

NP5032SA

Simple Packaged Crystal Oscillator (SPXO)

■ Main Application

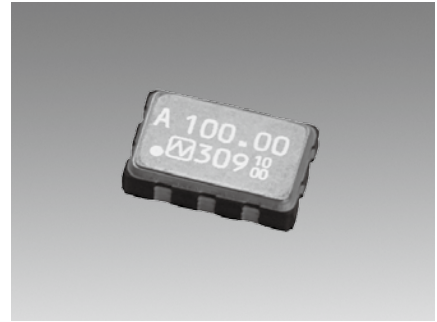
For SONET-, SDH-, and GbEthernet-related equipment

■ Features

- Compact dimension : 5.0 × 3.2 × 1.2 mm.
- Supply voltage : +2.5V or +3.3V
- LVPECL output level
- Excellent low phase jitter.(Typ. 0.08ps @148.5MHz)

Pb Free

RoHS Compliant
Directive 2011/65/EU

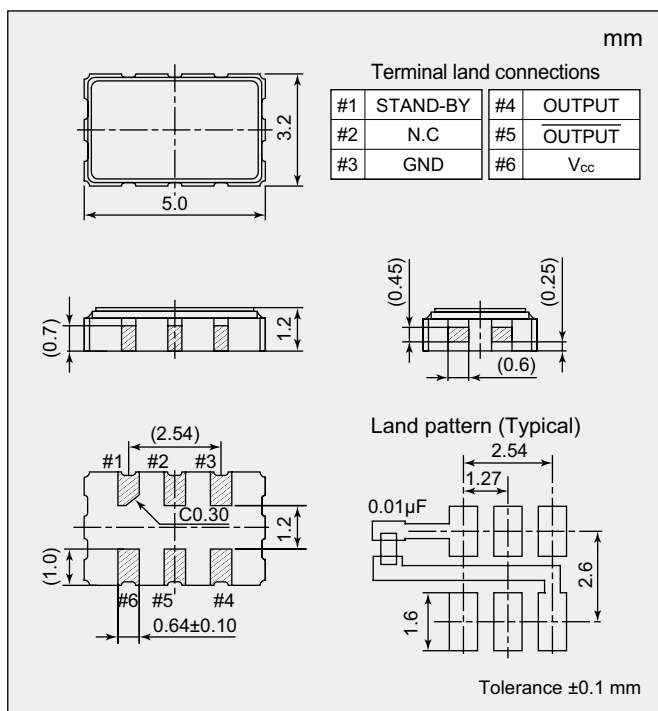


■ Specifications

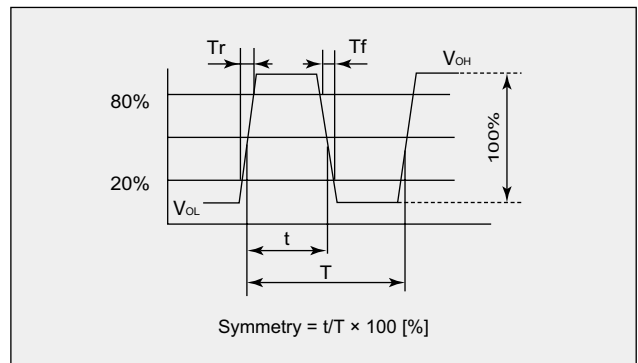
| Item | Model | NP5032SA | | | | | |
|---------------------------------------|---------------|--|-------------|------------------------------|-------------|-------------------------------|-------------|
| Output Type | | LVPECL | | | | | |
| Nominal Frequency Range (MHz) | | 100 to 170 | | | | | |
| Overall Frequency Tolerance *1 | | Max. $\pm 25 \times 10^{-6}$ | | Max. $\pm 50 \times 10^{-6}$ | | Max. $\pm 100 \times 10^{-6}$ | |
| Operating Temperature Range (°C) | | 0 to +70 | | 0 to +85 | | -40 to +85 | |
| Storage Temperature Range (°C) | | -55 to +125 | | | | | |
| Supply Voltage [V _{CC}] (V) | | +2.5 ± 5 % | +3.3 ± 10 % | +2.5 ± 5 % | +3.3 ± 10 % | +2.5 ± 5 % | +3.3 ± 10 % |
| Current Consumption | Enable (mA) | Max. 60 (STAND-BY=V _{CC} or OPEN, R _L =50Ω) | | | | | |
| | Stand-by (µA) | Max. 30 (STAND-BY=GND) | | | | | |
| Output Voltage (V) | | V _{OL} : V _{CC} -1.81 to V _{CC} -1.62 (DC characteristics) | | | | | |
| | | V _{OH} : V _{CC} -1.025 to V _{CC} -0.88 (DC characteristics) | | | | | |
| Rise Time / Fall Time (ns) | | Max. 1 (20 to 80% Waveform) | | | | | |
| Symmetry (%) | | 45 to 55 (at 50% Waveform) | | | | | |
| Output Load (Ω) | | 50 (Terminated to V _{CC} -2.0V) | | | | | |
| Phase Jitter (ps) | | Max. 1 (Offset frequency : 12kHz to 20MHz) | | | | | |
| Specification Number | | NSC5105A | NSC5106A | NSC5105B | NSC5106B | NSC5105C | NSC5106C |

*1 : The frequency stability includes initial frequency tolerance, temperature variation, and supply variation.

■ Dimensions



■ Output waveform



■ Standby Function Table (Three-state)

| #1 Input | #4 and #5 output |
|--|-----------------------|
| Level H (V _{IH} ≥ 0.7 V _{CC}) or OPEN | Oscillation output ON |
| Level L (V _{IL} ≤ 0.3 V _{CC}) | High impedance |

Please specify the model name, frequency, and specification number when you order products.
For further questions regarding specifications, please feel free to contact us.