



ELECTRONIC TUBE REFERENCE

DG251

Specialized - Cathode Ray electronic tube

CONSOLIDATED TECHNICAL DATA

1 SECTION
CONSTRUCTION
CATHODERAY

Philips/Mullard DG-series cathode-ray instrument tube intended for oscillographic and measurement display, with manufacturer-defined electrostatic focusing, deflection, screen, and accelerating characteristics for type DG251.

GENERAL CHARACTERISTICS

BASE DESIGNATION	—	BASE PINS	—
NOMINAL HEATER	4 V / 1.2 A	PARALLEL HEATER	— / —
HEATING	Indirect	SERIES OPERATION	Not specified
CATHODE ARRANGEMENT	Separate cathodes	SECTION CONSTRUCTION	Similar

SECTION RATINGS

SECTION 1 Cathode Ray

No fixed ratings recorded.

Philips high-vacuum cathode-ray tube for television receiver service with green fluorescent screen and double electrostatic deflection.

DG251 is a CathodeRay device in the supplied Philips literature. Philips high-vacuum cathode-ray tube for television receiver service with green fluorescent screen and double electrostatic deflection.

SOURCE OPERATING CONDITIONS

[SOURCE PDF](#)

1938 Philips Miniwatt Vacuum Tube Catalog

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

1938 PHILIPS MINIWATT VACUUM TUBE CATALOG

Section 1 · Cathode Ray

OTHER		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Screen diameter	257 mm	—
Greatest overall length	580 mm	—
Greatest length without pins	550 mm	—
Maximum third-anode voltage	5000 V	—
Maximum second-anode voltage	1700 V	—
Maximum first-anode voltage	250 V	—
Maximum grid bias for ray suppression	-60 V	—
Third-anode voltage	5000 V	—
Second-anode voltage	1400 V	—
First-anode voltage	250 V	—

CHARACTERISTIC		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Deflection sensitivity N1	0.13 mm/V	—
Deflection sensitivity N2	0.11 mm/V	—

CAPACITANCE		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Grid capacitance	15 pF	—
Deflection-plate capacitance D1-D1'	5.5 pF	—
Deflection-plate capacitance D2-D2'	6.5 pF	—

SOURCE OPERATING CONDITIONS

[SOURCE PDF](#)

1999 Philips 0-D

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

1999 PHILIPS 0-D

Section 1 · Cathode Ray

CHARACTERISTICS

PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Screen diameter	25 cm	Published datasheet value
Screen fluorescence	Green for DG25-1; blue for DB25-1	Published datasheet value
Focusing	Electrostatic	Published datasheet value
Deflection	Electrostatic	Published datasheet value

OTHER

PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
Filament voltage	4 V	Published datasheet value
Filament current	approx. 2.3 A	Published datasheet value

TUBE TINKER

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

[Catalog](#) [Tube types](#) [Full books](#) [Blog](#) [Feedback & corrections](#)

© 2026 Tube Tinker