



Tone / Noise Generator (Model No. A69-20)

The Tone / Noise Generator is a self-contained tone and white noise source with an integral power amplifier to drive a speaker. It has a universal 5 to 30 Volt control input so that it may be operated by Habitest Lincs, LabLinc V modules, or Tru Scan Lincs. You may manually select noise or one of 30 tone frequencies to be presented either manually or by program control.

At the upper end of the available spectrum you must use a high quality tweeter to deliver the stimulus. The unit may be manually operated momentarily by pressing the stimulus-gating switch down, or indefinitely by placing it in the up position. When the switch is in the center position, the unit is gated on by a signal to the universal control input on the back of the case. The unit is powered by a wall-mount power supply that is supplied with the product.

FRONT PANEL CONTROLS

Frequency

Tone frequency is set by selecting one of 15 frequencies on the rotary selector switch. A range switch selects either one or ten times the set frequency. The 16th position on the switch is the white noise selection. Available frequencies range above human hearing to 30KHz.

Attenuation

The attenuation rotary switch has 10 positions and is scaled in dB relative to the maximum output. The tenth switch position is full scale or 0dB, with the other nine positions in descending order being -1, -2, -4, -6, -9, -12, -15, -18, and -21. These attenuation levels are valid for either tone or noise.

Gating

The Gating control is a three-position toggle switch. The three positions are CONSTANT, REMOTE and MOMENTARY. In the CONSTANT position, the stimulus is constantly on at the output. The MOMENTARY position activates connects the signal to the output as long as the switch is held down. The REMOTE position allows for the gating to be controlled with the two remote operate jacks on the rear panel. See REMOTE OPERATE. The remote operate and gating toggle switch operate independently of one another so that either will work at any time.

REAR PANEL

Power Switch

The power switch is a two-position rocker switch. A power on LED is located on the front panel to indicate the switch position.

Power Jack

The power in jack is a 2.1mm DC power jack for a wall mount or tabletop supply providing 24 VDC and at least 400mA with center positive.

Remote Operate

The pair of remote operate jacks take a remote operate signal between 5 and 30 VDC with the upper jack being the positive potential.

AUDIO OUT

The AUDIO OUT jack is an RCA phono jack that will deliver approximately 2.5 W of RMS power into 8W of impedance.

Specifications

Selectable Frequency Settings:

X 1 Range: 200, 400, 600, 800, 1000, 1200, 1400, 1600, 1800, 2000, 2200, 2400, 2600, 2800, 3000 Hz
X 10 Range: 2000, 4000, 6000, 8000, 10000, 12000, 14000, 16000, 18000, 20000, 22000, 24000, 26000, 28000, 30000 Hz

Frequency Accuracy: 5%

Amplitude Stability: 0.5 dB

Distortion: 0.5%

Noise: 10 Hz to 20 KHz

Selectable Attenuation Settings: 0, -1, -2, -4, -6, -9, -12, -15, -18, -21 dB

Operate:

Manual: Switch Selectable (Constant and Momentary)

Remote: 5 to 30 Volts DC;

.080 Sockets

Rise/Fall time: 80mS +/- 10%

Audio Output:

Amplitude: 2.5 Watt (RMS) into 8 ohms

RCA Phono Socket

Power Requirements: 400 mA @ 24 Volts DC