Alternator Physical Da</b>	ta				
No. of Bearings:				1	
Insulation Class:			Н		
Winding Pitch:				2/3	
Winding Code				6S	
Wires:				6	
Ingress Protection Rating:				IP23	
Excitation System:				AREP	
AVR Model:				D510	
* dependant on voltage code selected					
Alternator Operating [	Data				
Overspeed: rpm			2250		
Voltage Regulation: (Steady state	2) %		+/- 0.5		
Wave Form NEMA = TIF:				50	
Wave Form IEC = THF:	%			2	
Total Harmonic content LL/LN:	%			3.5	
Radio Interference:				EN61000-6	
Radiant Heat: 50 Hz	kW (Btu/min)			76.8 (4368)	
Radiant Heat: 60 Hz	kW (Btu/min)				
Alternator Performance	e Data 50 Hz				
7 itemator i errormane	e Data 30 Hz.	415/240 V	400/230 V	380/220 V	
Voltage Code					
Motor Starting Capability* kV	'A	8870	8266	7491	
Short Circuit Capacity** %		300	300	300	300
Reactances Xo	H	3.057	3.291	3.646	

### **Alternator Performance Data 60 Hz**

Χ'd

X"d

Voltage Code

Motor Starting Capability*	kVA					
Short Circuit Capacity**	%	300	300	300	300	300
Reactances	Xd					
	X'd					
	X"d					

0.235

0.127

0.253

0.127

0.28

0.14

Reactances shown are applicable to prime ratings.

<sup>\*</sup>Based on 30% voltage dip at 0.4 power factor.

<sup>\*\*</sup> With optional independant excitation system (PMG / AUX winding)



Output Ratings	50 Hz			
		Prime		Standby
Voltage Code	kVA	kW	kVA	kW
415/240V	2250	1800	2500	2000
400/230V	2250	1800	2500	2000
380/220V	2250	1800	2497	1997.6
230/115V				
220/127V				
220/110V				
200/115V				
240V				
230V				
220V				
Output Ratings	60 Hz			
Output Natings	00112	Prime		Standby
Voltage Code	kVA	kW	kVA	kW
480/277V				
440/254V				
416/240V				
400/230V				
380/220V				
240/139V				
240/120V				
230/115V				
220/127V				
220/110V				
208/120V				
240/120				
220/110				





## **Dealer Contact Details**



#### **Documentation**

Operation and maintenance manual including circuit wiring diagrams.

### **Generator Set Standards**

The equipment meets the following standards: BS5000, ISO 8528, ISO 3046, IEC 60034, NEMA MG-1.22.

### Warranty

6.8 – 750 kVA electric power generation products in prime applications the warranty period is 12 months from date of start-up, unlimited hours (8760). For standby applications the warranty period is 24 months from date of start-up, limited to 500 hours per year.

730 – 2500 kVA electric power generation products in prime applications the warranty period is 12 months from date of start-up, unlimited hours (8760 hours) or 24 months from date of start-up, limited to 6000 hours. For standby applications the warranty period is 36 months from date of start-up, limited to 500 hours per year.

#### FG Wilson manufactures product in the following locations:

Northern Ireland • Brazil • China • India

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.