

# Si4617-A10 Data Short

## Low-Power, High-Performance AM/FM HD Radio™ Baseband Processor with Seamless Blending

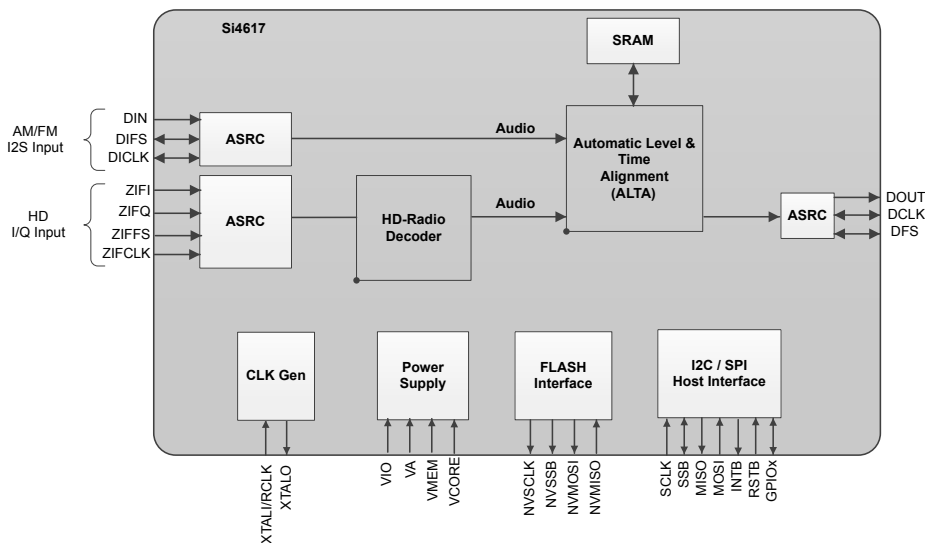
The Si4617 HD Radio™ radio processor provides significant advances in size, power consumption, and performance to enable HD Radio reception in automotive infotainment systems and car radios as well as in high-end audio/video receivers and pro-audio systems. It is designed to work with the high-performance automotive Si479xx family of AM/FM radio tuners.

### Applications

- Aftermarket car radio systems
- OEM automotive infotainment systems
- OEM automotive PND docking systems
- Audio video receivers
- Pro-audio systems

### KEY FEATURES

- AM/FM HD Radio channel decoder
- Complete on-chip HDC audio source decoder
- FM HD1, HD2, HD3 multicast support
- Station Information Service (SIS) support
- Program Service Data (PSD)
- HD Radio Emergency Alerts
- Integrated automatic level and time alignment and seamless blending
- No external RAM required for channel decoding
- Flash memory interface for application program load
- Support for Si479xx Zero-IF digital at 744.1875 kS/s
- On-chip crystal oscillator
- Reference clock input
- SPI or I<sup>2</sup>C control interfaces
- QFN 48-pin, 7 x 7 x 0.85 mm
  - Pb-free, RoHS-6 compliant
- AEC-Q100 qualified



## 1. Pin Descriptions: Si4617

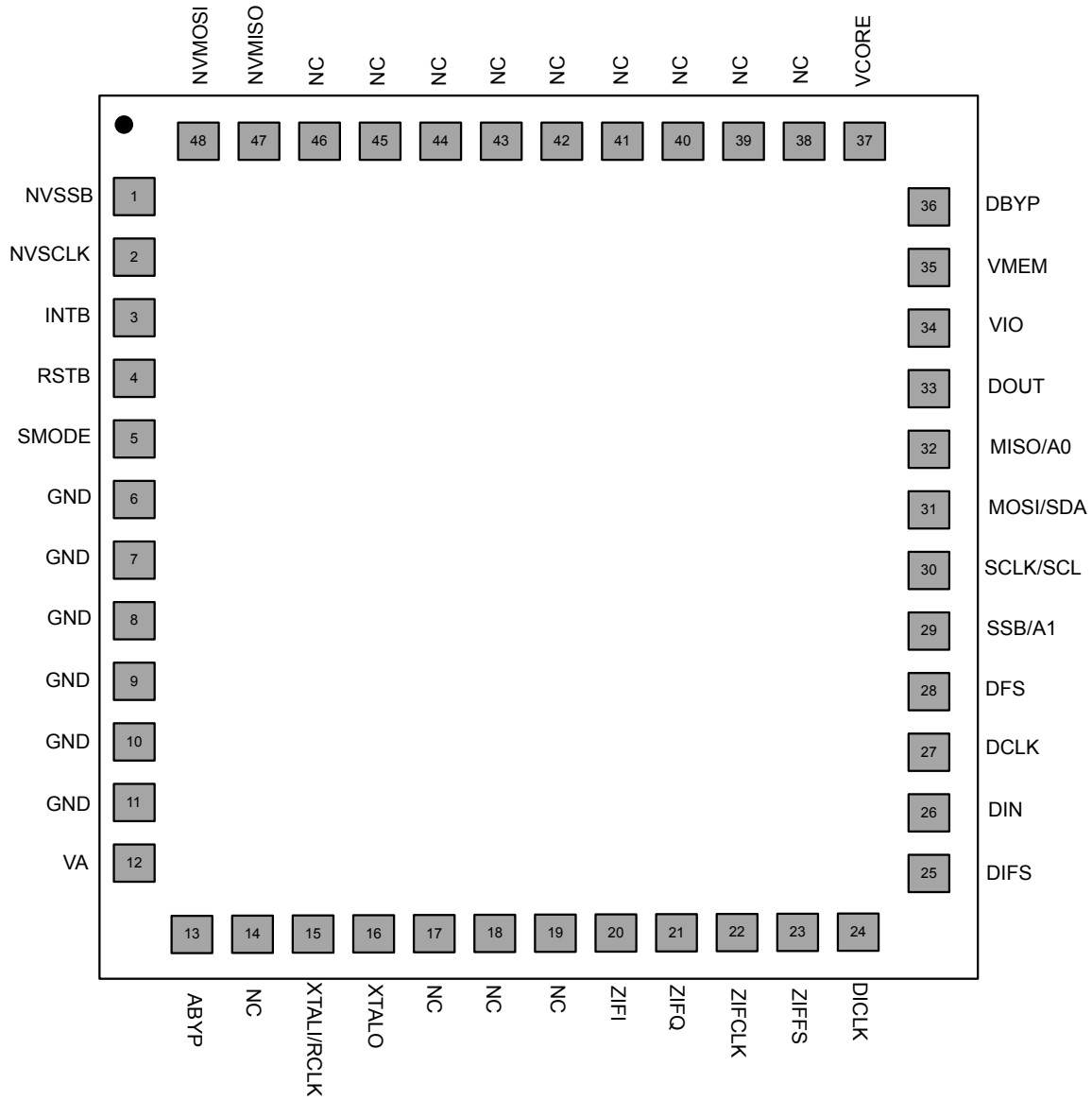
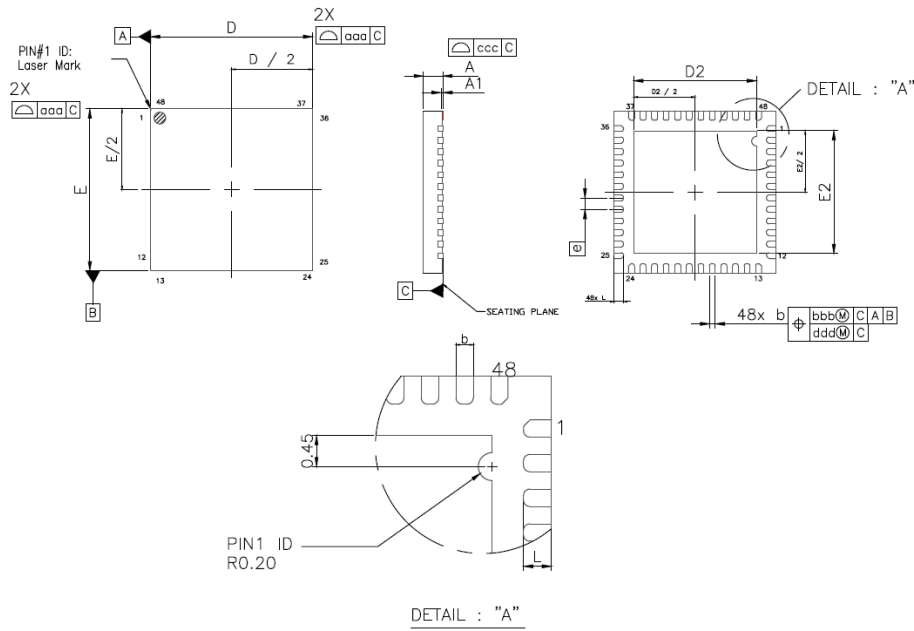


Figure 1.1. 48-pin QFN

## 2. Package Outline: Si4617 (QFN)

The figure below illustrates the package details for the Si4617 QFN package. The table lists the values for the dimensions shown in the illustration.



**Figure 2.1. 7 x 7 mm 48-pin QFN**

**Table 2.1. Package Diagram Dimensions**

Dimension	Min	Nom	Max
A	0.80	0.85	0.90
A1	0.00	0.02	0.05
b	0.18	0.25	0.30
D	7.00 BSC		
D2	5.20	5.30	5.40
e	0.50 BSC		
E	7.00 BSC		
E2	5.20	5.30	5.40
L	0.30	0.40	0.50
aaa	0.15		
bbb	0.10		
ccc	0.10		
ddd	0.05		

**Note:**

1. All dimensions shown are in millimeters (mm) unless otherwise noted.
2. Dimensioning and Tolerancing per ANSI Y14.5M-1994
3. This drawing conforms to the JEDEC Solid State Outline MO-220, Variation VKKD-4.
4. Recommended card reflow profile is per the JEDEC/IPC J-STD-020 specification for Small Body Components



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