## SIVI-NPLL32M180

TSMC 180nm (1P4M)



## **MAIN FEATURES**

- Designed on TSMC 180nm
- Supply Voltage 1.8V (+/-10%)
- Input Frequency 32.8kHz sleep mode clock
- Output Frequency 38.4MHz
- Current Consumption <1.0mA
- Start Up time < 20ms
- Power down current < 2uA</li>
- Long term jitter rms < 1ns (100Hz to 2MHz)
- Suitable for low power MP3 players
- High supply rejection and process tolerance
- Self-calibration mechanism using fully integrated calibrators and state machines
- Operational temperature range from -40°C to 125°C

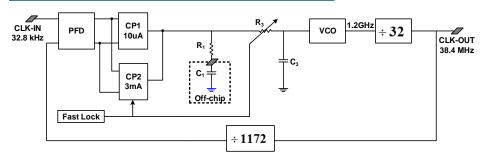
## IP DESCRIPTION

Silicon Vision's SiVi-NPLL32M180 is an ultra-low power low noise audio clock PLL that is suitable for audio application in current portable devices. The IP uses the 32.8kHz sleep mode clock as a reference to generate the low jitter audio clock of 38.4MHz. SiVi-NPLL32M180 is characterized by its small silicon area which is less the 0.4mm². The loop filter main capacitor is the only off-chip component required by the IP. The IP guarantees fast start up and auto calibration in the bring up mode. The whole PLL consumes less the 1mA in typical operation

SiVi-NPLL32M180 is ready on 180nm TSMC

## **APPLICATIONS**

Low Power Audio Applications for portable devices



Block Diagram for SiVi- NPLL32M180

