

# **Dual Core Alternators**



Rugged and Reliable
Dual Core Alternators



KATO ENGINEERING

# **Quality Design & Manufacturing**



Kato Engineering designs and manufactures dual core alternators designed to be coupled with high speed engines for locomotives. These dual core alternators provide traction power to wheel motors for main propulsion as well as power from the auxiliary generator for accessory power.

Enclosed in the same frame, the dual core alternator is driven off an engine flywheel via a common shaft. This design saves space in your locomotive and negates the necessity to pull power from the front of the engine. Also included in the main box are AC/DC rectifiers which provide DC rectification for the locomotive traction motors, and keep the width within the engine/generator skid.

Kato also offers several convenient options including optional cooling for wheel motors; as well as a Digital Voltage Regulator specifically designed for the companion generator operation. Our dual traction generators are built to last and provide a total package to meet your locomotive power needs.

#### **Dual Core Alternator Ratings**

Main Traction	Ratings*				
8P6.5	Stack Length / Code	Max Traction Power (kW)	Voltage (Range)	Current (Cont.)	Current (Inter.)
	1850	1400	1250 - 1350	2500	3500
	2000	1600	700	4400	6600
	2250	2000	1250 - 1350	3600	4500
	2500	2300	1251 - 1350	4000	5200
	3000	2600	1252 - 1350	4400	6000
	3400	2800	1253 - 1350	4800	6600

<sup>\*1500</sup> RPM Ratings

Companion	Ratings*		
	Stack Length / Code	kVA	Voltage (Range)
	0600	250	200-240
8P5			400-480
	0075	360	200-240
	0875		400-480

## **Custom Engineering**

We know each application is unique and so are the solutions we supply. Kato Engineering has been providing custom traction alternator packages for decades and our engineers thrive on designing specific solutions for unique applications and challenging projects.

Our dual core alternators are designed to interface to many different engine drive systems to make your power system engineering easier. Kato dual core units have adaptable mounting for multiple skid/base designs and can interface with a wide variety of torsional couplings to accommodate most high-speed engines and skid subframes. In addition, Kato offers modular outlet boxes to fit a variety of different installations and installation requirements.



## **Durable & Reliable**

Kato Engineering has earned trusted status in the power generation industry by building our products with quality craftmanship and manufacturing reliable generators that work when you need them to. Our products are well-known for their durability and can stand up to the dirty, grimy and harsh rail environments found in the field.

#### We use the following to increase reliability:

- Class H insulation on all our dual core alternators
- Vacuum Pressure Impregnation (VPI) for our all our windings
- Bearings designed to exceed L10 30,000 hours life
- Bored frame construction used to accommodate the heavy shock loads found in rail duty

Kato dual core alternators are built to withstand the toughest conditions and to be the most reliable power generation choice for your high speed engine rail project.

### **Service & Maintenance**



Kato Engineering understands that it is critical to keep your locomotives running and efficient. We have designed our dual core alternator units with accessibility in mind and your maintenance staff will appreciate the ease of access of our generator package. In addition, we understand that providing support from our end is just as important. We have skilled specialists available to assist customers 24/7 every day of the year and offer a wide array of aftermarket support services including:

- Service team available to travel to customer sites for:
  - Equipment Installation, Commissioning and Start-Up
  - Preventative & Scheduled Maintenance
  - Troubleshooting & Repairs
- Genuine Kato Aftermarket parts
- Complete Remanufacturing capabilities at our plants to extend generator life





### KatoEngineering.com



#### KATO ENGINEERING

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