

# Crystal Clock Oscillator

## 2725 Series

## Power-saving Type

### Model name

2725Z Frequency stability of  $\pm 100 \times 10^{-6}$ .

### Application

- For compact mobile information equipment, such as DVC, DSC, notebook PC, and PDA

### Features

- A power saving-type crystal oscillator, capable of being driven by a 1.8 V power supply.
- Current consumption during standby is 3  $\mu$ A or less.
- Automatic mounting by taping and IR reflow (lead-free) are possible.
- Lead-free.
- Compact and light. Dimensions and weight: 5.0 x 3.2 mm, 1.0 mm, and 0.06 g.

Pb Free

RoHS Compliant  
Directive 2002/95/EC



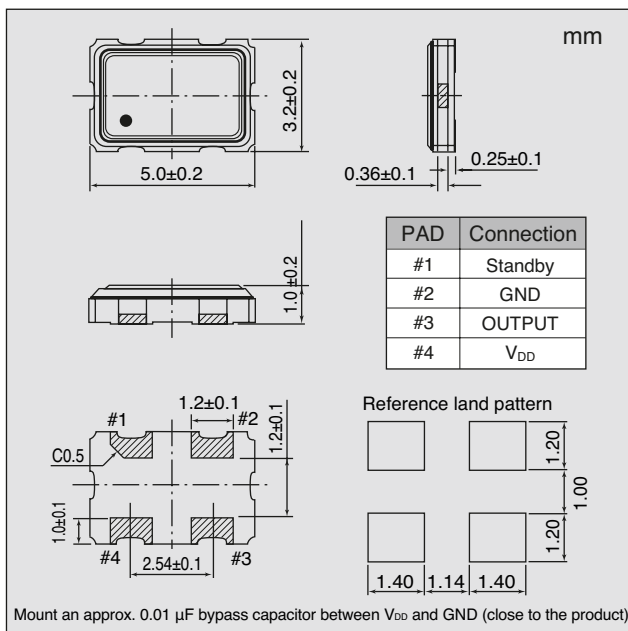
Absolute maximum rating  
Power supply voltage ( $V_{DD}$ ) -0.5 to +7.0 V  
Storage temperature range -55 to +125 °C

### Specifications

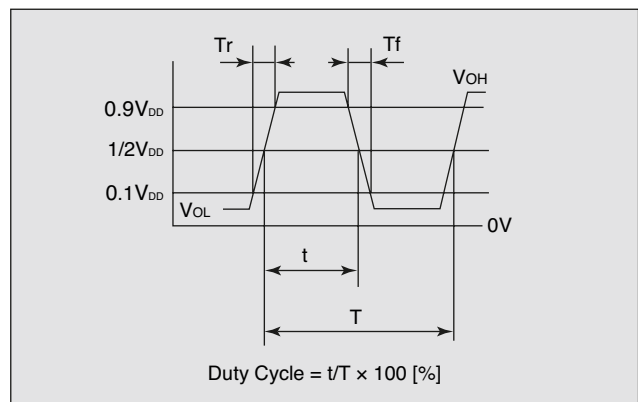
Item	Model	2725Z
Output level		C-MOS
Frequency range <sup>*1</sup>	(MHz)	$2.5 \leq F < 40$
Operating temperature range <sup>*2</sup>	(°C)	-20 to +70
Frequency stability	( $\times 10^{-6}$ )	$\pm 100$
Power supply voltage [ $V_{DD}$ ]	(V)	+1.8 $\pm$ 0.1
Current consumption	During operation	2 (1mA TYP.)
	During standby	3
$V_{OL}$ max/ $V_{OH}$ min	(V)	0.1 $V_{DD}$ /0.9 $V_{DD}$
$T_r$ max/ $T_f$ max	(ns)	6/6 (0.1 $V_{DD}$ to 0.9 $V_{DD}$ )
Duty Cycle min. to max.	(%)	40 to 60 (at 1/2 $V_{DD}$ )
Load ( $C_L$ ) max	(pF)	5
Oscillation start time max	(ms)	4
Standby function		Available (tristate)
Number for specifying an order		NSA6297A

\*1: If you require a product with a frequency not given above, please contact us. \*2: If you require a product with an operating temperature range not given above, please contact us.

### Dimensions



### Output Waveform <C-MOS>



### Standby Function

#1 Input	#3 Output
Level H ( $0.7 V_{DD} \leq V_{IH} \leq V_{DD}$ ) or OPEN is selected.	Oscillation output ON
Level L ( $V_{IL} \leq 0.3 V_{DD}$ ) is selected.	High impedance

### How to Specify an Order

When ordering our products, specify them with an "Ordering Code" that consists of the following:

[Model name] - [Frequency (up to 9 digits)]M - [Number for specifying an order]

If you have any queries concerning our standard frequencies and numbers for specifying orders, please contact our sales representatives or visit our homepage (<http://www.ndk.com/>).

Example 1: When ordering a product with model name: 2725Z, frequency: 20 MHz, frequency stability:  $\pm 100 \times 10^{-6}$ , and power supply voltage: 1.8 V  
Ordering Code: 2725Z - 20.000000M - NSA6297A