HP 9000 Series 200 Computer Systems

HP 98624A
HP-IB Interface Card

Installation Note
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98624-90000

First Edition ........................................ June 1981
Second Edition ....................................... June 1985

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HP 98624A
HP-IB Interface Card

Installation

The HP 98624A is an HP-IB Interface Card for HP 9000 Series 200 Computers. (HP-IB is Hewlett-Packard's implementation of IEEE 488-1978.) This note describes the procedure for installing the 98624A.

Installing Interface Cards in the Series 200 Backplane

The backplane of a Series 200 computer can contain from 2 to 16 card slots (depending on the model of computer). These card slots come in pairs; each cover plate on the back of the computer covers one such pair of slots. The lower slot of each pair can accept any Series 200 card (interface, memory, or DMA); the upper slot can accept only memory and DMA cards. Thus interface cards must be inserted into the lower slot of a pair.

To install an interface card in the Series 200 backplane, follow these instructions:

1. Set the switches on the card according to the instructions in the section on Configuring the Interface Card.

2. Turn the computer off.

3. Interface cards must go into any of the slots just below a pair of cover bolt holes. Remove the metal backplane cover one by one until you find an empty slot just below a pair of cover bolt holes.

4. The metal plate on the interface card takes the place of a backplane cover. A memory or DMA board may be installed in the slot above the interface card.

5. Slide the interface card into the slot, component side up, until it bottoms against the backplane connector board. Then tighten the thumbscrews until they are finger tight.

6. If there are no empty slots just below a cover bolt hole pair, you must rearrange the memory boards to accommodate the interface card. Remove any memory board in a slot below a bolt hole pair and re-install it in an empty slot above a bolt hole pair. It is not necessary to change the address of the memory board, as the computer CPU automatically finds the board at its new location.

7. If there are no empty slots, a memory board or interface card must be removed and left out if the new interface card is to be installed. If a RAM memory board is left out, make sure it has the lowest address.

8. Connect the computer to the desired peripheral using an appropriate cable.

9. Turn the computer and the peripheral on and operate according to the instructions in the appropriate operating manual. If problems are encountered, call the nearest HP Sales and Service Office.
Configuring the Interface Card

Figure 1 shows the location of all the configuring switches on the 98624A, in the default (factory set) configuration. In this configuration, the interface card "wakes up" as follows:

1. Not System Controller
2. Interrupt Level 3
3. Select Code 8
4. Primary Address 0

If the default configuration is acceptable, check to make sure that all the switches are set according to the diagram. If you wish to reconfigure the interface, refer to the accompanying drawing and the HP-IB section of your I/O Programming Manual.

NOTES:
2. Address Switches (1-ADRS-1) set for power-up primary HP-IB address of the card. If you want this card to perform the functions of the computer's internal HP-IB, we recommend that you set the address to 21 if the card is the system controller, or 20 if the card is not the system controller. The driver interprets an HP-IB address of 31 as an address of 0.
3. The board is not set for system controller.

Figure 1. Configuration Switch Diagram
Table 1. Interrupt Level Switch

<table>
<thead>
<tr>
<th>Interrupt Level</th>
<th>Switch Settings</th>
<th>1</th>
<th>0</th>
</tr>
</thead>
<tbody>
<tr>
<td>3</td>
<td>0</td>
<td>0</td>
<td></td>
</tr>
<tr>
<td>4</td>
<td>0</td>
<td></td>
<td>1</td>
</tr>
<tr>
<td>5</td>
<td>1</td>
<td></td>
<td>0</td>
</tr>
<tr>
<td>6</td>
<td>1</td>
<td></td>
<td>1</td>
</tr>
</tbody>
</table>

Figure 2. HP 98624A (HP-IB) Connector Diagram