



# Intrinsically Safe

Provides high reliability power supply for an electronic control system in Group I, zone 0 such as Nautitech's:

- ✓ I.S Automation control systems
- ✓ I.S Safety shutdown systems
- ✓ I.S Safety startup systems
- ✓ I.S Event logging systems
- ✓ I.S Mobile headlights

No additional enclosure needed Full 1 year warranty

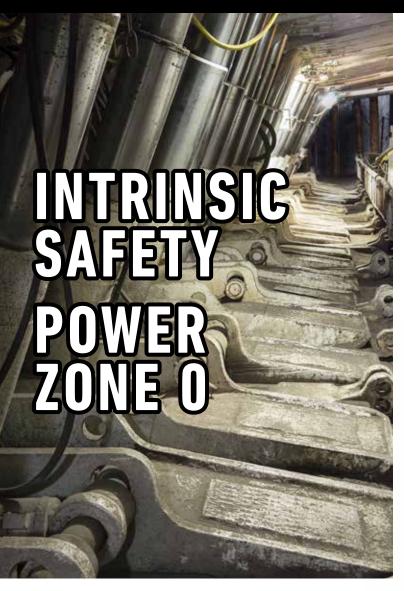


# Power zone 0

## **CHOOSE YOUR I.S POWER SUPPLY MODULE**

## **APPLICATIONS**

The Power Supply Modules support a range of certified complimentary components to permit the construction of complex control systems. The Nautitech I.S range includes uninterruptible power supplies, lights, PLC's, temperature sensors, pressure sensors, float sensors, gas detection & position sensors.



## Power Supply Local Control (PSL)

## I.S PSL

The backplane buses are energised autonomously according to the mains or alternator point.

#### TYPICAL APPLICATIONS

PSM LIM (LIGHT INTERFACE MODULE)



### **CERTIFICATIONS**



IECEx ITA 14.0036X
Intrinsically Safe
Ex mb [ia] 1 Mb (Um applied)
Ex ia 1 Ma (Um withdrawn)





Nautitech's Intrinsically Safe Power Supplies are a modular component of an automation system, for use in hazardous areas [Group I, zone 0]. Typical applications include safety startup and shutdown systems, data logging systems & automation control systems.

## **Power Supply Extended Control (PSE)**

### I.S PSE

The PSE excludes the power supplies for data circuits & backplane pins for incoming regulated power. This allows it to connect to the same or separate (e.g. redundant) mains power source & extend the regulated power to downstream modules. It is controlled remotely across the backplane.

## **Power Supply Remote Control (PSR)**

## I.S PSR

The PSR excludes the mains power regulation circuits and input cables. Power can be taken from the back plane and delivered at an intrinsically safe level to a selected load bus under remote control backplane control. This facility extends the capability of I.S system architecture.



## **DID YOU KNOW...**

Our I.S modules stack together in any order to suit any application.





#### **SPECIFICATIONS**

			and the
ITEM	PSL	PSE	PSR
Integrated cable tail	V 100	~	×
Input power loop	OPTIONAL	OPTIONAL	×
Backplane non-IS power		<b>V</b>	/
Backplane IS communications	OPTIONAL	V	<b>✓</b>
Backplane IS power supply (low impedance)	OPTIONAL	×	<b>✓</b>
Backplane power control	×	V	<b>✓</b>
Backplane IS load bus selection (x4 options)	~	V	<b>'</b>
Incoming power quality lockout & transient protecti	on 🗸	<b>/</b>	<b>✓</b>
Multiple modules per rack	V	V	<b>'</b>
Modular mounted	V	<b>V</b>	<b>✓</b>
Robust, SS316 armour housing	V	V	<b>✓</b>
Readable device identification	V	V	<b>'</b>
Integrated HMI display	OPTIONAL	OPTIONAL	OPTIONAL
Keypad T	<b>V</b>	V	<b>✓</b>
Branding	OPTIONAL	OPTIONAL	OPTIONAL

OUTPUT	INPUT
$U_{o} = 8.95V$ $I_{o} = 2.4A$ $P_{o} = 20W$ $C_{o} = 72.3uF$ $L_{o} = 30uH$	$U_n = 20V$ $I_n = 11.9A$ $U_m = 90V$

**-**20C < Ta < +60°

Rated Voltage: 7-18V

Rated Current: 7A

#### **SERVICE & SUPPORT**

Nautitech provides a full support service for customers such as:

- ✓ CODE & AS3800 overhauls & machine rewires
- ✓ NATA CH4 sensor calibration
- ✓ Installation, repairs, maintenance & training of all Nautitech products
- ✓ Dossier audits & compliance checks for diesel machines
- ✓ Audit & repair 3rd party installations to remove intermittent faults
- ✓ Provision of manuals & quotes for new systems

Our assistance is available throughout the product's life cycle & its renewal. As our systems are EX ia certified & SIL rated, we advise Nautitech's involvement in service & code work to ensure the product's longevity.

Please contact Nautitech regarding cable specifications & the best system solution for your unique application.



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