

# decsystem10

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## MF10 Memory System





## Features

- 550 nanosecond access time
- Overlapped memory operation
- Two- or four-way interleaving
- 22-bit address logic
- 1024K words of directly addressable memory (maximum), 36 bits plus parity per word
- Compatible with both KA10 and KI10 processors
- Swing down indicator panel
- Lamp test
- Quick-latch cable connections

The MF10 Memory System permits DECsystem-10 users to expand the KA10 and KI10 system memories for maximum performance. The KI10, in particular, benefits from the advanced control logic features of the MF10 Memory System. Included in the MF10 is an overlapped memory control logic. This permits the KI10 to transmit an address to a second MF10 memory bank for the next data fetch while waiting for the preceding data request to be satisfied by another memory bank. This feature gives KI10/MF10 configurations a high throughput rate under heavy processing loads.

The MF10 Memory System is a ferrite-core memory having a nominal read access time of 550 nanoseconds, a maximum read access time of 660 nanoseconds and a cycle time of 950 nanoseconds. Up to 16 MF10 modules may be combined to provide 1024K words of high speed memory. Each module may contain one to four memory parts for connection to processors, data channels and the data channel multiplexer. Two- or four-way interleaving is provided by switches on each memory

module. Address logic decodes a 22-bit address, providing 4096K words of addressing capability.

Because of the asynchronous operation of the DECsystem-10 processor, the MF10 memory can be intermixed with DECsystem-10 memory systems of various speeds to optimize system performance.

## Specifications

Word Size	36 bits plus parity	
Minimum Memory Size	32K words (K=1024)	
Expansion Module Size	32K words	
Maximum Memory Size	1024K words	
Read Access Time		
Typical	550 nanoseconds	
Maximum	610 nanoseconds	
Memory Cycle Time	950 nanoseconds	
Voltage	115 or 230 Vac	
Operating Current	14A@115 V or 7A@230 V	
Power	1500 watts	
Heat	5075 BTU's/Hour	
Dimensions		
Height	72 in.	1.83 m
Width	33 in.	0.84 m
Depth	30 in.	0.76 m
Weight	800 lb.	363.6 kg
Operating Temperature	60 to 95F 15 to 35C	
Storage Temperature	40 to 110F 5 to 45C	
Relative Humidity	20% to 80%	

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