

iMars BG

Three Phase Grid-tied Solar Inverter

BG4KTR / 5KTR / 6KTR / 8KTR / 10KTR



Monitoring solution:

WiFi 200
GPRS 200

SysExpert

PhoneExpert
InteExpert
Monitoring Center

Efficient

- The core technologies are from Germany.
- Wider voltage range, lower starting voltage and higher conversion efficiency. (Max efficiency can be reach to 98.3%).
- Two MPPT, adapt to the complex conditions of roof, improve power generation.
- Adopt the latest technologies and combination of T-type three level topologies and SVPWM.



Smart

- Smart grid adaptive to meet the requirements of various power grid accesses.
- Variety of monitoring modes: APP (one-button registration), large screen data monitoring center, cloud monitoring platform.
- Support RS485,GPRS,WIFI, GPRS200.



Reliable

- Aluminum casing, natural cooling, IP65 protection level.
- Adopt internationally famous brand components to ensure the stable operation of inverter.
- Insured by well-known international property insurance company (AIG) for Products /Completed Operations Liability Insurance



Simple

- Home appliance design, easy to operation.
- Small in size, light in weight, easy to install.

Specification

	BG4KTR	BG4KTR-S	BG5KTR	BG6KTR-S	BG6KTR	BG8KTR	BG10KTR
Input (DC)							
Max. DC input power (W)	4800	4800	5700	5700	7200	9000	11000
Max. DC input voltage (V)			900				1000
Starting voltage (V)			220/180				220/150
Min. operation voltage (V)			200-800/580				200-800/610
MPPT Range(V)							
Rated input voltage(V)			220/180				220/150
Number of MPPT / String per MPPT	2/1	1/1	2/1	1/1			2/1
Max. DC current (A) Per MPPT	10x2	12x1	10x2	12x1	10x2	12x2	12.5x2
x Number of MPPT							
DC switch						Optional	
Output (AC)							
Rated output power (W)	4000	4000	5000	5000	6000	8000	10000
Max. AC output current (A)	6.4	6.4	8	8	9.6	12.5	14
Grid voltage range			3/PE :230/400V, (320~460V)/3/PE:220/380V/(320~480V)				
Grid frequency /range			50Hz/47~51.5Hz) / 60Hz/57~61.5Hz)				
Power factor			-0.8~+0.8 (adjustable)				
THDI			< 3% (at rated power)				
AC output			Three-phase (L1, L2, L3, N, PE)/(L1, L2, L3, PE)				
System							
Cooling method			Natural cooling			Smart cooling	
Max. efficiency	98.10%	98.10%	98.10%	98.10%	98.20%	98.30%	98.30%
Euro-efficiency	97.50%	97.50%	97.60%	97.60%	97.70%	97.80%	97.80%
MPPT efficiency			99.90%				
Protection degree			IP65				
Self-consumption(at night)			<0.5 (W)				
Topology			Transformerless				
Operating temperature range			-25℃ ~+60℃ (derate after 45℃)				
Relative humidity			0-95%, no condensation				
Protection			PV array leakage protection, PV array leakage current protection, Ground fault monitoring,Grid monitoring, Island protection, DC monitoring, Short current protection etc.				
Noise (dB)			< 30			< 50	
Display and communication							
Display			2.0 inches LCD display, support backlit display				
LCD language			English, Chinese, German, Dutch				
Keyboard			Integrated				
Communication interface			RS485 (standard), WiFi, GPRS200 (optional)				
Mechanical parameters							
Dimension (H x W x D (mm))			530x360x150			575x360x150	
Weight (kg)			20			23	
Installation			Wall mounting				
Others							
DC terminal			Waterproof terminals				
Grid qualification	IEC 61727/IEC62116) , IEC 60068-2-1: 2007, IEC 60068-2-2: 2007, IEC 60068-2-14: 2009, IEC 60068-2-30: 2005, IEC 61683: 1999, VDE0126-1-1, VDE-AR-N4105, G59/3, C10/11, AS/NZS 4777.2:2015, NBT 35004-2013, PEA, ZVR						
Sale certificates / EMC certificates	IEC 62109-1 : 2010, IEC 62109-2 : 2011, EN 61000-6-2: 2005, EN 61000-6-3:2007/A1:2011						
Factory warranty			5 years(standard)				

iMars BG

Three Phase Grid-tied Solar Inverter

BG12KTR / 15KTR / 17KTR



Monitoring solution:



WiFi 200
GPRS 200



SystemExpert



PhoneExpert
Monitoring Center



Efficient

- Integrated intelligent DC combiner and surge protection improve system flexibility and lower the system cost.
- Max efficiency is up to 98.3%, wide input voltage range, adapt to all kinds of solar panels and string configuration.
- Dual MPPT work independently and allow unbalanced input power. One MPPT maximum input is up to 60% of Max. DC power.
- Adopt the latest technologies and combination of T-type three level topologies and SVPWM.



Smart

- AC output power is adjustable between 1-100%.
- Smart grid adaptive to meet the requirements of various power grid accesses.
- Variety of monitoring modes: APP (one-button registration), large screen data monitoring center, cloud monitoring platform.
- Support RS485, GPRS, WiFi, GPRS200.



Reliable

- IP65 protection level, suitable for various installation environments.
- Bus capacitors consist of advanced film capacitors, designed with the latest thermal simulation technology for longer lifespan.
- Insured by well-known international property insurance company (ANQ) for Products / Completed Operators Liability Insurance.



Simple

- High power density, small size.
- Modular design, easy to maintain.

Specification

	BG12KTR	BG15KTR	BG17KTR
Input (DC)			
Max. DC input power (W)	14000	18000	19500
Max. DC input voltage (V)		1000	
Starting voltage (V) / Min. operation voltage (V)		200/180	
MPPT Range(V) / Rated input voltage(V)		190-800/610	
Number of MPPT / String per MPPT		2/2	
Max. DC current (A) Per MPPT x Number of MPPT	19x2	21x2	23x2
DC switch		Integrated	
Output (AC)			
Rated output power (W)	12000	15000	17000
Max. AC output current (A)	20	24	28
Grid voltage range		3/PE 290/400V, (320-460V, 3/PE(220/380V, (320-480V)	
Grid frequency range		50Hz (47-51.5Hz) / 60Hz (57-61.5Hz)	
Power factor		-0.8~+0.8 (adjustable)	
THDI		< 3% (at rated power)	
AC output		Three-phase (L1, L2, L3, N, PE)/(L1, L2, L3, PE)	
System			
Cooling method		Smart cooling	
Max. efficiency	98.20%	98.30%	98.30%
Evo-efficiency	97.60%	97.80%	97.80%
MPPT efficiency		99.90%	
Protection degree		IP65	
Self-consumption(at night)		<0.5 (W)	
Topology		Transformerless	
Operating temperature range		-25°C~+60°C (derate after 45°C)	
Relative humidity		0-95%, no condensation	
Protection		PV array insulation protection, PV array leakage current protection, Ground fault monitoring, Grid monitoring, Island protection, DC monitoring, Short current protection etc.	
Noise (dB)		< 50	
Display and communication			
Display		3.5 inches LCD display, support backlit display	
LCD language		English, Chinese, German, Dutch	
Keyboard		Integrated	
Communication interface		RS485 (standard), WiFi, GPRS200 (optional)	
Mechanical parameters			
Dimension (H x W x D mm)		610x480x220	
Weight (kg)		38	
Installation		Wall mounting	
Others			
DC terminal		Waterproof terminals	
Grid qualification		DIN VDE 0128-1-1:2013, VDE-AR-N 4105:2011, DIN VDE V 0124-100:2012, IEC 61727/IEC62116, AS/NZS 4772-2:2015, NB/T32004-2013, IEC 60086-2-1:2007, IEC 60086-2-2:2007, IEC 60069-2-14:2009, IEC 60069-2-30:2005, IEC 61683:1999, C10/11:2012	
Safety certificates / EMC certificates		IEC 62109-1:2010, IEC 62109-2:2011, EN 61000-6-2:2005, EN 61000-6-3:2007/A1:2011	
Factory warranty		5 year(standard)	

