

## WR 90 Mechanically Tuned Gunn oscillator

The unit utilises a GaAs Gunn device in a waveguide cavity. The frequency can be adjusted using a mechanical screw mechanism.

The module provides a convenient way of generating an RF signal using a solid state device A clean and stable DC power supply will enhance performance and spectral purity

## **Applications:-**

Educational Communications Research Imaging/sensors

Frequency (GHz)	Power (dBm)	Voltage (Volts)	Min Bandwidth (MHz)
10.5	10	8.5 to 9.5	100
10.5	13	8.5 to 9.5	100
10.5	17	8.5 to 9.5	100
10.5	20	8.5 to 9.5	100
10.5	22	8.5 to 9.5	100
10.5	23	8.5 to 9.5	100



Alternative centre frequency available Specifications at + 25°C case temperature

DC input : Solder pin / board

RF output: UBR 100 flange pattern

: SMA female - special request

**Note**: Customised performance and outline envelope available e.g. greater bandwidth, smaller outline/ mass.



## WR 90 Varactor Tuned Gunn oscillator

The unit utilises a GaAs Gunn device and a GaAs varactor diode in a waveguide cavity. By appropriate selection the frequency can be altered remotely. This is essentially achieved by the application of a DC tuning voltage which effectively perturbs the electric fields within the cavity.

The tuning voltage allows a convenient way to alter the frequency of operation; high modulation schemes can be applied thus enabling frequency agility.

A clean and stable DC power supply will enhance performance and spectral purity

## **Applications:-**

Educational Communications Research Imaging/sensors



Frequency (GHz)	Power (dBm)	Voltage (Volts)	Min Bandwidth (MHz)	Tuning voltage (Volts)
10.5	10	8.5 to 9.5	25	0 to +13 / 15
10.5	13	8.5 to 9.5	25	0 to + 13 / 15
10.5	17	8.5 to 9.5	25	0 to +13 / 15
10.5	20	8.5 to 9.5	25	0 to +13 / 15
10.5	22	8.5 to 9.5	25	0 to +13 / 15

Alternative centre frequency available Specifications at + 25°C case temperature

DC Gunn input : Solder pin / board DC Varactor input : solder pin/board

RF output : UBR 100 flange pattern

: SMA female - special request

**Note**: Customised performance and outline envelope available e.g. greater bandwidth, smaller outline/ mass.