Overview

The BlueBridge DSP platforms are powerful and flexible tools offering mission critical solutions to successfully satisfy your customers’ application needs. Engineered to strict standards with the highest quality internal components, BlueBridge DSP solutions provide pure clean audio, Ethernet connectivity for cost effective TCP/IP control and open architecture with Drag and Drop programmability. Atlas Sound offers the widest range of open architecture DSP platform I/O configurations of any manufacturer in the industry using the same easy to program software, high quality THAT Corporation microphone preamps, and the same powerful 48KHz, 40 Bit Floating DSP Engine.

Features:

- 8X8, 8X16, 16X8, & 16X16 I/O Configurations
- Open Architecture Programmability
- High Quality THAT Corporation Mic Preamps
- Touch Panel Options Available
- TCP/IP Third Party Control Capability
- Four Logic Inputs & Outputs
- 48KHz, 40 Bit Floating DSP Engine
- Remote Control Using Optional Wall Plates
- Output Peak & Signal Indicator LED's
- Safety Listed to UL60005

Product Description:

The Atlas Sound BB-88, BB-816, BB168, and BB1616 models are part of the new BlueBridge family of products. The open architecture drag and drop DSP models are offered in an 8x8, 8x16, 16x8 and 16x16 I/O configurations with all inputs and outputs balanced. BlueBridge models utilize high quality THAT Corporation microphone preamps and 24 Bit converters to obtain an ultra-low noise floor and pure clean sound. BlueBridge models use a 40 Bit Floating Point DSP engine to prevent digital clipping that can occur in other DSP products and to provide the processing power for complex systems. BlueBridge DSP units can operate on an Ethernet network and the optional controls work on a PoE Network.

BlueBridge software provided with each system is an intuitive program used to configure audio processing and control capabilities within the device. BlueBridge DSP platforms offer all of the processing tools necessary for complex systems including: EQ’s, anti-feedback EQ’s, crossovers, delays, gain-sharing and gating auto-mixers, matrix mixers, standard mixers, filters, meters, generators, compressors, expanders, limiters, duckers, and an assortment of logic components to expand system control capabilities. BluePanel controls can be created in the BlueBridge software to create control pages for easy system operation by users of varying levels of system familiarity and knowledge. Blue Panel software can be installed on Windows computers for wireless remote control without consuming large amounts of storage space or slowing down a system.

The BlueBridge DSP platforms are cost effective solutions for the most demanding applications including house of worship, presentation rooms, conference rooms, background & foreground music, courtrooms, zoned paging and many other sound reinforcement and AV applications.
BlueBridge Software Offers the Capability of Displaying Components Connected to Inputs and Outputs

BlueBridge Open Architecture Software Provides Flexibility to Customize For Any Application
WALL CONTROL OPTIONS:

BlueBridge TouchPanel and Wall Controls are a natural extension of the Blue Bridge DSP platforms and provide a simple and cost effective way to ensure a sophisticated system is user friendly. The wall controls are available in five configurations and can be configured to fit the unique needs of a particular application. The BBWP-TOUCH7B, like the wall controls, makes a complex system easy for the user to operate. The BBWP-TOUCH offers greater flexibility by providing a way for the controls to be customized to meet the exact needs for an application. Even better, the process of creating the graphic interface for BBWP-TOUCH7B is fast, easy and intuitive.

BBWP-K1B  BBWP-K4B  BBWP-S4B  BBWP-S4K1B  BBWP-S8B  BBWP-TOUCH7B
**Specification**

**BB-88, BB-816, BB168, BB1616**

### Input Type

- **Quantity**: 8 or 16
- **Type**: Mic or Line, GUI Selectable
- **Configuration**: Electronically balanced
- **Gain**: -40 to +15dB in 0.25 dB steps
- **Polarity**: +/- GUI Selectable
- **Connection**: PHX Style, 3 Position, 3.5mm spacing
- **Input Impedance**: >10kΩ
- **Maximum Input Level**: +20dBu
- **Phantom Power**: 48V, GUI enabled

### Output Power

- **Quantity**: 8 or 16
- **Type**: Line
- **Configuration**: Electronically Balanced
- **Gain**: -40 to +15dB in 0.25 dB steps
- **Polarity**: +/- GUI Selectable
- **Connection**: PHX Style, 3 Position, 3.5mm spacing
- **Output Impedance**: 50Ω
- **Maximum Output Level**: +20dBu

### DSP modules

- **EQ**: Parametric, Graphic, Anti Feedback
- **Crossover**: Butterworth, Linkwitz Riley, Bessel, Slopes: 6 to 48dB per Octave
- **Filters**: High Shelf, Low Shelf, All Pass, 10mS - 2 Second
- **Delay**: Gain Sharing Auto-mixer, Gating Auto-mixer, Matrix Mixer, Standard Mixer, LR Mixer, LCR Mixer
- **Mixers**: Sine Tone, Sign Sweep, White, Pink, RMS
- **Generators**: Compressor, Expander, Limiter, Ducker
- **Logic**: AND, OR, NOT, NAND, NOR, FlipFlop, Multiplexor, Encoder, Decoder

### System Parameters

- **Preset Programs**: 70
- **Delay Units**: ms, ft, m
- **Security locks**: Password

### Front Panel Features

- **LED's Input & Output**: One per channel, multi-color type
- **Signal LED**: Green
- **Peak LED**: Red, -3db before Clip
- **Status LED**: Yellow
- **Data**: Blue

### Rear Panel Connectors:

- **Analog Inputs**: Qty. 16, 3 Position Phoenix Plug-in 3.5mm
- **Analog Outputs**: Qty. 8, 3 Position Phoenix Plug-in 3.5mm
- **Logic Ports**: Qty. 2, 6 Position Phoenix Plug-in 3.5mm
- **Ethernet Port**: RJ-45
- **Dante Port**: Dual RJ-45
- **AC Mains Power**: Standard IEC Socket

### General

- **Rack Space**: 1RU, 19’
- **Power**: 90-240VAC (50-60Hz), Internal Power Supply
- **Dimensions**: 19”x1.75”x9” (483x44x229 mm)
- **Weight**: 7.2 lbs / 3.25 kg (BB-1616)
- **Safety**: Safety Listed to UL60005
- **Power Consumption**: 18.5W
- **Thermal Dissipation**: 63 BTU