

Switch Mode Power Supplies

Switch Mode Power Supplies are also known as “Switched Mode Power Supplies”, “Switching Mode Power Supplies”, “SMPSU” and “SPS” and are electronic power supply units that incorporate a switching regulator.

Switch Mode Power Supplies have been around for a long time but are now becoming the predominant type of external DC power supply in use.

Traditional linear transformer based power supplies have increased in price recently due to dramatic increases in the cost of copper and steel which are the primary raw materials used for transformers.

Comparatively speaking, the price of Switch Mode Power Supplies has been coming down in recent years as PCB assembly processes have been further automated and internal components have been miniaturised and integrated.

Switch Mode Power Supply Units also have several other advantages over transformer based PSU's:

- Environmentally friendly due to greater energy efficiency allowing compliance with the latest Minimum Energy Performance Standards (MEPS).
- Smaller size, lighter weight and lower heat generation resulting from higher efficiency compared to Linear Transformer Power Supplies
- Universal auto-ranging input voltage, typically from 90V AC to 264V AC.
- Latest generation have cleaner EMC characteristics to reduce interference with sensitive equipment.
- Output voltage is fully regulated.

Plug-in models are available in 5 Watt, 10~12 Watt, 15~18 Watt & 25~30 Watt sizes and have insulated mains pins for increased safety and compliance with AS/NZS3112.

In-line models are available in 12~18 Watt, 30~42 Watt, 50~60 Watt & 150 Watt sizes and some models are available with a choice of IEC-C14 or IEC-C8 appliance connectors allowing different input cords to be easily fitted.

Popular DC output voltages are available for each model including 3.3V, 5V, 6V, 9V, 12V, 15V 18V, 24V & 48V. Please check adjacent tables.

05G Series Switch Mode PSU



new

Wall mounted light weight and compact Switch Mode Power Supply Unit with 5 watt maximum output capacity. 96V-264V AC wide input voltage range suits travel product applications. Popular voltages shown below. Other voltages can be custom made. Insulated active and neutral pins meet AS/NZS3112 for improved electrical safety. The narrow width of this adaptor allows two adaptors to be used in a standard double power outlet. Dimensions 41(W) x 57(H) x 49(D)mm. Electrical Safety Authority Approved.

CAT #	OUTPUT	PLUG	CENTRE
T0510-001	5V DC 1000mA	11 x 5.5 x 2.1mm	Pos
T0510-002	5V DC 1000mA	Mini-USB	
T0510-003	5V DC 1000mA	10 x 3.5 x 1.3mm	Pos
T0683-001	6V DC 830mA	11 x 5.5 x 2.1mm	Pos
T0955-001	9V DC 550mA	11 x 5.5 x 2.1mm	Pos
T0955-002	9V DC 550mA	11 x 5.5 x 2.5mm	Pos
T1241-001	12V DC 410mA	11 x 5.5 x 2.1mm	Pos

10G Series Switch Mode PSU



new

Wall mounted light weight and compact Switch Mode Power Supply Unit with 10-12 watt maximum output capacity. 96V-264V AC wide input voltage range suits travel product applications. Popular voltages shown below. Other voltages can be custom made. Insulated active and neutral pins meet AS/NZS3112 for improved electrical safety. The narrow width of this adaptor allows two adaptors to be used in a standard double power outlet. Dimensions 41(W) x 74(H) x 35(D)mm. Electrical Safety Authority Approved.

CAT #	OUTPUT	PLUG	CENTRE
T0520-21G	5V DC 2.0 Amp	11 x 5.5 x 2.1mm	Pos
T0620-21G	6V DC 1.67 Amp	11 x 5.5 x 2.1mm	Pos
T0911-21G	9V DC 1.1 Amp	11 x 5.5 x 2.1mm	Pos
T1210-21G	12V DC 1.0 Amp	11 x 5.5 x 2.1mm	Pos
T1210-25G	12V DC 1.0 Amp	11 x 5.5 x 2.5mm	Pos
T1866-21G	18V DC 660mA	11 x 5.5 x 2.1mm	Pos

15G Series Switch Mode PSU



new

Wall mounted light weight and compact Switch Mode Power Supply Unit with 15-18 watt maximum output capacity. 96V-264V AC wide input voltage range suits travel product applications. Popular voltages shown below. Other voltages can be custom made. Insulated active and neutral pins meet AS/NZS3112 for improved electrical safety. The narrow width of this adaptor allows two adaptors to be used in a standard double power outlet. Dimensions 44(W) x 85(H) x 38(D)mm. Electrical Safety Authority Approved.

CAT #	OUTPUT	PLUG	CENTRE
T0333-21G	3.3V DC 3.0 Amp	11 x 5.5 x 2.1mm	Pos
T0530-21G	5V DC 3.0 Amp	11 x 5.5 x 2.1mm	Pos
T0530-25G	5V DC 3.0 Amp	11 x 5.5 x 2.5mm	Pos
T0530-21N	5V DC 3.0 Amp	11 x 5.5 x 2.1mm	Neg
T0625-21G	6V DC 2.5 Amp	11 x 5.5 x 2.1mm	Pos
T0752-21G	7.5V DC 2.0 Amp	11 x 5.5 x 2.1mm	Pos
T0916-21G	9V DC 1.66 Amp	11 x 5.5 x 2.1mm	Pos
T1255-21G	12V DC 1.5 Amp	11 x 5.5 x 2.1mm	Pos
T1255-25G	12V DC 1.5 Amp	11 x 5.5 x 2.5mm	Pos
T1255-21N	12V DC 1.5 Amp	11 x 5.5 x 2.1mm	Neg
T1512-21G	15V DC 1.2 Amp	11 x 5.5 x 2.1mm	Pos
T1512-005	15V DC 1.2 Amp	EIAJ-05	Pos
T1810-21G	18V DC 1.0 Amp	11 x 5.5 x 2.1mm	Pos
T1810-25G	18V DC 1.0 Amp	11 x 5.5 x 2.5mm	Pos

30G Series Switch Mode PSU



new

Wall mounted light weight and compact Switch Mode Power Supply Unit with 30 watt maximum output capacity. 96V-264V AC wide input voltage range suits travel product applications. Popular voltages shown below. Other voltages can be custom made. Insulated active and neutral pins meet AS/NZS3112 for improved electrical safety. Dimensions 55(W) x 96(H) x 42(D)mm. Electrical Safety Authority Approved.

CAT #	OUTPUT	PLUG	CENTRE
T0927-21G	9V DC 2.7 Amp	11 x 5.5 x 2.1mm	Pos
T1225-21G	12V DC 2.5 Amp	11 x 5.5 x 2.1mm	Pos
T1516-25G	15V DC 1.6 Amp	11 x 5.5 x 2.5mm	Pos
T2412-21G	24V DC 1.2 Amp	11 x 5.5 x 2.1mm	Pos

30D Series Switch Mode PSU



In-line lightweight and compact Switch Mode Power Supply Unit with 18 watt maximum output capacity. 96V-264V AC wide input voltage range suits travel product applications. Standard IEC-C8 or IEC-C14 inlet allows correct IEC-C7 or IEC-C13 power cord to be selected for each country. IEC power cord not included. Popular voltages shown below. Other voltages can be custom made. Dimensions 99(L) x 50(W) x 36(H)mm. Electrical Safety Authority Approved.

CAT #	OUTPUT	PLUG	CENTRE	IEC
T0525-008	5V DC 2.5Amp	10.5 x 5.5 x 2.5mm	Pos	C8
T0525P21	5V DC 2.5Amp	11 x 5.5 x 2.1mm	Pos	C14
T0921P21	9V DC 2.0Amp	10.5 x 5.5 x 2.1mm R/A	Pos	C14
T1225P13	12V DC 1.5Amp	10.5 x 3.5 x 1.3mm	Pos	C14
T1225P21	12V DC 1.5Amp	11 x 5.5 x 2.1mm	Pos	C14
T4802P25	48V DC 200mA	10.5 x 5.5 x 2.5mm R/A	Pos	C14

60D Series Switch Mode PSU



In-line Switch Mode Power Supply Unit with 60 watt maximum output capacity. 96V-264V AC wide input voltage range suits travel product applications. Standard IEC-C8 or IEC-C14 inlet allows correct IEC-C7 or IEC-C13 power cord to be selected for each country. IEC power cord not included. Popular voltages shown below. Other voltages can be custom made. Dimensions 114(L) x 62(W) x 36(H)mm. Electrical Safety Authority Approved.

CAT #	OUTPUT	PLUG	CENTRE	IEC
T0955PD	9V DC 5.5 Amp	5-pin Din		C14
T0955P21	9V DC 5.5 Amp	11 x 5.5 x 2.1mm	Pos	C14
T1250-001	12V DC 5.0 Amp	11 x 5.5 x 2.1mm	Pos	C14
T1250-002	12V DC 5.0 Amp	11 x 5.5 x 2.5mm	Pos	C14
T1540-008	15V DC 4.0 Amp	11 x 5.5 x 2.1mm	Pos	C8
T2425P25	24V DC 2.5 Amp	11 x 5.5 x 2.5mm	Pos	C14

42D Series Switch Mode PSU



In-line lightweight and compact Switch Mode Power Supply Unit with 42 watt maximum output capacity. 96V-264V AC wide input voltage range suits travel product applications. Standard IEC-C14 or IEC-C8 inlet allows correct IEC-C13 or IEC-C7 power cord to be selected for each country. IEC power cord not included. Popular voltages shown below. Other voltages can be custom made. Dimensions 100(L) x 56(W) x 35(H)mm. Electrical Safety Authority Approved.

CAT #	OUTPUT	PLUG	CENTRE	IEC
T0560-001	5V DC 6.0Amp	11x5.5x2.1mm	Pos	C14
T0940TOU	9V DC 4.0Amp	11x5.5x2.1mm	Pos	C14
T1235-001	12V DC 3.5Amp	11x5.5x2.1mm	Pos	C14
T1235-008	12V DC 3.5Amp	11x5.5x2.1mm	Pos	C8
T1235-002	12V DC 3.5Amp	11x5.5x2.5mm	Pos	C14
T1235-110	12V DC 3.5Amp	11x5.5x2.1mm	Pos	C14 (CEUL)
T1528-008	15V DC 2.8Amp	11x5.5x2.1mm	Pos	C8
T1626-002	16V DC 2.6Amp	9.7x6.5x3.0mm	Pos	C14
T1823-001	18V DC 2.33Amp	11x5.5x2.1mm	Pos	C14
T2417-001	24V DC 1.75Amp	11x5.5x2.1mm	Pos	C14

150F Series Switch Mode PSU



new

In-line Switch Mode Power Supply Unit with 150 watt maximum output capacity. Green power LED. Fan-less design for long-term reliability. 96V-264V AC wide input voltage range suits travel product applications. Standard IEC-C14 inlet allows correct IEC-C13 power cord to be selected for each country. IEC power cord not included. Standard models are shown below. Other voltages can be custom made. Dimensions 170(L) x 33(W) x 19(H)mm. Electrical Safety Authority Approved.

CAT #	OUTPUT	PLUG	IEC
T1212-150	12V DC 12.5 Amp	4-pin DC	C14
T2462-150	24V DC 6.25 Amp	4-pin DC	C14

Wide and Narrow Power Supplies (AS/NZS 3112:2000 & 2004)

To allow for the safe side-by-side use of devices with integral mains pins (such as plug-in power supplies) in double or multiple socket outlets (double-power points or power boards), these devices must be either less than 43.8mm wide or greater than 54mm wide. Two power supplies that are both less than 43.8mm wide will fit into a double power point (or adjacent sockets on a power board) without jamming. Two wide power supplies (both wider than 54mm) cannot be plugged into the same double power point (neither power supply will work). If one wide and one narrow power supply are plugged into the same double power point, only one power supply will be able to be correctly inserted and the other power supply will not work. The width (w) is measured at the widest part of the device as shown below.



Two narrow power supplies may be used together in a standard double power point. They will both safely operate without mechanical interference.



In an attempt to use one wide plus one narrow power supply in the same double power point, only one will be able to be fully inserted and the other power supply will not work. This example shows the wide power supply displacing the "narrow" power supply and preventing it from operating safely.



This example shows an attempt to use two wide power supplies in the same double power point. Both the power supplies are displaced. Neither can be inserted correctly and neither power supply will operate safely.



Multi-Voltage Adaptors

3 models available, 300mA, 500mA and 1 Amp. Rear mounted slide voltage selector switch prevents accidental changing of voltage whilst the unit is plugged into a wall mains outlet. 7 DC voltage selections: 1.5, 3, 4.5, 6, 7.5, 9 & 12 Volts DC. Compact wall mounted design. Green LED indicator. 180 degree swivel on output cord. Output plug selection includes a small EIAJ plug as used on some Walkmans, MP3 players, Gameboys etc. Output plug centre positive or centre negative changeable. Internal thermal fuse for electrical safety. The insulated active and neutral pins are compliant with AS/NZS3112. Packed in Powermaster[®] brand 3-color heat-sealed blister pack. Electrical Safety Authority Approved.

CAT #	CURRENT	DIMENSIONS
T0300	300mA	43(W) x 73(H) x 53(D)mm
T0500	500mA	43(W) x 73(H) x 53(D)mm
T1000	1 Amp	58(W) x 87(H) x 53(D)mm

