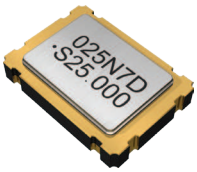



# CRYSTAL OSCILLATOR

# OSC52

## Applications

- PC Main board / VGA card / DVD / DVC / DSC / Printer / Scanner / Game Console

## Features

- Low height ceramic package / Dimensions (7.0×5.0×1.4)
- CMOS / TTL Output with Tri-state function

## Specifications

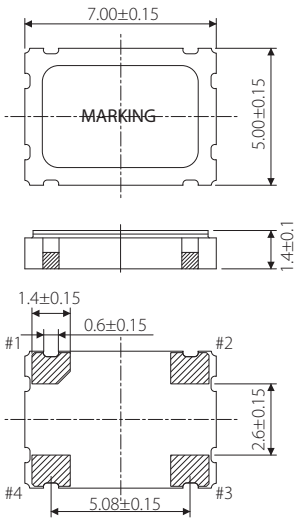
| Model | OSC52 | |
|---|---|---|
| Nominal frequency range | 0.500～160.000 MHz | 0.500～107.000 MHz |
| Storage temperature range | -55～+125℃ | |
| Operating temperature range | 0～+70℃ | |
| Frequency stability | ±20 × $10^{-6}$ , ±25×$10^{-6}$, ±50×$10^{-6}$, ±100×$10^{-6}$ | |
| Power supply voltage (Vdd) | +3.3V DC ±10% | +5.0V DC ±10% |
| Current consumption | 10 mA max: 0.5～14.9MHz<br>15 mA max: 15～29.9MHz<br>20 mA max: 30～39.9MHz<br>25 mA max: 40～49.9MHz<br>30 mA max: 50～59.9MHz<br>35 mA max: 60～79.9MHz<br>45 mA max: 80～99.9MHz<br>50 mA max: 100～125MHz<br>65 mA max: 125.1～160MHz | 10(※20) mA max: 0.5～19.9MHz<br>10(※35) mA max: 20～29.9MHz<br>15(※35) mA max: 30～34.9MHz<br>30(※35) mA max: 35～49.9MHz<br>30(※60) mA max: 50～65.9MHz<br>50(※60)mA max: 66～80.0MHz<br>60 mA max: 80.1～107MHz |
| Output level | TTL-CMOS (See Table A) | |
| Tri-state Function | #1: Floating or "H"→Output enable / #1: "L"→Output disable (Hi-Z) | |

Tabla A

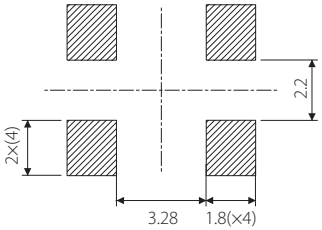
| | | |
|---|---|---|
| Output level | CMOS | TTL (+5.0V only) |
| Load | 15pF (※50pF) | 2TTL, 5TTL, 10TTL |
| Level | $V_{OL}$: 10%Vdd max. / $V_{OH}$: 90%Vdd min. | $V_{OL}$: +0.4 max. / $V_{OH}$: 2.4V min. |
| Rise & Fall time | 10ns max: F≦40MHz, 7ns max: F＞40MHz, 5ns max: F＞100MHz | |
| | at 10%～90% Vdd | at +0.4V - +2.4VDC |
| Duty cycle | 45%～55% at 1/2Vdd F≦50MHz | 40%～60% at +1.4V |
| | 40%～60% at 1/2Vdd F≦50MHz | |

Package quantity: 1,000pcs max./Reel. / Please consult with us for more details and Vdd: +1.8V, +2.5V, +2.8V , +3.0V

## Outline and Dimensions [unit:mm]




Example of a Terminal Land Pattern




| Terminal | Connection |
|---|---|
| #1 | Tri-state |
| #2 | GND |
| #3 | OUTPUT |
| #4 | Vdd |

Tri-state Function

| Tri-state Pin | Output |
|---|---|
| High or Floating | Active |
| Low | Hi-impedance |