

iMars Series Grid-tied Solar Inverters



Accessoires



WiFi 200 / GPRS
Via RS485 interface



Data Webbox
Support up to 16 inverters



APPs
for ISO and Android



Web monitoring
With INVT Cloud server

Description

iMars BG series three-phase grid-tied solar inverters adopt the latest technologies combination of T type three level topology and SVPWM, provide flexible system configuration and monitoring solutions for household, commercial and power plant systems.

Features

- Dual MPPTs work independently and allow unbalanced input power. One MPPT maximum input is up to 60% of Max. DC power.
- High efficiency and stable performance at entire input voltage and output power range.
- Max. efficiency is up to 98.6%.
- Wide input voltage range gives more possibilities for accepting different string configuration and different type of PV modules.
- Bus capacitors consist of advanced film capacitors, designed with the latest thermal simulation technology for longer lifespan.
- Integrated intelligent DC combiner and surge protection improve system's flexibility and lower the cost.
- 5V 200mA auxiliary DC power interface is optional for system expansion.
- AC output power is adjustable between 1-100%.
- Reactive power control and power factor adjustable: 0.8 leading ~ 0.8 lagging.
- RS485, Ethernet, WIFI communication modes are optional for realizing multiple monitoring solutions via PC, mobile phones, internet etc. platforms.



ACT witness Lab certified by TÜV SÜD



**G83/G59 C10/11
TF3.2.1 MEA PEA**



iMars PhoneExpert
(for IOS)



iMars PhoneExpert
(for Android)

Specification

	BG40KTR	BG50KTR	BG60KTR
Input (DC)			
Max. DC voltage (V)	1000	1100	
Starting voltage /Min. operation voltage (V)	300/280		
Starting power (W)	150		
MPPT Operating Voltage Range (V) / Rated Voltage	280 - 800/610V		
Rated power voltage range (V)	580 – 800	550-850	
Number of MPPT / String Per MPPT	2/4	2/5	2/6
Max. DC Power (W)	40800	54300	66000
Max. DC Current (A) Per MPPT x Number Of MPPT	33x2	42x2	
DC switch	Integrated		
Output (AC)			
Rated power (W)	40000	50000	60000
Max AC Current (A)	48	52	55.7
Rated AC Voltage And Range	3/PE, 277/480V (384–552V)	3/N/PE,310/540V (459–594V)	3/N/PE,381/660V (561–726V)
Rated Grid frequency And Range	50Hz (47–51.5Hz) / 60Hz (57–61.5Hz) According to VDE0126-1-1, VDE-AR-N4105, CQC, G59/3, C10/11, AS/NZS 4777.2:2015, PEA		
Power factor	-0.8~+0.8 (Adjustable)		
THD	< 3% (at rated power)		
AC connection	Three-phase (L1, L2, L3, PE) or (L1, L2, L3, N, PE)		
System			
Cooling method	Smart Cooling method		
Max efficiency	98.60%	98.90%	
Euro-efficiency	98.20%	98.60%	
MPPT efficiency	99.9%		
Degree of protection	IP65		
Self-consumption (at night)	<0.5W		
Topology	Transformerless		
Operating temperature range	-25℃~+60℃ (derate after 45℃)		
Relative humidity	0~95%, no condensation		
Protection	DC isolation monitoring, DC monitoring, grounding fault monitoring, grid monitoring, island protection, overvoltage and short circuit protection, etc.		
Noise	< 50dB		
Display and communication			
Display	3.5inches LCD display, support backlit display		
System language	English, Chinese, German, Dutch		
Key	Integrated		
Communication interfaces:	RS485 (Standard), WiFi, Ethernet (Optional)		
Mechanical parameters			
Dimension (H x W x D mm)	660x525x250	700x540x250	
Weight (kg)	52	62	
Installation	Wall mounting		
Others			
DC terminal	BC03A, BC03B (PV-FT-CF-C-4-300-BU (-); PV-FT-CM-C-4-300-RD (+), Helios H4 4mm ²)		
Certifications	TUV, CE, VDE0126-1-1, VDE-AR-N4105, G59/3,C10/11, TF3.2.1, AS/NZS 4777.2:2015,CQC EN61000-6-1:4, EN61000-11:12, IEC62109-1:2010, PEA,ZVRT,LVRT		
Factory warranty (years)	5 (standard) / 10, 15, 20 (optional)		



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