

### MECHANICAL DATA

Bulb . . . . .	T-6 $\frac{1}{2}$
Base . . . . .	E9-1, Small Button 9-Pin
Outline . . . . .	6-2
Basing . . . . .	9CY
Cathode . . . . .	Coated Unipotential
Mounting Position . . . . .	Any

### ELECTRICAL DATA

#### HEATER CHARACTERISTICS

	5AM8	6AM8	6AM8A	
Heater Voltage . . . . .	4.7	6.3	6.3	Volts
Heater Current . . . . .	600	450	450	Ma
Heater Warm-up Time <sup>1</sup> . . . . .	11		11	Seconds
Heater-Cathode Voltage (Design Center Values)				
Heater Negative with Respect to Cathode				
Total D C and Peak . . . . .	200	200	200	Volts Max.
Heater Positive with Respect to Cathode				
D C . . . . .	100	100	100	Volts Max.
Total D C and Peak . . . . .	200	200	200	Volts Max.

#### DIRECT INTERELECTRODE CAPACITANCES

Pentode	Shielded <sup>2</sup>		Unshielded	Max.
Grid to Plate: (g1 to p) . . . . .	0.015	0.015	$\mu\mu\text{f}$	Max.
Input: g1 to (h+k+g2+g3) . . . . .	6.0	6.0	$\mu\mu\text{f}$	
Output: p to (h+k+g2+g3) . . . . .	3.4	2.60	$\mu\mu\text{f}$	
<b>Diode</b>				
Input: p to (h+k) . . . . .	2.3	1.7	$\mu\mu\text{f}$	
Cathode to (h+p) . . . . .	3.0	3.0	$\mu\mu\text{f}$	
Coupling: (diode p to pentode p) . . . . .	0.035	0.10	$\mu\mu\text{f}$	Max.
Coupling: (diode p to g1) . . . . .	0.005	0.006	$\mu\mu\text{f}$	Max.
Coupling: (diode k to pentode p) . . . . .	0.15	0.15	$\mu\mu\text{f}$	Max.

#### RATINGS (Design Center Values)

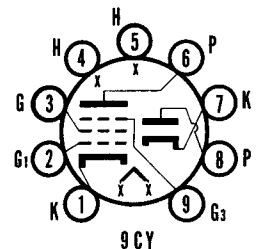
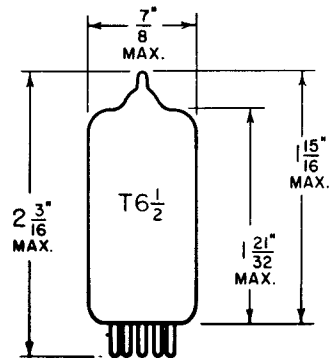
Plate Voltage . . . . .	300	Volts	Max.
Plate Dissipation . . . . .	2.8	Watts	Max.
Grid No. 2 Voltage . . . . .	See Rating Chart		
Grid No. 2 Supply Voltage . . . . .	300	Volts	Max.
Grid No. 2 Dissipation . . . . .	0.5	Watt	Max.
Positive Grid No. 1 Voltage . . . . .	0	Volts	Max.
Grid No. 3 Voltage . . . . .	0	Volts	Max.
Grid No. 1 Circuit Resistance			
Cathode Bias . . . . .	1.0	Megohm	Max.
Fixed Bias . . . . .	0.25	Megohm	Max.
Diode Current for Continuous Operation . . . . .	5.0	Ma	Max.

#### CHARACTERISTICS

Conditions:			
Plate Voltage . . . . .	200	Volts	
Grid No. 2 Voltage . . . . .	150	Volts	
Grid No. 3 Voltage . . . . .	0	Volts	
Cathode Resistor . . . . .	120	Ohms	
Plate Current . . . . .	11.5	Ma	
Grid No. 2 Current . . . . .	2.7	Ma	
Transconductance . . . . .	7000	$\mu\text{mhos}$	
Plate Resistance (approx.) . . . . .	0.6	Megohm	
Grid No. 1 Voltage for $I_b = 10\mu\text{a}$ . . . . .	-8	Volts	
Diode Plate Voltage for			
Diode Current of 50 Ma <sup>3</sup> . . . . .	10	Volts	

### QUICK REFERENCE DATA

The Sylvania Type 6AM8 is a miniature diode-pentode designed for use as a combined video detector and last IF stage. The 5AM8 and 6AM8A have controlled heater warm-up time for service in series heater string television receivers. Except for heater characteristics the 5AM8 and 6AM8A are identical to the 6AM8.



**SYLVANIA ELECTRIC  
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**RADIO TUBE DIVISION  
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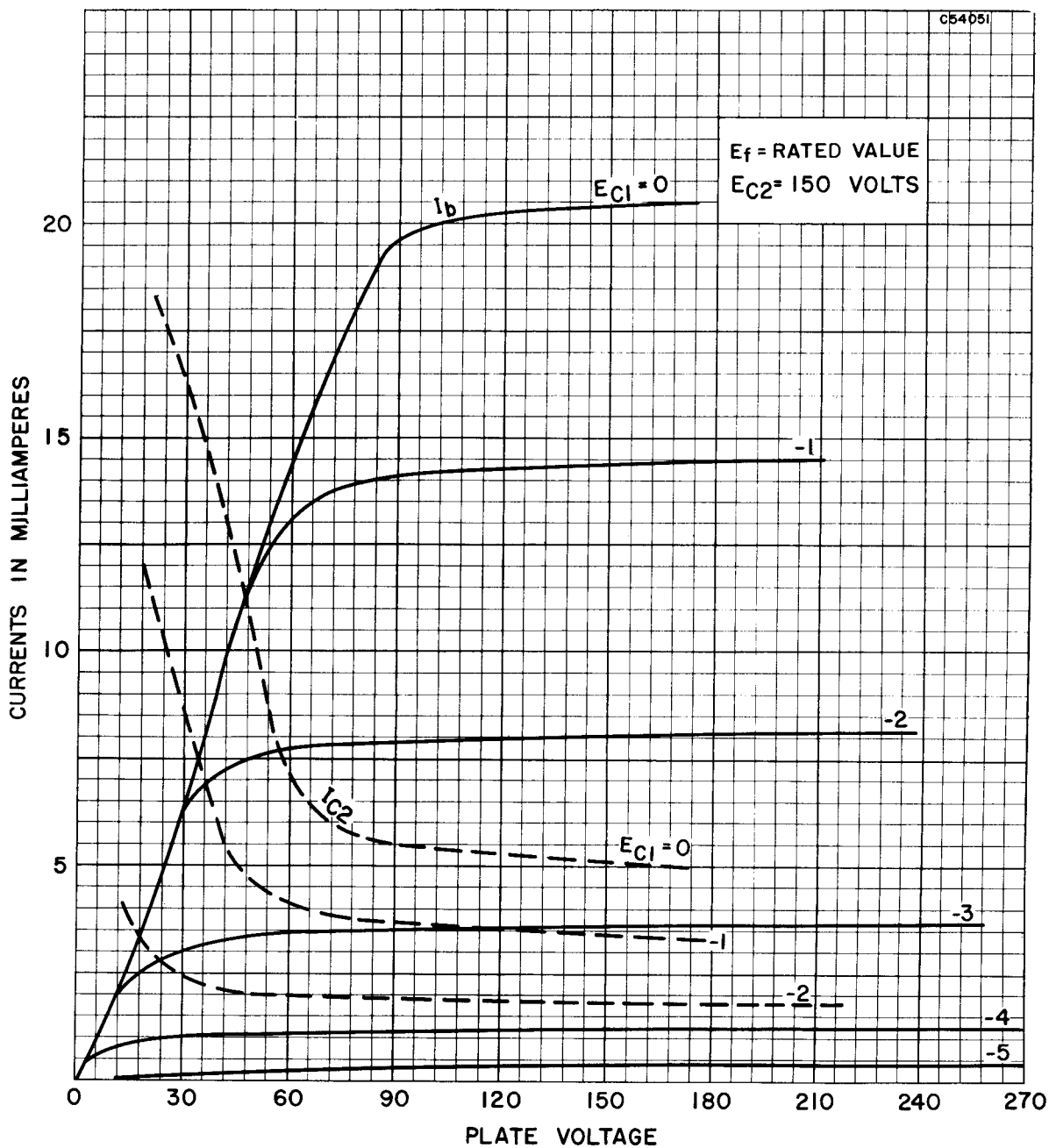
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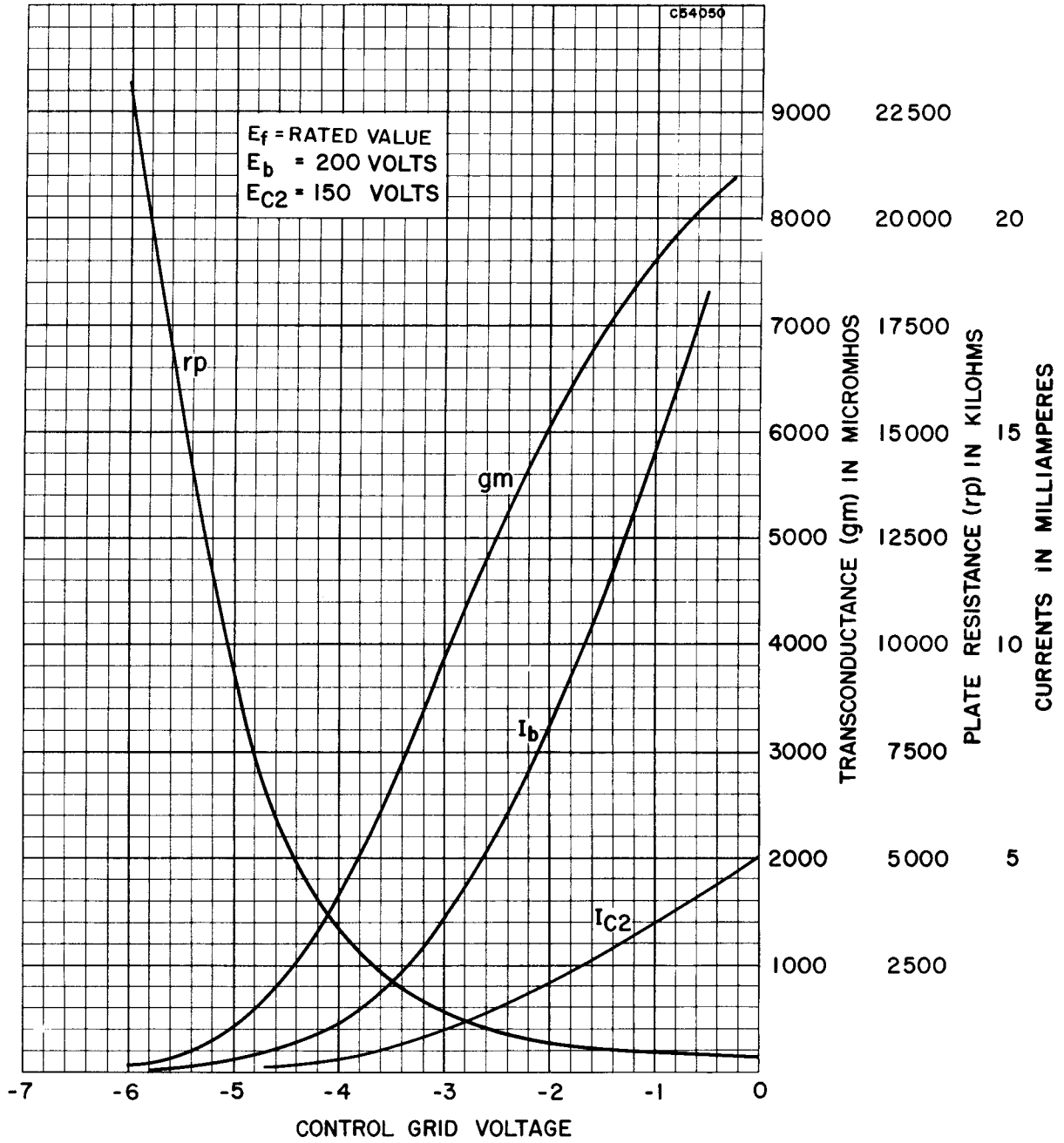
NOTES:

1. *Heater Warm-up Time is defined as the time required for the voltage across the heater to reach 80% of its rated value after applying four (4) times rated heater voltage to a circuit consisting of the tube heater in series with a resistance equal to three (3) times rated heater voltage divided by rated heater current.*
2. *Shield No. 315.*
3. *Test condition only. Operating conditions must not exceed the design center rating.*

AVERAGE PLATE CHARACTERISTICS



AVERAGE PLATE CHARACTERISTICS



RATING CHART

