

# Plasma Torch

## **Transformer Rectifier Systems For Plasma Torch and Electron Beam Applications**

#### Added Benefits of Power Electronic Systems Supplied by Neeltran - Robust and Reliable Power to run your 24/7 processes.

At Neeltran, we are uniquely positioned because we are one of the few companies in the world that designs and manufactures its own rectifier-transformers and rectifiers in the same facility for torch based applications. This capability allows for combined Full Current and Full Voltage factory testing of the transformer and rectifier in their actual configuration prior to shipment.

An experienced client requires combined testing to eliminate integration problems at the site, and to assure the shortest commissioning time. This results in significant cost savings and produces the highest quality units.

Neeltran possesses multi-industry, engineering, and manufacturing experience that helps us to be flexible and design products that meet your specific technical and safety requirements.

Markets served: All O.E.M and System Integrators that require custom high end product

Extra line

#### **Product Details:**

- Latest safety features
- Low Ripple
- Design to all types of environments
- Remote monitoring via PLC modem
- State-of-the-art Neeltran high speed, high accuracy control boards with Microprocesser based controller available
- All types of PLC's available for ease of interface to customer systems
- On Load Tap Changer available, in all cases including NLTC tap changer will have its own separate oil supply
- Based on specifications we can conform to ANSI, IEC, IEEE, NEMA, CSA, BS, AS, JS, CE etc...
- Design to seismic zone and altitude
- All types of IP or Nema Ratings
- Conservative Transformer design (Dry, Water, Oil)
- High Efficiency units with low operating temperatures
- Conservative selection and specially developed water cooled thrysitor system provides unmatched reliability



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### **General Specifications**

Three-phase supply voltage main by customer	V	0 to 34500
Maximum power	kVA	0 to 50000
Three phase voltage on the secondary	V	0 to 2000
Frequency	Hz	50 - 60
NLTC or OLTC		NLTC - OLTC
DC Current	A	0 to 100000
DC Voltage	V	0 to 3000
Rectifier Connection	ANSI - IEC	
Pulses		6-12-18-24 and more
Control card type		Digital - Analog
Accuracy of the constant current control system		0.5%
Transformer Cooling		ONAN-ONAF-OFAF-OFWF-KNAN
Transformer Manufacturer		Neeltran
Transformer Oil Type		Mineral, FR3, Silicon
Temp class		105°C
Tap changer		NLTC - OLTC
Rectifier Cooling		Water
Rectifier Enclosure Type		Indoor - Outdoor
Rectifier Manufacturer		Neeltran
Rectifier power section material		Extruded Aluminum - Copper
Rectifying elements		Thyristor - IGBT
Redundancy		N-1, N-2
Line Up Testing Available		Combined Test at Neeltran Factory

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+1 860.350.5964 Phone | +1 860.350.5024 Fax | 71 Pickett District Road | New Milford, CT 06776, USA Web: Neeltran.com | Email: sales@Neeltran.com