

ZILQ5 MULTIMEDIA/PC AUDIO

WIRELESS DEVICES

Block Diagram	ISA Bus I/F DMA Interface Logic Interrupt Control Logic Registers	Host I/F SRAM Control Zero Crossing Detector Amplitude Processing Data Transfer Control	Command Control Parameter Acquisition Bank ROM I/F Waveform Data Input MCA	Modulator DW/PW DWI Demodulator Matched Filter Down Converter ADC's DAC's FSK FSK Demodulator Transceiver Control Logic Transmit & Receive Buffer OSD DSP Core	
PART NUMBER	Z53C80	Z89341/Z89342	Z2000*	Z87000	
DESCRIPTION	SCSI Adaptor	Wave Synthesis Chip Set	Spread Spectrum Burst Processor	Cordless Phone Transceiver/Controller	
SPEED MHz	Clock 3 Mb/s	CMOS: 36 MHz	CMOS: 45 MHz Clock: 2.048 Mb/s	CMOS: 16.384 MHz	
FEATURES	■ ANSI X3, 131-1986 Standard ■ DMA or Programmed I/O Data Transfers ■ Asynchronous Interface Support ■ 3 Mb/s ■ ISA Bus I/F ■ Glitch Eater	■ 4-Channel ■ 16-Bit Linear ■ PCM Sound Generator ■ Sampling Rates 20 kHz to 44.1 kHz ■ Support 16-, 18-, and 20-Bit DAC ■ Audio Bandwidth 0 Hz to 20,000 Hz ■ Direct Interface with PC ISA Bus ■ Direct Support 4Mx16 ROM	■ Operates up to 11.1264 Mcchips Second in Transmit and Receive Modes ■ Maximum Data Rate of 2.048 Mbps in Conformance with FCC Regulations ■ Supports Differentially Encoded BPSK or QPSK Modulation ■ Full- or Half-Duplex Operation for FDD or TDD Implementations ■ Two Independent PN Sequences ■ Power Management Features	■ Supports 900 MHz Spread Spectrum Cordless Phone Design ■ Adaptive Frequency Hopping ■ Transmit Power Control ■ Bus Interface to ADPCM Processor ■ 12K Words of RAM for Transceiver and Phone Control Software ■ 32 Pins of Program I/O ■ ROM Code, OTP and ICEBOX™ Version to be Available Q3/94	
PACKAGE	40 Pin DIP 44 Pin PLCC	84 Pin PLCC	100-Pin VQFP	84-Pin PLCC	
SUPPORT PRODUCTS	Support Documentation Provided with Device	Support Documentation Provided with Device	Z0200000ZC0 - Evaluation Board	Z870000ZEM - Emulator	

*Z2000 is sold under license from Stanford Telecommunications, Inc. ASIC and Custom Product Division