

Serial Port Use

The default is for this to be off. You can configure a serial (or printer) port to send out (or to receive) serial port messages.

If this option is turned on, then for each part of every trial, an integer char (a single byte) can be sent out the specified port. Note that the integer zero ("0") is provided to send no character whereas all other integers will send signals. The input from the serial port can be used to trigger the end of the stimulus event (and all trial stages in Pause trial types). Whether or not a device is attached to the serial port, **MacStim** will send a signal each time a trial event changes if the port status has been set to on.

You can configure the port characteristics (ie alter them from the default of: 9600 baud, 1 stop bit, no parity, 8 data bits) using the **Preferences...** menu item of the **File** menu, choose the **Serial Setup** under the top popup menu, and then selecting new options from the pop-up menus. Click **OK** to institute your new settings. Note that the **Port Status** popup must be set to **On** for **MacStim** to use any serial port. When this is set to on, you can click the Test button below it to see if your configuration will work with your equipment (you don't need to have any thing attached to the modem or printer ports to do the test). The test just tries to initialize and then closes the specified ports and does **EXTENSIVE** error checking! The ports will not be activated until you start your experiments. You should consider turning any built in modems off when using this option (eg the internal modems in PowerBooks). Using the printer port should overcome this difficulty if you want to leave your modem software installed and active. Note that I haven't tried all possible configurations (possibly yours!) and so if you have errors write down the error numbers and call us.

The **Serial Messages...** menu item, also under the **Preferences...** menu shows the preset default integer values to be sent for each event in the trial design, and you can alter them according to your needs. These settings will only be remembered in future sessions if you save them with the current script. You can specify which characters are to be triggers of the three main stages of a trial, or use 0 to mean that any serially delivered character is an acceptable trigger.