



DM8606C/DM8606CI Product Brief

6-Port Fast Ethernet Single Chip Switch Controller with

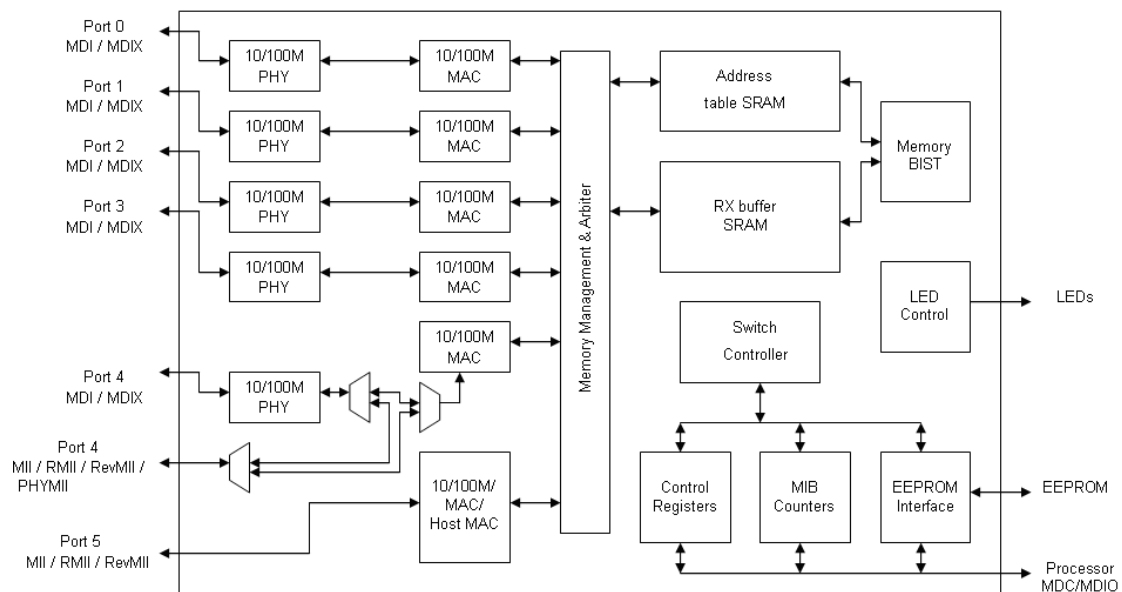
MII/RMII/Reverse MII Interface

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The DM8606C/DM8606CI is a industrial-temperature (DM8606CI only) fully integrated and cost-effective fast Ethernet switch controller with five 10/100MB PHY, Six 10/100Mb MAC, and one MII/RevMII/RMII for 6th MAC

The controller provides basic Layer-2 switch functions and advance IEEE 802.1Q VLAN, priority queuing scheme, IGMP snooping protocol. Spanning Tree protocol, The integrated 5 ports PHY are compliant with IEEE 802.3u standards. The MII/RMII/Reverse MII interface provides the flexibility to connect Ethernet 10/100M PHY devices.

Block Diagram



Specifications

- IEEE 802.3 10BASE-T/ IEEE 802.3u 100BASE-TX compatible
- Ethernet Switch Ports
- Five 10/100Mb PHY or Five 100Mb Fiber PHY
- Port 4 support MII/RMII/RevMII or PHY MII interface
- Port 5 support MII/RMII/RevMII
- Per port supports HP Auto-MDIX

- Per port support bandwidth, ingress and egress rate control
- Per port support priority transmit queues for QoS:
- Each port have four queues with strict or weight ratio priority
- IEEE 802.1p VLAN, Port based, MAC based, IPv4 TOS, Special Tag
- Per port support broadcast storming filter function for broadcast, multicast – and unknown unicast packets
- Flow Control:
- Supports IEEE 802.3x Flow Control in full-duplex mode
- Supports Back Pressure Flow Control in half-duplex mode
- Support VLAN ID tag/untag options
- Support special Tag to communication with CPU
- Record up to 2K Uni/Multi-cast MAC addresses
- IEEE 802.1Q VLAN up-to 16 VLAN groups
- Full 12-bit VID, 4-bit FID, Tag/untag,
- Support SVL/IVL
- Support hardware IGMP snooping v1/v2 and MLD v1
- Support STP/RSTP
- Support automatic aging scheme
- Support trunk ports
- Support EEPROM interface for power up configurations
- Supports industrial-temperature (-40°C ~ +85°C)
- Support serial data management interface and MIB counter for diagnostic
- 128 QFP package with 0.18um process, 1.8V internal core, 3.3V I/O with 5V tolerance

Application

- SOHO 5-port switch.
- 5-port switch + Router with MII CPU interface.

Ordering Information

Part Number	Pin Count	Package
DM8606CFP DM8606CIFP	128	QFP (Pb-Free and Halogen-Free)

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