

Eimac mercury-vapor half-wave rectifier designed for high peak inverse voltage with relatively low forward drop. Its single rectifying section is intended for high-voltage professional power supplies.

GENERAL CHARACTERISTICS

BASE DESIGNATION	—	BASE PINS	—
NOMINAL HEATER	2.5 V / 10 A	PARALLEL HEATER	— / —
HEATING	Direct	SERIES OPERATION	Not specified
CATHODE ARRANGEMENT	Separate cathodes	SECTION CONSTRUCTION	Similar

SECTION RATINGS

SECTION1 Rectifier	
PEAK INVERSE VOLTAGE	11000 V
NOMINAL OUTPUT CURRENT	750 mA
PEAK FORWARD CURRENT	3 A
FORWARD VOLTAGE DROP	15 V
WARM-UP TIME	30 s
Promoted fields populated only where the published value maps directly to the schema; device-specific values retained as parameters.	

EITEL-McCULLOU GH, INC. VAPOR The Eimac RX2IA is a half-wave mercury vapor rectifier incorporating features which enable it to withstand high peak inverse voltages and to conduct at relatively low applied voltages. The shielded ribbon filament, edgewise-wound, provides a large emmision reserve and long life. Voltage - - - - R - - - - 2.5 volts Current - - - - - . . . - - 10 amperes Tube Voltage Drop (approx.) . . - - 15 volts

SOURCE OPERATING CONDITIONS

[SOURCE PDF](#)

1962 Eimac

Published test conditions and operating points. Values on this page are preserved as reported by this source.

1962 EIMAC

Section 1 · Rectifier

OTHER		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Voltage - - - - . - - R	2.5 V	Voltage - - - - . - - R - - - - 2.5 volts
Current	10 A	Current - - - - - . - - - - 10 amperes
Tube Voltage Drop (approx.)	15 V	Tube Voltage Drop (approx.) . - - - 15 volts
PEAK INVERSE ANODE VOLTAGE _z	11000	PEAK INVERSE ANODE VOLTAGE _z - - - - - 11,000 MAX. VOLTS
PEAK ANODE CURRENT	3 A	PEAK ANODE CURRENT - - - - - 3 MAX. AMPERES
AVERAGE ANODE CURRENT	75 A	AVERAGE ANODE CURRENT - - - - - .75 MAX. AMPERES
SUPPLY FREQUENCY	150	SUPPLY FREQUENCY - - - - - 150 MAX. C. P. S.
CONDENSED-MERCURY TEMPERATURE RANGE? [1]	20	CONDENSED-MERCURY TEMPERATURE RANGE? - - - - - 20-60 °C
CONDENSED-MERCURY TEMPERATURE RANGE? [2]	-60	CONDENSED-MERCURY TEMPERATURE RANGE? - - - - - 20-60 °C
Published value [1]	2 V	2Temperatures in excess of 60° C limit the peak-inverse rating to 5,000 volts with a corresponding reduction in
Published value [2]	60 V	2Temperatures in excess of 60° C limit the peak-inverse rating to 5,000 volts with a corresponding reduction in
Published value [3]	5000 V	2Temperatures in excess of 60° C limit the peak-inverse rating to 5,000 volts with a corresponding reduction in
conducting and tends to reduce the life of the filament. A temperature tifier and load, to prevent exceeding the maximum peak current of	3	conducting and tends to reduce the life of the filament. A temperature tifier and load, to prevent exceeding the maximum peak current of 3

PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
ELECTRICAL current from exceeding	3 A	ELECTRICAL current from exceeding 3 amperes. This is for the usual case where the
value of [1]	2.5 V	value of 2.5 volts. Unavoidable variations in filament voltage must be In the single phase cricuits (1 and 3), if the current drawn by the
value of [2]	1 V	value of 2.5 volts. Unavoidable variations in filament voltage must be In the single phase cricuits (1 and 3), if the current drawn by the
value of [3]	3 V	value of 2.5 volts. Unavoidable variations in filament voltage must be In the single phase cricuits (1 and 3), if the current drawn by the
kept within the range of [1]	2.4 V	kept within the range of 2.4 to 2.6 volts. A filament voltage less than load is reduced or varies under operating conditions to values less
kept within the range of [2]	2.6 V	kept within the range of 2.4 to 2.6 volts. A filament voltage less than load is reduced or varies under operating conditions to values less
the minimum recommended value may cause a high tube voltage drop, than approximately	70	the minimum recommended value may cause a high tube voltage drop, than approximately 70% of the indicated maximum d-c load current, a
tions, a delay of approximately	30 s	tions, a delay of approximately 30 seconds will be required. The delay When "condenser input" filter is used, the peak current will be rela-
tube. In radio transmitter applications the filament should be kept at the capacitor may be as high as	1.4	tube. In radio transmitter applications the filament should be kept at the capacitor may be as high as 1.4 times the nominal RMS voltage of
Published value [1]	60	.060 +.003 INPUT YOLTS* APPROX. D-C MAX. D-C
Published value [2]	3	.060 +.003 INPUT YOLTS* APPROX. D-C MAX. D-C
' dition such that the peak inverse voltage is limited to	5500 V	' dition such that the peak inverse voltage is limited to 5500 volts, the



1965 Eimac Tube Manual

Published test conditions and operating points. Values on this page are preserved as reported by this source.

1965 EIMAC TUBE MANUAL

Section 1 · Rectifier

OTHER		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
PEAK INVERSE ANODE VOLTAGE*	11000 V	PEAK INVERSE ANODE VOLTAGE* ----- 11,000 MAX. VOLTS
PEAK ANODE CURRENT ----- I	3 mA	PEAK ANODE CURRENT ----- I ----- 3 MAX. AMPERES
AVERAGE ANODE CURRENT	75 mA	AVERAGE ANODE CURRENT -----, 75 MAX. AMPERES
SUPPLY FREQUENCY	150	SUPPLY FREQUENCY ----- 150 MAX. CJS
CONDENSED-MERCURY TEMPERATURE RANGE** [1]	20	CONDENSED-MERCURY TEMPERATURE RANGE** ----- 20-60° CENTIGRADE
CONDENSED-MERCURY TEMPERATURE RANGE** [2]	-60	CONDENSED-MERCURY TEMPERATURE RANGE** ----- 20-60° CENTIGRADE
* Temperatures in excess of [1]	60	* Temperatures in excess of 60°C limit the peak-inverse rating to 5500 volts with a corresponding
* Temperatures in excess of [2]	5500	* Temperatures in excess of 60°C limit the peak-inverse rating to 5500 volts with a corresponding
Mounting: The RX2	1 V	Mounting: The RX21A must be mounted vertically, the recommended value raises the voltage at which
This temperature should be maintained at [1]	40 V	This temperature should be maintained at 40° ±5°C voltage as measured directly at the filament pins,
This temperature should be maintained at [2]	5 V	This temperature should be maintained at 40° ±5°C voltage as measured directly at the filament pins,
within the range of [1]	24 V	within the range of 2.4 to 2.8 volts, A filament voltage
within the range of [2]	2.8 V	within the range of 2.4 to 2.8 volts, A filament voltage
The filament of the RX2	1	The filament of the RX21A should be allowed to reach

PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
imately	30	imately 30 seconds will be required. The delay time detrimental to tube life and make proper operation