

# engineering data service

### 2AP1A

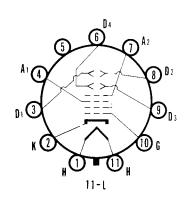
Pocusing Method   Electrostatic	GENERAL DATA	CHARAC	TERI	STI	CS		
Deflecting Method   Electrostatic   Phosphor   P1   Fluorescence   Green   Persistence   Medium   Faceplate   Clear					. El	ectrostatic	
Fluorescence	Deflecting Method				. El	ectrostatic	
Persistence	Phosphor					P1	
Faceplate   Clear							
Heater Voltage							
Heater Voltage	racepiate					. Cicai	
Heater Current (approx.) Direct Interelectrode Capacitances (approx.) Cathode to All Other Electrodes 5.5 μμf Grid to All Other Electrodes 8.0 μμf Between Deflecting Plates 1-2¹ 0.6 μμf Deflecting Plate 1 to All Other Electrodes Except DP2 8.0 μμf Deflecting Plate 2 to All Other Electrodes Except DP1 4.6 μμf Deflecting Plate 3 to All Other Electrodes Except DP4 7.5 μμf Deflecting Plate 4 to All Other Electrodes Except DP4 6.0 μμf Deflecting Plate 4 to All Other Electrodes Except DP5 6.0 μμf Deflecting Plate 4 to All Other Electrodes Except DP6 7.5 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 8.0 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf Deflecting Plate 4 to All Other Electrodes Except DP7 1.1 μμf	ELECTRICAL DAT	'A					
Direct Interelectrode Capacitances (approx.)   Cathode to All Other Electrodes   5.5 μμf	Heater Voltage					6.3	Volts
Cathode to All Other Electrodes   5.5 μμf	Heater Current (ap	prox.)				0.6	Ampere
Grid to All Other Electrodes   8.0 μμf	Direct Interelectrod	e Capacitances (	approx.)				
Except DP2	Cathode to All	Other Electrodes				5.5	μμt
Except DP2	Brid to All Oth	ier Electrodes .				8.0	$\mu\mu t$
Except DP2	Between Deflet	ting Plates 1-2'.				0.0	$\mu\mu t$
Except DP2   8.0 μμf	Deflecting Plat	al to All Other F	i Hasemadaa			1.1	$\mu\mu$ I
Deflecting Plate 2 to All Other Electrodes   Except DP1						8.0	<b>f</b>
Except DP1	Deflecting Plat	e 2 to All Other F	Electrodes				
Except DP4	Except DP1	e z to im other z				46	inuf
Except DP4	Deflecting Plat	e 3 to All Other I	Electrodes	• •	• •	1.0	μμ.
Deflecting Plate 4 to All Other Electrodes Except DP3	Except DP4					7.5	uuf
MECHANICAL DATA  Minimum Useful Screen Diameter	Deflecting Plat	e 4 to All Other I	Electrodes				r-r
MECHANICAL DATA  Minimum Useful Screen Diameter	Except DP3					6.0	μμf
MAXIMUM RATINGS (Absolute Values)  Anode No. 2 Voltage							
Anode No. 2 Voltage							
Anode No. 1 Voltage						1 100	** 1 1
Grid Voltage Negative Value							
Negative Value	Crid Voltage	ge				. ))0	voits ac
Positive Value 0 Volts Peak Heater-Cathode Voltage Heater Negative with Respect to Cathode		5				125	Volte
Peak Heater-Cathode Voltage Heater Negative with Respect to Cathode							
Heater Negative with Respect to Cathode				• •		. 0	V 0103
Heater Positive with Respect to Cathode			o Cathod	е.		. 125	Volts
Peak Voltage Between Anode No. 2 And any Deflection Plate	Heater Positiv	e with Respect to	o Cathod	e .		. 10	Volts
RECOMMENDED OPERATING CONDITIONS  Anode No. 2 Voltage <sup>2</sup>	Peak Voltage Betwe	en Anode Ño. 2					
Anode No. 2 Voltage <sup>2</sup> 1,000 Volts dc Anode No. 1 Voltage for Focus	And any Deflec	tion Plate				. 660	Volts
Anode No. 2 Voltage <sup>2</sup> 1,000 Volts d c Anode No. 1 Voltage for Focus	DECOMMENDED	ODED ATING	COND	ITIO	NIC		
Grid Voltage Required for Cutoff <sup>3</sup> –30 to –90 Volts d c Deflection Factor						1 000	37 1. 3
Grid Voltage Required for Cutoff <sup>3</sup> –30 to –90 Volts d c Deflection Factor	Anode No. 2 Volta	ge-				27 to 200	Volts dc
Deflection Factor	Grid Voltage Requi	e for rocus			. 1	30 to 500	Volts de
		ica ioi Cutoii .				-70 10 -90	VOICS CIC
Deflecting Plates 3-45	I lettection Bactor	1				230	Volte de/In
Zenetting I mes y I		ec 1-7±				400	
		es 1-2 <sup>+</sup>		• •		196	Volts de/In
		es 1-2 <sup>+</sup>				196	Volts dc/In
CIRCUIT VALUES	Deflecting Plat Deflecting Plat					196	Volts dc/In

Deflection Circuit Resistance . . . . . . . . . . . . . . . . 5.0 Megohms Max.

### QUICK REFERENCE DATA

Special Purpose Tube 2" Direct Viewed Round Glass Type Electrostatic Deflection Electrostatic Focus





#### SYLVANIA ELECTRIC PRODUCTS INC.

TELEVISION PICTURE TUBE DIVISION SENECA FALLS, NEW YORK

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### SYLVANIA

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#### NOTES:

- 1. Deflecting Plate 1 is Pin No. 3 Deflecting Plate 2 is Pin No. 8 Deflecting Plate 3 is Pin No. 9 Deflecting Plate 4 is Pin No. 6
- 2. Brilliance and definition decrease with decreasing Anode No. 2 Voltage. In general, Anode No. 2 Voltage should not be less than 500 volts.
- 3. Visual extinction of undeflected focused spot.
- 4. Deflecting Plates 1-2 are nearer the screen.
- 5. Deflecting Plates 3-4 are nearer the base.

