

The Maximum PC Plug 'n' Connector Reference

A visual tour of your PC's ins and outs

Computers are so ubiquitous these days that it's only a matter of time before you see a FireWire 800 cable as a visual Daily Double on *Jeopardy!* Don't be the laughingstock of the country by blowing an easy one like

that on national television. Check out our guide to the most essential plugs and connectors in today's PCs, put on a nice suit, and hit the buzzer with confidence and pride.

40-pin IDE ribbon cable



80-pin IDE ribbon cable



IDE (integrated drive electronics)

The hoary standard for hard drives, Zip drives, and opticals
Bandwidth: Up to 133MB/s

Serial ATA

Next-gen connector for hard drives, and soon optical drives as well

Bandwidth: 150MB/s
Connector: 4-pin data cable



Serial (RS-232)

Medieval port used for modems and old handhelds

Bandwidth: 115.2Kb/s;
230.4Kb/s (high-speed)
Connector: DB9



5-pin powered mini cable



5-pin powered mini cable



4-pin powered mini cable



USB (universal serial bus), USB 1.1, USB 2.0

Bandwidth: 1.5Mb/s (USB 1.1), 12Mb/s (USB 1.1), 480Mb/s (USB 2.0)

6-pin powered cable



4-pin unpowered cable



FireWire (IEEE 1394a)

Standard for linking DV cameras and high-speed peripherals

Bandwidth: 400Mb/s

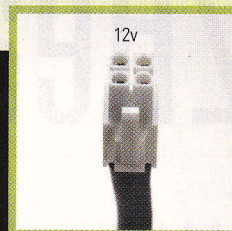
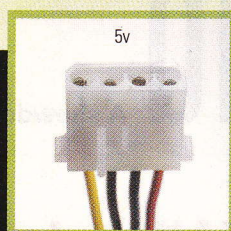
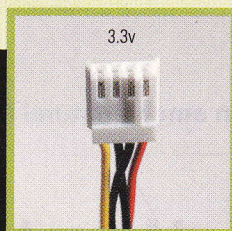
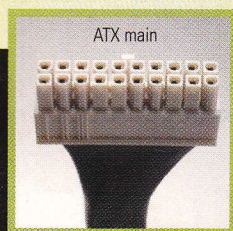
Note: External FireWire devices that use the small 4-pin unpowered jack will require a separate power source.

Parallel (IEEE 1284)

Once the standard for external peripherals and printers

Bandwidth: 2MB/s
Connector: DB25





Power Supply (3.3v, 5v, 12v)

Enables transition of PC and components from "off" state to "on" state



DVI (digital visual interface)

For connecting digital displays (LCDs)
Connector: 20-pin DVI-D or DVI-I cable



VGA (video graphics adapter)

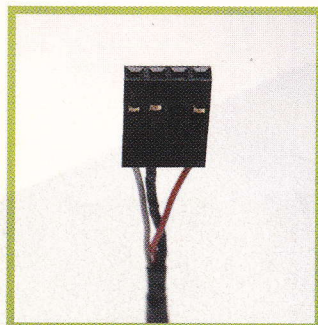
For connecting analog displays (CRTs)
Connector: DB15 15-pin VGA connector



FireWire 800 (IEEE 1394b)

Doubles the data rate of the original FireWire spec

Bandwidth: 800Mb/s
Connector: 9-pin cable



CD Audio/SPDIF (Sony/Philips digital interface)

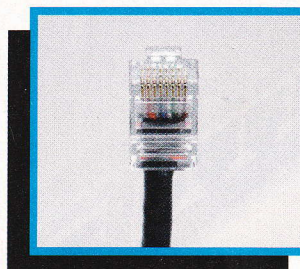
Obsolete connection for digital audio (replaced by digital audio through the parallel connection)
Connector: 2- or 4-pin cable



Floppy

Ye Olde Floppy Drive

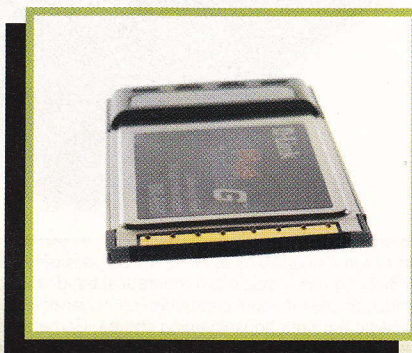
Bandwidth: Up to 1Mb/s
Connector: 34-pin ribbon cable



Ethernet

Tipper invented this networking protocol while AI was busy with the Internet

Bandwidth: 10Mb/s, up to 1Gb/s for Gigabit Ethernet
Connector: RJ45 connectors (that's telephone cables, folks)



CardBus

The 32-bit CardBus replaced the 16-bit PC Card (PCMCIA) bus for connecting peripherals to laptops

Bandwidth: 133MB/s
Connector: 68-pin connector

Note: Never try to force a CardBus peripheral into the slot; a difficult entry may mean the card is an older PC Card that has different power requirements than what your laptop may require. Check the documentation!