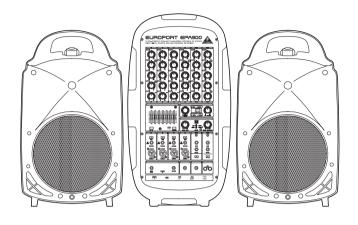
# **SERVICE MANUAL**



# **EUROPORT EPA900**

Ultra-Compact 900-Watt 8-Channel Portable PA System with Digital Effects and FBQ Feedback Detection

# Thank you

Thank you for purchasing the EUROPORT EPA900. The EPA900 is a portable, ultra-compact powered mixer/loudspeaker combination with enormous power, unbelievable sound, and an extremely low weight. The mixer unit has 8 input channels (4 mono and 2 stereo channels), an internal 24-bit studioquality effects processor, and a 7-band graphic equalizer with FBQ feedback detection. All channels have ultra-high precision 2-band EQs and CLIP LEDs for total control. At 900 Watts, the high-performance power amp is properly sized, and with the 2 supplied loudspeakers a microphone, including cable, you can get going right away!

With the EPA900, you can quickly and easily master any sound situation.

We at BEHRINGER hope you enjoy your new acquisition.

This manual is available in English, German, French, Spanish, Italian, Russian, Polish, Dutch, Finnish, Swedish, Danish, Portugese, Greek, Japanese and Chinese. There may also be more current versions of this document. Download them by going to the appropriate product page at:

# www.behringer.com

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2

# **Important Safety Instructions**





To reduce the risk of electric shock, do not remove the top cover (or the rear section). No user serviceable parts inside; refer servicing to qualified personnel.



To reduce the risk of fire or electric shock, do not expose this appliance to rain and moisture. The apparatus shall not be exposed to dripping or splashing liquids and no objects filled with liquids, such as vases, shall be placed on the apparatus.



This symbol, wherever it appears, alerts you to the presence of uninsulated dangerous voltage inside the enclosure voltage that may be sufficient to constitute a risk of shock.



This symbol, wherever it appears, alerts you to important operating and maintenance instructions in the accompanying literature. Please read the manual.



- 1 Read these instructions.
- 2 Keep these instructions.
- 3 Heed all warnings.
- 4 Follow all instructions.
- 5 Do not use this apparatus near water.
- 6 Clean only with dry cloth.
- Do not block any ventilation openings. Install in accordance with the manufacturer's instructions.
- B Do not install near any heat sources such as radiators, heat registers, stoves, or other apparatus (including amplifiers) that produce heat.
- Do not defeat the safety purpose of the polarized or grounding-type plug. A polarized plug has two blades with one wider than the other. A grounding type plug has two blades and a third grounding prong. The wide blade or the third prong are provided for your safety. If the provided plug does not fit into your outlet, consult an electrician for replacement of the obsolete outlet.
- 10 Protect the power cord from being walked on or pinched particularly at plugs, convenience receptacles, and the point where they exit from the apparatus.
- 11 Only use attachments/accessories specified by the manufacturer.
- 12 Use only with the cart, stand, tripod, bracket, or table specified by the manufacturer, or sold with the apparatus. When a cart is used, use caution when moving the cart/apparatus combination to avoid injury from tip-over.



- 13 Unplug this apparatus during lightning storms or when unused for long periods of time.
- 14 Refer all servicing to qualified service personnel. Servicing is required when the apparatus has been damaged in any way, such as power supply cord or plug is damaged, liquid has been spilled or objects have fallen into the apparatus, the apparatus has been exposed to rain or moisture, does not operate normally, or has been dropped.
- 15
   CAUTION These service instructions are for use by qualified service personnel only. To reduce the risk of electric shock do not perform any servicing other than that contained in the operation instructions.
- 16 The apparatus shall be connected to a MAINS socket outlet with a protective earthing connection.
- 17 Where the MAINS plug or an appliance coupler is used as the disconnect device, the disconnect device shall remain readily operable.

# 1. Before You Get Started

### 1.1 Shipment

Your EPA900 was carefully packed at the factory, and the packaging was designed to protect the unit from rough handling. Nevertheless, we recommend that you carefully examine the packaging and its contents for any signs of physical damage that may have occurred during transit.

- ♦ If the unit is damaged, please do NOT return it to BEHRINGER. Instead, notify your dealer and the shipping company immediately. Otherwise, claims for damage or replacement may not be honored.
- Always use the original packing carton to prevent damage during storage or transport.
- Make sure that no children are left unsupervised with the unit or its packaging.
- Please ensure proper disposal of all packing materials.

### **1.2 Initial operation**

Be sure that there is enough space around the unit for cooling. To avoid overheating, please do not place the EPA900 near radiators and other equipment emanating heat.

♦ Blown fuses must be replaced by fuses of the same type and rating! Please refer to the "TECHNICAL SPECIFICATIONS" section for the correct rating. To avoid an electric shock, turn off and unplug the unit before replacing the fuse. For more information, please see Chapter 3.8 and Figure 3.9.

The mains connection is made using the enclosed power cord and a standard IEC receptacle. It meets all of the international safety certification requirements.

- ♦ Before connecting the unit to the mains, please check that it is set to the correct supply voltage.
- ♦ You have to use another fuse if you set the unit to another supply voltage. The correct value is specified in Chapter "TECHNICAL SPECIFICATIONS".
- ♦ Please make sure that all units have a proper ground connection. For your own safety, never remove or disable the ground conductor from the unit or of the AC power cord. The unit shall always be connected to the mains socket outlet with a protective earthing connection.
- ♦ Please ensure that only qualified people install and operate the mixing console. During installation and operation, the user must have sufficient electrical contact to earth, otherwise electrostatic discharges might affect the operation of the unit.
- ♦ The sound quality may diminish within the range of powerful broadcasting stations and high-frequency sources. Increase the distance between the transmitter and the device and use shielded cables for all connections.

### 1.3 Online registration

Please do remember to register your new BEHRINGER equipment right after your purchase by visiting www.behringer.com (alternatively www.behringer.de) and kindly read the terms and conditions of our warranty carefully.

Should your BEHRINGER product malfunction, our goal is to have it repaired as quickly as possible. To arrange for warranty service, please contact the retailer from whom the equipment was purchased. Should your BEHRINGER dealer not be located in your vicinity, you may directly contact one of our subsidiaries. Corresponding contact information is included in the original equipment packaging (Global Contact Information/European Contact Information). Should your country not be listed, please contact the distributor nearest you. A list of distributors can be found in the support area of our website (www.behringer.com/ support).

Registering your purchase and equipment with us helps us process your repair claims quicker and more efficiently.

Thank you for your cooperation!

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# 2. Installation

The EPA900 mobile PA system consists of two loudspeakers and a powered mixer that easily join into a portable, wheeled unit for easy transportation. In the following sections, you will find out how to set up and start up the PA system.

### 2.1 Setup Preparations

Follow the instructions to ensure straightforward and reliable operation of the EPA900.

- 1. Open the upper latch.
- 2. Open the latches on the sides of the PA unit by pressing and then lifting them.
- 3. With one hand, grab hold of the recessed handle above the latch on the side of the loudspeaker and hold the upper handle with the other hand. Then, carefully remove the loudspeaker sideways from the mixer.

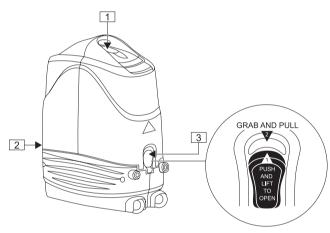


Fig. 2.1: EPA900 setup

- Be careful to prevent the loudspeaker from accidentally falling on your foot.
- 4. Repeat Step 3 for the second loudspeaker.
- 5. Place the mixer in an upright position.
- ♦ To assemble the PA unit for transportation, perform the steps in the reverse order.

### 2.2 Setup

- 1. Separate the three pieces of the PA unit as described in Chapter 2.1.
- 2. Place the mixing console and loudspeakers in the required positions in the venue.
- ♦ Use of the optional loudspeaker stands ensures a wider, more even dispersion of sound.
- 3. Using the supplied cables, connect the loudspeakers to the rear loudspeaker outputs.

# Caution

ONLY connect the EPA900's loudspeakers, never other equipment, via the rear loudspeaker connectors. Otherwise, your equipment could get damaged.

- 4. Connect instruments, microphones, and additional equipment via the remaining connectors on the mixer (see Chapter 4).
- 5. If you have an active subwoofer available (not included), connect it to the SUB OUT socket.
- 6. Ensure that the two volume control knobs in the MAIN LEVEL CONTROL have been turned counterclockwise as far as possible.
- 7. Use the IEC power cord to connect the mixer's power inlet to an AC outlet.
- 8. Turn on the mixer.
- 9. Make the desired settings.

# Caution

We would like to point out that high volume levels could damage your hearing. Always make sure that the appropriate volume is set.

## 3. Control Elements and Connections

The EPA900 mixer is equipped with 4 mono and 2 stereo inputs and an additional AUX input. The input signals are internally distributed to a stereo bus. It is also possible to use its channels separately (mono), such as when used for FOH/PA and stage. Depending on the requirements, one stereo or two independent mono sounds can be run. An internal effect can be used as an AUX effect from each channel. The 7-band graphic equalizer is used to process the stereo bus or the two mono paths.

### 3.1 Mono Channels (1-4)

Channels 1-4 are designed as mono channels and are used to connect microphones or mono line-level sources. The connectors are balanced to ensure high interference resistance. If possible, you should use balanced cable connectors to profit from the advantages of this type of connection.

### 3.1.1 Microphone/Line Inputs

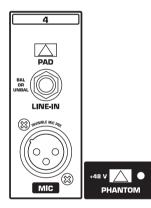


Fig. 3.1: Mono channel connectors

#### MIC

You can connect either dynamic microphones or condenser microphones to the MIC connector using XLR plugs.

#### LINE IN

Via the LINE IN connector, you can connect instruments (e.g., keyboards, electric guitars) or other line-level sources (e.g., CD player, external

mixers, notebook sound card). The  $\frac{1}{4}$ " jack accepts both balanced and unbalanced connectors.

#### PAD

With the PAD switch, you can weaken loud input signals by 20 dB. Use this function if the CLIP LED is lit up and the level cannot be reduced any further using the LEVEL control.

#### PHANTOM

With the PHANTOM switch, you can activate the phantom power supply for all microphone channels. Use the supply for condenser microphones.

### 3.2 Stereo Channels (5/6-7/8)

Channels 5/6-7/8 are designed as stereo channels and are used to connect stereo line-level sources.

### 3.2.1 Line Inputs

#### LEFT (L) / RIGHT (R)

Via these connectors, you can connect stereo line-level sources (e.g., keyboard, CD player, external mixers, notebook sound card). Either the cinch jacks or the ¼" jacks can be used, but not both at the same time.

#### **VOICE CANCELLER (CHANNEL 7/8)**

The VOICE CANCELLER function enables voice to be filtered out of stereo signals. This function is useful for karaoke applications with a player (CD/MP3 player, etc.).

Fig. 3.2: Stereo channel connectors

### 3.3 Channel Strips

Each channel strip is equipped with an equalizer section, an effects control, and one control each for signal routing and volume control.

#### TREBLE/BASS

The equalizer section comprises these two controls. With the TREBLE control, you can modify the high frequencies, and with the BASS control the low frequencies. Rotate the control knob:

- clockwise to boost the frequency range by max. 15 dB.
- counterclockwise to cut the frequency range by max. 15 dB.
- ♦ If you use the equalizer section to boost frequencies, the signal level of the channel increases. If the CLIP LED lights up, you need to reduce the level using the corresponding LEVEL control.

#### EFFECTS

With the EFFECTS control, you can specify the portion of the channel signal to be routed to the effects unit. The further clockwise you turn the control knob, the greater the effect that is applied to the signal. Turning the knob counterclockwise as far as possible results in a signal with no effects.

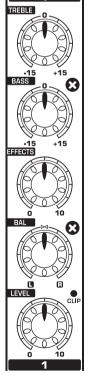
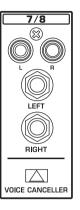


Fig. 3.3: Channel strip for a mono channel

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#### BAL

6

Use the BAL control of the mono channels to adjust the position of the signal within the stereo image (left/right) or for both mono paths. Turn the control:

- completely to the left to hear the signal only on the left side, that is the LEFT/MAIN path.
- completely to the right to hear the signal only on the right side, that is the RIGHT/MAIN path.

Positions between these settings will result in a proportionate signal allocation between LEFT/MAIN and RIGHT/MAIN. The BAL control determines the levels of a stereo source's left and right input signals in relation to each other. Turn the control:

- completely to the left to hear only the left signal component of the stereo source on the LEFT/MAIN path.
- completely to the right to hear only the right signal component of the stereo source on the RIGHT/MAIN path.

Positions between these settings will result in a proportionate signal allocation of the left/right signal component between LEFT/MAIN and RIGHT/MAIN.

#### CLIP

When lit up, the CLIP LED indicates that the corresponding channel is being overdriven. If this LED lights up regularly, you need to reduce the level of the respective channel using the LEVEL control and/or the PAD switch.

#### LEVEL

The LEVEL control is used to set the volume of the channel signal. If the CLIP LED is lit up, the level has to be reduced using this control.

### 3.4 Additional Connections

The EPA900 is equipped with additional inputs and outputs as well as a footswitch connector.

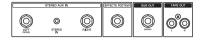


Fig. 3.4: Connectors for additional devices

#### **STEREO AUX IN**

The STEREO AUX IN sockets are designed as separate ¼" jacks and as a stereo minijack. You can connect additional devices with adjustable line levels (e.g., other mixers, MD player) here. The signal is sent directly to the output busses, with no further adjustment possible. Use either the minijack or the two ¼" jacks, not both types at the same time. For mono sources, use the LEFT connector.

#### **EFFECTS FOOTSW**

The EFFECTS FOOTSW socket is used to connect a footswitch. You can switch the effect on and off with the foot switch.

#### SUB OUT

You can connect an active subwoofer to the SUB OUT socket.

#### **TAPE OUT**

You can connect a 2-track recorder (DAT, MD, etc.) to the TAPE OUT sockets. The two TAPE OUTs carry the output bus signals.

#### **SPEAKER OUTPUTS**

The SPEAKER OUTPUTS connectors on the back of the unit are used to connect the supplied loudspeakers.

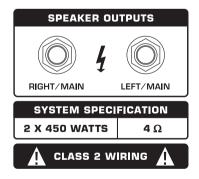


Fig. 3.5: Powered connectors for passive loudspeakers



The outputs are powered outputs, which put out a strong, amplified signal (not a low-level LINE signal!). For this reason, only PASSIVE loudspeaker systems can be connected. Other devices could get damaged.

- If loudspeakers with an impedance of 4  $\Omega$  are used, the two outputs have a maximum power of 900 W.
- If loudspeakers with an impedance of 8  $\Omega$  are used, the two outputs have a maximum power of 800 W.

### 3.5 Graphic Equalizer

The EPA900 is equipped with a 7-band graphic equalizer, which enables you to adapt the sound to the room conditions and your own ideas for the sound. The equalizer always processes the LEFT/MAIN and RIGHT/MAIN bus equally.

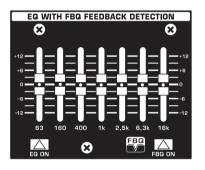


Fig. 3.6: Graphic equalizer section

#### EQ ON

You can activate the equalizer using the EQ ON switch.

#### **FBQ ON**

Using the FBQ ON switch, you can activate the feedback detection circuit. This function only has an effect if the equalizer is active. For every frequency that causes feedback, the corresponding LED on a slide control lights up. Lowering the displayed frequency minimizes feedback.

### 3.6 Effects Unit

The EPA900 is equipped with an internal stereo effects processor, which offers 100 different standard effects, including reverb, chorus, flanger, and echo, as well as various multieffects. It is permanently integrated into the mixer as a Send/Return effect; i.e., an adjustable signal portion can be routed to the effects unit from every input channel. The selected effect is applied to the signal portions of the channels, and the signals are then mixed with the direct signals via the stereo bus.

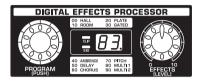


Fig. 3.7: Internal 24-bit multieffects unit

#### CLIP/SIG

The CLIP and SIG LEDs provide information on the signal level on the effects unit.

- When continuously lit up, the CLIP LED indicates a signal overdrive. In this case, the effects unit input level should be reduced through lowering of the Send level using the EFFECTS controls for the input channels.
- The SIG LED signalizes that the effects processor is receiving a signal and is working. If the LED is not lit up, the input signal is too weak.

#### **PROGRAM (PUSH)**

You can turn the PROGRAM control knob to select an effects preset. Then press the knob to activate the selected effect.

#### **EFFECTS (LEVEL)**

The EFFECTS (LEVEL) control is used to adjust the effects signal volume.

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### 3.7 Main Power Section

The operating volume of the sound system is set via the main power section (MAIN LEVEL CONTROL).

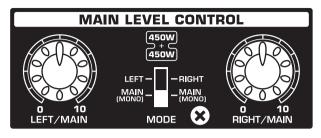


Fig. 3.8: Control elements in the main power section

#### LEFT/MAIN AND RIGHT/MAIN

The two controls are used to adjust the volume of the corresponding loudspeaker outputs.

#### MODE

With the MODE switch, the power amplifier section can be switched to stereo or mono mode. Depending on the setting, the limiter, which provides overdrive protection for the system, works in coupled stereo or independent mono mode.

♦ Always remember to set the switch according to the given application to avoid incorrect limiter behavior!

### 3.8 Power Supply and Serial Number

#### **FUSE HOLDER/IEC SOCKET**

Connection to an AC power supply is made via an IEC socket. It complies with applicable safety regulations. A suitable AC power cord is included. Replace the fuse with a fuse of the same type.

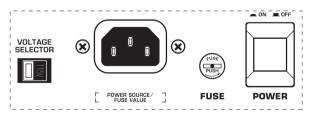


Fig. 3.9: Power supply and fuse

♦ To avoid an electric shock, turn off and unplug the unit before replacing the fuse.

#### **POWER SWITCH**

Use the POWER switch to start up the unit. The POWER switch should be in the "Off" position when you connect the unit to the AC power supply.

To disconnect the unit from the power supply, pull out the power plug. When starting up the unit, ensure that the power plug is easily accessible. Please note: Switching the POWER switch off does not completely disconnect the unit from the power supply. For this reason, you should unplug the power cord if the unit is not going to be used for a long period of time.

#### **VOLTAGE SELECTOR**

The VOLTAGE SELECTOR switch lets you set the correct operating voltage.

- ♦ Before connecting the unit to the mains, please check that it is set to the correct supply voltage.
- ♦ You have to use another fuse if you set the unit to another supply voltage. The correct value is specified in Chapter "TECHNICAL SPECIFICATIONS".

#### SERIAL NUMBER

The serial number can be found on the back of the mixer. It is needed for online registration.

# 4. Applications

The EPA900 can be used for simple sound tasks, e.g., amplification of the presenter's voice, playback sound, or karaoke applications, as well as for demanding tasks such as band amplification or stage monitor sound. A typical example of use as a sound system for music with live instruments and players is given below.

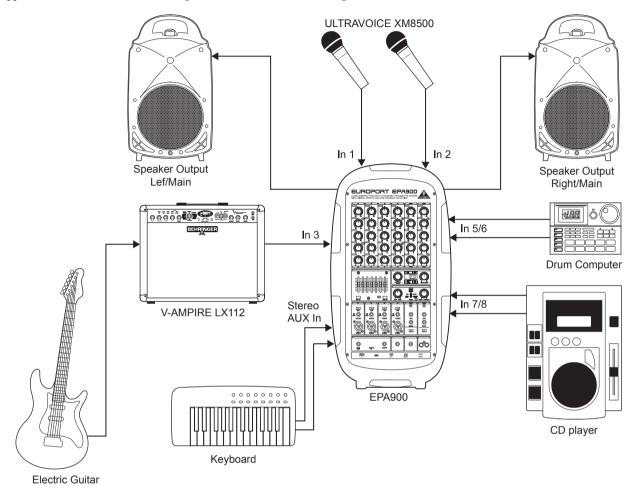


Fig. 4.1: Sound example

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# 5. Technical Specifications

### **INPUTS 1-4**

10

Туре	4 x XLR, electronically balanced, 4 x ¼" TRS jack, electronically balanced
Impedance	approx. 2.2 k $\Omega$ , balanced, approx. 1.1 k $\Omega$ , unbalanced
Input sensitivity	- 21 dBu @ PAD/OFF
Max. gain	+ 30 dB to + 10 dB
Phantom power supply	+ 48 V
Signal-to-noise ratio	- 90 dB, A-weighted
Channel separation	70 dB
INPUTS 5-8	
Туре	4 x ¼" TS jack, unbalanced 4 x RCA phono jack, unbalanced
Impedance	approx. 20 k $\Omega$ , unbalanced

RMS @ 1% THD (sine signal)	8 Ω 2 x 360 W; 4 Ω 2 x 400 W
Peak power	8 Ω 2 x 400 W; 4 Ω 2 x 450 W
YSTEM SPECIFICATIONS	
Frequency response	50 Hz to 44 kHz, ± 3 dB
Distortion (THD + N)	0.32%@1W
OWER SUPPLY	
Power consumption	1,000 W
Fuse	T 10 A H 250V (100 – 120 V~, 50/60 Hz) T 10 A H 250 V (220 – 240 V~, 50/60 Hz)
IMENSIONS/WEIGHT	
Dimensions (H x W x D)	approx. 660 mm x 354 mm x 883 mm (26.0" x 13.9" x 34.8")
Weight	approx. 37.5 kg (82.5 lb)

**OUTPUT POWER** 

BEHRINGER is constantly striving to manintain the highest professional standards. As a result of these efforts, modifications may be made from time to time to existing products without prior notice. Specifications and appearance may differ from those listed or liiustrated.

#### STEREO AUX IN

Max. gain

Input sensitivity

Signal-to-noise ratio

Туре	1 x ¼" TS jack, unbalanced 1 x stereo minijack, unbalanced
Impedance	approx. 100 k $\Omega$ , unbalanced
Input sensitivity	- 8 dBu
Signal-to-noise ratio	- 90 dB, A-weighted

- 15 dBu

+ 20 dB

- 85 dB, A-weighted

#### TAPE OUT

Туре	2 x cinch jack, unbalanced	
Impedance	approx. 1 kΩ	
Max. output level	+ 17 dBu, unbalanced	
Channel separation	> 70 dB	

#### SUB OUT

Туре	1 x ¼" stereo jack, unbalanced
Impedance	approx. 1 kΩ
Max. output level	+ 21 dBu, unbalanced

#### **CHANNEL EQ**

BASS	± 15 dB @ 80 Hz
TREBLE	± 15 dB @ 27 kHz

#### EFFECTS

Converter	24-bit delta-sigma
Sampling frequency	40 kHz
Display	2-digit, 7-segment

#### EQ

Type		

#### LOUDSPEAKER OUTPUTS

Туре	2 x ¼" TS jack
Load impedance	8 Ω

7-band

# 6. Effects Table

EFFECT PRESETS					
No.	EFFECT	Description	No.	EFFECT	Description
	HALL	0-09			DELAY 50-59
00	SMALL HALL 1	approx. 1.0s reverb decay	50	SHORT DELAY 1	Like a short shattering
01	SMALL HALL 2	approx. 1.2s reverb decay	51	SHORT DELAY 2	1-2 short impulse(s)
02	SMALL HALL 3	approx. 1.5s reverb decay	52	SHORT DELAY 3	1-2 short impulse(s)
03	MID HALL 1	approx. 1.8s reverb decay	53	MID DELAY 1	Classical Delay for up-tempo music (115-125 BPM)
04	MID HALL 2	approx. 2.0s reverb decay	54	MID DELAY 2	Classical Delay for mid-tempo music (105-115 BPM)
05	MID HALL 3	approx. 2.5s reverb decay	55	MID DELAY 3	Classical Delay for slow-tempo music (95-105 BPM)
06	BIG HALL 1	approx. 2.8s reverb decay	56	LONG DELAY 1	Classical Delay for reggae-tempo music (85-95 BPM)
07	BIG HALL 2	approx. 3.2s reverb decay	57	LONG DELAY 2	Classical Delay for dub-tempo music (75-85 BPM)
80	BIG HALL 3	approx. 4s reverb decay	58	LONG DELAY 3	Extra long (nearly infinite) delay effect
09	CHURCH	approx. 7s reverb decay	59	LONG ECHO	Extra long canyon echo effect
	ROOM	10-19			CHORUS 60-69
10	SMALL ROOM 1	approx. 0.5s reverb decay	60	SOFT CHORUS 1	Unobtrusive effect
11	SMALL ROOM 2	approx. 0.8s reverb decay	61	SOFT CHORUS 2	Unobtrusive effect with different color
12	SMALL ROOM 3	approx. 1.0s reverb decay	62	WARM CHORUS 1	Analog sounding
13	MID ROOM 1	approx. 1.2s reverb decay	63	WARM CHORUS 2	Analog sounding with different color
14	MID ROOM 2	approx. 1.5s reverb decay	64	PHAT CHORUS 1	Pronounced chorus effect
15	MID ROOM 3	approx. 1.8s reverb decay	65	PHAT CHORUS 2	Pronounced chorus effect with different color
16	BIG ROOM 1	approx. 2.0s reverb decay	66	CLASSIC FLANGER	Standard flanger effect
17	BIG ROOM 2	approx. 2.2s reverb decay	67	WARM FLANGER	More analog touch
18	BIG ROOM 3	approx. 2.5s reverb decay	68	DEEP FLANGER	Deep modulation impression
19	CHAPEL	approx. 3s reverb decay	69	HEAVY FLANGER	Extremely pronounced effect
	PLATE				PHASE/PITCH 70-79
20	SHORT PLATE	approx. 1.0s reverb decay	70	CLASSIC PHASER	Standard phaser effect
21		approx. 1.5s reverb decay	71	WARM PHASER	More analog touch
22		approx. 2.2s reverb decay	72	DEEP PHASER	Deep modulation impression
23	VOCAL PLATE	approx. 1.2s reverb decay	73	HEAVY PHASER	Extreme strong effect
24	DRUMS PLATE	approx. 1.0s reverb decay	74	PITCH SHIFT DETUNE	2-3-times detune for a wider solo voice sound
25	GOLD PLATE 1	approx. 1.2s reverb decay	75	PITCH SHIFT +3	Minor third added voice
26	GOLD PLATE 2	approx. 2.0s reverb decay	76	PITCH SHIFT +4	Major third added voice
27	SHORT SPRING	approx. 1.0s reverb decay	77	PITCH SHIFT +7	Quint above added voice
28	MID SPRING	approx. 2.0s reverb decay	78	PITCH SHIFT -5	Fourth down added voice
29	LONG SPRING	approx. 2.5s reverb decay	79	PITCH SHIFT -12	1 octave down added voice
20	GATED/REVI		10		MULTI 1 80-89
30	GATED REV SHORT	approx. 0.8s gate time	80	CHORUS + REVERB 1	Soft chorus + medium-short reverb
31	GATED REV MID	approx. 1.2s gate time	81	CHORUS + REVERB 2	Deep chorus + medium-long reverb
32	GATED REV LONG	approx. 2.0s gate time	82	FLANGER + REVERB 1	Soft flanger + medium-short reverb
33	GATED REV XXL	approx. 3.0s gate time			Deep flanger + medium-long reverb
34	GATED REV DRUMS 1	approx. 0.8s gate time	84	PHASER + REVERB 1	Soft phaser + medium-short reverb
35	GATED REV DRUMS 1	approx. 1.2s gate time	85	PHASER + REVERB 2	Deep phaser + medium-long reverb
36	REVERSE SHORT	approx. 0.8s reverb raise	86	PITCH + REVERB 1	Soft voice detuning + medium-short reverb
37	REVERSE MID	approx. 1.2s reverb raise	87	PITCH + REVERB 2	Fourth above interval + medium-long reverb
38	REVERSE LONG	approx. 2.0s reverb raise	88	DELAY + REVERB 1	Short delay + medium-short reverb
39	REVERSE XXL	approx. 3.0s reverb raise	89	DELAY + REVERB 2	Medium-long delay + medium-long reverb
00	EARLY REFLE		00	DEERT	MULTI 2 90-99
40	EARLY REFLECTION 1	Short	90	DELAY + GATED REV	Short delay + medium-long gated reverb
41	EARLY REFLECTION 2	Medium-short	91	DELAY + REVERSE	medium-short delay + medium-long reverse reverb
41 42	EARLY REFLECTION 2	Medium-long	92	DELAY + CHORUS 1	Short delay + soft chorus
42 43	EARLY REFLECTION 3	Ű			Medium-long delay + deep chorus
		Long	93	DELAY + CHORUS 2	
44	SHORT AMBIENCE	Short Madium short	94	DELAY + FLANGER 1	Short delay + soft flanger
		Medium-short		DELAY + FLANGER 2	Medium-long delay + deep flanger
46		Medium-short	96	DELAY + PHASER 1	Short delay + soft phaser
47		Medium-long	97	DELAY + PHASER 2	Medium-long delay + deep phaser
48	STADIUM	Long	98	DELAY + PITCH 1	Short delay + fourth down interval
49	GHOST AMBIENCE	Extra-long special FX	99	DELAY + PITCH 2	Medium-long delay + minor third above interval

ENGLISH

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# FEDERAL COMMUNICATIONS COMMISSION COMPLIANCE INFORMATION

FC BEHRINGER EUROPORT EPA900

Responsible party name:	BEHRINGER USA, Inc.	
Address:	18912 North Creek Parkway,	
	Suite 200 Bothell, WA 98011,	
	USA	
Phone/Fax No.:	Phone: +1 425 672 0816	
	Fax: +1 425 673 7647	
hereby declares that the product		

### **EUROPORT EPA900**

complies with the FCC rules as mentioned in the following paragraph:

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

This device complies with Part 15 of the FCC rules. Operation is subject to the following two conditions:

- (1) this device may not cause harmful interference, and
- (2) this device must accept any interference received, including interference that may cause undesired operation.

#### Important information:

Changes or modifications to the equipment not expressly approved by BEHRINGER USA can void the user's authority to use the equipment.

## **Legal Disclaimer**

Technical specifications and appearance are subject to change without notice. The information contained herein is correct at the time of printing. All trademarks (except BEHRINGER, the BEHRINGER logo and JUST LISTEN) mentioned belong to their respective owners and are not affiliated with BEHRINGER. BEHRINGER accepts no liability for any loss which may be suffered by any person who relies either wholly or in part upon any description, photograph or statement contained herein. Colors and specifications may vary slightly from product. Products are sold through our authorized dealers only. Distributors and dealers are not agents of BEHRINGER and have absolutely no authority to bind BEHRINGER by any express or implied undertaking or representation. No part of this manual may be reproduced or transmitted in any form or by any means, electronic or mechanical, including photocopying and recording of any kind, for any purpose, without the express written permission of BEHRINGER International GmbH.

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### Warranty

#### §1 Other warranty rights and national law

- This warranty does not exclude or limit the buyer's statutory rights provided by national law, in particular, any such rights against the seller that arise from a legally effective purchase contract.
- [2] The warranty regulations mentioned herein are applicable unless they constitute an infringement of national warranty law.

#### § 2 Online registration

Please do remember to register your new BEHRINGER equipment right after your purchase by visiting http://www.behringer.com and kindly read the terms and conditions of our warranty carefully. Registering your purchase and equipment with us helps us process your repair claims quicker and more efficiently. Thank you for your cooperation!

#### § 3 Warranty

- BEHRINGER (BEHRINGER International GmbH including all BEHRINGER subsidiaries, except BEHRINGER Japan) warrants the mechanical and electronic components of this product to be free of defects in material and workmanship for a period of one (1) year\* from the original date of purchase, in accordance with the warranty regulations described below. If the product shows any defects within the specified warranty period that are not excluded from this warranty as described under § 5, BEHRINGER shall, at its discretion, either replace or repair the product using suitable new or reconditioned parts. In the case that other parts are used which constitute an improvement, BEHRINGER may, at its discretion, charge the customer for the additional cost of these parts.
- [2] If the warranty claim proves to be justified, the product will be returned to the user freight prepaid.
- 3 Warranty claims other than those indicated above are expressly excluded.

#### § 4 Return authorization number

- To obtain warranty service, the buyer (or his authorized dealer) must call BEHRINGER during normal business hours BEFORE returning the product. All inquiries must be accompanied by a description of the problem. BEHRINGER will then issue a return authorization number.
- 2 Subsequently, the product must be returned in its original shipping carton, together with the return authorization number to the address indicated by BEHRINGER.
- 3 Shipments without freight prepaid will not be accepted.

#### § 5 Warranty regulations

I Warranty services will be furnished only if the product is accompanied by a copy of the original retail dealer's invoice. Any product deemed eligible for repair or replacement under the terms of this warranty will be repaired or replaced.

- If the product needs to be modified or adapted in order to comply with applicable technical or safety standards on a national or local level, in any country which is not the country for which the product was originally developed and manufactured, this modification/adaptation shall not be considered a defect in materials or workmanship. The warranty does not cover any such modification/adaptation, irrespective of whether it was carried out properly or not. Under the terms of this warranty, BEHRINGER shall not be held responsible for any cost resulting from such a modification/adaptation.
- Image: The second maintenance/repair work are expressly excluded from this warranty, in particular, if caused by improper handling of the product by the user. This also applies to defects caused by normal wear and tear, in particular, of faders, crossfaders, potentiometers, keys/buttons, tubes, guitar strings, illuminants and similar parts.
- [4] Damage/defects caused by the following conditions are not covered by this warranty:
  - improper handling, neglect or failure to operate the unit in compliance with the instructions given in BEHRINGER user or service manuals;
  - connection or operation of the unit in any way that does not comply with the technical or safety regulations applicable in the country where the product is used;
  - damage/defects caused by force majeure or any other condition that is beyond the control of BEHRINGER.
- Any repair or opening of the unit carried out by unauthorized personnel (user included) will void the warranty.
- If an inspection of the product by BEHRINGER shows that the defect in question is not covered by the warranty, the inspection costs are payable by the customer.
- Products which do not meet the terms of this warranty will be repaired exclusively at the buyer's expense. BEHRINGER will inform the buyer of any such circumstance. If the buyer fails to submit a written repair order within 6 weeks after notification, BEHRINGER will return the unit C.O.D. with a separate invoice for freight and packing. Such costs will also be invoiced separately when the buyer has sent in a written repair order.

#### § 6 Warranty transferability

This warranty is extended exclusively to the original buyer (customer of retail dealer) and is not transferable to anyone who may subsequently purchase this product. No other person (retail dealer, etc.) shall be entitled to give any warranty promise on behalf of BEHRINGER.

#### §7 Claim for damage

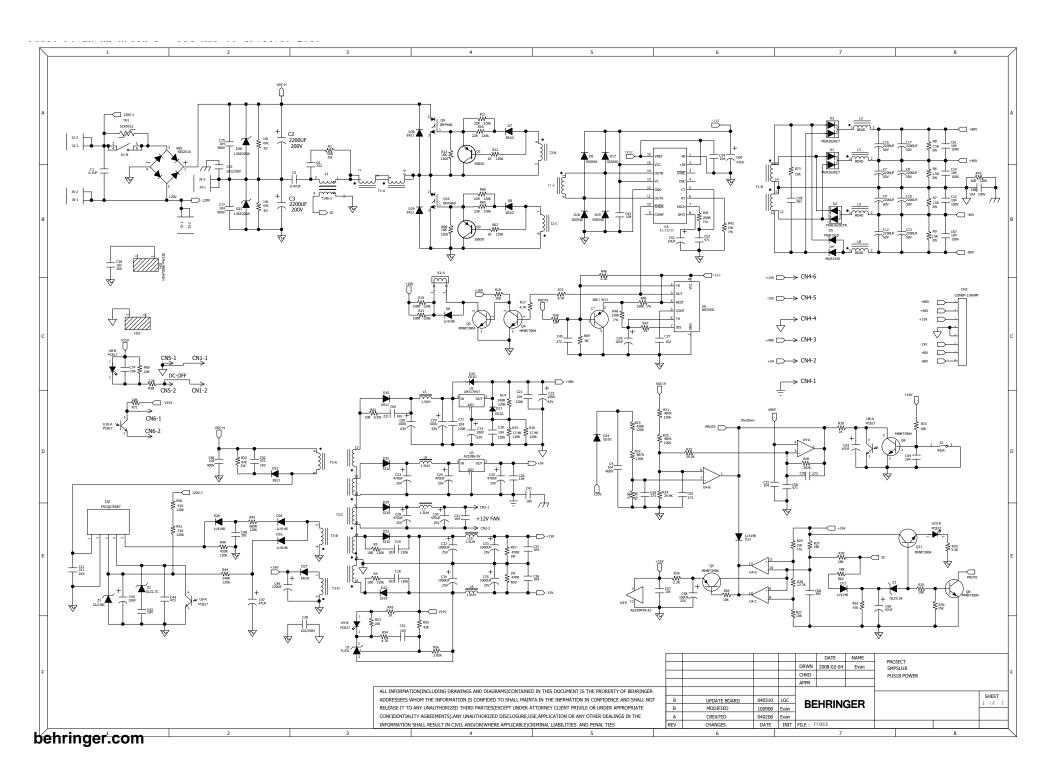
Failure of BEHRINGER to provide proper warranty service shall not entitle the buyer to claim (consequential) damages. In no event shall the liability of BEHRINGER exceed the invoiced value of the product. ENGLISH

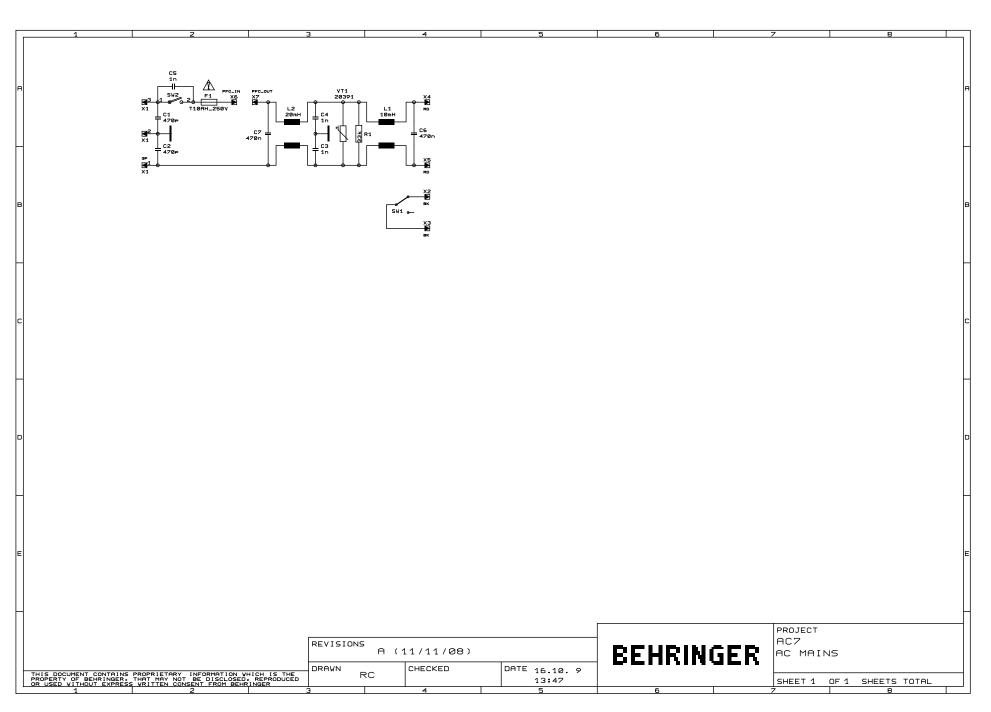


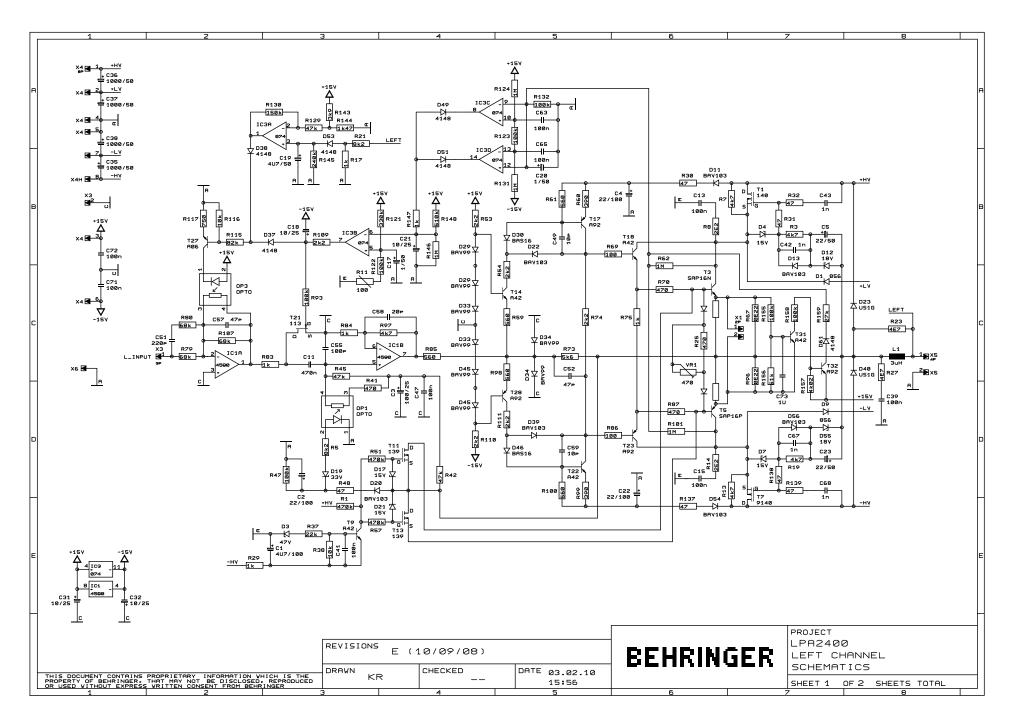
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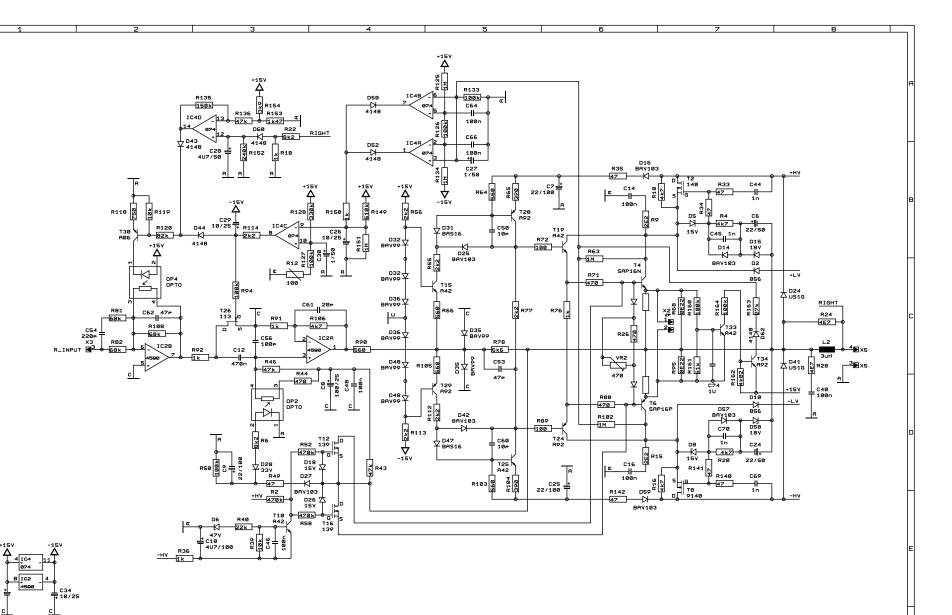
# www.behringer.com

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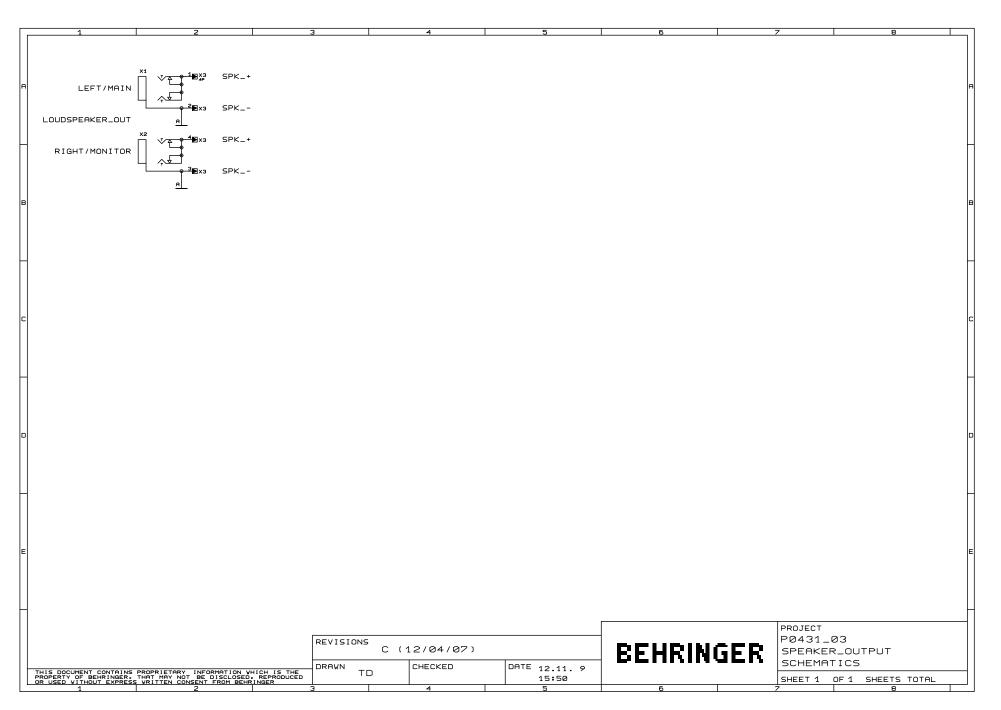


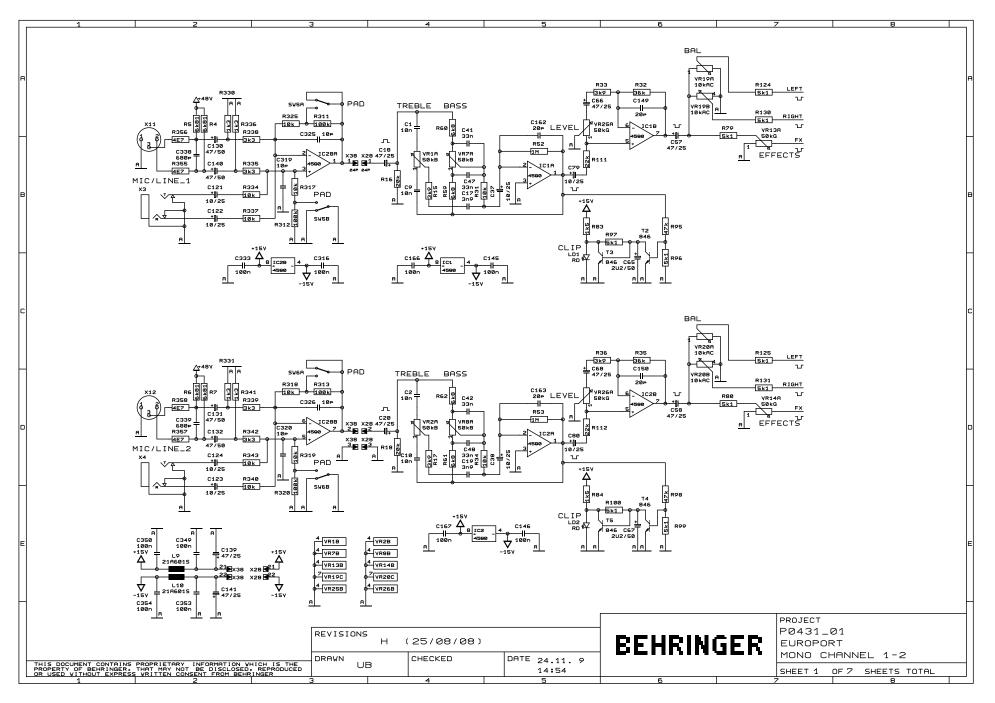
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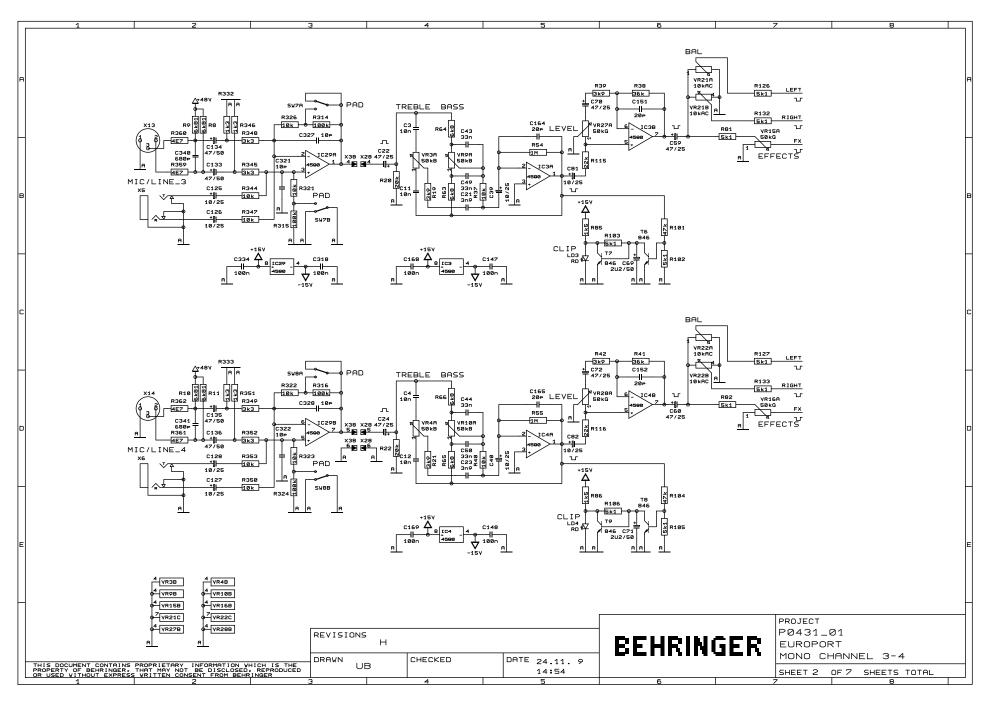
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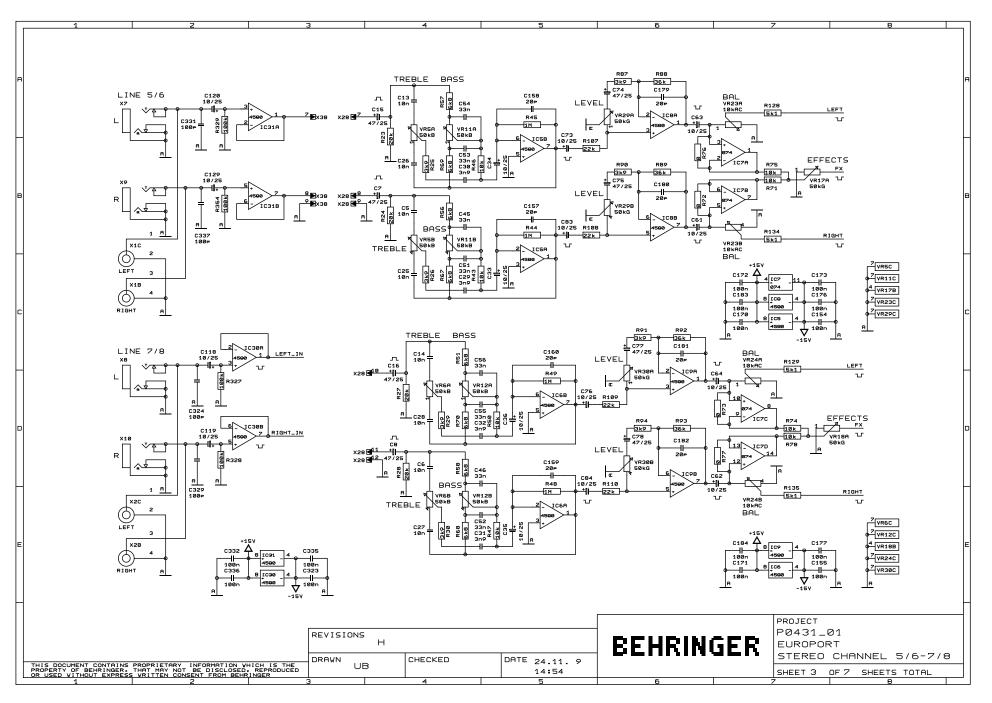
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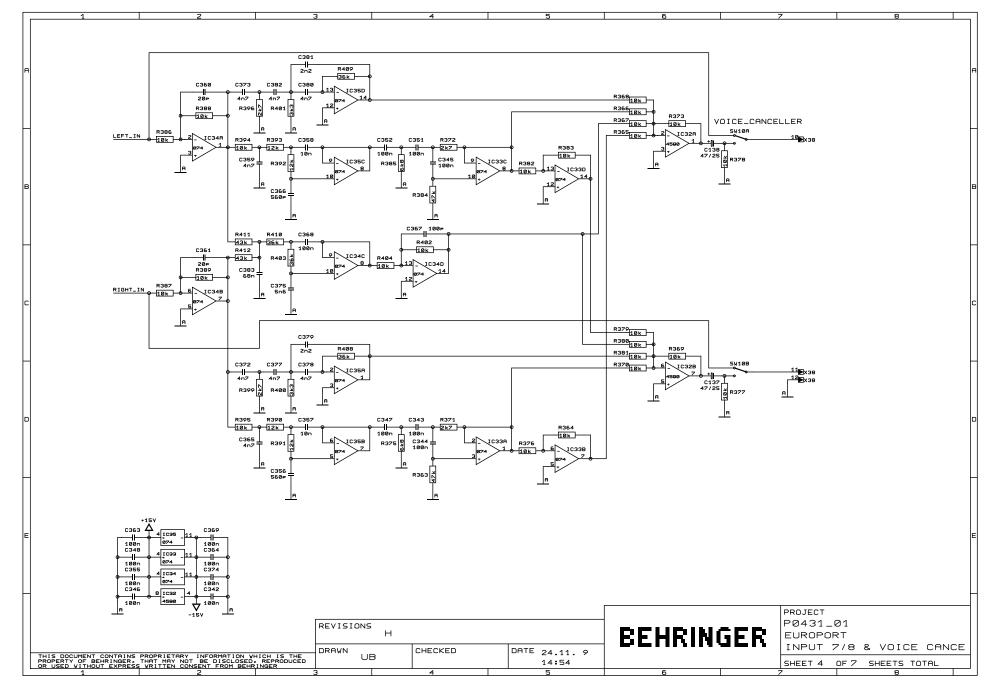
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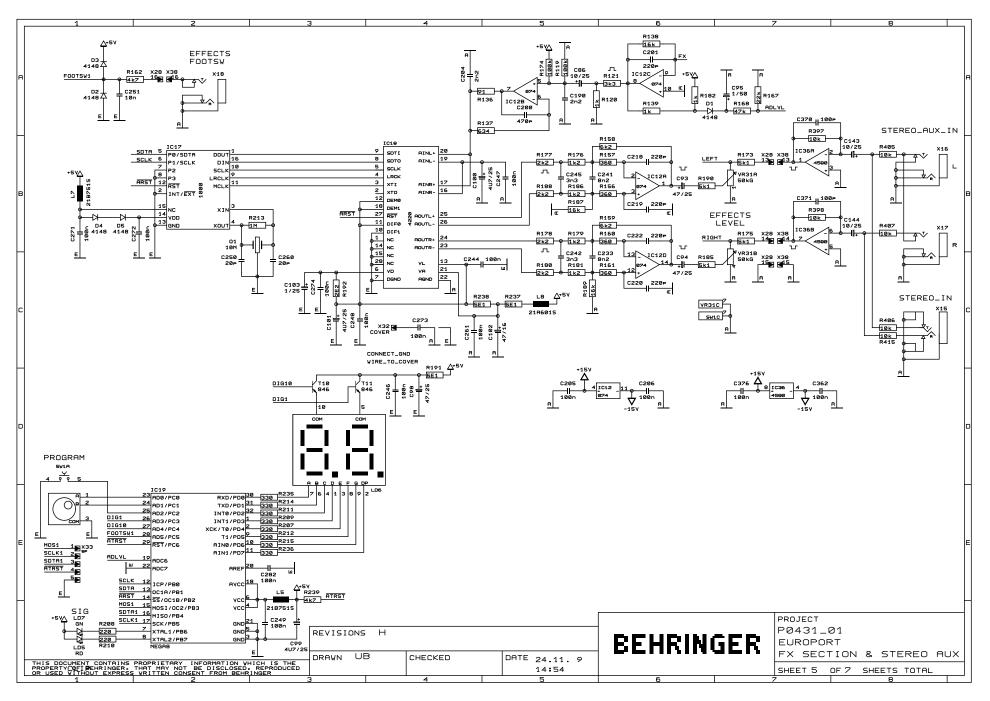


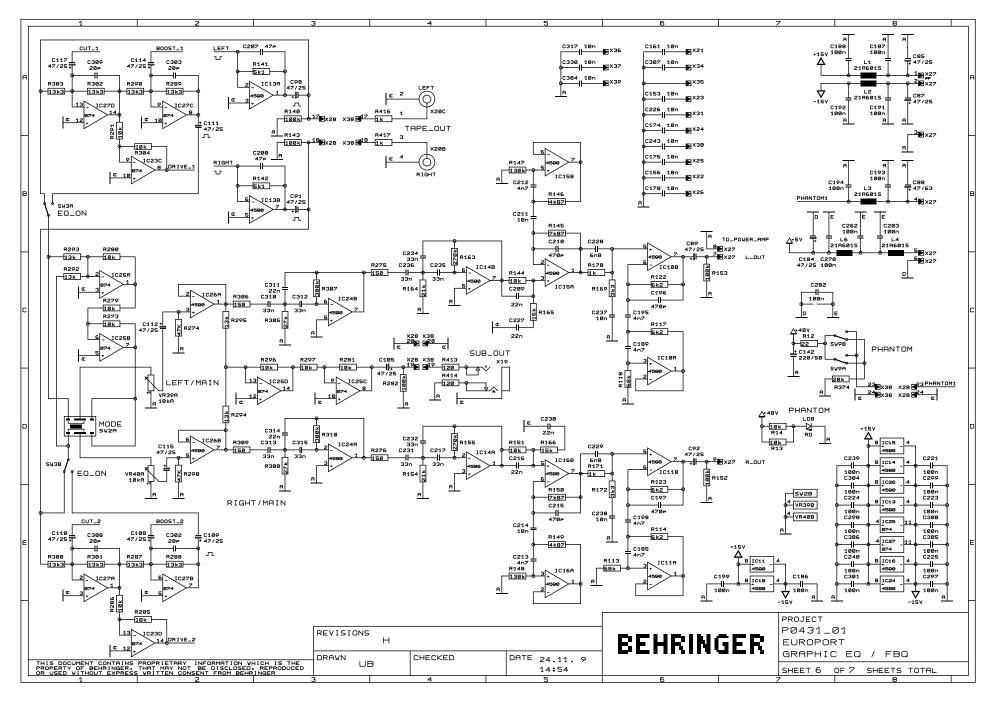












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