



2K56

2K56 KLYSTRON

SINGLE-RESONATOR, REFLEX TYPE
Frequency: 3840 to 4460 Mc.

GENERAL DATA

Electrical:

Heater, for Unipotential Cathode:

Voltage 6.3 ± 0.5 ac or dc volts
Current 0.44 amp
Frequency Range 3840 to 4460 Mc

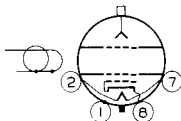
Mechanical:

Mounting Position Any
Dimensions, Terminal Connections,
and Mechanical Tuning Mechanism See Outline Drawing
Resonant Cavity Integral Part of Tube
Envelope Metal
Cap Miniature with Wafer
Base Small-Wafer Octal 4-Pin with Pin No.4
replaced by Coaxial Output Line

BOTTOM VIEW

Pin 1 - Shell,
Resonator

Pin 2 - Heater



Pin 7 - Heater
Pin 8 - Cathode

Cap - Reflector
Terminal

NOTE: COAXIAL OUTPUT LINE PASSES THROUGH
VACANT PIN POSITION NO.4

CW OSCILLATOR - Class C

Maximum Ratings, Absolute Values:

DC RESONATOR VOLTAGE 330 max. volts
DC REFLECTOR VOLTAGE:
Positive Value 0 max. volts
Negative Value 400 max. volts
DC RESONATOR CURRENT 37 max. ma
PEAK HEATER-CATHODE VOLTAGE:
Heater negative with respect to cathode. 50 max. volts
Heater positive with respect to cathode. 50 max. volts
AMBIENT TEMPERATURE OF SHELL 110 max. °C
TEMPERATURE OF COAXIAL OUTPUT LINE 90 max. °C

Typical Operation [□] at 4150 Mc in Mode "A"

with 1" x 2" Wave Guide

DC Resonator Voltage 300 volts
DC Reflector Voltage Range[▲] -85 to -150 volts
DC Resonator Current 25 ma
DC Reflector Current less than 7 μ a

(continued on next page)

□, ▲: See next page.

NOV. 15, 1948

TUBE DEPARTMENT
RADIO CORPORATION OF AMERICA, HARRISON, NEW JERSEY

TENTATIVE DATA

2K56



2K56 KLYSTRON

Half-Power Electronic-Tuning

Frequency Change [■]	35	Mc
Power Output	90	mW

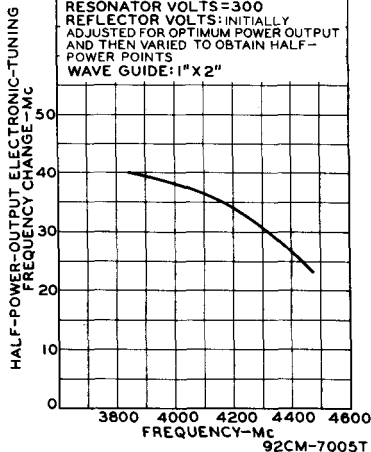
- ▲ Adjusted for maximum power output at the given operating frequency.
- Change in frequency between the two half-power points when the reflector voltage is varied above and below the point of maximum power output corresponding to the given frequency.
- The coaxial output line is coupled to the specified wave guide through the wide-band coaxial coupling unit shown on the following pages.

INSTALLATION and OPERATING NOTES for the 2K56 are the same as those shown for the 2K26, except that consideration should be given to the different coupling unit and wave guide required for the 2K56.

OUTLINE DIMENSIONS for Type 2K56 are the same as those for Type 2K26

OPERATION CHARACTERISTIC

TYPE 2K56
OPERATING MODE: "A"
RESONATOR VOLTS=300
REFLECTOR VOLTS: INITIALLY
ADJUSTED FOR OPTIMUM POWER OUTPUT
AND THEN VARIED TO OBTAIN HALF-
POWER POINTS
WAVE GUIDE: 1" X 2"



NOV. 15, 1948

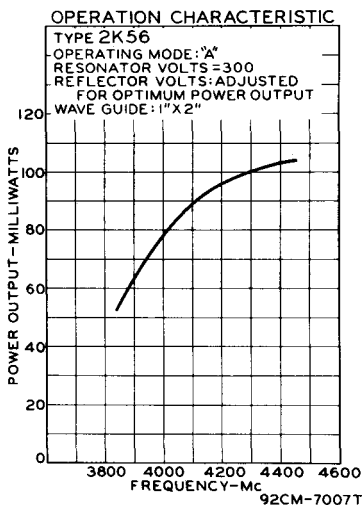
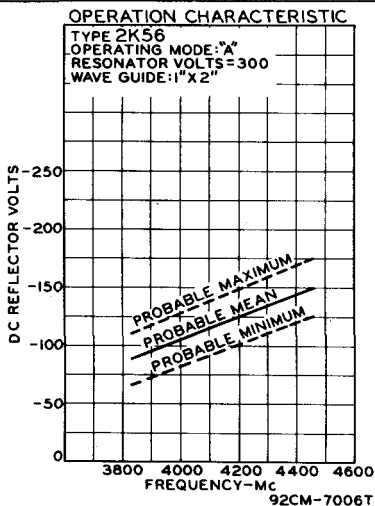
TUBE DEPARTMENT
RADIO CORPORATION OF AMERICA, HARRISON, NEW JERSEY

CE-7005T



2K56 KLYSTRON

2K56



NOV. 15, 1948

TUBE DEPARTMENT
RADIO CORPORATION OF AMERICA, HARRISON, NEW JERSEY

CE-7006T-7007T

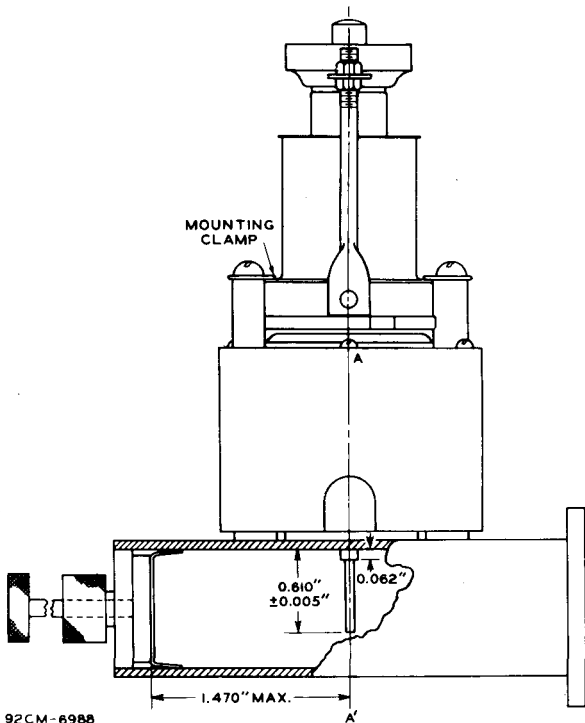
2K56



2K56 KLYSTRON

COUPLING ARRANGEMENT

*RCA-2K56 Coupled to a 1" x 2" Wave Guide
Through a Coaxial Transducer Coupling
Circuit*



NOV. 15, 1948

TUBE DEPARTMENT
RADIO CORPORATION OF AMERICA, HARRISON, NEW JERSEY

CE-6988VA

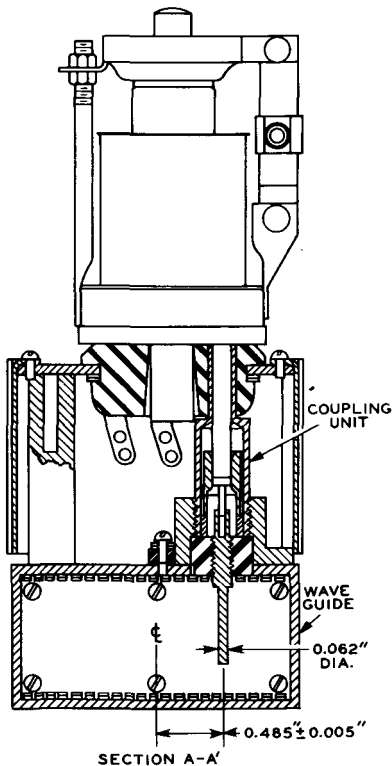


2K56

KLYSTRON

2K56

COUPLING ARRANGEMENT (Cont'd)



NOV. 15, 1948

TUBE DEPARTMENT
RADIO CORPORATION OF AMERICA, HARRISON, NEW JERSEY

CE-6988VB