



15W AC-DC High Reliable Extreme Small Desktop Industrial Adaptor

SGAS15B series



User's Manual



Video



Features

- Extreme small
- Universal AC input / Full range
- 2 pole AC inlet IEC320-C8, Class II power unit
- No load power consumption < 0.075W
- **Energy efficiency Level VI**
- Comply with EISA 2007/DoE, EU ErP and meet CoC Version 5
- Protections: Short circuit / Overload / Over voltage
- Fully enclosed plastic case
- Pass LPS
- 7.5V / 18V / 48V models available (by request)
- Various DC plug quick adapter accessory available
(Plug kit sold separately, please refer to : https://www.meanwell.com/upload/pdf/DC_plug.pdf)
- 3 years warranty

Applications

- Consumer electronic devices
- Telecommunication devices
- Office facilities
- Industrial equipments

GTIN CODE

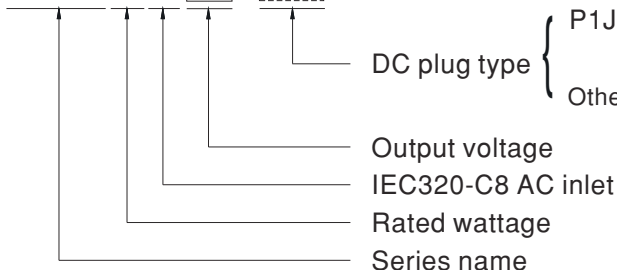
MW Search: <https://www.meanwell.com/serviceGTIN.aspx>

Description

SGAS15B is a 15W compact size highly reliable, desktop style single-output green adaptor series, which is compact and convenient for carry. This product is a class II power unit (no FG) equipped with the standard IEC320-C8 AC inlet and accepting the input range from 90VAC to 264VAC. The whole series provides different models with output voltages ranging between 5VDC and 24VDC that it can satisfy the demands for various types of consumer electronic devices. With the efficiency up to 86% and the extremely low no-load power consumption below 0.075W, SGAS15B is compliant with USA EISA 2007/DoE, EU ErP, and meet Code of Conduct (CoC) Version 5. The supreme feature allows the adaptor to save the energy when it is under either the operating mode or the standby mode. The entire series is approved for international safety regulations; moreover, it adopts the 94V-0 flame retardant plastic case that it can effectively prevent users from electric hazards.

Model Encoding

SGAS 15 B 05 - P1J

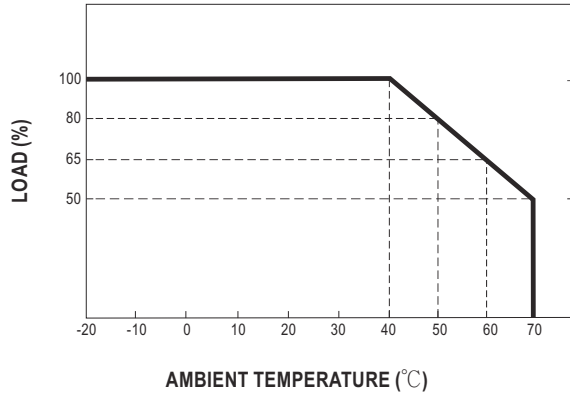




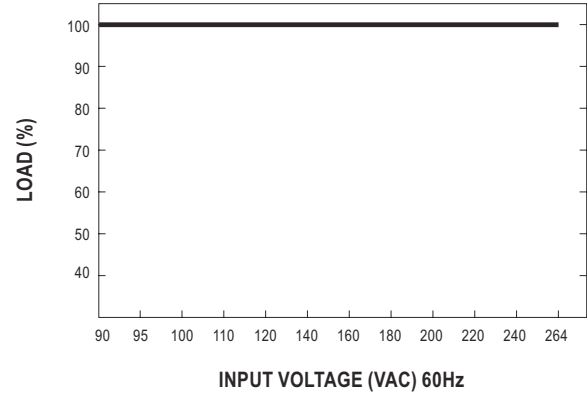
SPECIFICATION

ORDER NO.		SGAS15B05-P1J	SGAS15B09-P1J	SGAS15B12-P1J	SGAS15B15-P1J	SGAS15B24-P1J	
OUTPUT	SAFETY MODEL NO.	SGAS15B05	SGAS15B09	SGAS15B12	SGAS15B15	SGAS15B24	
	DC VOLTAGE Note.2	5V	9V	12V	15V	24V	
	RATED CURRENT	2.40A	1.66A	1.25A	1.00A	0.625A	
	CURRENT RANGE	0 ~ 2.40A	0 ~1.66A	0 ~ 1.25A	0 ~ 1.00A	0 ~ 0.625A	
	RATED POWER	12W	15W	15W	15W	15W	
	RIPPLE & NOISE (max.) Note.3	80mVp-p	80mVp-p	80mVp-p	80mVp-p	100mVp-p	
	VOLTAGE TOLERANCE Note.4	±5.0%	±5.0%	±3.0%	±3.0%	±2.0%	
	LINE REGULATION Note.5	±0.5%	±0.5%	±0.5%	±0.5%	±0.5%	
	LOAD REGULATION Note.6	±5.0%	±5.0%	±3.0%	±3.0%	±2.0%	
SETUP, RISE, HOLD UP TIME		3000ms, 50ms, 10ms at full load					
INPUT	VOLTAGE RANGE	90 ~ 264VAC 135 ~ 370VDC					
	FREQUENCY RANGE	47 ~ 63Hz					
	EFFICIENCY (Typ.)	79%	84%	85%	85%	86%	
	AC CURRENT	0.4A / 100VAC					
	INRUSH CURRENT (max.)	Cold start 30A/ 115VAC 50A / 230VAC					
	LEAKAGE CURRENT(max.)	0.25mA / 240VAC					
PROTECTION	OVERLOAD	105 ~ 250% rated output power Protection type : Hiccup mode, recovers automatically after fault condition is removed					
	OVER VOLTAGE	>120% rated output voltage Protection type : Clamp by zener diode					
	WORKING TEMP.	-20 ~ +70℃ (Refer to "Derating Curve")					
ENVIRONMENT	WORKING HUMIDITY	20% ~ 90% RH non-condensing					
	STORAGE TEMP., HUMIDITY	-20 ~ +85℃, 10 ~ 95% RH non-condensing					
	TEMP. COEFFICIENT	±0.03% / °C (0 ~ 40℃)					
	VIBRATION	10 ~ 500Hz, 2G 10min./1cycle, period for 60min. each along X, Y, Z axes					
	SAFETY STANDARDS	UL62368-1, CSA C22.2 NO. 62368-1, TUV BS EN/EN62368-1, EAC TP TC 004 approved					
SAFETY & EMC (Note. 7)	WITHSTAND VOLTAGE	I/P-O/P:3KVAC					
	ISOLATION RESISTANCE	I/P-O/P:100M Ohms / 500VDC / 25℃ / 70% RH					
	EMC EMISSION	Parameter	Standard			Test Level / Note	
		Conducted emission	BS EN/EN55032(CISPR32)/FCC PART 15 / CISPR22, CAN ICES-3(B)/NMB-3(B)			Class B	
		Radiated emission	BS EN/EN55032(CISPR32)/FCC PART 15 / CISPR22, CAN ICES-3(B)/NMB-3(B)			Class B	
		Harmonic current	BS EN/EN61000-3-2			Class A	
		Voltage flicker	BS EN/EN61000-3-3			-----	
	EMC IMMUNITY	Parameter	Standard			Test Level /Note	
		ESD	BS EN/EN61000-4-2			Level 3, 8KV air; Level 2, 4KV contact	
		RF field susceptibility	BS EN/EN61000-4-3			Level 2, 3V/m	
		EFT bursts	BS EN/EN61000-4-4			Level 2, 1KV	
		Surge susceptibility	BS EN/EN61000-4-5			Level 3, 1KV/L-N	
		Conducted susceptibility	BS EN/EN61000-4-6			Level 2, 3V	
		Magnetic field immunity	BS EN/EN61000-4-8			Level 1, 1A/m	
Voltage dips , interruption		BS EN/EN61000-4-11			> 95% dip 0. 5 periods, 30% dip 25 periods, > 95% interruptions 250 periods		
OTHERS	LIFE	3 years : 100% load 40℃, 12hours / day					
	MTBF	507Khrs min. MIL-HDBK-217F(25℃)					
	DIMENSION	80*39*27.7mm (L*W*H)					
	PACKING	130g ; 72pcs / 11Kg / CARTON					
CONNECTOR	PLUG	See page 4~5 ; Other type available by customer requested					
	CABLE	See page 4~5 ; Other type available by customer requested					
NOTE		1.All parameters are specified at 230VAC input, rated load, 25℃ 70% RH ambient. 2.DC voltage: The output voltage set at point measure by plug terminal & 50% load. 3.Ripple & noise are measured at 20MHz by using a 12" twisted pair terminated with a 0.1μf & 47μf capacitor. 4.Tolerance: includes set up tolerance, line regulation, load regulation. 5.Line regulation is measured from low line to high line at rated load. 6.Load regulation is measured from 0% to 100% rated load. 7.The power supply is considered as an independent unit, but the final equipment still need to re-confirm that the whole system complies with the EMC directives. For guidance on how to perform these EMC tests, please refer to "EMI testing of component power supplies." (as available on http://www.meanwell.com) ※ Product Liability Disclaimer : For detailed information, please refer to https://www.meanwell.com/serviceDisclaimer.aspx					

Derating Curve

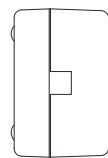
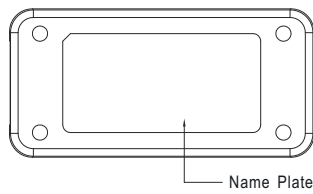


Static Characteristics

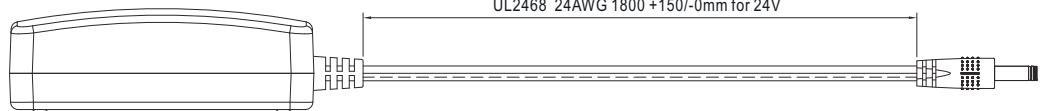


Mechanical Specification

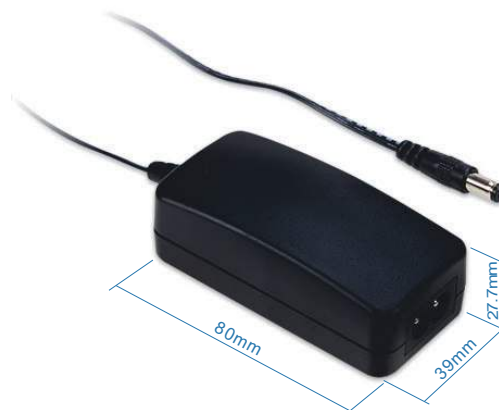
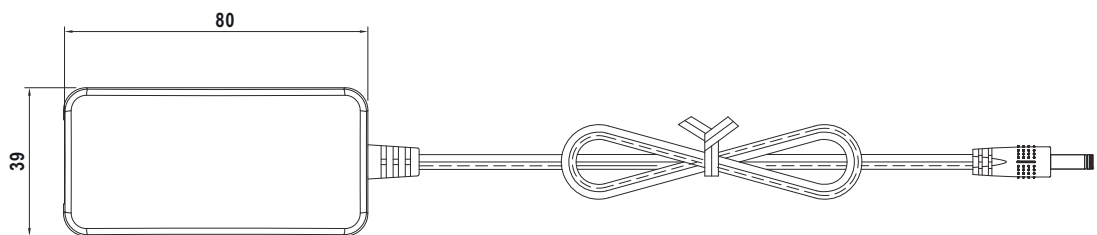
Unit:mm



UL2468 20AWG 1200 +150/-0mm for 5~12V
 UL2468 24AWG 1200 +150/-0mm for 15V
 UL2468 24AWG 1800 +150/-0mm for 24V



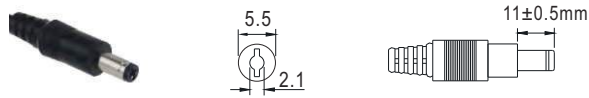
AC INLET
IEC320-C8



DC output plug

Standard plug: P1J

Unit:mm

P1J	Pin Assignment
	
	Outside  Inside

DC plug changeable through:

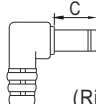
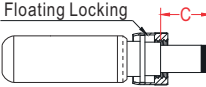
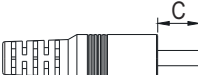
- Customization of the standard part with an optional DC plug according to the table (MOQ applicable)
- Quick adapter accessory (sold separately without MOQ)

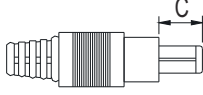
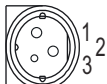
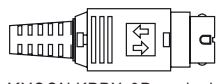
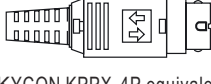
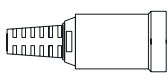
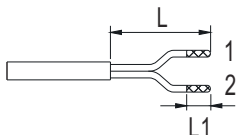
Please refer to below table and online selection guide : https://www.meanwell.com/upload/pdf/DC_plug.pdf

Example quick adapter accessory:



Optional DC plug: (Available in customized cable or quick adapter)

Tuning Fork Style		Type No.	A	B	C	Quick Adapter Accessory
			OD	ID	L	
 	 (Straight)  (Right-angled)	P1I	5.5	2.1	9.5	Available (Current rating: 7.5A max.)
		P1L	5.5	2.5	9.5	
		P1M	5.5	2.5	11.0	
		P1IR	5.5	2.1	9.5	
		P1JR	5.5	2.1	11.0	
		P1LR	5.5	2.5	9.5	
		P1MR	5.5	2.5	11.0	
Barrel Style		Type No.	A	B	C	
			OD	ID	L	
 	 (Straight)  (Right-angled)	P2I	5.5	2.1	9.5	None
		P2J	5.5	2.1	11.0	
		P2L	5.5	2.5	9.5	
		P2M	5.5	2.5	11.0	
		P2IR	5.5	2.1	9.5	
		P2JR	5.5	2.1	11.0	
		P2LR	5.5	2.5	9.5	
		P2MR	5.5	2.5	11.0	
Lock Style		Type No.	A	B	C	
			OD	ID	L	
 	 Floating Locking SWITCHCRAFT original or equivalent	P2S(S761K)	5.53	2.03	12.06	None
		P2K(761K)	5.53	2.54	12.06	
		P2C(S760K)	5.53	2.03	9.52	
		P2D(760K)	5.53	2.54	9.52	
Min. Pin Style		Type No.	A	B	C	
			OD	ID	L	
 	 EIAJ equivalent	P3A	2.35	0.7	11.0	Available (Current rating: 5A max.)
		P3B	4.0	1.7	11.0	
		P3C	4.75	1.7	11.0	

Center Pin Style	Type No.	A	B	C	D	Quick Adapter Accessory
		OD	ID	L	Center Pin	
   EIAJ equivalent	P4A	5.5	3.4	11.0	1.0	Available (Current rating: 7.5A max.)
	P4B	6.5	4.4	11.0	1.4	
	P4C	7.4	5.1	11.0	0.6	
Min. DIN 3 Pin with Lock (male)	Type No.	Pin Assignment				Available (Current rating: 7.5A max.)
		PIN No.	Output			
   KYCON KPPX-3P equivalent	R6B	1	+Vo			
		2	-Vo			
		3	+Vo			
Min. DIN 4 Pin with Lock (male)	Type No.	Pin Assignment				Available (Current rating: 7.5A max.)
		PIN No.	Output			
   KYCON KPPX-4P equivalent	R7B	1	+Vo			
		2	-Vo			
		3	-Vo			
		4	+Vo			
Min. DIN 4 Pin with Lock (female)	Type No.	Pin Assignment				None
		PIN No.	Output			
   KYCON KPJX-CM-4S equivalent	R7BF	1	+Vo			
		2	-Vo			
		3	-Vo			
		4	+Vo			
Stripped and tinned leads	Type No.	Pin Assignment				None
		PIN No.	Output			
  Length of Land L1 by request (MW's standard length, L: 25 mm, L1: 10 mm)	by customer	1 (White)	+Vo			
		2 (Black)	-Vo			

Installation Manual

Please refer to : <http://www.meanwell.com/manual.html>