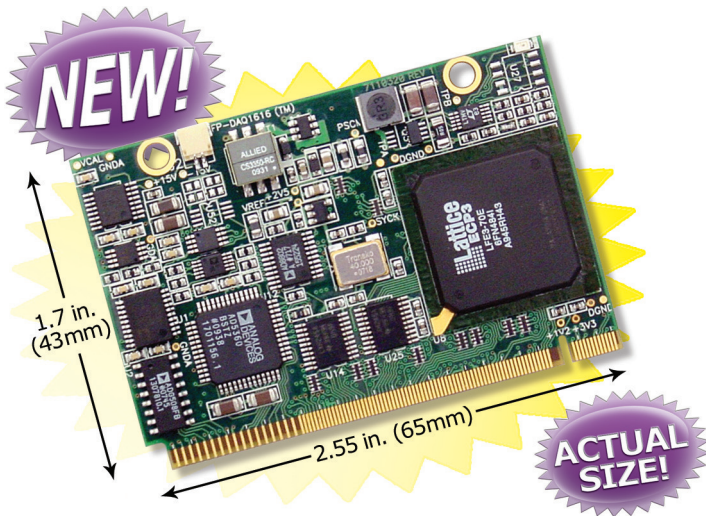
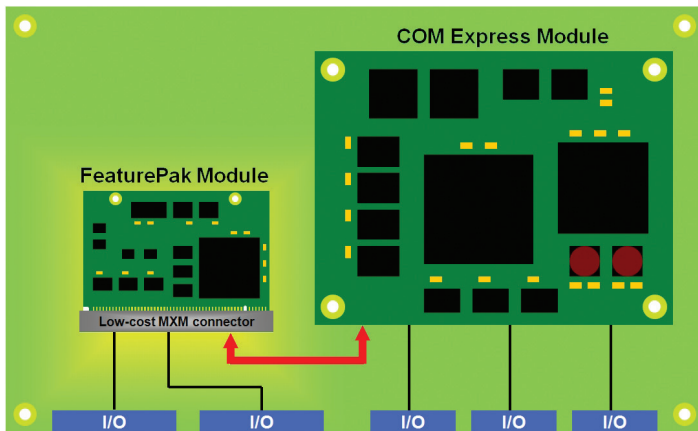


# FeaturePak™



**FeaturePak** is an exciting new embedded system expansion standard, originated by Diamond Systems, that provides a compact, low-cost method of adding I/O to board-level embedded computers. FeaturePak modules can be used as snap-in customization modules for commercial, off-the-shelf single-board computers (SBCs) and computer-on-module (COM) baseboards, or as functional blocks on fully-custom embedded electronics.

This new mezzanine-style embedded I/O expansion standard is highly synergistic with existing and emerging bus-, I/O-, chip- and board-level technologies. It leverages the latest high-speed serial expansion standards—such as PCI Express and USB—and is compatible with a wide range of current and future processors, including both x86 and RISC architectures.



FeaturePak on COM Express baseboard

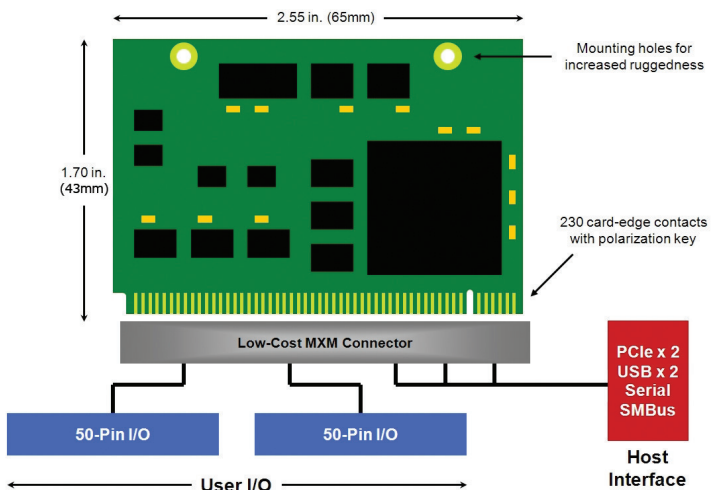
## WORLD'S SMALLEST PCI EXPRESS OPEN ARCHITECTURE EMBEDDED I/O STANDARD

### Key Features

- ◆ Compact, low profile form-factor—0.6x the size of a credit card!
- ◆ Single low-cost connector integrates all host and external I/O signals
- ◆ Provides up to 100 I/O points per module
- ◆ Leverages industry-standard buses such as PCI Express, USB, and SMBus
- ◆ Host form-factor and processor agnostic
- ◆ Coexists with PC/104, SUMIT, Qseven, ETX, XTX, COM Express, etc.
- ◆ Multiple FeaturePak modules may be present within one system
- ◆ Rugged and reliable
- ◆ Open industry standard

### Key Benefits

- ◆ Shortens time-to-market
- ◆ Reduces board-level development costs and risks
- ◆ Simplifies system design
- ◆ Eliminates cables, resulting in higher reliability, lower cost, and faster assembly
- ◆ Enables scalable and reconfigurable system design
- ◆ Enables easy product upgrades
- ◆ Protects from component obsolescence
- ◆ Encapsulates intellectual property
- ◆ Suitable for SBCs, baseboards, and proprietary all-in-one hardware designs
- ◆ Ideal for rapid-prototyping through high-volume applications
- ◆ Ideal format for silicon vendor reference designs
- ◆ Open standard increases market acceptance



### FeaturePak modules Enable Faster and More Flexible Baseboard Design

With their compact size and standardized connector, FeaturePak modules are easy-to-use macrocomponents that target a wide range of embedded applications. Embedded computer design can be greatly simplified by treating complex I/O subsystems as components, just as various types of COMs (computer-on-modules)

allow designers to treat the core embedded computing functions as a plug-in building block. This macrocomponent approach greatly accelerates design cycles, and also enables the creation of reconfigurable and upgradable products.

