

# PROGRAMMABLE OSCILLATOR

Ceramic Surface Mount **EP26** Series 3.3V<sub>DC</sub>



## PART NUMBERING GUIDE

**EP26 00 ET T TS - 24.000M - TR**

### FREQUENCY TOLERANCE / STABILITY

00=±100ppm Maximum (Standard)  
45=±50ppm Max

### OPERATING TEMP. RANGE

Blank=-20°C to 70°C or  
ET=-40°C to 85°C

### DUTY CYCLE

Blank=50 ±10% (Standard)  
T=50 ±5%

### AVAILABLE OPTIONS

Blank=Blank (Standard)  
TR=Tape and Reel (pg. L1)

### FREQUENCY

### PIN 1 CONNECTION

TS=Tri-State  
PD=Power Down

## ELECTRICAL SPECIFICATIONS

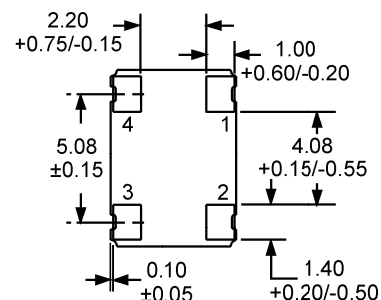
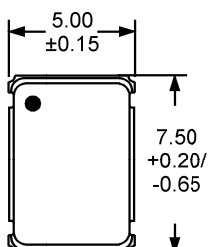
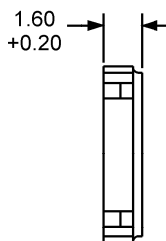
Marking Specifications See pg. G2, Group I

Frequency Range		1.000MHz to 106.250MHz
Operating Temperature Range		-20°C to 70°C or -40°C to 85°C
Storage Temperature Range		-55°C to 125°C
Supply Voltage (V <sub>DD</sub> )		3.3V <sub>DC</sub> ±0.3V <sub>DC</sub>
Input Current		28mA Maximum (Unloaded)
Disable Current (TS Option)		16mA Maximum (Pin 1=Ground)
Standby Current (PD Option)		20uA Maximum (Pin 1=Ground)
Frequency Tolerance / Stability	Inclusive of Operating Temp Range, Supply Voltage, and Load	±100ppm or ±50ppm Maximum
Output Voltage Logic High (V <sub>OH</sub> )	w/HCMOS Load	V <sub>DD</sub> -0.4V <sub>DC</sub> Minimum   I <sub>OH</sub> =-8mA
Output Voltage Logic Low (V <sub>OL</sub> )	w/HCMOS Load	0.4V <sub>DC</sub> Maximum   I <sub>OL</sub> =+8mA
Rise Time / Fall Time	20% to 80% of waveform w/HCMOS Load	4 nSeconds Maximum
Duty Cycle	at 50% of waveform w/HCMOS Load	50 ±10% (Standard)
	at 50% of waveform w/HCMOS Load (≤ 50.000MHz Only)	50 ±5% (Optional)
Load Drive Capability	≤ 50.000MHz	30pF HCMOS Load Maximum
	>50.000MHz	15pF HCMOS Load Maximum
Pin 1 Connection	TS	Tri-State
	PD	Power Down
Pin 1 Input Voltage	V <sub>IH</sub> : No Connection or ≥ 70% of V <sub>DD</sub>	Enables Output
	V <sub>IL</sub> : (TS Option) ≤ 20% of V <sub>DD</sub>	Disable Output: High Impedance
	V <sub>IL</sub> : (PD Option) ≤ 20% of V <sub>DD</sub>	Disable Output: Logic Low
Aging (at 25°C)		±5ppm / year Maximum
Start Up Time		10 mSeconds Maximum
Absolute Clock Jitter	≤ 33.000MHz	±250pSec Max, ±100pSec Typical
	>33.000MHz	±125pSec Max, ±75pSec Typical
One Sigma Clock Period Jitter	≤ 33.000MHz	±50pSeconds Maximum
	>33.000MHz	±40pSeconds Maximum

## MECHANICAL DIMENSIONS

Environmental / Mechanical Specifications See pg. H2, Group E

Pin 1: No Connect or Power Down  
Pin 2: Case Ground  
Pin 3: Output  
Pin 4: Supply Voltage



Dimensions in mm

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Specifications subject to change without notice. • Contact factory for latest revision • 1/99 • (OS48)