SMART
Modular Technologies ®

Embedded USB Flash Based Drive

SMART Modular Technologies' Embedded USB (eUSB) Flash drive is designed as the main boot and storage device in embedded systems. The eUSB's small form factor, lower power consumption, and fast access times, offer distinct technical advantages over more traditional mass storage devices.

Available in sizes up to 32GB, SMART's commercial and industrial grade eUSB drives are offered in both 3.3V or 5V versions. With random access times that are typically less than 1ms for the drive, the eUSB is capable of read speeds up to 35MB/s and write speeds up to 25MB/s.
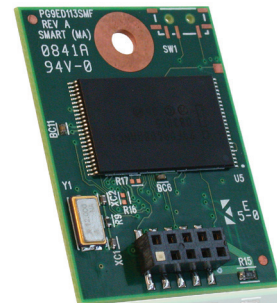
Utilizing the USB interface, eUSB products are easily integrated into host systems without any special BIOS modifications or additional device drivers. SMART eUSB products provide reliability by incorporating onboard error detection and correction. Static and dynamic-wear leveling algorithms also help to produce reliable operation over product life cycles.

Features & Benefits

- SLC NAND Technololgy
- Supports bootability with most standard BIOSs
- Low power dissipation: less than 0.45W active (0.68W for 5V version) and less than 10mW standby
- Small footprint header: industry standard header or low profile stacking header available
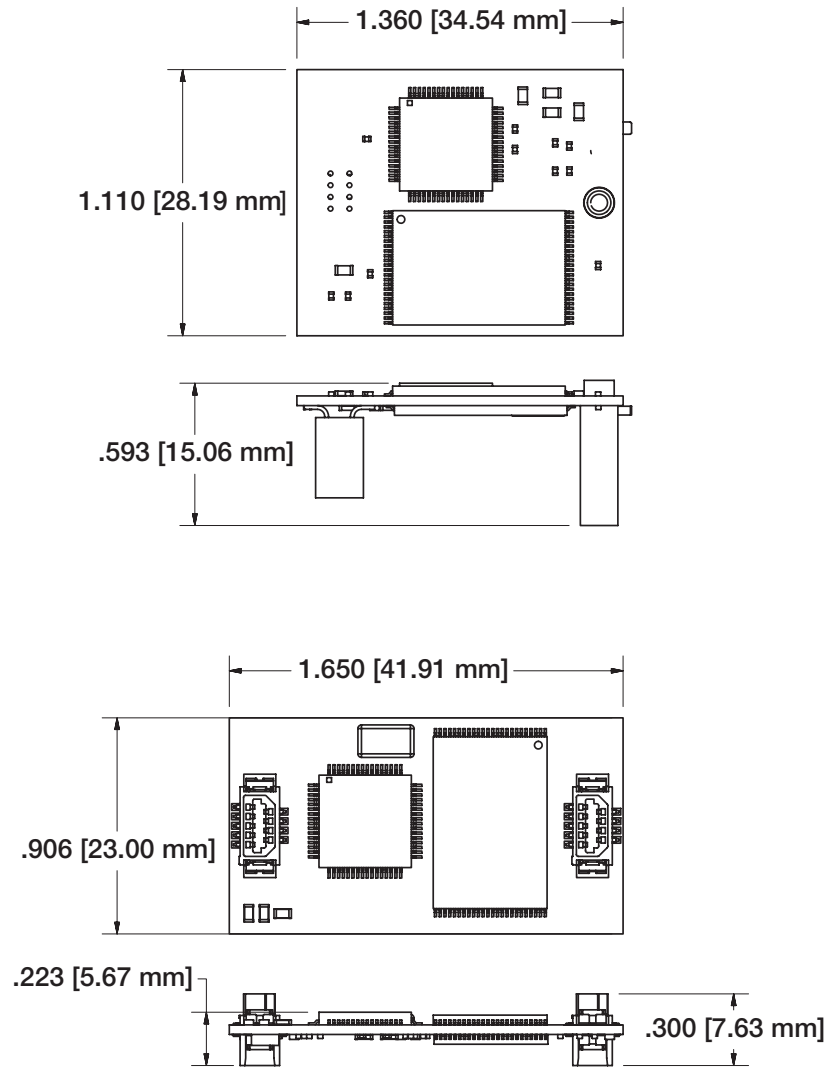- Optional HW Reset and Write Protect support

Product Family Overview

	Capacity	Performance Sequential
eUSB		
USB 2.0 compliant	1GB to 32GB	Up to 35MB/s (read) Up to 25MB/s (write)

Applications

- Single board computers for defense, gaming and industrial control applications
- Telecom and networking routers and switches
- ATCA compute blades
- Networking
- Industry standard servers

eUSB Flash Drive

eUSB Diagram

1.360 [34.54 mm]

1.110 [28.19 mm]

.593 [15.06 mm]

1.650 [41.91 mm]

.906 [23.00 mm]

.223 [5.67 mm]

.300 [7.63 mm]

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