2way Advanced is a 2 channel crossover plug-in for multi-way active loudspeaker configurations. Based on the architecture of a 2way PEQ version, this plug-in also provide the ability to input Biquad coefficients for up to 68 biquad filters allowing un-paralleled flexibility for engineers looking for unique custom filtering.

Software features
- Extensive set of audio algorithms
- Live tuning, hear the changes real time
- Save/Load configurations
- Advanced mode allows custom Biquad filter programming
- Extensive plotting capabilities
- Plug & Play setup requires no driver
- Free Un-limited upgrades, your plug-in evolves as we evolve!

Applications
- Active loudspeakers
- All digital active crossover module
- Proprietary filters for OEM applications
- Custom amplifiers
- Small PA processor
- Custom Pro Audio boards

Algorithm and plug-in configuration

<table>
<thead>
<tr>
<th>Item</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sampling frequency</td>
<td>48kHz</td>
</tr>
<tr>
<td>Algorithm resolution</td>
<td>Double precision for best audio quality (56bits resolution)</td>
</tr>
<tr>
<td>Digital Inputs</td>
<td>Plug-in IN#1 &amp; 2 selectable on 12S_Data_In7 &amp; 8</td>
</tr>
<tr>
<td>Digital Outputs</td>
<td>Plug-in OUT#1/2/3/4 available on 12S_Data_Out1/2/3/4</td>
</tr>
<tr>
<td></td>
<td>Un-processed signal from ADC on 12S_Data_Out5/6</td>
</tr>
<tr>
<td></td>
<td>Un-processed signal from Digital IN on 12S_Data_Out 7/8</td>
</tr>
<tr>
<td>Input mute/select</td>
<td>Click-less input mute per channel and input selection</td>
</tr>
<tr>
<td>Digital gain</td>
<td>Fader gain control from –80 to 0dB</td>
</tr>
<tr>
<td>Input/Output meters</td>
<td>Monitoring signal from –80dBFS to 0dBFS - High refresh rate</td>
</tr>
<tr>
<td>Low &amp; High Pass Filter</td>
<td>Buterworth up to 8th order (6 to 48dB/oct)</td>
</tr>
<tr>
<td>on each output</td>
<td>Linkwitz-Riley up to 8th order (12 to 48dB/oct)</td>
</tr>
<tr>
<td></td>
<td>Bessel - 2nd order - Bypass per filter</td>
</tr>
<tr>
<td>Parametric Equalizers</td>
<td>6 EQ bands per input, 6 EQ bands per output</td>
</tr>
<tr>
<td>(Peak/Shelf)</td>
<td>Frequency, Gain, Q configurable, Peak of Shelf (low/high)</td>
</tr>
<tr>
<td></td>
<td>Per-band bypass feature</td>
</tr>
<tr>
<td>Advanced Mode</td>
<td>Allows programming of each filter (PEQ/Crossover) as a custom biquad filter</td>
</tr>
<tr>
<td>Delay</td>
<td>Up to 7.5ms per channel (258cm) with 0.02ms increments</td>
</tr>
<tr>
<td>Polarity</td>
<td>Invert polarity 180degree per channel</td>
</tr>
<tr>
<td>Output mute</td>
<td>Individual output mute</td>
</tr>
<tr>
<td>Master output gain</td>
<td>Analog potentiometer control master output digital gain fader from –80 to 0dB. Disabled if no pot connected.</td>
</tr>
</tbody>
</table>

Audio flow chart diagram

Example application diagram

Custom active bi-amped loudspeakers

MiniDSP, powered by DSP4YOU company
Features and Specifications subject to change prior notice
Delay, Polarity and input/output metering

- **Delay**: Control delay per output channel to better time align each channel. To simplify your calculations, the equivalent distance in cm is calculated for you.
- **RMS meter**: Displays for input and output channels. Resolution from –80 to 0dBfs (Full scale).

Custom firmware

Looking for a custom firmware for a specific application? Want an OEM version for your own product line?

Our sales and engineering can help. Just email us with a description of your requirements and we’ll get back to you with a quote.

Software & Hardware requirements

### PC Hardware requirements
- 1GHz CPU
- 512MB RAM
- USB V2.0

### Software requirements
- Windows XP/Vista/7
- Adobe Air environment
- Net 3.5 environment

### Mac Hardware requirements
- Intel Core Duo or faster
- 512MB RAM
- USB V2.0

### Software requirements
- Mac OS X v10.4, 10.5, 10.6
- Adobe Air environment