

The disk drive address lines DAO, DA1, and DA2 are connected to processor address lines A2, A3, and A4, respectively. This results in the following memory map.

A1000 Address	Addr on AT Address	Valid Data	Read Function	Write Function
\$0DD1020	-	D31	None	Mode Reg0 (reserved)
\$0DD1022	-	D31	None	Mode Reg1 (reserved)
\$0DD3020	-	D31	IDE int reg	None
\$0DD303A	3F6	8 bits	Alternate Status	Device Control
\$0DD303E	3F7	8 bits	Drive address	Not used
\$0DD2026	1F1	8 bits	Error Register	Features
\$0DD202A	1F2	8 bits	Sector Count	Sector Count
\$0DD202E	1F3	8 bits	Sector Number	Sector Number
\$0DD2032	1F4	8 bits	Cylinder Low	Cylinder Low
\$0DD2036	1F5	8 bits	Cylinder High	Cylinder High
\$0DD203A	1F6	8 bits	Drive/Head	Drive/Head
\$0DD203E	1F7	8 bits	Status	Command
\$0DD2020	1F0	16 bits	Data	Data

Locations \$0DD1020 and \$0DD1022 are reserved for the mode registers. These are currently not implemented. When implemented, they will allow faster transfer rates from hard drives that support such rates. Part of the ID of a drive is information that allows the driver to decide which 'mode' is the fastest the drive supports. Modes are defined as follows.

Mode Reg1	Mode R090	Mode Type	Maximum Transfer Rate
0	0	mode 0	3.3 MB/sec
0	1	mode 1	5.2 MB/sec
1	0	mode 2	8.3 MB/sec
1	1	Undefined	Undefined

As currently implemented, only mode 0 is available.

Location \$0DD3000 contains the IDE interrupt register. This register returns a value of 1 if an interrupt is pending from the IDE hard disk, and a value of 0 if an interrupt is not pending from this source. Writing to this register has no effect.

## Audio

Two external RCA jacks are provided for stereo audio output (pre-amp levels). As in the A3000, right and left channels are shorted together to provide combined monaural audio if only a single RCA plug is installed. Separate right and left stereo is provided when male RCA plugs are inserted into both of the RCA jacks.

External audio in is provided on pin 18 of the RS-232 DB25 connector. This audio is mixed into the right channel. Audio out is also provided on the DB25 connector on pin 11, which is sent from the left audio channel.

An internal connector on the PCB allows for additional Right and Left audio to be mixed in. This allows internal expansion devices (such as a DSP) to provide stereo audio as well.