

# **TORUS** POWER

Engineered to perform
& protect like no other

Toroidal Isolation
Power Transformers

# **TOT Series Manual**



North American and International Models - without optional faceplate



Receptacle Panel of International Models, CE model shown



North American Models

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#### **Important Safety Instructions**





**CAUTION!** To reduce the risk of electric shock and fire, do not remove the cover of this device. There are no user serviceable parts inside. Please refer all servicing to licensed service technicians.

**CAUTION!** The international symbol of a lightning bolt inside a triangle is intended to alert the user to uninsulated "dangerous voltage" within the device's enclosure. The international symbol of an exclamation point inside a triangle is intended to alert the user to the presence of important operating, maintenance and servicing information in the manual accompanying the device.

**CAUTION!** To prevent electrical shock, match wide blade of plug to wide slot, fully insert.

**CAUTION!** To reduce the risk of electrical shock, do not expose this equipment to rain or moisture.

- 1. Read Instructions—All safety and operating instructions should be read before operating the device.
- 2. Retain Instructions—The safety and operating instructions should be retained for future reference.
- 3. Heed Warnings—All warnings on the device and in the operating instructions should be adhered to.
- 4. Follow Instructions—All operating and safety instructions should be followed.
- 5. Water & Moisture—The device should never be used in, on or near water for risk of fatal shock.
- 6. Ventilation—The device should always be located in such a way that it maintains proper ventilation. TOT Series Stand-Alone models should never be placed in a built-in installation or anywhere that may impede the flow of air through its ventilation slots.
- 7. Heat—Never locate the device near heat sources such as radiators, floor registers, stoves or other heat-generating devices.
- 8. Power Cord Protection—Power cables should be routed so they are not likely to be stepped on or crushed by items placed on them or against them. Special attention should be paid to areas where the plug enters a socket or fused strip and where the cord exits the device.
- 9. Periods Of Non-Use—The device should be unplugged when not being used for extended periods.
- 10. Dangerous Entry—Care should be taken that no foreign objects or liquids fall or are spilled inside the device.

- 11. Damage Requiring Service—The device should be serviced by licensed technicians when:
- The plug or power supply cord has been damaged.
- Objects have fallen or liquid has spilled inside the device.
- The device has been exposed to moisture.
- The device does not appear to be operating properly or exhibits a marked change in performance.
- The device has been dropped or the enclosure becomes damaged.
- 12. Service—The device should always be serviced by licensed technicians. Only replacement parts specified by the manufacturer should be used. The use of unauthorized substitutions may result in fire, shock, or other hazards.
- 13. Do not position the equipment so that it is difficult to operate the disconnecting device (power cord).
- 14. If the equipment is used in a manner not specified by the manufacturer, the protection provided by the equipment may be impaired.
- 15. The power switch should be in the "off" position when connecting or disconnecting equipment from a Torus Power unit.
- 16. **CAUTION** Some units can be very heavy, please use safe practices when lifting.







≥18 kg (39.7 lb)

≥32 kg (70.5 lb)

≥55 kg (121.2 lb)

#### **Description**

Torus Power **TOT Mini** and **TOT Max** are ultra compact toroidal isolation power conditioners, and the most affordable products in the Torus line-up. The compact footprint and sloped face of TOT models make them convenient for use in almost any situation. They look sharp on a component shelf, or can be located elsewhere when space is at a premium.

The **TOT Mini** is rated at 7A (North American version), and 3A (International). It is the ideal accessory to provide true toroidal power conditioning for small or mid-power AV systems, or dedicated to video components (ie. flat panel TVs, projectors); or audio components (i.e. media sources, powered speakers, source components, etc.).

The **TOT Max** is rated at 15A (North American version) and 8A (International), and can be used in systems up to the rated output current.

**TOT** models provide a convenience USB-type charger as a bonus feature. **TOT** models provide basic circuit protection: series mode surge protection is available as a factory-installed option.

**TOT Mini** is designed to fit between studs spaced at 16" for in-wall installations. A factory installed in-wall mounting kit is available.







## **Shipping Carton & Packing Material**

Please keep the original shipping box and all packing material. This will ensure the TOT is protected in future transport.

In the unlikely event you have a problem and must return it for service you must use the original packing material.

Ship the TOTs only in the original packing material, as the unit is not insurable by carriers otherwise.

#### **Placement & Ventilation**

Torus Power TOTs are extremely efficient devices, however, they are also very high-power devices, and must be adequately cooled.

TOT MAX units have ventilation slots on the base and side panels. Maintain at least 2.5cm distance from each of these surfaces to anything else. Should your installation conditions be constricted, additional forced air-cooling may be necessary.

Do not install the TOT directly above heat-generating equipment.

Maintain at least 15cm behind the TOT for adequate wiring space.

# Warranty

Torus Power products are warranted to be free from manufacturing defects for five years from the original date of sale. This includes parts, labour and return shipping to the first registered owner and all subsequent registered owners. Warranty coverage is extended to applicable products registered or having proof-of-purchase (sales invoice, etc.).

In the event of a defect or malfunction, Torus Power will remedy the problem by repair or replacement, as we deem necessary, to restore the product to full performance.

This warranty is considered void if the defect, malfunction or failure of the product or any component part was caused by damage (not resulting from a defect or malfunction) or abuse while in the possession of the customer. Failure to fully comply with Torus Power operating instructions, voids the warranty.



# **Front Panel Layout**



North American Model Numbers International Model Numbers

TOT MINI and TOT MAX.

TOT MINI CE, TOT MAX CE,

TOT MINI UK, TOT MAX UK,

TOT MINI AUS, TOT MAX AUS.



(RK Faceplate shown in Silver above is also available in Black Anodize as well)

#### **Rear Panel Layout**

#### **International Models - Continental Europe - CE**



Model Number TOT MAX CE

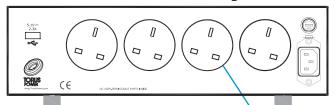


Power Inlet

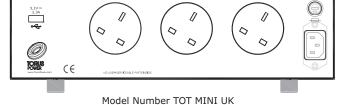
Model Number TOT MINI CE Rubber Mounting Feet (may be removed if Wall or Rack mounting)

Power Outlet (SCHUKO CEE 7/7)

#### **International Models - United Kingdom - UK**

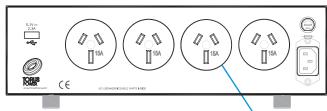


Model Number TOT MAX UK

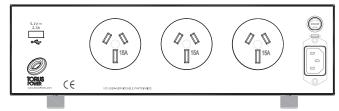


Power Outlet (Inter Power UK)

#### **International Models - Australian - AUS**



Model Number TOT MAX AUS



Power Outlet (Inter Power AUS)

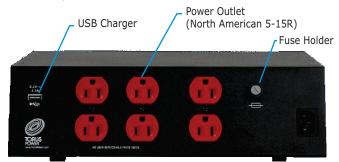
Model Number TOT MINI AUS

#### **North American Models**



Model Number TOT MAX North American

Owner's Manual



Model Numbers TOT MINI North American



Power Conditioners

Audio / Video Power Isolation Units

# **Electrical / Mechanical Specifications**

	NORTH AM	TH AMERICAN 120V INTERNATIONAL 220V - 240V					
MODEL	TOT MINI	TOT MAX	TOT MINI CE	TOT MAX CE	TOT MINI UK	TOT MAX UK	TOT MAX AUS
CONFIGURATION	SAU (Stand-Alone Unit), RK (Rack Mount), IW (In-Wall Mount)						
CHASSIS HEIGHT	2U						
INPUT VOLTAGE	120V 220V - 240V						
OUTPUT VOLTAGE	120V 220V - 240V						
INPUT PROTECTION	1 X 7A FUSE	1 X 15A FUSE	1 X 3A FUSE	1 X 8A FUSE	1 X 3A FUSE	1 X 8A FUSE	
OUTPUT CURRENT	7A	15A	3A	8A	3A	8A	
POWER RATING	840VA	1800VA	696VA	1840VA	696VA	1840VA	
FREQUENCY	6	60Hz 50/60Hz					
NUMBER OF OUTLETS	6	8	3	4	3	4	
INLET TYPE	IEC 15A (I	JL) 10A(VDE)	IEC 15A (UL) 10A(VDE) IEC 15A (UL) 10A(VDE)			DE)	
OUTLET TYPE	NORTH AM	ERICAN 5-15R	SCHUKO CEE 7/7		UK BS1363 AS/NZ 311		AS/NZ 3112
OUTPUT USB	5.1VDC nominal / 2300mA maximum						
WEIGHT (SAU)	25.1 lbs (11.4kg)	38.9 lbs (17.7kg)	25.5 lbs (11.6kg)	49.5 lbs (22.5kg)	25.5 lbs (11.6kg)	49.5 lbs (22.5kg)	
WEIGHT (RACK)	26.0 lbs (11.8kg)	39.8 lbs (18.1kg)	26.4 lbs (12.0kg)	39.8 lbs (18.1kg)	26.4 lbs (12.0kg)	39.8 lbs (18.1kg)	
WEIGHT (IN-WALL)	29.5 lbs (13.4kg)	43.3 lbs (19.7kg)	Not Applicable	Not Applicable	Not Applicable	Not Applicable	
DIMENSIONS WxHxD	318x101x262 (12.5x4.0x10.3)	318x101x363 (12.5x4.0x14.3)	318x101x262 (12.5x4.0x10.3)	318x101x363 (12.5x4.0x14.3)	318x101x262 (12.5x4.0x10.3)	318x101x363 (12.5x4.0x14.3)	318x101x363 (12.5x4.0x14.3)
DIMENSIONS (RACK)	480x88x271 (18.9x3.4x10.7)	480x88x373 (18.9x3.4x14.7)	480x88x271 (18.9x3.4x10.7)	480x88x373 (18.9x3.4x14.7)	480x88x271 (18.9x3.4x10.7)	480x88x373 (18.9x3.4x14.7)	480x88x373 (18.9x3.4x14.7)
DIMENSIONS (IN-WALL)	419x90x381 (16.5x3.6x15.0)	419x90x483 (16.5x3.5x19.0)	Not Applicable	Not Applicable	Not Applicable	Not A	pplicable

OPTIONS	Δ\/ΔΙΙ	ΔRI	F٠

- Series Mode Surge Suppression SMSS (factory installed)
- 19" Rack Faceplate/Adapter Kit (Silver and Black Anodized)
- In-Wall Adapter Kit Available For North American Models

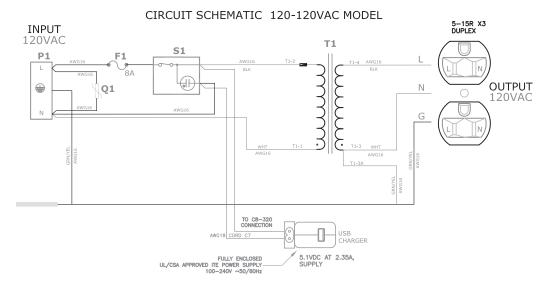
#### **Circuit Protection**

The TOT models come with a replaceable fast acting fuse 1/4" x 1-1/4" (6.35mm x 32mm) on the input side of the unit. This fuse is safety rated with a high maximum interrupt current.

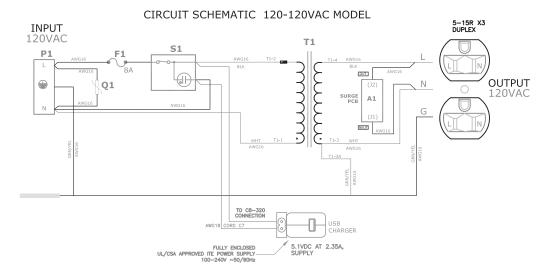
When the power is on, the switch is illuminated.



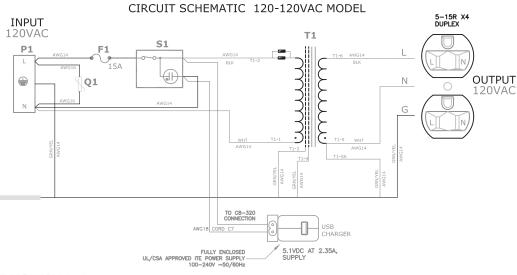
#### **Circuit Schematic North American Model TOT MINI**



#### **Circuit Schematic North American Model TOT MINI SMSS**

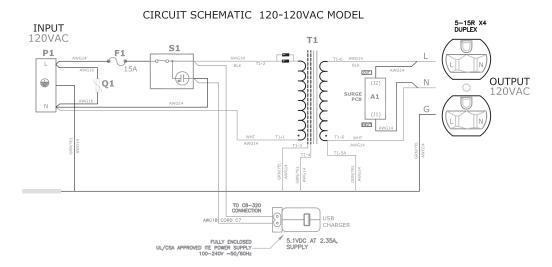


#### **Circuit Schematic North American Model TOT MAX**



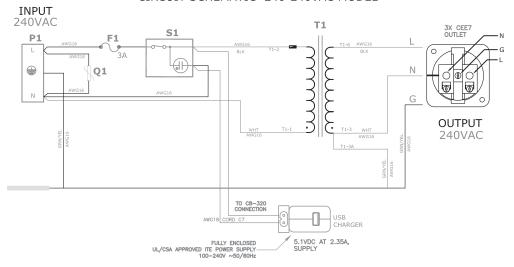


#### **Circuit Schematic North American Model TOT MAX SMSS**



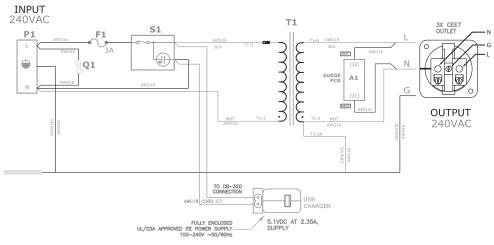
#### **Circuit Schematic International TOT MINI CE**

#### CIRCUIT SCHEMATIC 240-240VAC MODEL



#### **Circuit Schematic International TOT MINI CE SMSS**

#### CIRCUIT SCHEMATIC 240-240VAC MODEL



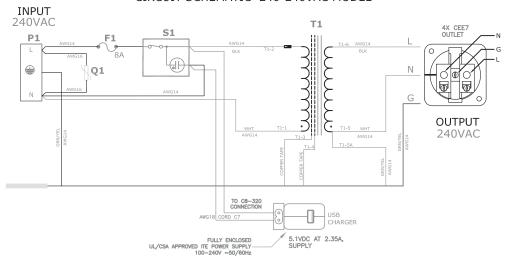


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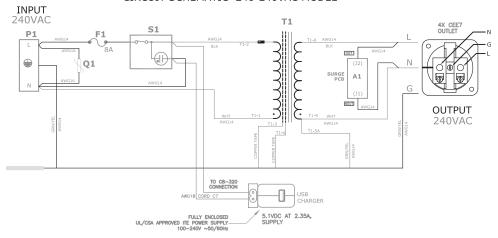
#### **Circuit Schematic International TOT MAX CE**

#### CIRCUIT SCHEMATIC 240-240VAC MODEL



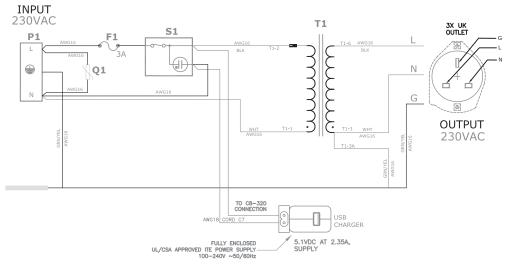
#### **Circuit Schematic International TOT MAX CE SMSS**

#### CIRCUIT SCHEMATIC 240-240VAC MODEL



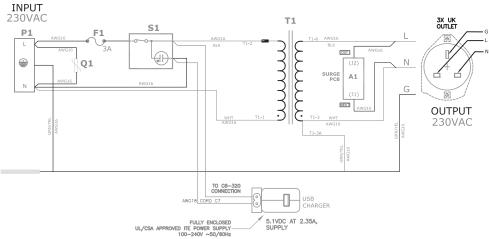
#### **Circuit Schematic International TOT MINI UK**

CIRCUIT SCHEMATIC 230-230VAC MODEL

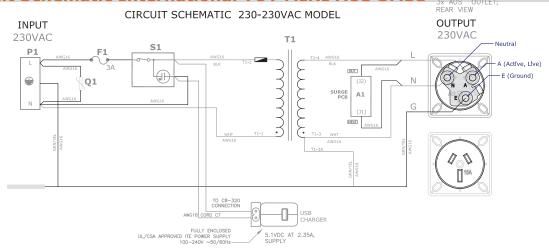


#### **Circuit Schematic International TOT MINI UK SMSS**

CIRCUIT SCHEMATIC 230-230VAC MODEL



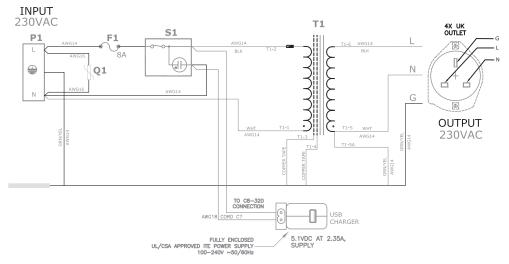
#### **Circuit Schematic International TOT MINI AUS SMSS**



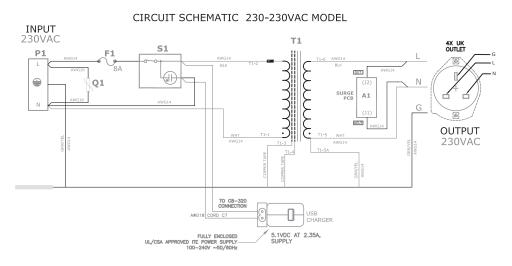


#### **Circuit Schematic International TOT MAX UK**

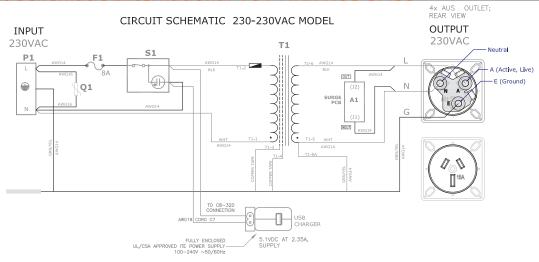
#### CIRCUIT SCHEMATIC 230-230VAC MODEL



#### **Circuit Schematic International TOT MAX UK SMSS**



#### **Circuit Schematic International TOT MAX AUS SMSS**

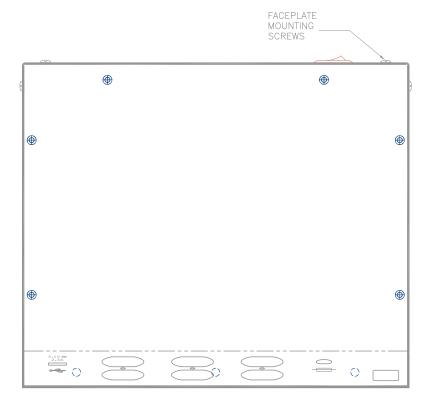


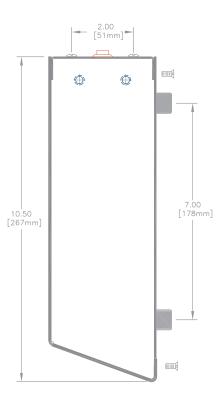


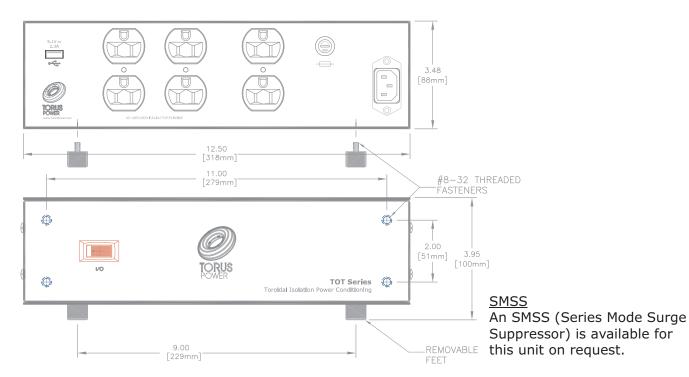
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#### **Layout TOT MINI & TOT MINI SMSS**







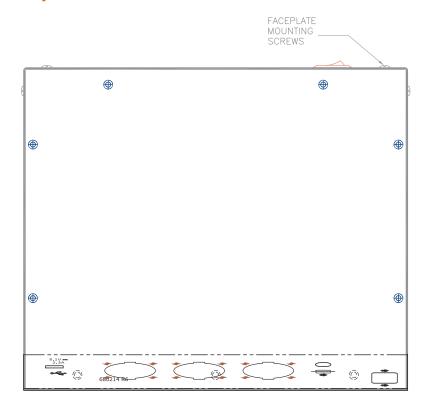
This is an installation drawing for the **TOT MINI**. The four rubber feet at the base of the unit are removable to bolt the unit to a surface. All units are 2U height

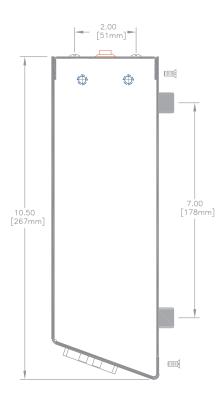
#### **Faceplate**

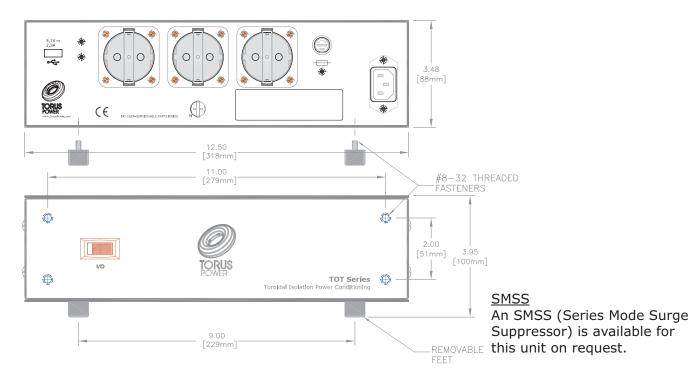
- -RK faceplate, width is 19"
- -Shelf-type faceplate, width is 12.5"



### **Layout TOT MINI CE & TOT MINI CE SMSS**







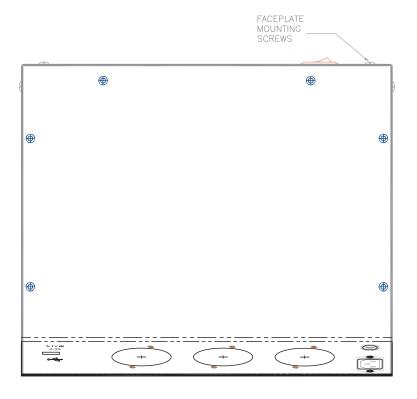
This is an installation drawing for the **TOT MINI CE**. The four rubber feet at the base of the unit are removable to bolt the unit to a surface. All units are 2U height

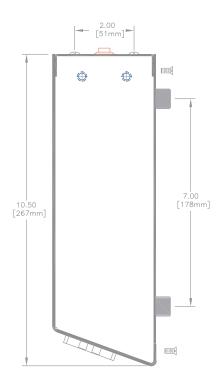
#### **Faceplate**

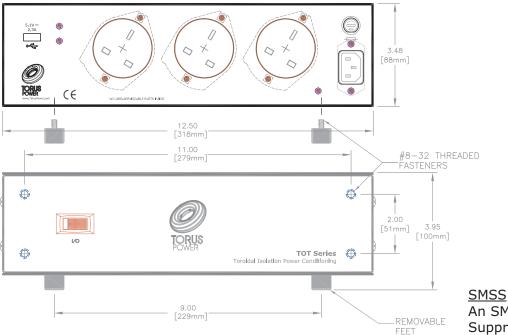
- -RK faceplate, width is 19"
- -Shelf-type faceplate, width is 12.5"



# **Layout TOT MINI UK & TOT MINI UK SMSS**







An SMSS (Series Mode Surge Suppressor) is available for this unit on request.

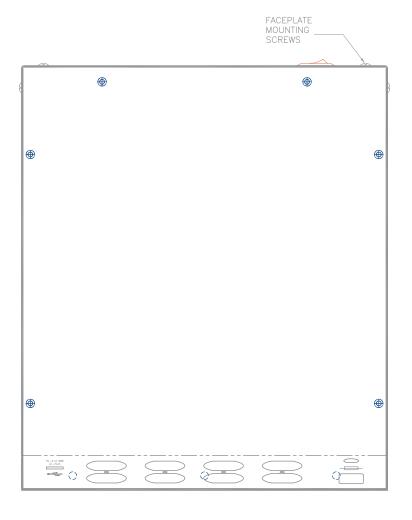
This is an installation drawing for the **TOT MINI UK**. The four rubber feet at the base of the unit are removable to bolt the unit to a surface. All units are 2U height

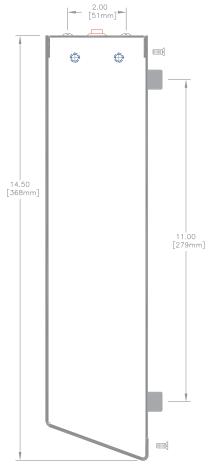
#### <u>Faceplate</u>

- -RK faceplate, width is 19"
- -Shelf-type faceplate, width is 12.5"



### **Layout TOT MAX & TOT MAX SMSS**





This is an installation drawing for the **TOT MAX.** 

The four rubber feet at the base of the unit are removable to bolt the unit to a surface.

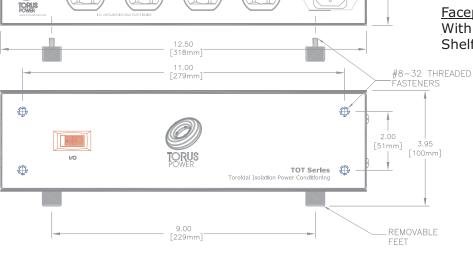
All units are 2U height

#### Faceplate

3.48

[88mm]

With RK faceplate, width is 19" Shelf-type faceplate, width is 12.5"



#### **SMSS**

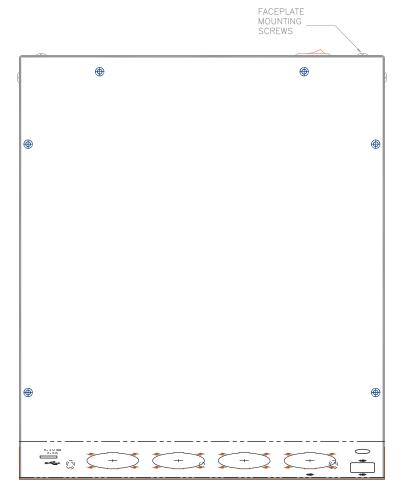
An SMSS (Series Mode Surge Suppressor) is available for this unit on request.

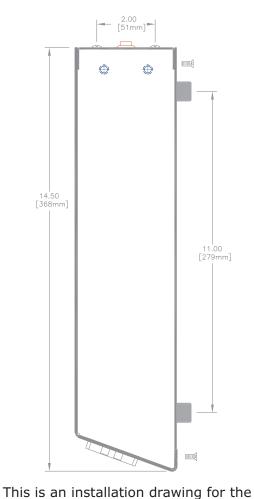


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Audio / Video Power Isolation Units

### **Layout TOT MAX CE & TOT MAX CE SMSS**





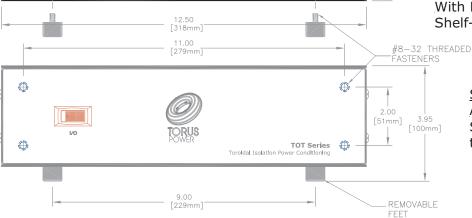
TOT MAX CE.

The four rubber feet at the base of the unit are removable to bolt the unit to a surface.

All units are 2U height

#### <u>Faceplate</u>

With RK faceplate, width is 19" Shelf-type faceplate, width is 12.5"



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: TOT 3A 240 : 240V - 50Hz 3A Max: : 240V ~ r : 240V ~ Input : 201331-nnnn (exemple

#### **SMSS**

An SMSS (Series Mode Surge Suppressor) is available for this unit on request.



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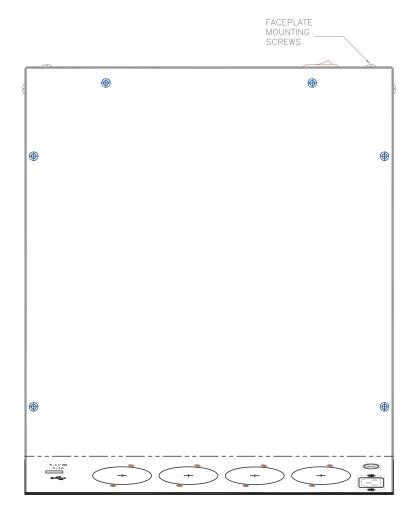
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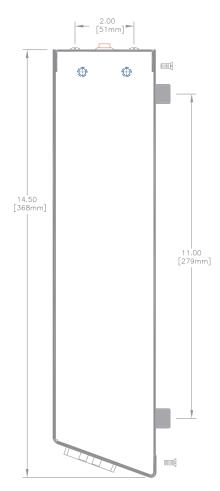
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### **Layout TOT MAX UK & TOT MAX UK SMSS**





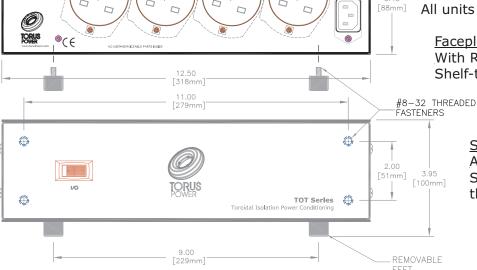
This is an installation drawing for the TOT MAX UK.

The four rubber feet at the base of the unit are removable to bolt the unit to a surface.

All units are 2U height

#### Faceplate

With RK faceplate, width is 19" Shelf-type faceplate, width is 12.5"



(4)

3.48 [88mm]

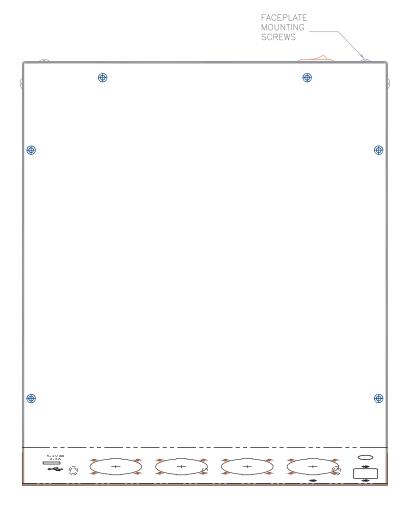
#### **SMSS**

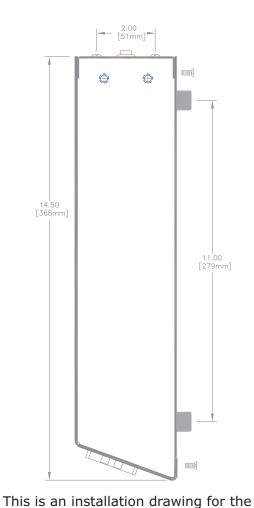
An SMSS (Series Mode Surge Suppressor) is available for this unit on request.



Audio / Video Power Isolation Units

#### **Layout TOT MAX AUS & TOT MAX AUS SMSS**





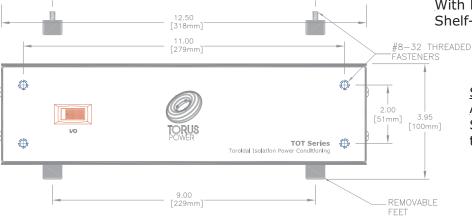
TOT MAX AUS.

The four rubber feet at the base of the unit are removable to bolt the unit to a surface.

All units are 2U height

#### <u>Faceplate</u>

With RK faceplate, width is 19" Shelf-type faceplate, width is 12.5"



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#### **SMSS**

An SMSS (Series Mode Surge Suppressor) is available for this unit on request.



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Power Conditioners

Torus Power products are marketed worldwide by Torus Power Inc.

#### For sales contact:

sales@toruspower.com

Phone: (+1) 416-477-4799 Toll free: 1-877-337-9480

# **Technical inquiries:**

tech@toruspower.com Phone: (+1) 416-477-4799

Toll free: 1-877-337-9480



**Torus Power Inc.** 2861 Sherwood Heights Drive Suite 26 Oakville, ON L6J 7K1

www.toruspower.com

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