

Single-resonator reflex klystron oscillator covering approximately 3.84–4.46 GHz, with an integral cavity and mechanical tuning for continuous-wave microwave generation.

GENERAL CHARACTERISTICS

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

SECTION RATINGS

SECTION 1 Klystron

No fixed ratings recorded.

Source-derived section; promoted values populated where applicable.

2K56 KLYSTRON SINGLE-RESONATOR, REFLEX TYPE __ Freauency: 3840 to 4460 Mc. GENERAL DATA
Electrical: Heater, for Unipotential Cathode: Voltage. . . « « . . 6.3+0.5, ... a or dc volts Current.
0.44 amp, Frequency Range. . . 3840 to 4460 Mc Mechanical: Mounting Position. . . « o v
v v v . v o h 0oL . Any Dimensions, Terminal Connections, and Mechanical Tuning Mechanism, . . . See
Outline Drawing Resonant Cavity. . . « « + + « « o o . Integral Part of Tube EMVeloPe & v v v v e e e e e
e e e e e e e e Metal Cape v v v vt e e e e e e e e Miniature with Wafer Base Small-Wafer
Octal 4-Pin with Pin No.4 replaced by Coaxial Output Line BOTTOM VIEW Pin 1-Shell, Pin 7- Heater
Resonator Pin 8~ Cathode Cap - Reflector Pin 2-Heater Terminal NOTE: COAXIAL OUTPUT LINE PASSES
THROUGH VACANT PIN POSITION NO.4 CW OSCILLATOR—Class C Maximum Ratings,

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 · Klystron

OTHER		
PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
__Freauency	4460 MHz	__Freauency: 3840 to 4460 Mc.
Voltage. . . « «	0.5 V	Voltage. . . « « . . 6.3+0.5, ... a or dc volts
Current	440 mA	Current. 0.44 amp,
Frequency Range	4460 MHz	Frequency Range. . . 3840 to 4460 Mc
DC RESONATOR VOLTAGE + . + . «	330 V	DC RESONATOR VOLTAGE + . + . « . . . 330 max. volts
Positive Value « v v v o o	0 V	Positive Value « v v v o o 4 .. 0 max. volts
Negative Value + v v « v o v v v v v v	400 V	Negative Value + v v « v o v v v v v v 400 max. volts
DC RESONATOR CURRENT « « . v v« v v v	37 mA	DC RESONATOR CURRENT « « . v v« v v v v . 37 max. ma
Heater negative with respect to cathode	50 V	Heater negative with respect to cathode. 50 max. volts
Heater positive with respect to cathode	50	Heater positive with respect to cathode. 50 max. wvolts
Typical Operation © at	4150 MHz	Typical Operation © at 4150 Mc in Mode "A"
DC Resonator Voltage PN	300 V	DC Resonator Voltage PN 300 volts
DC Reflector Voltage Range*	-150 V	DC Reflector Voltage Range* -85 to -150 volts
DC Resonator Current	25 mA	DC Resonator Current 25 ma
Frequency Change®	35 MHz	Frequency Change® 35 Mc
© RESONATOR VOLT\$=	300 V	© RESONATOR VOLT\$=300
RESONATOR VOLTS=	300 V	RESONATOR VOLTS=300

PARAMETER	PUBLISHED VALUE	CONDITION / NOTE
RESONATOR VOLTS =	300 V	RESONATOR VOLTS =300