

## Features and Benefits

Temp. stability less than +/- 20 ppb  
 -30C to +70C operation  
 20 MHz +5 dBm sine output  
 5.0V

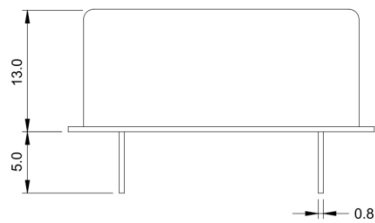
## Typical Applications

GPS or Beidou Navigation Systems  
 Test Equipment, and synthesizers  
 Communications Systems

## Description

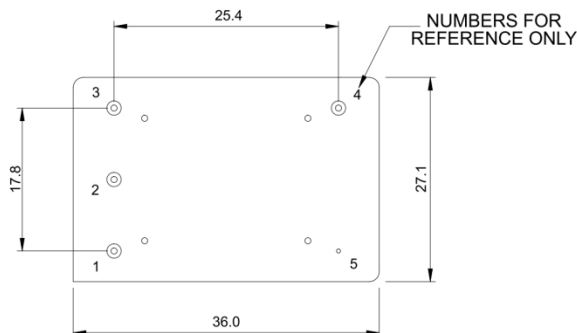
The OCXO3627N ovenized oscillator family is a standard Euro-style package configuration offering excellent stability, good phase noise, and consistent high quality on all production lots.

## Mechanical Drawing & Pin Connections



PIN NO.	CONNECTIONS
1	Voltage Control
2	Reference Voltage
3	Supply Voltage
4	RF Output
5	Ground

Unit = mm



## Specification

Oscillator Specification		Sym	Condition	Value			Unit	Note
				Min.	Typ.	Max.		
Operational Frequency Range		F <sub>nom</sub>			20.000000		MHz	
Sine	Output Level			+5.0	+7.0	+9.0	dBm	
	Harmonics					-40.0	dBc	
	Spurious					-80.0	dBc	
	Output Load			45	50	55	ohms	
<b>Power Supply</b>								
Voltage		V <sub>cc</sub>		4.75	5.00	5.25	V	
Power Consumption			Warm-up			4	Watts	
			Steady-state, +25°C			1.5	Watts	
Warm-up Time:		T <sub>up</sub>	To within +/- 1e-7, at +25°C			300	seconds	ref. frequency after 15 min.
<b>Frequency Control*</b>								
Control voltage range ( Pin 1 )				0.0	2.5	5.0	V	
Frequency Tuning range				+/- 0.8		+/- 2.4	ppm	
Reference voltage Output ( Pin 2 )				4.75	5.00	5.25	V	
<b>Frequency Stability</b>								
Versus temperature			-30°C to +70°C, ref 25°C	-20.0		+20.0	ppb	
Tolerance at 25°C			After turn on +15 minutes	-100		+100	ppb	
Versus 5% change in supply voltage				-2.0		+2.0	ppb	
Daily Aging			Per Day maximum after 30 days on	-1.0		+1.0	ppb	
First Year Aging				-100		+100	ppb	
Ten Year Aging				-600		+600	ppb	
SSB Phase noise (typ.) @ 20 MHz +5.0 dBm output					-110.0		dBc/Hz	
			10 Hz		-135.0			
			100 Hz		-145.0			
			10 KHz		-150.0			
			100 KHz		-150.0			
Short-Term	Tau = 1 second 100 samples		After 60 minutes ON			1.0	E-11	
<b>Environmental Conditions</b>								
Operating temperature range			-30°C to +70°C					
Storage temperature range			-40°C to +90°C					