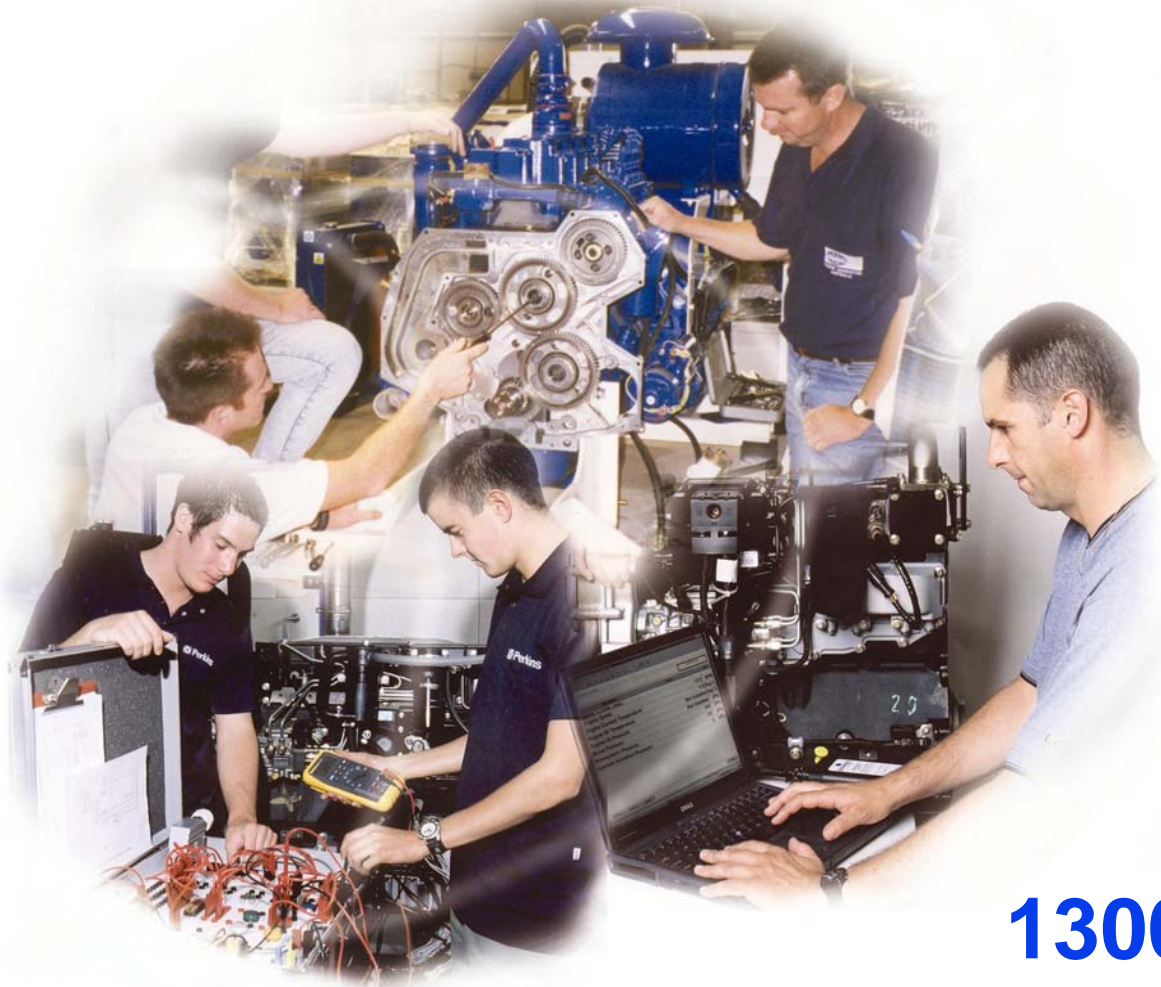




# Perkins Product Training

## 1300 Edi Series Electronic Engine Training



## Please Note:

- The Product Training information is distributed for informational purposes only. It is not to be construed as creating or becoming part of Perkins Engines contractual or warranty obligations.
- The appropriate service literature and 'Service Bulletins' available on [www.perkins.com](http://www.perkins.com) should always be the final authority and source of information.
- Electrical Circuits, connections and termination points may change, make sure you have the correct drawings.

# 'Off Road' Emissions Legislation

## Tier 0

"A" rated engines can be used in regions without Emissions Legislation.

## Tier 1

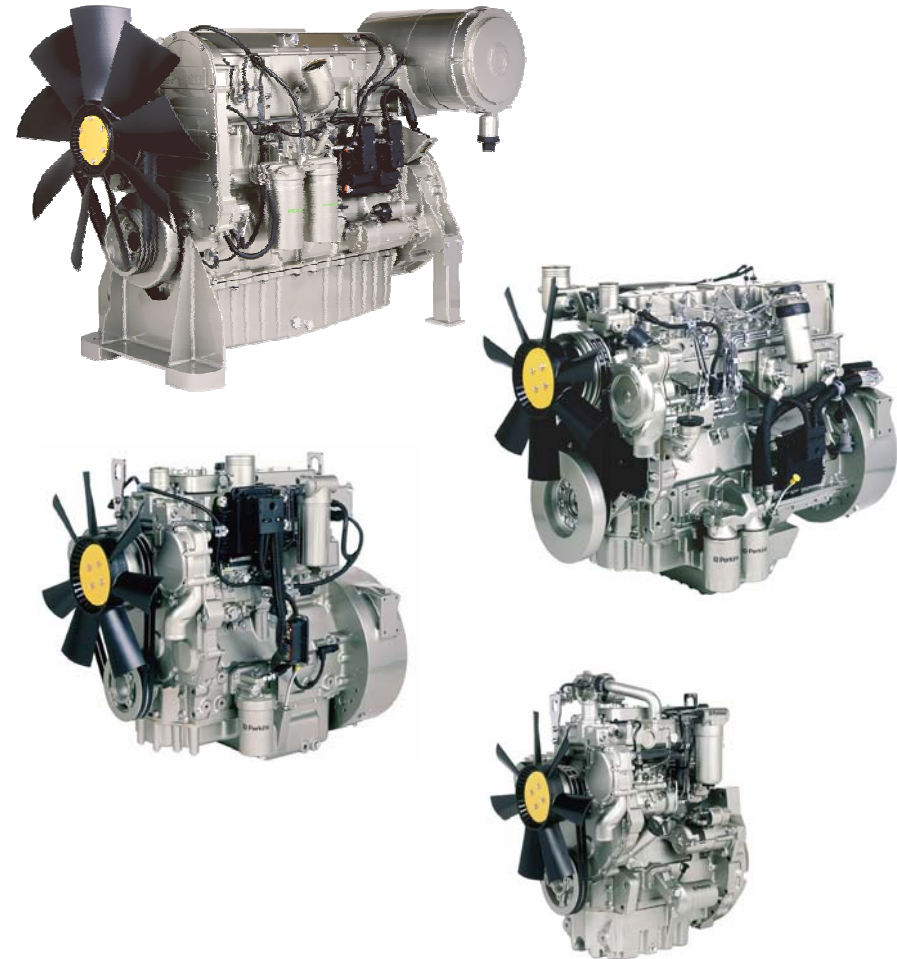
"B" rated engines are suitable for regions with Tier 1/Stage I Emissions Legislation

## Tier 2

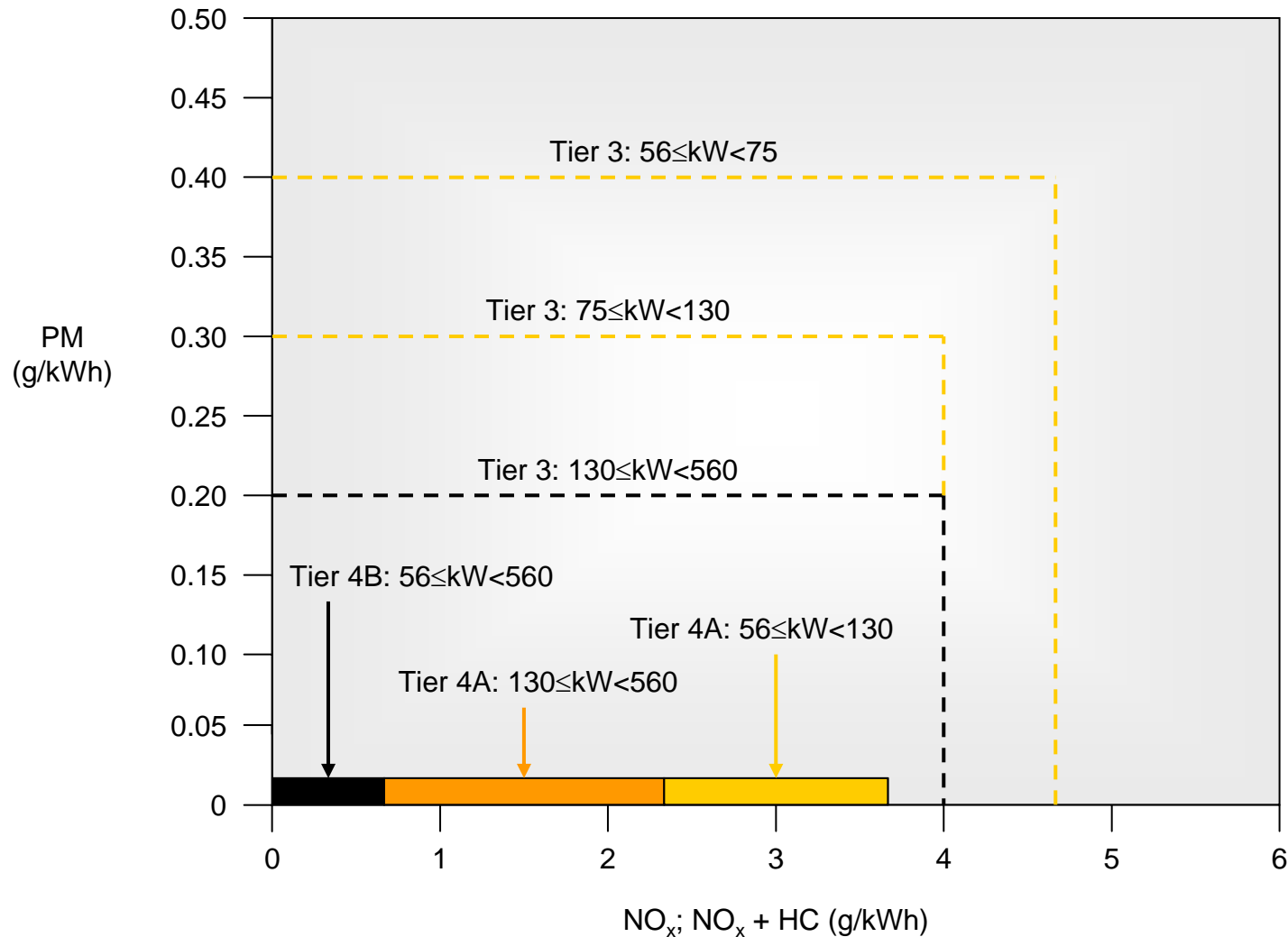
"C" rated engines are suitable for regions with Tier 2/Stage II Emissions Legislation.

## Tier 3

"D" rated engines are suitable for regions with Tier 3/Stage III Emissions Legislation.



# 'Off Road' Industrial - Ever Cleaner Engines



**1980's**  
Particulate Matter  
(PM) 0.6g/kWh

Nitrous Oxide  
(NO<sub>x</sub>) 10.00g/kWh

# Electronic Engine Benefits

## Electronic Engine Management system gives:

- Improved Specific Fuel Consumption (SFC) through precise control of Injection Timing and Duration.
- Machine protection under extreme operating conditions.
- Easy servicing and fault diagnostics, Electronic Service Tool, (EST)
- Exceeds emissions legislation and has a lower noise level.
- Better engine 'responsiveness'.
- Improved reliability, engine monitoring and protection.
- Further cost savings through integration into 'Genset' design (CAN)
- Improved torque, different torque curves available, torque 'shaping'
- Rating changes available, Base Load, Prime, Standby, 1500/1800
- Configuration files, gives the customer flexibility, droop, etc



# Gen Set Power Selector Chart

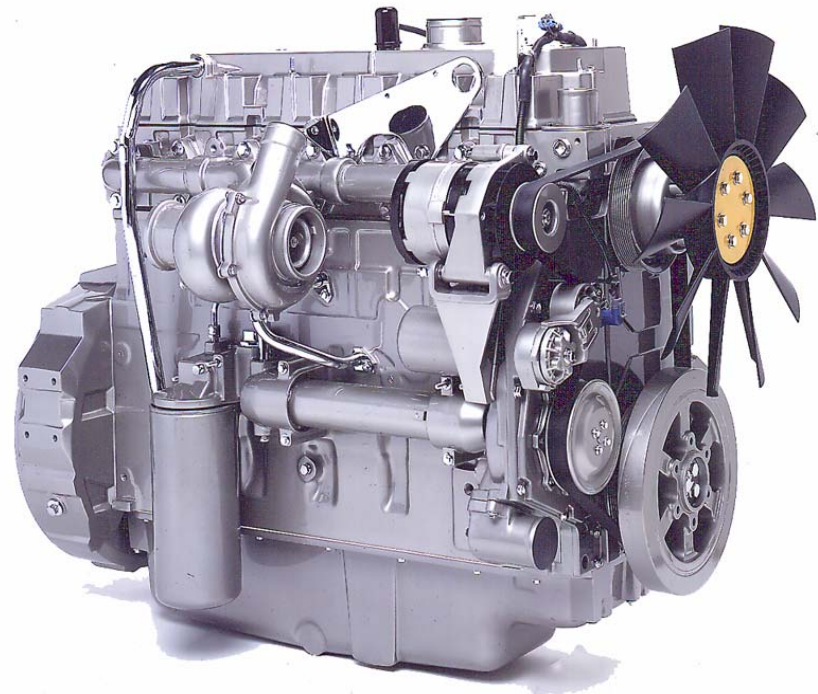
Model offering for Unregulated Territories

**50Hz**

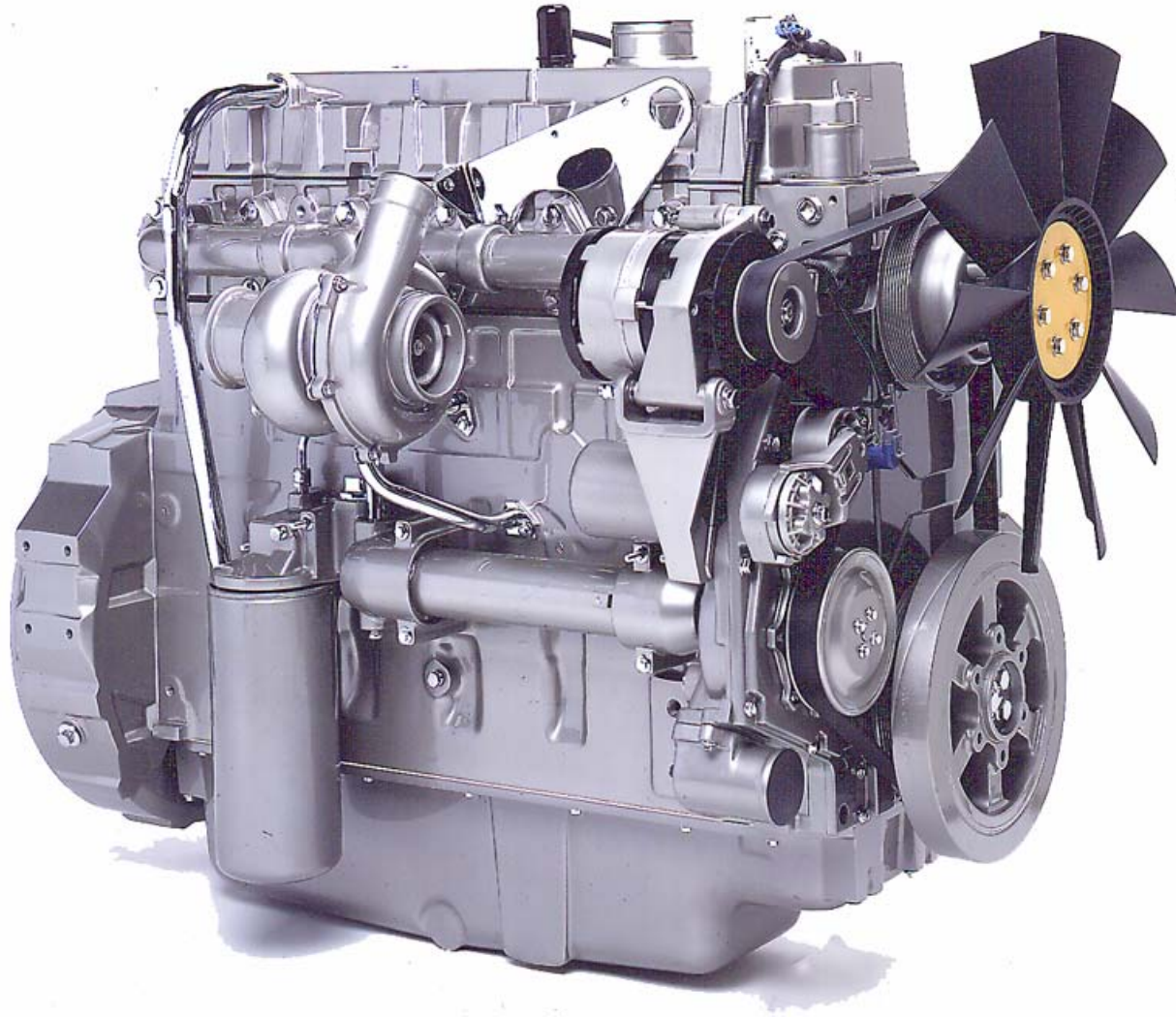
Model	Net Engine Output			Typical Generator Efficiency %	Typical Power Factor	Typical Generating Set Output						1500/1800 rev/min switchable
	Baseload kWm	Prime kWm	Standby kWm			Baseload		Prime		Standby		
				kWe		kVA	kWe	kVA	kWe	kVA		
<b>1306C-E87TAG3</b>	164	180	199	92	0.8	151	189	166	208	183	229	■
<b>1306C-E87TAG4</b>	179	198	217	92	0.8	165	205	182	228	200	250	■
<b>1306C-E87TAG5</b>	185	204	224	92	0.8	170	213	188	235	206	258	
<b>1306C-E87TAG6</b>	198	218	239	92	0.8	182	228	200	250	220	275	

**Never Forget  
it's A  
Diesel Engine**

- **Electronics gives control!**
- **It needs a good flow of ;  
Clean Air and Fuel.**
- **Also needs Compression!**



# 1300 Edi Series-Industrial Open Power Unit



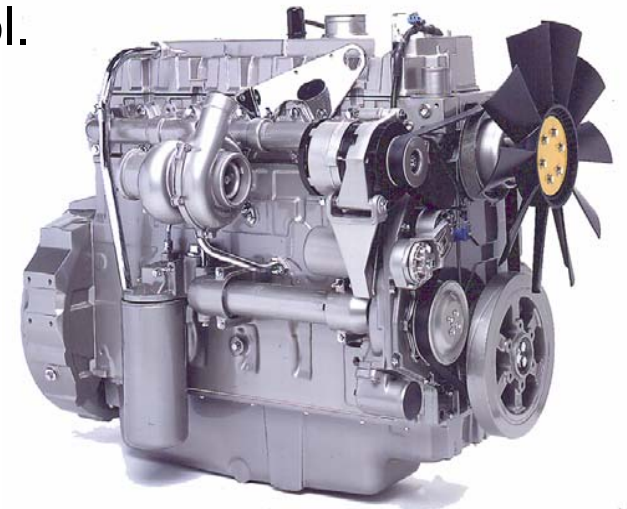


# 1300 Edi Series-Industrial Open Power Unit

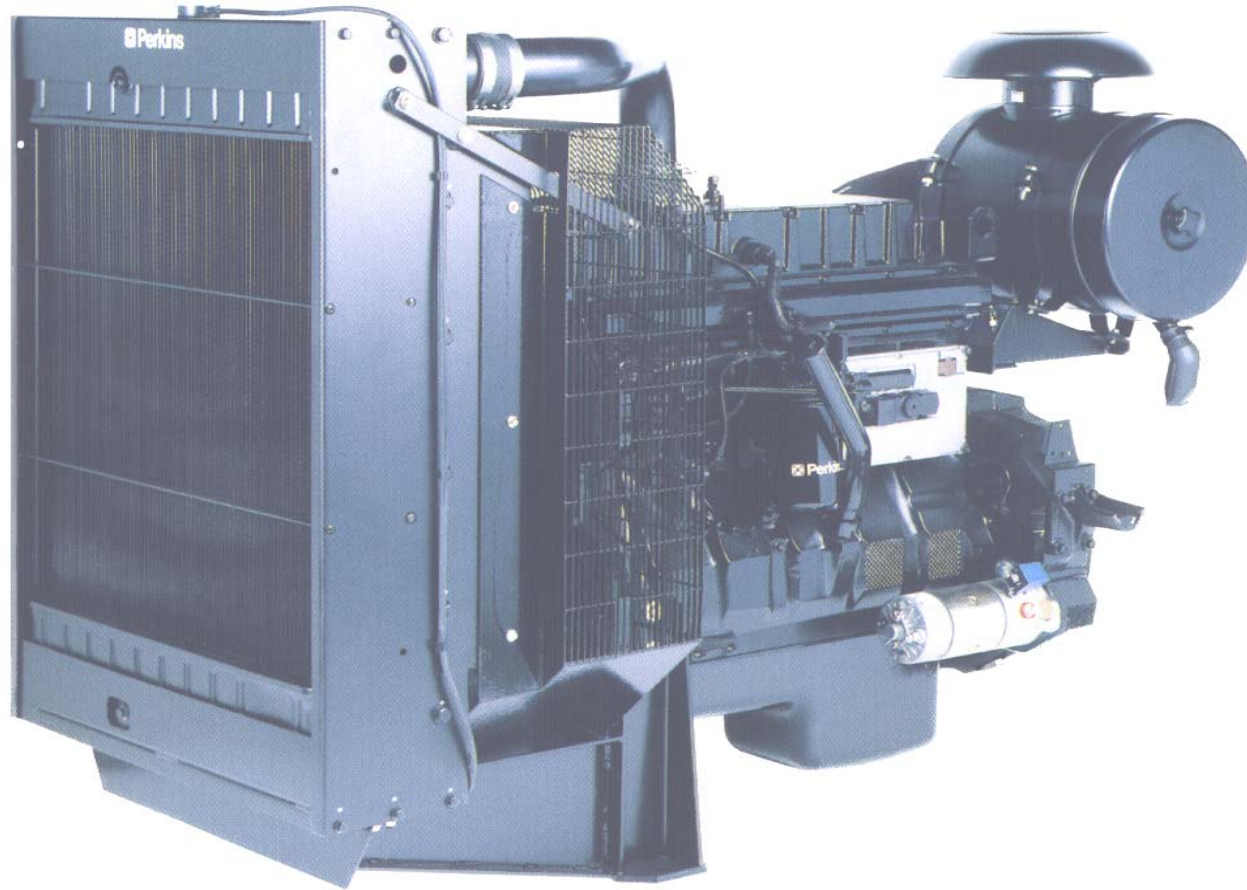
- **IOPU 1** -Variable Speed Droop, with analogue throttle and Idle validation switch. (mobile applications)
- **IOPU 2** - Variable Speed Isochronous with analogue hand throttle, (no IVS - non Mobile Applications)
- **IOPU 3** - Variable Set Speed Isochronous Control.
- **IOPU 4** - With Pre-Set Speed Isochronous Control.

- **12 Volt and 24 Volt ECM's available.**

If you are not sure of the voltage and markings have been removed check PIN 35 to ground 1.4K Ohms – 12 volts / 2.8K Ohms – 24 volts.



# 1300 Edi Series-Electropack



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