



ELECTRONIC TUBE REFERENCE

21DHP4

Specialized - Cathode Ray electronic tube

CONSOLIDATED TECHNICAL DATA

1 SECTION
CONSTRUCTION
CATHODERAY

Twenty-one-inch direct-view monochrome television picture tube with magnetic deflection and a P4 display screen. Manufacturer documentation places it in the high-voltage receiver CRT family, with construction optimized for bright rectangular picture presentation.

GENERAL CHARACTERISTICS

BASE DESIGNATION	8HR	BASE PINS	—
NOMINAL HEATER	6.3 V / 450 mA	PARALLEL HEATER	— / —
HEATING	Indirect	SERIES OPERATION	Not specified
CATHODE ARRANGEMENT	Separate cathodes	SECTION CONSTRUCTION	Similar

SECTION RATINGS

SECTION1 Cathode Ray	
MAXIMUM PLATE VOLTAGE	19800 V
<i>CRT maximum accelerating/anode/ultor voltage is promoted to MaxPlateVoltage; additional electrode ratings, capacitances, operating conditions, focus/deflection and optical data are preserved as parameters.</i>	

A lightweight 21-inch direct-view rectangular glass television picture tube with electrostatic focus, 110-degree magnetic deflection, gray filter glass and an aluminized P4 screen, using a 450 mA heater.

SOURCE OPERATING CONDITIONS

[SOURCE PDF](#)

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

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Section 1 · Cathode Ray

CHARACTERISTIC		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Heater warm-up time	11 s	—
Faceplate light transmission	76 %	Approximate

CAPACITANCE		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Grid 1 to all other electrodes	6 pF	—
Cathode to all other electrodes	5 pF	—

OTHER		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Maximum grid 2 voltage	550 V	—
Maximum grid 1 negative-bias voltage	154 V	NegativeBias
Maximum grid 1 positive-bias voltage	0 V	PositiveBias
Maximum grid 1 positive-peak voltage	2 V	PositivePeak
Maximum grid 1 negative-peak voltage	220 V	NegativePeak
Grid 4 focus voltage	0–400 V	Focus
Projected screen area	262 in ²	—

TUBE TINKER

An independent reference for electronic tubes, vacuum tubes, and their source documents.

