

FEATURES

- 48 MHz operating frequency
- Accuracy over Supply and Temp. better than $\pm 0.1\%$
- Fully integrated – No external components
- Fast wake-up time
- Low Power consumption ($< 300\mu\text{A}$ @ 48MHz)
- Power Down Mode
- 3.3V Operating Voltage

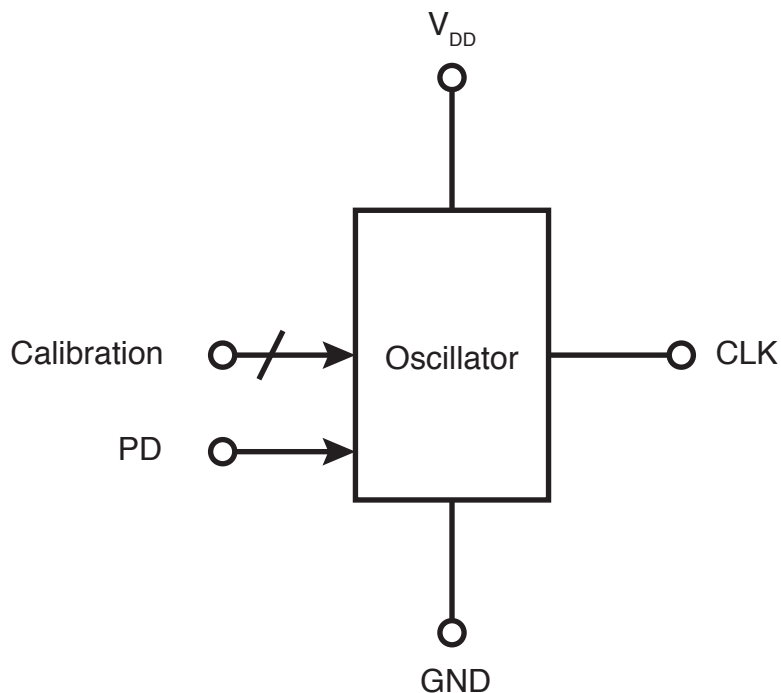
APPLICATIONS

On chip system clock requiring high precision and low power consumption. Ceramic resonator or Crystal replacement.

TECHNOLOGY

TowerJazz 0.13 μm Generic CMOS Process

BLOCK DIAGRAM



OVERVIEW

The cell is a unique high precision Silicon oscillator based on MOSCAD's NXO Technology™ and intended to operate at a frequency of 48 MHz (after calibration). With a precision better than $\pm 1000\text{ppm}$ over supply voltage and temperature, it permits replacing ceramic resonator or quartz based solutions in many applications, thereby eliminating expensive resonators and other external components. Its low power consumption together with a power down mode makes the cell ideally suited for battery operated applications.