

RADITEK INC.

TEMPERATURE COMPENSATED CRYSTAL OSCILLATORS

code-w



RTCXO-TC18B SERIES

- Stability up to $\pm 0.5 \times 10^{-6}$
- Control Voltage Range $\pm 10 \times 10^{-6}$ Max
- TTL/HCMOS Output
- Low Aging
- SDH/SONET
- ATM
- WLL
- Measurement Equipment

Performance Characteristics

Parameter		Condition	TC18B	
Frequency Range	F_0		1.250MHz~40.000MHz	
Frequency Stability		All Condition	See Next Table	
Operating Temperature Range	T_{OPR}		See Next Table	
Supply Voltage	V_{DD}		B: +5.0VDC $\pm 10\%$	A: +3.3VDC $\pm 10\%$
Supply Current	I_{DD}	$1.25M \leq F_0 < 15M$	15mA Max	10mA Max
		$15M \leq F_0 < 26M$	20mA Max	15mA Max
		$26M \leq F_0 < 40M$	25mA Max	20mA Max
Output Load			A: TTL 15pF C: CMOS 15pF D: CMOS 50pF	
Output Duty		1.4V or $1/2V_{DD}$	45%~55%	
Control Voltage Range			See Ordering Information	
Frequency Stability	Supply Voltage change	$\pm 5\%$	$\pm 0.2 \times 10^{-6}$	
	Load change	$\pm 10\%$	$\pm 0.2 \times 10^{-6}$	
	Aging		$\pm 1 \times 10^{-6}$ /year	
Rise Time	T_r	0.4V~2.4V	10nS Max	
		$10\%V_{DD} \sim 90\%V_{DD}$		
Fall Time	T_f	2.4V~0.4V	10nS Max	
		$90\%V_{DD} \sim 10\%V_{DD}$		
Output Level	"0"Level	V_{OL}	0.4V Max or $10\%V_{DD}$	
	"1"Level	V_{OH}	2.4V Min or $90\%V_{DD}$	
Vc Input Impedance			1M Ω	
Start-Up Time		T_s	2mS Max	
Storage Temperature Range		T_{STG}	-55°C~+125°C	

Frequency Stability Over Temperature Range

Temperature Range	Frequency Stability					
	H: $\pm 0.5 \times 10^{-6}$	I: $\pm 1.0 \times 10^{-6}$	J: $\pm 1.5 \times 10^{-6}$	K: $\pm 2.0 \times 10^{-6}$	L: $\pm 2.5 \times 10^{-6}$	N: $\pm 5.0 \times 10^{-6}$
A: 0°C~+50°C	●	●	●	●	●	●
B: -10°C~+60°C	●	●	●	●	●	●
C: -20°C~+70°C		●	●	●	●	●
D: -30°C~+75°C		●	●	●	●	●
G: -40°C~+85°C		●	●	●	●	●

RTCXO-TC18B Series-w

Specifications may be subject to change

10/11/06

WORLD HQ: 1702H Meridian Ave. Suite 127, San Jose, Ca 95125, U.S.A.

Telephone: (408) 266-7404 FAX: (408) 266-4483

WEB: www.raditek.com, E-mail: sales@raditek.com

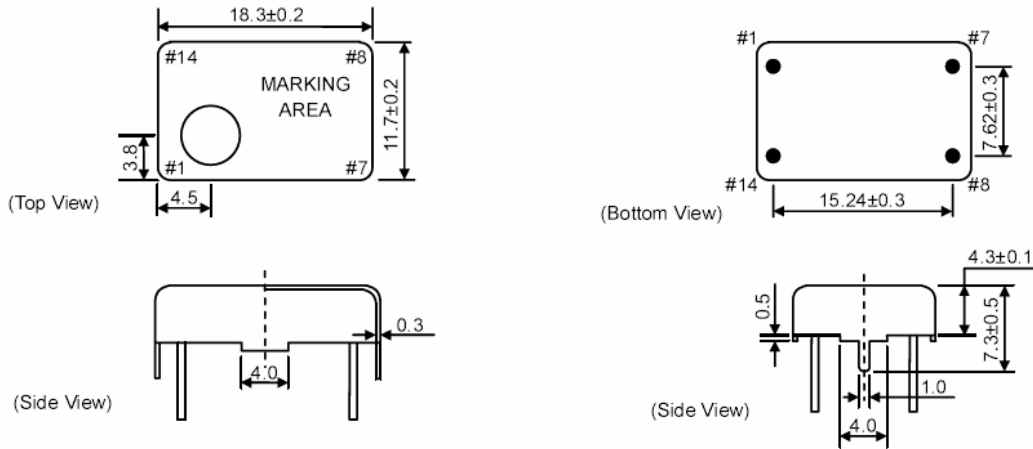
RADITEK INC.

TEMPERATURE COMPENSATED CRYSTAL OSCILLATORS

code-w

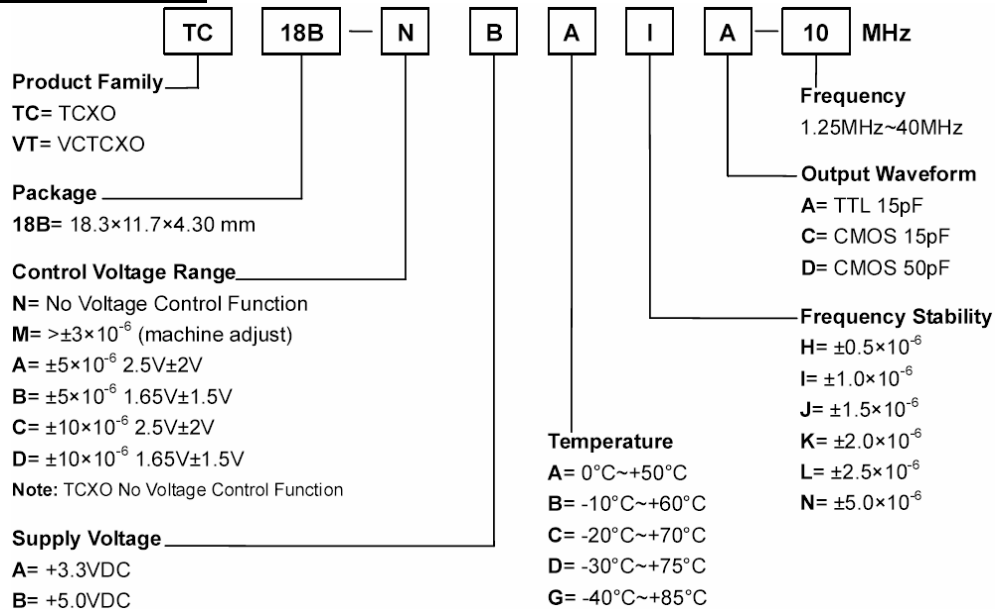
RTCXO-TC18B SERIES

OUTLINE DRAWING (units in mm – not to scale)



PIN	FUNCTION
#1	VC/NC
#7	GND
#8	OUTPUT
#14	+DC

ORDERING INFORMATION



ORDERING EXAMPLE

TC18B-NBAIA-10MHz
 TCXO / No Voltage Control Function / +5.0VDC / 0°C~+50°C / $\pm 1.0 \times 10^{-6}$ / TTL 15pF / 10MHz
VT18B-ABAIA-10MHz
 VCTCXO / ± 5 PPM 2.5V±2V / +5.0VDC / 0°C~+50°C / $\pm 1.0 \times 10^{-6}$ / TTL 15pF / 10MHz

RTCXO-TC18B Series-w

Specifications may be subject to change

10/11/06

WORLD HQ: 1702H Meridian Ave. Suite 127, San Jose, Ca 95125, U.S.A.

Telephone: (408) 266-7404 FAX: (408) 266-4483

WEB: www.raditek.com, E-mail: sales@raditek.com