SYM-1 I/O Board (Type T)

This board requires a female DB-25 connector be soldered onto the T pins of the SYM-1 (I recommend DigiKey part number 1173-125FEA-ND). If you would rather not solder on the connector, I also have a Type A I/O board that connects to the Application connector at the top of the SYM-1 with similar functionality. This I/O board provides a female DB-9 connector for RS-232 communication, a mono 3.5mm jack for cassette audio out, a mono 3.5mm jack for cassette audio in and a 2.5mm jack for cassette remote control.

## RS-232 over the DB-9 Connector

To use the DB-9 connector for RS-232 communication follow the directions sections 3.12 and 3.13 of the SYM-1 manual.

## Cassette Audio In

Connect a 3.5mm mono cable between the audio out (EAR) of your cassette player to the jack labeled P4 on the I/O board. A stereo cable can be used but cassette audio will only be used from one channel.

## Cassette Audio Out

First, we need to set the HI/LO jumper labelled J3 on the I/O board. Most of the time LOW is sufficient for proper operation. To put the audio out into LO mode jumper pins 3-4 on J3. Pins 1-2 are identified by the white dot to the right of the jumper pins. If needed, you can put the audio out in HI mode by jumpering pins 1-2 of J3. Once properly jumpered connect a 3.5mm mono cable between the audio in (MIC) of your cassette player to the jack labeled P5 on the I/O board. Again, a stereo cable can be used but the audio will only be outputted on one channel.

## Cassette Remote Control

First, we need to set the proper jumpers for your cassette deck. Section 3.8 of the SYM-1 manual describes how to determine which pins the remote-control jack of your cassette deck need to be used for proper operation. The following table describes the jumpers (pins 1-2 are marked by a white dot to the right of the jumper pins):

|  |  |
| --- | --- |
| **Jumper Label** | **Description** |
| J1 | Determines to which SYM-1 pin the remote-control sleeve is connected.  Pins 1-2 = T-14, 3-4 = T-15, 5-6 = T-16 and 7-8 = T-17 |
| J2 | Determines to which SYM-1 pin the remote-control tip is connected.  Pins 1-2 = T-14, 3-4 = T-15, 5-6 = T-16 and 7-8 = T-17 |
| J4 | Connects T-8 and T-17 for cassette deck types V through VIII. |

If you have any questions or concerns do not hesitate to reach out to [zoggins@retro-spy.com](mailto:zoggins@retro-spy.com) or join the RetroSpy discord at <https://discord.gg/CDQEhmr>.