PART NUMBER

TA82380-25-ROCV

Rochester Electronics Manufactured Components

Rochester branded components are manufactured using either die/wafers purchased from the original suppliers or Rochester wafers recreated from the original IP. All re-creations are done with the approval of the Original Component Manufacturer. (OCM)

Parts are tested using original factory test programs or Rochester developed test solutions to guarantee product meets or exceeds the OCM data sheet.

Quality Overview

• ISO-9001

• AS9120 certification

• Qualified Manufacturers List (QML) MIL-PRF-38535
  • Class Q Military
  • Class V Space Level

Qualified Suppliers List of Distributors (QSLD)
  • Rochester is a critical supplier to DLA and meets all industry and DLA standards.

Rochester Electronics, LLC is committed to supplying products that satisfy customer expectations for quality and are equal to those originally supplied by industry manufacturers.

The original manufacturer's datasheet accompanying this document reflects the performance and specifications of the Rochester manufactured version of this device. Rochester Electronics guarantees the performance of its semiconductor products to the original OCM specifications. 'Typical' values are for reference purposes only. Certain minimum or maximum ratings may be based on product characterization, design, simulation, or sample testing.
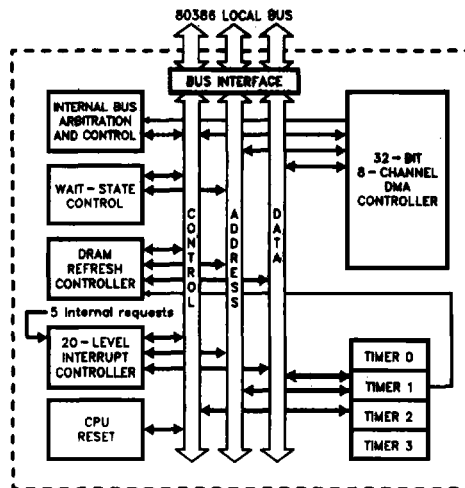
intel.

82380
HIGH PERFORMANCE 32-BIT DMA CONTROLLER WITH INTEGRATED SYSTEM SUPPORT PERIPHERALS

- **High Performance 32-Bit DMA Controller**
  - 50 MBytes/sec Maximum Data Transfer Rate at 25 MHz
  - 8 Independently Programmable Channels
- **20-Source Interrupt Controller**
  - Individually Programmable Interrupt Vectors
  - 15 External, 5 Internal Interrupts
  - 82C59A Superset
- **Four 16-Bit Programmable Interval Timers**
  - 82C54 Compatible

- **Programmable Wait State Generator**
  - 0 to 15 Wait States Pipelined
  - 1 to 16 Wait States Non-Pipelined
- **DRAM Refresh Controller**
- **80386 Shutdown Detect and Reset Control**
  - Software/Hardware Reset
- **High Speed CHMOS III Technology**
- **132-Pin PGA Package**
  (See Packaging Handbook Order 240800-001, Package Type A)
- **Optimized for use with the 80386 Microprocessor**
  - Resides on Local Bus for Maximum Bus Bandwidth
  - 16, 20, and 25 MHz Clock

The 82380 is a multi-function support peripheral that integrates system functions necessary in an 80386 environment. It has eight channels of high performance 32-bit DMA with the most efficient transfer rates possible on the 80386 bus. System support peripherals integrated into the 82380 provide Interrupt Control, Timers, Wait State generation, DRAM Refresh Control, and System Reset logic.

The 82380's DMA Controller can transfer data between devices of different data path widths using a single channel. Each DMA channel operates independently in any of several modes. Each channel has a temporary data storage register for handling non-aligned data without the need for external alignment logic.

82380 Internal Block Diagram

290126-1

The complete document for this product is available from Intel's Literature Center at 1-800-548-4725.