JMB353 1394a + USB20 to SATA Host Adapter

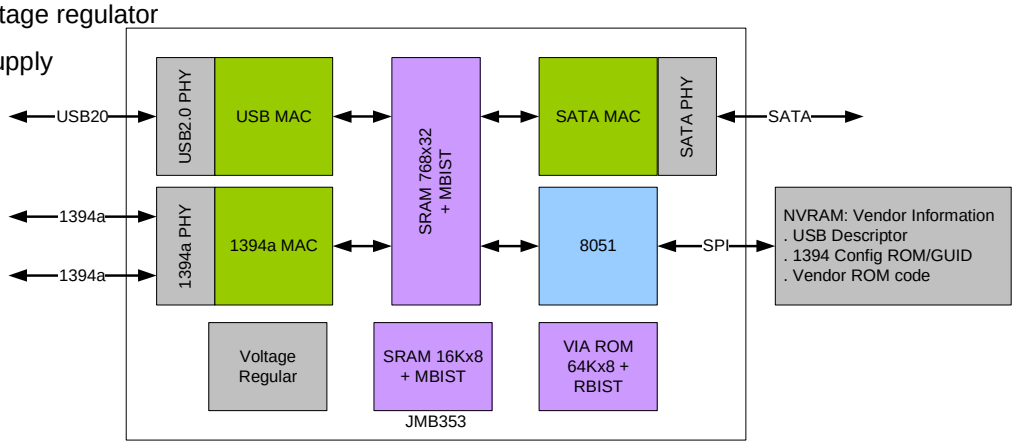
Description

The JMB353 is single chip solution to bridge between USB 2.0 host or 1394 host and SATA device. The highly integrated USB 2.0, 1394a and SATA Phys technology provides a cost-effective solution to apply USB to SATA device or 1394 to SATA device enclosure. The USB adheres to the Mass Storage Class Bulk-Only Transport Specification. The embedded command parser supports both ATA and ATAPI command set with LBA48 bit addressing capability. The 1394 adheres to SBP-2 specification. And SBP-2 acceleration hardware is embedded to off-load CPU and easy firmware control.

Features

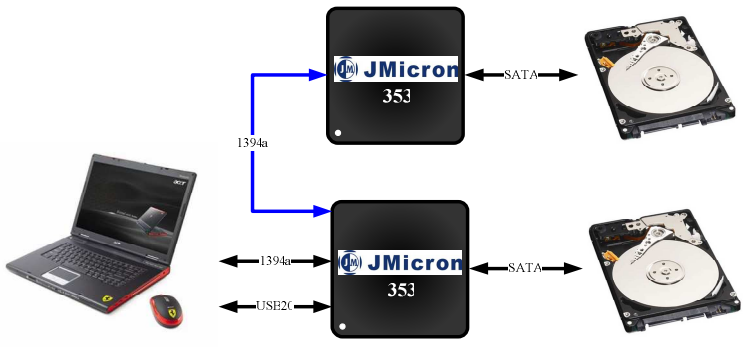
- Complies with Gen1i/Gen1m of Serial ATA II Electrical Specification 2.5
- Supports SATA II Asynchronous Signal Recovery (Hot Plug) feature
- Complies with USB 2.0 Specification
- Complies with USB Mass Storage Class, Bulk-Only Transport Specification
- Supports USB High-Speed and Full-Speed Operation
- Complies with IEEE Std 1394-1995 and IEEE 1394a-2000 Specifications
- Supports Asynchronous Transfers at 100/200 and 400 Mb/s for 1394a
- Supports 1394a SBP-2 Acceleration Feature to optimize performance
- Provides two 1394a ports for cascade topology application
- Supports 1394a power saving mode when USB is active
- Supports ATA/ATAPI PACKET command set
- Supports ATA/ATAPI LBA48 addressing mode
- Supports single 12MHz external crystal
- Supports external NVRAM for Vender Specific VID/PID of USB/1394 Device Controller
- Embedded 3.3V to 1.8V voltage regulator
- Single power 3.3V power supply
- 0.18um CMOS technology
- 64 LQFP package
- 15 GPIOs

Function Block Diagram

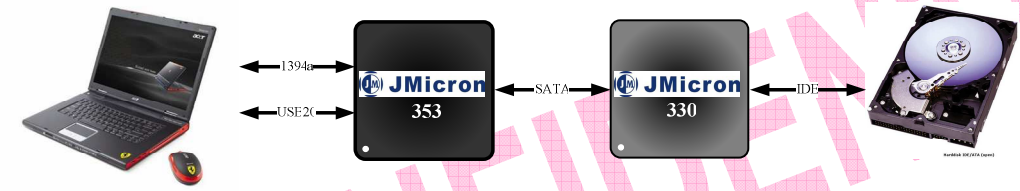


Applications

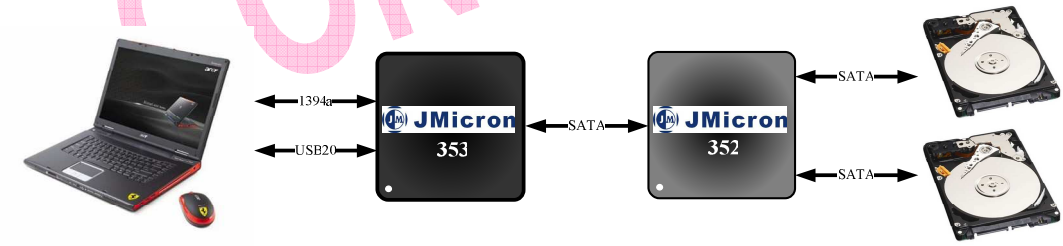
Adapt to SATA disk.



Adapt to IDE disk.



RAID application



Deliverables

- Data sheet
- Design guide
- Application EVB board

Contact Information

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