

BASH™ 300 Watt Digital Subwoofer Amplifier

The BASH 300 watt digital subwoofer amplifier is a high-performance amplifier module that is designed to offer high power output and excellent efficiency. Thanks to its patented digital architecture, it can produce as much power as a traditional class AB amplifier, without the bulk, weight, and excess wasted heat.

Connections and Controls

On/Auto/Standby Switch	Set to Auto to allow the amplifier to automatically turn on and off as a signal is sensed. Set to On for "always on" mode. Set to Standby for standby mode
Phase Switch	0° or 180° selectable, 0° is normal phase, 180° will reverse the polarity of the subwoofer output
Volume Control	Adjusts the output level of the amplifier
Freq	Sets the low-pass crossover frequency, adjustable from 50 to 150 Hz
Line Level Inputs	For connection to a full-range stereo line level signal, use the left and right line level inputs the on-board low-pass crossover will be in effect. For connection to the subwoofer out on a home theater receiver, use either the LFE input to bypass the internal crossover or the Left or Right input for additional crossover flexibility
Hi Level Inputs	Allows the connection of the amplifier to a speaker level output from a stereo amplifier or receiver
AC Mains Input	Fused IEC input with 3 amp 250V GMA-style fast blow fuse; accepts standard male IEC cord
On/Off Switch	Turns master power on and off

Modifying Bass Boost

1. Locate R26 and R25 on the pre-amp board, the default values are R26=30K and R25=120K. R26 and R25 are located on the small vertical PC board adjacent to the phase reversal switch.
2. Remove the existing resistors by using a low wattage soldering iron and desoldering braid. Be careful not to apply too much heat to the PC board traces.
3. Using the charts below, determine the proper resistor values to achieve the desired boost. New resistors can be any wattage 1/4 watt or greater, but 1/4 watt will physically fit best. Note: values are in k Ohms.
4. Install the new resistors and solder in place making sure you put the correct resistor in the proper component location.

1dB of Bass Boost				
Boost Freq. (Hz)	R26 (k Ohms)	R25 (k Ohms)	Filter Fc (Hz)	Filter Q
20-24 Hz	39	150	13.9	1.0
25-30 Hz	30	120	17.7	1.0
31-35 Hz	27	100	20.4	1.0
36-40 Hz	18	75	28.9	1.0

2dB of Bass Boost				
Boost Freq. (Hz)	R26 (k Ohms)	R25 (k Ohms)	Filter Fc (Hz)	Filter Q
20-24 Hz	33	150	15.1	1.1
25-30 Hz	22	120	20.7	1.2
31-35 Hz	18	100	25.0	1.2
36-40 Hz	15	75	31.6	1.1

3dB of Bass Boost				
Boost Freq. (Hz)	R26 (k Ohms)	R25 (k Ohms)	Filter Fc (Hz)	Filter Q
20-24 Hz	22	150	18.5	1.3
25-30 Hz	18	120	22.8	1.3
31-35 Hz	15	100	27.4	1.3
36-40 Hz	12	75	35.4	1.3

4dB of Bass Boost				
Boost Freq. (Hz)	R26 (k Ohms)	R25 (k Ohms)	Filter Fc (Hz)	Filter Q
20-24 Hz	18	180	18.6	1.6
25-30 Hz	15	150	22.4	1.6
31-35 Hz	12	120	28.0	1.6
36-40 Hz	10	100	33.6	1.6

5dB of Bass Boost				
Boost Freq. (Hz)	R26 (k Ohms)	R25 (k Ohms)	Filter Fc (Hz)	Filter Q
20-24 Hz	15	220	18.5	1.9
25-30 Hz	13	180	21.9	1.9
31-35 Hz	12	150	25.0	1.8
36-40 Hz	9.1	120	32.1	1.8