BARRIER AUDIO BOARD ASSEMBLY

The Barrier audio circuit generates three sounds: Triangle move, Diamond move, and explosion. All three signals are summed at the audio amplifier input U6. Volume control is set by potentiometer R29. Speaker output is pin 2 by the 9 pin molex connector.

Three voltages are supplied to the audio board via the 9 pin molex connector. Voltage regulators U4 and U7 supply the regulated ± 15 volts to the circuit from the ± 25 volt power supply outputs on pins 4 and 6 respectively while the ± 5 is found on pin 5 and ground on pin 7.

Three signals from the logic each generate a single sound. The noise generator comprised of Q1, Q2, and U1 is free running and its output is gated by the logic and shaped by the audio circuits for each sound.

A. Triangle Move. (BLIP)

A 26 ms pulse by the logic on pin 12 of the 16 pin ribbon connector will turn off Q3 enabling the output of U3 to be summed at the input of the audio amplifier U6

B. Diamond Move (BUMP)

A 235 ms pulse on pin 13 of the 16 pin ribbon connector close the analog switch U5 enabling the output of U8 to be I summed at the input of the audio amplifier U6

C. Explosion

A 78 ms pulse on pin 11 of the 16 pin ribbon connector will charge C18 and turn off Q6 enabling the explosion shaping circuits output at U9 to be enabled until turned off by Q6