

MODEL	BF-V700-60	
Standby Power (60Hz)	600KW / 750KVA	
Prime Power (60Hz)	550KW / 688KVA	

#### **Standard Features**

General Features:

Engine (VOLVO TWD1643GE)

Radiator 55°C max, fans are driven by belt, with safety guard

24V charge alternator

Alternator: single bearing alternator IP23, insulation

class H/H Absorber

Dry type air filter, fuel filter, oil filter, pre-filter, coolant filter

Main line circuit breaker

Standard control panel

Oil drain pump

Two12V batteries, rack and cable

Ripple flex exhaust pipe, exhaust siphon, flange,

muffler

User manual



PHOTO FOR REFERENCE ONLY

### **Generator Ratings**

Voltage	HZ	Phase	P.F (COS¢)	Standby Amps	Standby Ratings (KW/KVA)	Prime Ratings (KW/KVA)
480/277	60	3	0.8	902	600/750	550/688
450/260	60	3	0.8	962	600/750	550/688
440/254	60	3	0.8	984	600/750	550/688
416/240	60	3	0.8	1041	600/750	550/688

Prime Power (PRP): Prime power is available for an unlimited number of annual hours in variable load application, in accordance with GB/T2820-97 (eqv ISO8528); A 10% overload capability is available for a period of 1 hour within a 12-hour period of operation.

Standby Power Rating (ESP): The standby power rating is applicable for supplying emergency power for the duration of a utility power interruption. No overload, utility parallel or negotiated outage operation capability is available at this rating.

# **Sales Promises**

Baifa Power provides a full line of brand new and high quality products. Each and every unit is strictly factory tested.

Warranty is according to our standard conditions: a, 15 months, counted on the day BAIFA sold to the first buyer; b, One year after installation; c, 1000 running hours (accumulated); subject to the earlier one. Service and parts are available from Baifa Power or distributors in your location.



#### ENGINE DATA

Manufacturer / Model: VOLVO TWD1643GE, 4-cycle

Air Intake System: Turbo, Water charge Air Cooling

Fuel System: Elec. Injection, Elec. Fuel System

Cylinder Arrangement: 6 in line

Displacement: 16.12L

Bore and Stroke: 144\*165 (mm)

Compression Ratio: 16.5

Rated RPM: 1800rpm

Max. Standby Power at Rated RPM: 644KW/862HP (with fan)

Governor Type: EMS2

**Exhaust System** 

Exhaust Gas Flow: 130.1m<sup>3</sup>/min

Exhaust Temperature:  $461^{\circ}$ C

Max Back Pressure: 10kPa

Air Intake System

Max Intake Restriction: 5kPa

Burning Capacity: 54.85 m<sup>3</sup>/min

Air Flow: 697m<sup>3</sup>/min

Fuel System

100%(Prime Power) Load: 202 g/KWh

75%(Prime Power) Load: 197 g/KWh

50%(Prime Power) Load: 201 g/KWh

100%(Prime Power) Load: 137.8 L/h

Oil System

Total Oil Capacity: 48L

Oil Consumption: 0.11L/h

Engine Oil Tank Capacity: 32~42L

Oil Pressure at Rated RPM: 300-650kPa

Cooling System

Total Coolant Capacity: 128L

Thermostat: 82-92°C

Max Water Temperature: 103°C



# **ALTERNATOR SPECIFICATION**

#### **GENERAL DATA**

Compliance with GB755, BS5000, VDE0530, NEMAMG1-22, IED34-1, CSA22.2 and AS1359 standards.

#### **Alternator Data**

Number of Phase: 3

Connecting Type: 3 Phase and 4 Wires, "Y" type connecting

Number of Bearing: 1

Power Factor: 0.8

Protection Grade: IP23

Altitude: ≤1000m

Exciter Type: Brushless, self-exciting

Insulation Class, Temperature Rise: H/H

Telephone Influence Factor (TIF): <50

THF: <2%

Alternator Capacity: 713KVA

Alternator Efficiencies: 94.9%

# **GENERATING SET DATA**

Voltage Regulation: ≥±5%

Voltage Regulation, Stead State: ≤±1%

Sudden Voltage Warp (100% Sudden Reduce): ≤+20%

Sudden Voltage Warp (Sudden Increase): ≤-15%

Voltage Stable Time (100% Sudden Reduce): ≤4S

Voltage Stable Time (Sudden Increase) ≤4S

Frequency Regulation, Stead State: ≤5% Adjustable

Frequency Waving: ≤0.5%

Sudden Frequency Warp (100% Sudden Reduce): ≤+10%

Sudden Frequency Warp (Sudden Increase): ≤-7%

Frequency Recovery Time (100% Sudden Reduce): ≤3S

Frequency Recovery Time (Sudden Increase): ≤3S

Noise Level: 120dB



#### **Standard Features**

$\Diamond$	"COMAP"	Standard Auto	◇ MCCB	♦ Special Coolant for Volve
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Control System

♦ Base Fuel Tank
♦ Starting batteries
♦ Water Separator (Volvo)

( Maintenance-Free & Watering-Free) with connective wires

♦ Oil Drain Pump
♦ Exhaust System( including
♦ Documents

until muffler)

# **Options**

♦ Daily Fuel Tank
♦ Permanent Magnet
♦ Remote Control Panel

Generator(PMG)

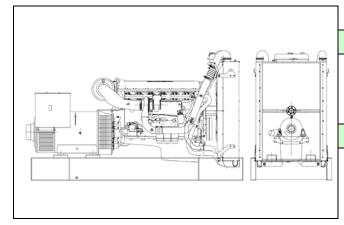
♦ Battery Charger
♦ Rainproof Type
♦ Automatic Transfer Switch

♦ Engine Heater
♦ Soundproof Type
♦ Switchboard

♦ Alternator Heater
♦ Trailer Type
♦ Paralleling System

♦ Engine Air Intake Heater
♦ Spare Parts

# **Dimension & Weight**



# Standard Configuration (Open Type)

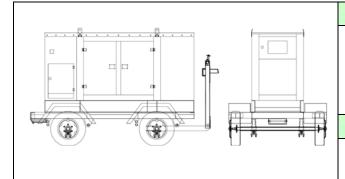
Overall Size: 3405\*1397\*1950 (mm)

Weight: 4050kg

#### With Base Fuel Tank

Overall Size: 3405\*1397\*2100 (mm)

Weight: 4350kg



# Soundproof Type

Overall Size: 5030\*1660\*2550 (mm)

Weight: 6060kg

### Trailer Type

Overall Size: 5840\*2540\*3400 (mm)

Weight: 7510kg



### **Standard Control Panel**



Baifa Standard Control Panel is the basic configuration for normal operation and usage, it is of some advantages such as easy to operate, various function and well protection. Operative buttons such as Turn On, Per-heat, Starting, Stop (Emergency Stop) on the panel. While malfunction occurs, control panel will stop the generator and also alarm with light or buzz.

# **Auto Module Control Panel**



**Auto Module Control Panel** is the configuration for nobody on duty controlling generators. This kind of panel adopts auto module control system, with large LCD display to show the menu.

Features: MRS10-can receive remote output signal from ATS and realize auto start and stop of generators.

MRS16-can realize all functions of MRS10, add RS232 interface which can communicate with PC to realize remote operation.

AMF25-Auto Mains Failure controller, can realize all functions of MRS16, furthermore can detect ATS and control directly.

### **Auto Parallel Control Panel**



Automatic Parallel Control Panel This new automatic parallel system adopts intelligent modules, inserted and folded installed, no need the peripheral relay and logic circuit. The main switch adopts electronic breaker or frame breaker, combined together with the generator, which is very reliable. One generator, one panel. The panel can be used both for singly and parallel. It is only need to parallel generator with such panel when the capability needs to be enlarged in the future.