

Sealed power adaptor for imc CRONOS-XT

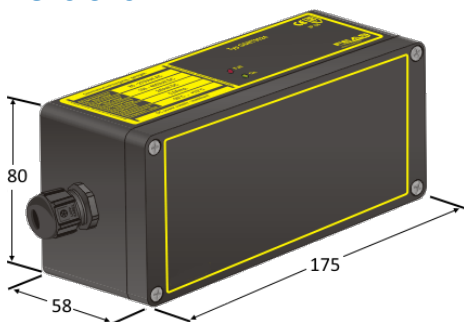


CRXT/AC-ADAP-24-120W-IP68, imc article no. 11100032 (similar to picture)

Highlights

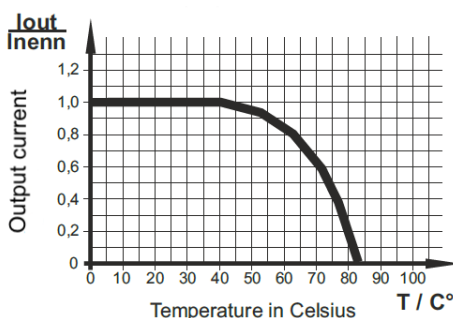
- Enclosure conforms to protective class IP68
- Reinforced isolation of output voltage with respect to AC line supply. Output circuit is not free floating isolated but intentionally grounded to earth (-OUT) in order to ensure well controlled grounding of supplied equipment.
- Protective Extra Low Voltage (PELV, EN 60204)
- Overload- and open-circuit protected
- Short circuit proof
- Reverse voltage protection at the output
- Suitable for tropics - Epoxy resin casted
- Red status LED indicates a fault due to short circuit, overtemperature or overload.
- Power supply case is suitable for screwing onto mounting surfaces.

Dimensions

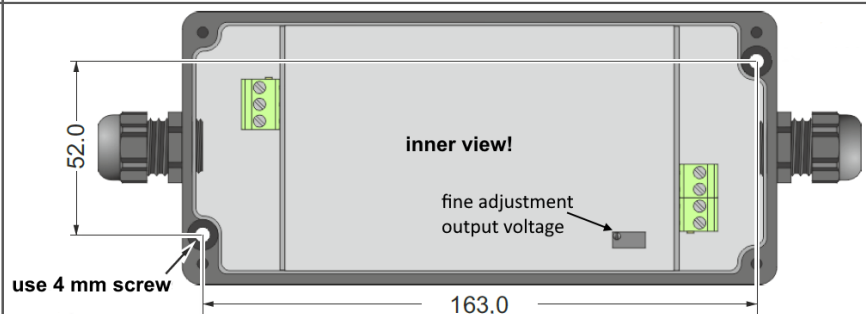


The output voltage of CRXT/AC-ADAP-24-120W-IP68 is connected to functional earth and therefore does not meet the requirements for SELV, contrary to the specification for GSNT9024.

Derating



Mounting (view without cover)



Technical Specs - Power adaptor

Input data		
Parameter	Value	Remarks
Input voltage AC	85 - 270 V _{AC}	0 - 400 Hz
Input voltage DC	120 - 400 V _{DC}	
Input current at nominal load at 115 V _{AC} at 230 V _{AC}	max. 1.7 A max. 0.85 A	
Input current peak	<18 A at 270 V _{AC}	
Protective circuit	Transient voltage suppressor varistor	
Hold-up time	20 ms (typ.)	
Output data		
Parameter	Value	Remarks
Output voltage U _{nominal}	24 V _{DC}	
Range of adjustment	22.5 - 30.0 V _{DC}	internal adjustment pot
Output current I _{nominal}	5 A	
Current limiting	1.5 x I _N	
Residual ripple (20 MHz)	<50 mV _{pp}	
Output power	120 W	
Efficiency	88 %	
Operating data		
Parameter	Value	Remarks
Operating temperature range	-40 °C to +70 °C	
Derating	from 40 °C	see Derating diagram
Storage temperature range	-40 °C to +105 °C	
Cooling	natural convection	recommendet clearing distance: 15 mm
Protection devices		
Parameter	Value	Remarks
Input fuse at 115 V _{AC} at 230 V _{AC}	3.15 A slow-blow 1.6 A slow-blow	to be provided (installed) on AC line circuit
Overload protection	integrated into device	
MTBF	>380.000 h	

Safety data	Value	Remarks
Isolation	reinforced isolation	output circuit to input circuit (AC mains)
Test voltage transformer	5 kV _{AC}	input to output (V _{OUT})
Grounding	-V _{OUT} grounded	galvanic connection to ground (functional earth FE) connected via AC mains plug PE contact
EMI suppression	meets the requirements of EN 55022/B	
Protection class	Class 1, with PE connection	
Extra-low voltage system class	PELV	Protective Extra Low Voltage
Ambient humidity	100 % relative humidity, yearly average dewing	allowed for use in tropical atmosphere
Protection class enclosure	IP68	see note on AC line plug
Vibration proof	>30 g at 33 Hz in X, Y and Z	meets requirements of IEC 60068-2-27



Note

Protection class

Deferring from the IP68 rating of the complete supply unit, housing and output plug (XT-Con) the AC mains input plug is rated for protection class IP44

Mechanical data	
Output connector	XT-Con (2-pin)
Cable length	4 m total (1.5 m from power supply adaptor to CRXT/POWER and 2.5 m to AC mains connection)
Mounting	wall mounting with screws Ø 4 mm
Dimensions W x H x D	175 x 80 x 58 mm
Weight	approximately 1.8 kg with cable approximately 1.2 kg without cable