

**SAFETY INFORMATION**

Loudspeakers can be checked and stamped according to BGV C1 by official departments. For more information contact TW AUDIO at info@twaudio.com or +49 (0) 71 41 - 48 89 89 0

**GENERAL**

The M12 loudspeaker is assymetrical design, with left and right enclosure versions, equipped with one 12" drivers and one HF 1,4" driver with 75 x 50 dispersion rotatable horn.

M12 as default is available in black colour and warnex structure paint coating. All RAL colours for new enclosures are possible upon request.

The M12 product is equipped with passive crossover optimized for group delay as well as frequency response.

The M12 can be used with 2 or 4 wires speaker cables. The connection to the M12 is done via the PIN 1+/- (Fig 4.). PIN2 is hardwired in NL4 sockets for easy forwarding the signals (for example: signal for subwoofer).

The M12 is designed to be powered by any professional amplifier available on the market. TW AUDIO recommends the Powersoft K3DSP AESOP or LAB PLM as a system amplifiers. As an external controller for other amps it's recommended to use the LAKE LM26 or LM44. TW AUDIO offers loudspeaker presets for 3 platforms: K-DSP and M-HDSP series from Powersoft and for Lake Controller. If you are using these platforms, always be aware to have the correct preset loaded on your system amplifier before connecting the loudspeaker.

**COMBINATION WITH OTHER PRODUCTS**

M12 can be combined with any TW AUDIO subwoofers products. All the loudspeakers are phase coherent in common frequency range. For this case load M12 presets into one of mentioned amplifier system.

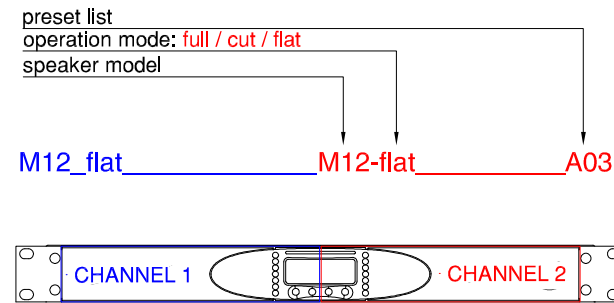
Please see system examples papers on www.twaudio.com for system combinations and setup examples.

**ACCESSORIES**

M12 can be flown (SBM12, DHST), mounted on speaker stand directly using pole hole available on enclosure or on speaker stand using SBM12 and HSF. Air cargo rigging tracks allow to use SBM12 without any tools. Simply click into place.

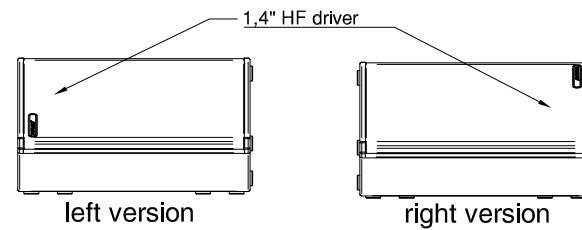
If you have any further questions about your product don't hesitate to contact TW AUDIO on support@twaudio.com or by phone +49 (0) 71 41 - 48 89 89 55

FIG 1. PRESETS / REFERED TO K-SERIES PRESETLIST A03



PRESET NAME	
CHANNEL 1	CHANNEL 2
B15-PASSIVE+M12	B15-PASSIVE+M12_A03
BS15-ACTIVE	M12-cut_A03
BS18	M12-cut_A03
BS30	M12-cut_A03
M12_flat	M12-flat_A03

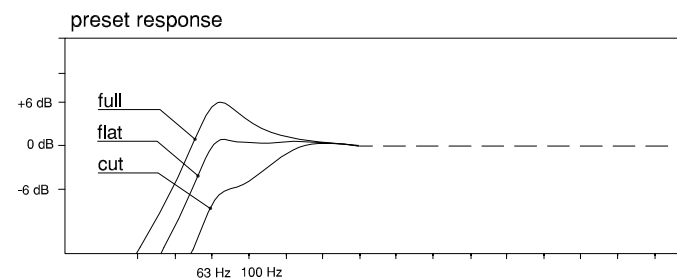
FIG 2. Enclosures variants.



last digit on serial number tells about enclosure version:

- odd digit - left version
- even digit - right version

FIG 3. FULL / FLAT / CUT



M12		
Frequency range	[Hz]	60 - 19 000
Power pgm/peak	[W]	700 / 1400
Impedance	[Ohm]	8
Dispersion		75 x 50, rotatable horn
Sensitivity	[dB]	101
max SPL	[dB]	133
Dimensions	[mm]	604 x 350 x 314
Weight	[kg]	20,5

FIG 4. INTERNAL WIRING DIAGRAM

M12

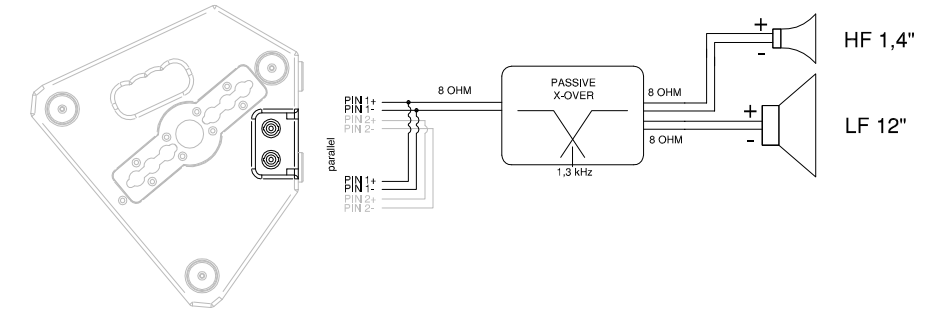
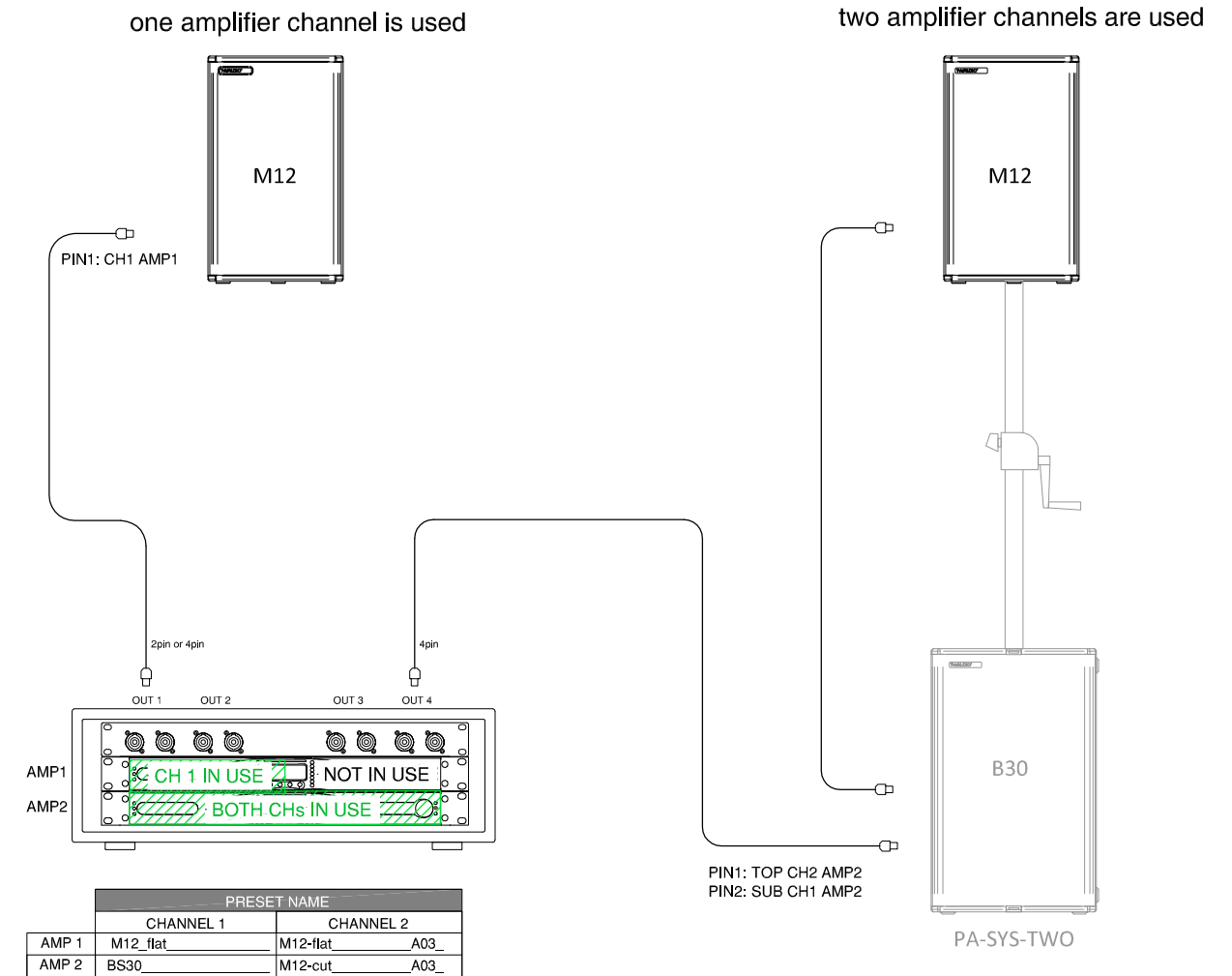


FIG 5. M12 - CONNECTION TO THE AMPLIFIER



For standalone use:  
for first amplifier use OUT 1 or/and OUT 2 depends amplifier channel in use.

For combination with subwoofers  
TW AUDIO presets are designed that first channel drives LF loudspeaker/ drivers while second amplifier channel M/HF source. For this combination always use OUT2 for first amplifier and OUT4 for second amplifier.

It is possible to connect more than one M12 to one K3DSP output.  
- for long term high SPL requirements drive only 2 boxes on one POWERSOFT K3DSP (4 OHM operation)  
- for lower SPL requirements, it is possible to drive up to 3-4 boxes on POWERSOFT K3DSP(2/2,6 OHM operation)