



ELECTRONIC TUBE REFERENCE

604

Rectifier - Full Wave electronic tube

CONSOLIDATED TECHNICAL DATA

2 SECTIONS

CONSTRUCTION

RECTIFIER-RECTIFIER

Directly heated mercury-vapor/gas-filled high-current rectifier for substantial industrial power supplies. Its heavy filament and gas-assisted conduction provide efficient high-current full-wave rectification.

GENERAL CHARACTERISTICS

BASE DESIGNATION	4BS	BASE PINS	4
NOMINAL HEATER	2.5 V / 11.5 A	PARALLEL HEATER	– / –
HEATING	Direct	SERIES OPERATION	Not specified
CATHODE ARRANGEMENT	Separate cathodes	SECTION CONSTRUCTION	Similar

SECTION RATINGS

SECTION1 Rectifier

No fixed ratings recorded.

Representative row for electrically identical rectifier sections of full-wave tube.

SECTION2 Rectifier

No fixed ratings recorded.

Second physical rectifier section; electrical properties populated from applicable published ratings.

Mercury-vapor or gas-filled high-current rectifier for power-supply service. The supplied datasheet was reviewed for heater/filament data, maximum ratings, operating conditions, capacitances, pulse/RF data, and thermal limits.

SOURCE OPERATING CONDITIONS

[SOURCE PDF](#)

1971 RCA HB3 Binder 6 of 7

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

1971 RCA HB3 BINDER 6 OF 7

Section 1 · Rectifier

CHARACTERISTICS		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Voltage (AC)	2.5	Published datasheet value
Current at 2.5 volts – published value 1	2.5 A	Published datasheet value
Current at 2.5 volts – published value 2	11.5 A	Published datasheet value
Current at 2.5 volts – published value 3	1 A	Published datasheet value
P i n 1 -Anode No.2 – published value 1	1	Published datasheet value
P i n 1 -Anode No.2 – published value 2	3	Published datasheet value
Pin 2 -Filament – published value 1	2	Published datasheet value
Pin 2 -Filament – published value 2	4	Published datasheet value
No load	18	Published datasheet value
Full load	28	Published datasheet value
For dower-succçLy frequency of 60 cçs	6	Published datasheet value

OTHER		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Typical Anode Starting Voltage	10	Published datasheet value
PEAK INVERSE ANODE VOLTAGE	900 mA	Published datasheet value
Peak	10 mA	Published datasheet value
Peak inverse anode voltage	900 V	Published rectifier rating

PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Maximum average anode/DC output current	2.5 A	Published rectifier rating

1971 RCA HB3 BINDER 6 OF 7

Section 2 · Rectifier

CHARACTERISTICS		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Voltage (AC)	2.5	Published datasheet value
Voltage (AC)	2.5	Published datasheet value
Current at 2.5 volts – published value 1	2.5 A	Published datasheet value
Current at 2.5 volts – published value 1	2.5 A	Published datasheet value
Current at 2.5 volts – published value 2	11.5 A	Published datasheet value
Current at 2.5 volts – published value 2	11.5 A	Published datasheet value
Current at 2.5 volts – published value 3	1 A	Published datasheet value
Current at 2.5 volts – published value 3	1 A	Published datasheet value
P i n 1 -Anode No.2 – published value 1	1	Published datasheet value
P i n 1 -Anode No.2 – published value 1	1	Published datasheet value
P i n 1 -Anode No.2 – published value 2	3	Published datasheet value
P i n 1 -Anode No.2 – published value 2	3	Published datasheet value
Pin 2 -Filament – published value 1	2	Published datasheet value
Pin 2 -Filament – published value 1	2	Published datasheet value
Pin 2 -Filament – published value 2	4	Published datasheet value
Pin 2 -Filament – published value 2	4	Published datasheet value
No load	18	Published datasheet value
No load	18	Published datasheet value

PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Full load	28	Published datasheet value
Full load	28	Published datasheet value
For dower-succLy frequency of 60 c/s	6	Published datasheet value
For dower-succLy frequency of 60 c/s	6	Published datasheet value

OTHER		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Typical Anode Starting Voltage	10	Published datasheet value
Typical Anode Starting Voltage	10	Published datasheet value
PEAK INVERSE ANODE VOLTAGE	900 mA	Published datasheet value
PEAK INVERSE ANODE VOLTAGE	900 mA	Published datasheet value
Peak	10 mA	Published datasheet value
Peak inverse anode voltage	900 V	Published rectifier rating
Maximum average anode/DC output current	2.5 A	Published rectifier rating