## MicroZed<sup>™</sup> FMC Carrier Card



The FMC Carrier Card supports the MicroZed™ Evaluation Kit and System-on-Module (SOM), providing easy access to the full 108 user I/O available from the MicroZed SOM. Two 100-pin MicroHeaders on the carrier card mate with the MicroZed, connecting 75 of the MicroZed Programmable Logic (PL) I/O to a low-pin-count Vita 57 FPGA Mezzanine Connector (FMC) interface. The remaining MicroZed I/O are connected to various FMC Carrier Card features, including push button switches, LEDs, EEPROMs, and five Digilent Pmod™ compatible interfaces. The FMC Carrier Card also generates the necessary power rails for MicroZed, providing 5 V to the MicroZed core and a user selectable bank voltage for the PL I/O and FMC Vadj. The FMC Carrier Card accelerates complex prototyping by interconnecting a MicroZed SOM and industry-standard FMC Modules.

## **FEATURES**

#### Interfaces

- Two 100-pin board-to-board MicroHeaders
- Xilinx PC4 header for PL JTAG download/debug
- Five Digilent Pmod™ compatible interfaces
  - Access to 8 MIO and 31 PL I/O (15 are 7Z020 only)
  - Two support the Zed Touch Display Kit
- Low pin count (LPC) FMC with
- 72 PL I/Os (36 differential pairs)
- 2 User push buttons and 4 User LEDs
- 2 Status LEDs (Power Good and DONE)

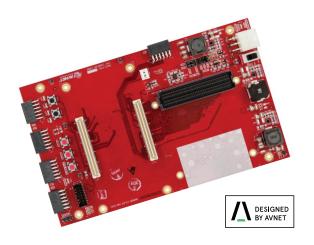
## **On-Board Memory**

- 2 Kb MAC ID EEPROM
- (optional) 1 Kb SHA-1 EEPROM (not populated by default)

#### **Power**

- Internal
  - Proper sequencing and handshaking as per MicroZed Carrier Card Design Guide
  - 5 V @ 2 A regulator for MicroZed power
  - 1.8/2.5/3.3 V @ 4 A Regulator for MicroZed VCCIO and FMC Vadj
  - 3.3 V @ 3 A Regulator for FMC and Pmods
- Input
- 12 V @ 5 A input via 2 x 3 connector
- (optional) Fan header
  - Resistor-selectable 5 V or 12 V to power an on-board fan

To purchase the carrier card, visit www.microzed.org



#### **COMPATIBLE WITH**

# /MICROZED™

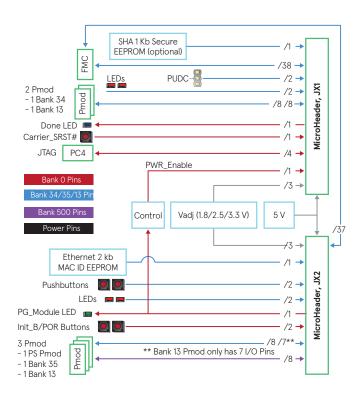
#### KIT INCLUDES

- FMC Carrier Card
- 12 V @ 5 A AC/DC Power Supply with international power cords
- MicroZed mounting hardware
- Quick Start Card

#### **TARGET APPLICATIONS**

- Zyng evaluation and prototyping
- FMC prototyping (see www.vita.com/fmc)
- Industrial automation
- Test & measurement
- Motor control
- Machine vision

#### **BLOCK DIAGRAM**



## **FEATURED MANUFACTURERS**









### **PARTS**

Part Number	Description	Resale
AES-MBCC-FMC-G	MicroZed™ FMC Carrier Card	\$149 USD

#### **RELATED PARTS**

Part Number	Description	Resale
AES-ALI2-ZED-G	7-inch Zed Touch Display Kit	\$499 USD
AES-Z7MB-7Z010-G	MicroZed Evaluation Kit	\$199 USD
AES-Z7MB-7Z010-SOM-G	AES-Z7MB-7Z010-SOM-G	\$192 USD
AES-Z7MB-7Z020-SOM-G	MicroZed 7020 SOM - Standard Version	\$289 USD
AES-FMC-IMAGEON-G	HDMI Input/Output	\$250 USD

 $\label{thm:condition} \textit{Visit www.microzed.org} \ \text{to learn more about our standard and extended temperature MicroZed SOM options}.$ 

Countries Available for Purchase: Americas, EMEA, Asia, Japan

CONTACT

North America

2211 S 47<sup>th</sup> Street Phoenix, Arizona 85034 United States of America eval.kits@avnet.com 1–800–585–1602 Europe

Gruber Str. 60c 85586 Poing Germany marketing@silica.com +49-8121-77702 Japan

Yebisu Garden Place Tower, 23F 4-20-3 Ebisu, Shibuya-ku Tokyo 150-6023 Japan eval-kits-jp@avnet.com +81-(0)3-5792-8210 Asia

151 Lorong Chuan #06-03 New Tech Park Singapore 556741 XilinxAPAC@avnet.com +65-6580-6000