

Crystal Clock Oscillator

2725 Series

Super Wide Operating Temperature Range Type

Model name

2725T Frequency stability of $\pm 100 \times 10^{-6}$
(Super Wide Operating Temperature Range Type).

Application

- Automobile navigation system, automobile audio equipment, and camera

Features

- Supports a wide temperature range from -40 to +105°C.
- 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.
- Conforms to AEC-Q200.

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

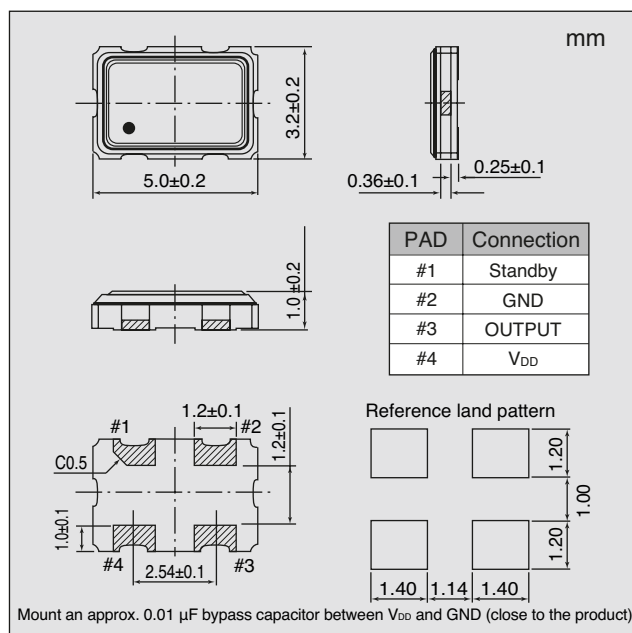


Specifications

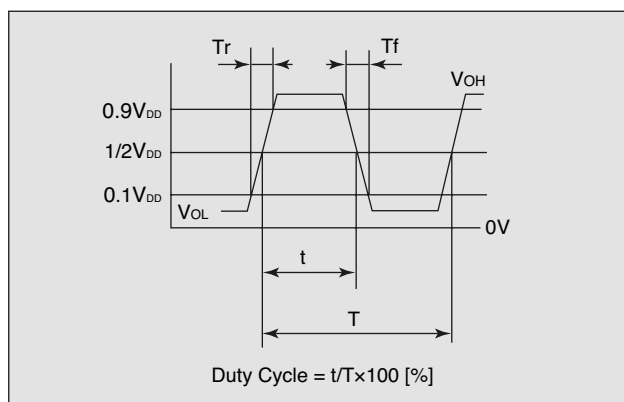
Item		Model	2725T			
Output level			C-MOS			
Frequency range ^{*1}	(MHz)		$2.5 \leq F < 20$	$20 \leq F < 40$	$40 \leq F < 60$	$60 \leq F \leq 75$
Operating temperature range ^{*2}	(°C)		-40 to +105			
Frequency stability	(×10 ⁻⁶)		±100			
Power supply voltage [V _{DD}]	(V)		+3.3±0.1			
Current consumption (+3.3 V, 25 °C) max	During operation	(mA)	8	15	22	25
	During standby	(μA)	10			
V _{OL} max/V _{OH} min		(V)	0.1 V _{DD} /0.9 V _{DD}			
Tr max/Tf max		(ns)	5/5 (0.1 V _{DD} to 0.9 V _{DD})			
Duty Cycle min. to max.		(%)	45 to 55 (at 1/2 V _{DD})			
Load (C _L) max		(pF)	15			
Oscillation start time max		(ms)	4		10	
Standby function			Available (tristate)			
Number for specifying an order			NSA6293F			

*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: 2725T, frequency: 20 MHz, frequency stability: $\pm 100 \times 10^{-6}$, and power supply voltage: 3.3 V
Ordering Code: 2725T - 20.000000M - NSA6293F