Installation Instructions

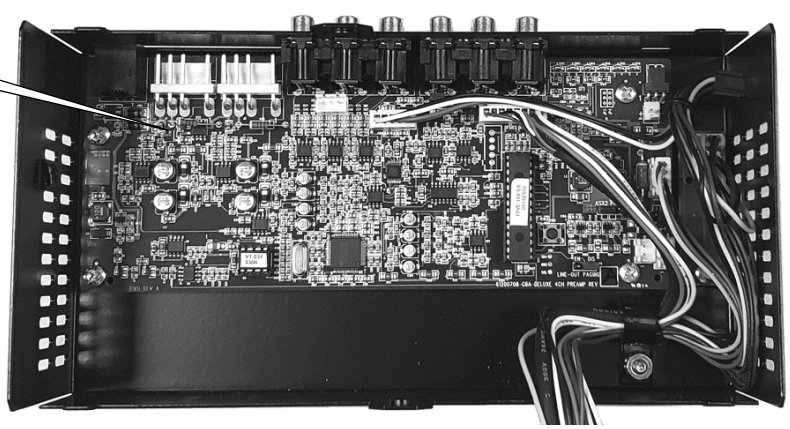
NGX Preamplifier Kit
Kit #26735303

This kit contains a Deluxe 4 channel preamp with instructions for installation and configuration.

Tools Required
#2 Phillips Head Screw Driver
11/32” Hex Nut Driver

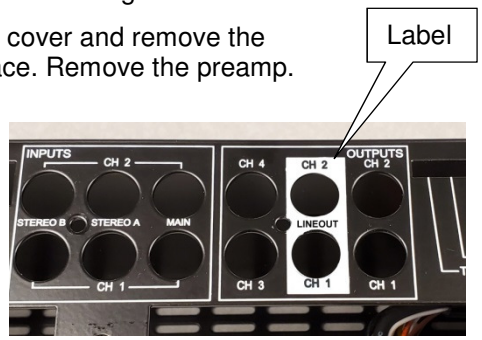
Parts Included with this Kit

Item #	Part Number	Description	Quantity
1	61200708	Preamplifier – Deluxe 4 Channel with Line-out	1
2	22167744	Label – Lineout	1
3	26735352	These Instructions	1



1. Power OFF the jukebox and unplug it from the wall.
2. Disconnect the wiring going to the amplifier.
3. Remove the amplifier from the jukebox.
4. Remove the two Philips screw holding the cover and carefully open the amplifier assembly.
5. Unplug the wiring going to the preamp. Make a note of which wires go where.
6. Remove 4 screws holding the preamp to the inside of the cover and remove the two small screws in the front holding the RCA jacks in place. Remove the preamp.
7. Place the label (item 2) over the top of the INVERT CH1 CH3 text on the front of the amplifier cover.
8. Verify the jumpers JP1 to JP6 are set correctly on the new preamp (See Preamplifier Jumpers later in these instructions). To install the new preamp, reverse steps 6 to 4.

   Please note when connecting the internal wiring to the preamp
   - For IcePower 500 watt connect J2 (8 pin) & J10 (2 pin)
   - For Pascal 1000 watt connect J2 (8 pin) & J11 (4 pin) & J5 (5 pin – if equipped)



9. Reinstall the amplifier in the jukebox and reconnect all amplifier wiring.
10. Power up the jukebox and test to be sure the amplifier is working.

PREAMPLIFIER LED INDICATORS

POWER (Green) – When lit, indicates power is applied to the amplifier.

STATUS (Red) – Indicates the status of the preamplifier/amplifier (See below).

COM (Green) – Quick flashes indicate communication with the Core Computer is OK.

MUTE (Red) – Indicates the mute status of the amplifier (On = muted, Off = not muted)

OVERCURRENT – When lit, indicates the amplifier is overloaded or clipping. Verify speaker load and ensure there are no shorted speaker wires.

THERMAL – When lit, indicates the amplifier is overheating. Be sure the cabinet fan(s) are working, the filters are clean, and nothing is blocking air flow through the cabinet.

RAIL VOLTAGE – (1000 watt 40991407 and 40991417 amplifiers only) When lit, indicates the amplifier power supply is on or the power supply capacitors have not yet discharged**. To prevent damage to the amplifiers, DO NOT connect or disconnect the cable between the Primary Amplifier and the Secondary Amplifier while these LEDs are lit.**

Preamplifier STATUS LED – Normal Operation

The STATUS LED is used to indicate the status of the preamplifier. Under normal conditions the STATUS LED will flash once on power up, stay off for a second, and then turn back on and stay on. If either of the two microphone inputs become active, either by activation of the SENSE line or by the Voice Activation Circuits, the STATUS LED will blink on and off at a 150ms rate until the microphone circuits become inactive.

Preamplifier STATUS LED – Error Conditions

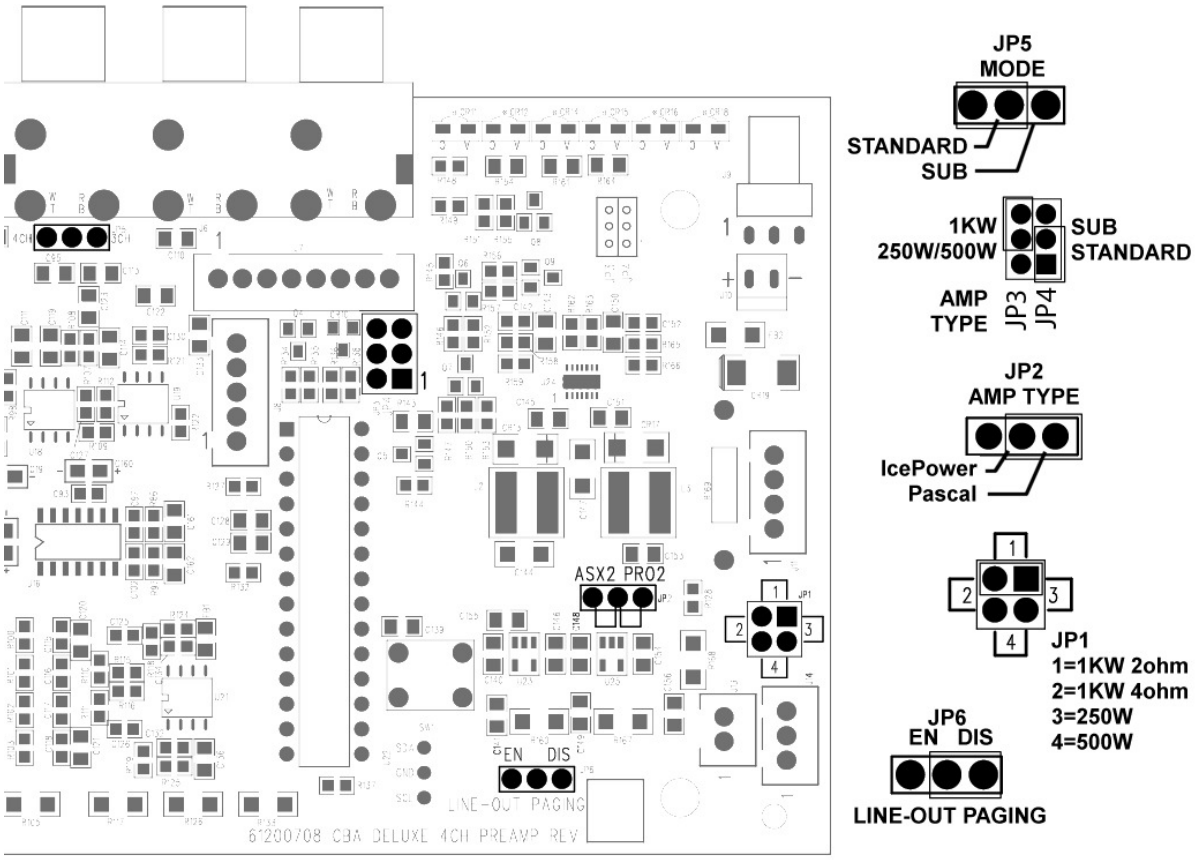
The STATUS LED is used to indicate possible faults on the preamplifier board. During power up, the preamplifier runs a self test. If a fault is detected, the STATUS LED is used to indicate what may be wrong. The LED will repeat a pattern of a specific number of blinks.

The blink pattern is 500ms on, 500ms off and then one to eight quick 100ms on blinks, followed by three seconds off. The blinking pattern will repeat until the preamplifier is reset or power is turned off.

Number of Blinks	Problem Description
1	Digital Audio Processor did not come out of RESET
2	Digital Audio Processor COM Error
3	EEPROM COM Error
4	Digital Audio Processor Memory Load Error
5	EEPROM Data Error
6	Digital Potentiometer COM Error in Mic Circuit
7	I^2C SDA Line is Stuck Low
8	Firmware Mismatch – Processor and DSP Firmware Not Compatible

If the DAP (Digital Audio Processor) fails during normal operation, the STATUS led will blink one second on, two seconds off, continuously, until power is cycled or until the DAP failure goes away.

Preamplifier Jumpers



There are 6 jumpers on the preamplifier, JP1 – JP6. The preamplifier will support both the IcePower 250ASX2 500 watt power amplifier used in 40991404, and the Pascal S-PRO2 1000 watt power amplifier used in 40991407 and 40991417. JP2 must be set to match the power amplifier in use. If this jumper is set wrong there may be no power to the preamplifier.

JP1: LOAD – Used to set the speaker load.

JP2, JP3: AMPLIFIER TYPE – Used to configure the preamplifier power supply. Set both jumpers to match which amplifier is being used. If these jumpers are set in the wrong position, the preamplifier may not work. If the Status LED indicates an error of seven blinks, verify JP2 is set correctly.

JP4, JP5: MODE – Set these jumpers to the STANDARD position for normal operation. The SUB position enables a High Pass Filter on Channel 1 and a Low Pass Filter on Channel 2.

JP6: LINE-OUT PAGING – This jumper enables/disables paging over the Line-out outputs.

AMI Entertainment Network, LLC, 1417 Eastern Ave SE, Grand Rapids, MI 49508