2-In-1-Out / 1-In-2-Out
(Reversible)
ParaHub

AF-142/AF-241
User's Manual

Packing Checklist

- 1 AF-142/ AF-241
- 1 User's Manual
- 1 3.5" Floppy (for AF-142 only)

Please read this manual thoroughly and follow the installation procedures carefully to prevent any damage to the AF-142/AF-241 and/or the devices it connects to.

Introduction

AF-142 and AF-241, ParaHubs, are automatic and first-come-first-served data switches. They scan for print job requests from both computers and send data to the printer. When one computer is printing, the other computer can not send print job until the current one is finished. The File Transfer feature enables you to access the other computer directly through the ParaHub and requires no special cables. Besides, the AF-142 can operate as a 1-to-2 selector enabling you to connect the LPT port to two parallel devices.

Features

- Supports IEEE-1284 nibble mode.
- Transfers files between computers.
- Shares peripherals between computers.
- Selects ports by button and software code operation.
- Selectable timeout: 15 or 45 seconds.
- First-come-first-served.
- Non-power operation
- AF-142 extras:

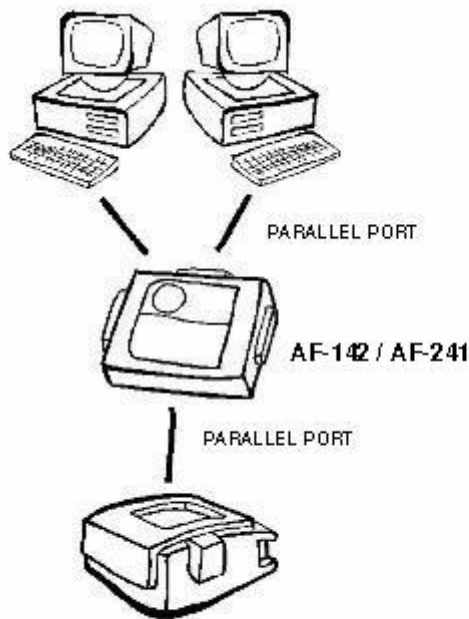- Reversible operation for 1-in-2-out or 2-in-1-out.
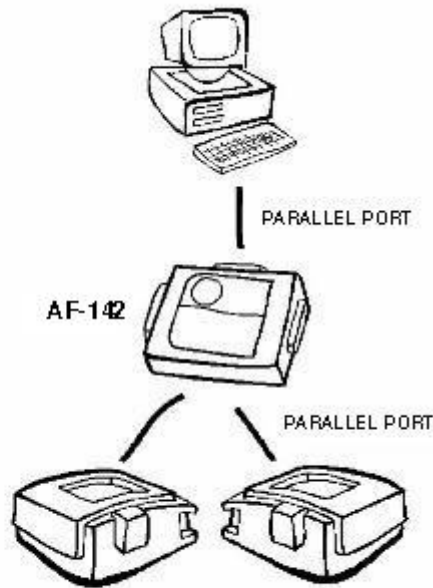- Supports broadcast mode.

fig.1 2-to-1 mode   fig. 2 1-to-2 mode

Installation

2-to-1 Mode (for AF-142 & AF-241)

1. Turn off all devices.
2. Connect the ParaHub to computers by two DB-25 straight-through male-to-male cables.
3. Connect the ParaHub to the printer by a DB-25 to C-36 male-to-male cable, as shown in fig. 1.
4. Set the slide switch, located on the side of the ParaHub, to 2 > 1 mode with a time out of either 15 or 45 seconds. (The AF-241 does not have a 1 > 2 mark).
5. Turn on your computers and the printer. The two LEDs should flash alternately as it is scanning for print jobs.
6. Power adapter is required when the ParaHub can not get enough power from devices and works intermittently.

1-to-2 Mode (for AF-142 only)

Never change the slide switch from **1 > 2** to **2 > 1**, or vice versa when connected devices are powered On.

1. Turn off all devices.
2. Connect the ParaHub to your computer by a DB-25 straight-through male-to-male cable.
3. Connect the ParaHub to parallel devices by cables with one DB-25 male connector and one appropriate connector for the parallel device, as shown in fig. 2.
4. Set the slide switch to 1 > 2 mode.
5. Turn on your computer and the parallel devices. The LED A turns on as port A is selected.
6. Power adapter is required when the ParaHub can not get enough power from connecting devices and works intermittently.

Operation

2-to-1 Mode (for AF-142 & AF-241)

Auto Mode:
The ParaHub scans for print jobs with two LEDs flashing alternately. When a print job is sensed, it locks onto the computer on a first-come-first-served basis until it finishes the job. Then, it returns to Auto mode again.

Manual Mode:
It allows only one computer to print. When the button is pressed, it cycles through the ports indicated by the LEDs as:

> *Port A* (LED A on) -> *Port B* (LED B on) -> *File Transfer* (both LEDs on) -> *Auto* (LEDs flash alternately) then to Port A again.

Button is not effective while printing or before timeout expires in order to prevent data loss.

⚠️ Most Parallel devices (ZIP Drives, etc.), can be shared. If it does not seem to work, set the timeout to 45 seconds.

File Transfer Mode:
When activated, files and peripherals of one computer can be accessed by the other and vice versa. With ParaHub, you can transfer files between computers by software as **Interlnk/Intersvr** of DOS, **LapLink** of Traveling software and **FastLynx** of Rupp corp. This mode can be activated or deactivated by button pressing, and can not be activated when timeout is 45 sec.

1-to-2 Mode (for AF-142 only)

You may select either port or broadcast to both ports (valid if both port A and B are connected to printers of the same model with bi-directional function disabled). Selected port is indicated by lighting its LED, and Broadcast mode is indicated by turning both LEDs on.

By Button:
The port selection cycles every time the button is pressed from *Port A* -> *Port B* -> *Broadcast* then to Port A again. Button is not effective while printing or before timeout expires in order to prevent data loss.

By Software:
You may use Hot keys under DOS or click on the **AF** icon under Windows to select ports.

Appendix

Specifications

Function	AF-142		AF-241
	1-2	2-1	2-1
Power Consumption	DC 9V 100mA (max.)		
Cable Length	6m [20ft] (max.)		
Connector-Input (Female)	1 DB-25	2 DB-25	
Connector-Output (Female)	2 DB-25	1 DB-25	

LEDs	2 Output Status	2 Input Status
I/P Port Selection	X	Auto/Manual
O/P Port Selection	Software/Manual	X
Timeout	X	15, 45 sec.
File Transfer	X	Yes
O/P Port Selection	Yes	X
Enclosure	Plastic	
Weight	150g	
Dimensions (LxWxH)	102 x 85 x 26 mm	

About the Software

The software allows you to select Port A, Port B or both ports as broadcast in 1-to-2 mode. Please read the READ.ME file in the floppy disk.

Series Products

AF-152, AF-251, AS-8144B, AS-8441B, AS-8154B, AS-8451B.

Troubleshooting

1. LED locks on a port when a cable is connected:
   - The ParaHub receives signal glitches and starts time-out counting. If the connecting printer is ready, just wait till the time-out expires.
   - The ParaHub is low on power, turn on one more device, or apply power adapter.

2. The printer status Windows shows "printer not responding" or "cable not connected" intermittently:
   - AF-142 and AF-241 do not emulate printer responses. Therefore, when status Windows poll for printer status at the same time, these messages show up.

3. Error messages show up while or after installing new printer drivers:
   - Un-install other bi-directional printer status Windows before installing a new one.
   - Press the button to lock your computer to the printer before installing a new printer driver.

Compatibility

The ParaHub is tested and is compatible with the following devices:

IOMEGA:	ZIP DRIVE, DITTO800, DITTO2000, DITTO3200
SEAGATE:	TSTORE3200E
SYQUEST:	EZFLYER
SONY:	STORSTATION
VIDEO CAPTURE:	GOCHA, GRABIT, SNAPPY
INTERNET PHONE SYSTEM:	SPECOM SUITE VISIONS
QUICKCAM:	DIGITAL CAMERA
SCANNER:	PAGEWIZ
MICROSOLUTION:	BACKPACK CDROM

LOGITEC:	AUDIOMAN, PARALLEL SOUND BLASTER
ADDONICS:	ADDONICS EXTERNAL CDROM

Preventing Radio & TV Interference

WARNING!!! This equipment generates, uses, and can radiate radio frequency energy and if not installed and used in accordance with the instruction manual, may cause interference to radio communications. It has been tested and found to comply with the limits for a Class A computing device pursuant to Subpart J of Part 15 of FCC Rules, which are designed to provide reasonable protection against such interference when operated in a commercial environment. Operation of this equipment in a residential area is likely to cause interference in which case the user at his own expense will be required to take whatever measures may be required to correct the interference.

Limited Warranty

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