

Z86CCP00ZEM

IN-CIRCUIT EMULATOR

HARDWARE FEATURES

■ Supported Products

Packages	Emulation	Programming	Notes
18-pin DIP	Z86C03/04/06/07 /08/09/16/19 Z86E03/04/06/07/08	Z86E04/07/08 Z86E03/06	1
20-pin DIP	N/A	Z86717	2
18-pin SOIC	N/A	Z86E04/07/08 Z86E03/06	3
20-pin SOIC	N/A	Z86717	4
20-pin SSOP	N/A	Z86717	5
28-pin DIP	Z86C03/31/32/233	Z86E30/31	6,7
28-pin SOIC	N/A	N/A	
40-pin DIP	Z86C40/243	Z86E40	7,8
44-pin PLCC	N/A	N/A	
44-pin QFP	N/A	N/A	

Notes:

1. E03/06; With optional, separately purchased adapter, Z86E0601ZDP.
2. With optional, separately purchased adapter, Z86E0700ZDP.
3. With optional, separately purchased adapter, Z8671701ZDp.
4. With optional, separately purchased adapter, Z8671701ZDS.
5. With optional, separately purchased adapter, Z8671701ZDH.
6. To emulate Z86233, select Z86C30 with 8 KB or ROM.
7. E30/31/140: With opt., separately purchased acc. kit Z86CCP00ZAC
8. To emulate Z86243, select Z86C40 with 8 KB or ROM.

- ICEBOX Emulator Provides In-Circuit Program Debug Emulation
- Z8 GUI Emulator Software
- Bit-Programmable I/O Ports for Digital Input/Output Functions
- RS-232 Connector
- One-Time Programmable

GENERAL DESCRIPTION

The Z86CCP00ZEM is a member of Zilog's family of in-circuit emulators providing support for the Consumer Controller Processor (CCP™) microcontrollers.

The emulator provides essential timing and I/O circuitry to simplify user emulation of the prototype hardware and software product.

Data entering, program debugging, and OTP programming are performed by the monitor ROM and the host package, which communicates through RS-232C serial interface. The user program can be downloaded directly from the host computer through the RS-232C

connector. User code may be executed through debugging commands in the monitor.

The Z86CCP00ZEM emulator can be connected to a serial port (COM1, COM2, COM3, and COM4) of the host computer and uses Graphical User Interface (GUI) software.

SPECIFICATIONS

Operating Conditions

Operating Temperature: 20°C ±10°C
Supply Voltage +7.5 VDC to +9.0 VDC
(+8.0 VDC Typical)
Minimum Emulation Speed: 1 MHz
Maximum Emulation Speed: 8 MHz

Power Requirements

+8.0 VDC @ 0.5A Minimum

Dimensions

Width: 7.0 in. (17.7 cm)
Length: 9.0 in (22.9 cm)
Height: 0.9 in. (2.3 cm)

Serial Interface

RS-232C @ 9600, 19200 (default), 28800, or 57600 Baud

HOST COMPUTER

Minimum Requirements

IBM PC (or 100-percent compatible) 386-based machine
33 MHz
4 MB RAM
VGA Video Adapter
Hard Disk Drive (1 MB free space)
3.5-inch, High-Density (HD) Floppy Disk Drive
RS-232C COM port
Mouse or Pointing Device
Microsoft Windows 3.1

The following changes to the Minimum Requirements are recommended for increased performance:

486- or Pentium-based machine
66 MHz (or faster)
8 MB or RAM (or more)
SVGA Video Adapter
Color Monitor
Printer

KIT CONTENTS

Z8[®] CCP[™] Emulator

CMOS Z86C9320VSC
20 MHz CMOS Z86C5020FSE ICE Chip
8K x 8 Static RAM (For Code Memory)
18-pin DIP Zero Insertion Force (ZIF)
Programming Socket
Sockets Available for 18/28/40-Pin Target Cables
Holes Available for 28/40-Pin ZIF Sockets
RS-232C Interface
Reset Switch

Cables

18-Pin DIP Target Cable

Devices

One Z86E0812PSC (18-Pin DIP)

Software (IBM PC Platform)

Z8 GUI Emulator Software
ZASM Cross-Assembler/MOBJ Object File Utilities
Production Languages Corporation COMPASS/Z8
(Evaluation Version)

Documentation

Emulator User Manual
Discrete Z8 Databook
Z8 Microcontroller Technical Manual
Registration Card
Product Information

Z8 CCP Emulator Accessory Kit
(Z86CCP00ZAC)

(Not included with Z86CCP00ZEM)

28-Pin ZIF Socket

28-Pin DIP Target Cable

40-Pin ZIF Socket

40-Pin DIP Target Cable

DB25 RS-232C Cable

Power Cable with Banana Plugs

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