KeyPro KP-200S

-INTRODUCTION-

The Motion Sound **KeyPro KP-200S** provides a significant improvement in sound quality and portability for professional and amateur musicians alike. The encompassing three-dimensional stereo sound is a true compliment to modern keyboard synthesizers, digital pianos, sound modules, guitar synthesizers and any application that can benefit from stereo sound.

Although operation may seem intuitive, we suggest that you read this manual for helpful tips and/or details about controls and operation of the KP-200S in various venues and environments.

-WARNING-

The KP-200S can produce high sound pressure levels. Hearing protection is advised. The KP-200S must be earthed for safe operation.

-SPECIFICATIONS-

Input Design Range - 300 mV RMS, 2.5 v RMS max

Input Impedance - 100K, 100 pf

Power Amplifier – 100-watt RMS/channel (200-watt RMS total)

Speakers - Two 10" Eminence Beta 250-watt, 8 ohms

Horns - Two 80-watt 3.5X3.5 Ferro cooled dynamic, 8 ohms

Frequency Response - 70-17 kHz

 $\underline{Crossover} - 3 \text{ kHz}$

Power	<u>Voltage</u>	Frequency	<u>Watts</u>	Fuse (slo-blo)
US	117 VAC	50/60 Hz	400	5 amp
Europe	230 VAC	50/60 Hz	400	2.5 amp
Japan	100 VAC	50/60 Hz	400	5 amp

<u>Fuse</u> – Located in the AC inlet module (Use only correct value.)

Finish- Two-part Polymaric[™] polymer finish on MDF

Dimensions - H 17", W 23", D 16" Weight 55 lbs.

-Quick Start Setup-

After powering on your signal source:

1. Set all controls to "5"

2. Master volume – quiet room 3-5

loud band 7-9

-Sound – -What to Expect-

The quality of the stereo 3D expander is totally dependent on a good stereo signal source; it will NOT create a stereo image from a mono source. The KP-200S is ideally placed in back of you at about 2 ft. above the floor. Your position should be at amplifier center for best expander stereo effect.

Experience has shown that placing the amplifier on the floor can provide more bass, but depending on how close you are to the KP-200S, you may not hear enough treble. Tilting the KP-200S back slightly can help direct more "highs" toward you.

All rooms will sound different; experimenting with amplifier placement can improve the sound for your audience.

-Control Panel-

The KP-200S has two input channels and a master control area. Channels one and two are the same.

<u>Inputs</u>: Two sets of unbalanced ¹/₄ stereo pairs. If you have a mono signal and want both channels to respond, use the right/mono input. All inputs are available simultaneously.

<u>Micophone input</u>: A balanced XLR microphone input (located on rear panel) is assigned to channel two's volume and EQ controls. It is a mono input to left and right channels and XLR line outputs. The XLR input works simultaneously with channel two's ¼" inputs. The XLR input is AC coupled so phantom powered microphones can be used. (The KP-200S does not supply phantom power).

<u>Volume</u> works in conjunction with your signal source volume and volume pedal (if used). Typical setting is 4-6 and should be adjusted so that your signal source/volume control covers the desired range.

<u>Expand</u> control increases the stereo spread. The control is totally dependent on the quality of a stereo source. Mono=No expand. Too much expand may change the tone of some sounds. Use only enough for effect and then readjust the channel EQ if needed.

<u>Bass</u> <150 Hz Low frequency boost/cut. If you have a bass player, set this at about 5. Bass uses a lot of power and can make your sound muddy, adjust carefully to preference. If you use the <100 Hz subwoofer output, read that section first.

<u>Middle</u> controls frequencies from 150 Hz to 3 kHz. This is the most important frequency range of most instruments---set at "5" and then vary according to preference.

<u>Treble</u> adjusts sound above 3 kHz. Treble is the highest frequency content of sound and the most directional part of the spectrum. Set at 5 initially and adjust to preference. The highest frequencies do not travel very far in air, so don't fry your ears with searing highs that will never reach an audience.

-MASTERS-

Volume

Normally set at 5-6. If you are playing quietly and input levels are within the normal range, you can adjust the master volume for quiet amplifier operations. Higher numbers 5-10 allow maximum headroom, but produce more pre-amp "hiss". Higher settings should be used in loud band situations.

<u>Click</u>

The ¹/4" unbalanced input (on the rear panel) is traditionally used to receive a "cue" from a tape or sequencer to start a song. This is a mono input and the KP-200S will reproduce the sound from both channels. The sound will NOT be sent to the XRL line outputs. This input can also be used to monitor other instruments on stage.

XLR Line Outputs

Left and right channels are output for feed to mixing boards. The level is "hot" microphone, approximately 2 volts p-p 600 ohms nominal impedance. The XLR line outputs will work very well in most venues. If there is a very large difference in ground potential between the KP-200S and the mixing board in use, you may need to use transformer isolation or "ground float" boxes to eliminate noise. Many older buildings can have ground problems. Check AC outlets to prevent shock and to ensure proper KP-200S grounding. Volume, expand and EQ affect XLR output signals.

Slave Output

Outputs left and right audio from the master volume control to a SL-200S slave amplifier. The connector is standard "midi" style for convenience in obtaining cords but does not send midi data. The cord must use all five conductors. Add as many SL-200S (up to 10) to a KP-200S as you need. Take just the right amount of power to each venue. Play next to a Guitar stack? No problem!

<100 Hz Output

¹/₄ unbalanced, 300 mv rms, 12 db oct @ 100 Hz. This output is used for bass or sub-woofer augmentation of the KP-200S, such as with a **Motion Sound SW-15 Subwoofer**. Set the bass control on the KP-200S at 5 or lower and let your external bass amplifier handle the lows. The KP-200S will then have full power available for mid and high frequencies. Using the 100 Hz output does not disable those frequencies from the KP-200S.

Maintenance

<u>Finish</u>: A tough Polymaric[™] polymer finish. Clean with mild soap and water if needed. No other maintenance is necessary.

<u>Speakers</u>: Remove screws from the grill cover and remove the grill. The 10" speakers and horns are mounted from the front with screws into steel inserts. Wires from the amplifier to the 10" speakers and ferro cooled dynamic horns are removable spade types. If you change speakers, use 8 ohm only.

<u>Amplifier</u>: The entire amplifier chassis is mounted from the rear outside. Remove all screws on top and around the back of the amplifier chassis. You must remove the speaker wires from the front (remove 10" speaker first) before the amp chassis can be entirely removed.