Crystal Oscillator



• Exchanger

• High-end router

Main Application

- Mobile communication base station
- Measuring instrument
- Synthesizer

Features

- Compact, with a low height.
- A surface-mount (SMD) package.
- Reflow soldering is possible.
- Excellent phase noise characteristics.
- Excellent aging characteristics.

■ Specifications

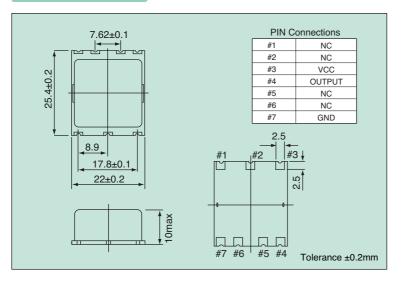
ŀ	Item Measurement condition Model		NH25M22WD
Standard nominal frequency (MHz)			12.8
Power supply voltage			DC +3.3V
Power consumption			2.7 W max. at the start and 1 W max. when stable (+25°C)
Output level			HCMOS (V_{OL}: 0.4V max., V_{OH}: 2.9V min.)
Load			10kΩ//15pF
Duty Cycle (1/2Vcc)			40 to 60%
Operating temperature range			-10 to +70°C
liity	Frequency warm-up characteristic	+25°C three minutes after power is on	±500×10 ⁻⁹ max.
stab	Aging	Based on frequency after 30 days operation	±10×10 ⁻⁹ /day max.
, ncy		Based on frequency after 30 days operation	±500×10 ⁻⁹ /year max.
Frequency stability	Frequency / temperature characteristic	-10 to +70°C	±300×10 ⁻⁹ max.
Fre	Power supply variation characteristics	DC +3.3V±5%	±50×10 ⁻⁹ max.

■ Reference Value

	Offset frequency	dBc/Hz
	1 Hz	–60 max.
	10 Hz	–90 max.
Phase noise (@12.8MHz)	100 Hz	–120 max.
	1k Hz	-130 max.
	10k Hz	-140 max.

The value of phase noise changes when the frequency changes.

Dimensions



■ List of Options

Power supply voltage	DC +5V
Nominal frequency (MHz)	10 to 38.88

For details of options, please feel free to contact our sales representatives.

List of Ordering Codes

Frequency (MHz)	Ordering Code
12.8	NH25M22WD-12.8M-NSA3418A

The above frequencies are NDK's standard frequencies. Frequencies other than the above are available. Feel free to contact our sales representatives.





