## Half-Wave Vacuum Rectifier

Duodecar Type Pressure-Welded Cathode Coating For Color-TV Damper-Diode Applications

Heater Voltage, ac or dc	ELECTRICAL CHARACTERISTICS - Bog	jey Values			
Heater Current	Heater Voltage, ac or dc Eh	6.3	v		
Direct Interelectrode	**	2.5	A		
Plate to cathode and heater   c cp(k+h)   13   pF			-		
Cathode to plate and heater   Cak(p+h)   18	Capacitances: a				
Cathode to plate and heater   Cak(p+h)   18	Plate to cathode and heater . Carlland	13 pl	F		
Heater to cathode	p(K · II)				
Instantaneous Tube Voltage   Drop for instantaneous   plate current (ib) = 680 mA. eb   20   V	K(p+n)	P			
Drop for instantaneous   plate current (ib) = 680 mA. eb   20   V		510 p.	•		
MECHANICAL CHARACTERISTICS         Maximum Overall Length       3.375 in (85.72 mm)         Maximum Seated Length       3.000 in (76.2 mm)         Maximum Diameter       1.188 in (30.1 mm)         Envelope       JEDEC T9         Base Description       Duodecar 12-Pin with Exhaust Tip (JEDEC E12-70)         Terminal Diagram       JEDEC 12GK         Type of Cathode       Coated Unipotential         Operating Position       Any         MAXIMUM RATINGS - Design-Maximum Values For operation as a Damper Tube in Color-TV Receivers utilizing a 525-line, 30-frame system         Peak Inverse Plate Voltage ebm       5000 V         Heater-Cathode Voltage:       +300 V         Peak       ehkm       +300 V         -5000       V         Average Ehk(av)       +100 V         Peak       -900 V         Heater Voltage, ac ordc       Ehk(av)       5.7 to 6.9 V         Plate Current:       Peak       ibm       1500 mA         Average Longton       Ib(av)       350 mA	_				
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Duodecar 12-Pin with Exhaust Tip (JEDEC E12-70)   Terminal Diagram					
Content   Cont					
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$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	Heater-Cathode Voltage:	5000	٧		
Average   Color   Color   Color	<del>-</del>	( +300 - 7	7		
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	Peak ehkm	2			
1500   V			•		
Heater Voltage, ac or dc       Eh       5.7 to 6.9       V         Plate Current:       Peak ibm       1500       mA         Average Ib(av)       350       mA	Average E <sub>hk(av)</sub>	3			
Plate Current:       1500       mA         Peak ibm       1500       mA         Average Ib(av)       350       mA	Heater Voltage ac ordo P	(			
Peak i <sub>bm</sub> 1500 mA           Average I <sub>b(av)</sub> 350 mA		5.7 to 6.9	•		
Average Ib(av) 350 mA	D- 1	1500			
	·		-		
11 W					
	ь р	V	•		

hottest point on envelope		
surface) TE	220	°C

- Measured without external shield in accordance with the current issue of EIA Standard RS-191.
- b Designed to mate with Duodecar 12-Contact Socket generally available from your local RCA Distributor.
- c As defined in the current issue of EIA Standard RS-239.
- d This rating is applicable when the duration of the voltage pulse does not exceed 15% of one horizontal scanning cycle. In a 525-line, 30-frame system, 15% of one horizontal scanning cycle is 10 μs.
- Measured with a dc meter.

Envelope Temperature (at

## OPERATING CONSIDERATIONS

Socket terminals 2, 3, 5, 6, 8, 9 and 11 should not be used as tie points for external-circuit components. It is recommended that the socket tabs be removed to reduce the possibility of arc-over and to minimize leakage.

## TERMINAL DIAGRAM (Bottom View)

Pin 1: Heater

Pin 2: Do Not Use

Pin 3: Do Not Use

Pin 4: Plate

m 4. Flate

Pin 5: Do Not Use

Pin 6: Do Not Use

Pin 7: Cathode

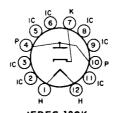
Pin 8: Do Not Use

Pin 9: Do Not Use

Pin 10: Plate

Pin 11: Do Not Use

Pin 12: Heater



JEDEC 12GK