CurvOmatic FT501   Resonant LP/HP Filter Set + "Bax" ToneTipper EQ

Specs and Operating Characteristics:

Low Pass Filter
• flter slope 9dB/octave at zero resonance
• flter cutof sweep range 160 Hz to 22kHz
• resonant peaking from 0 to +12dB

Hi Pass Filter
• flter slope 12dB/octave at zero resonance
• flter cutof sweep range 22 Hz to 2700Hz
• resonant peaking from +3 to +15dB

"Bax" Tone Tipper EQualization Curves: see CURVES

Rear Connectors: Line input and Line output on card edge (xlr i/o on standard "500" racks)

Input Impedance
• nominal 11,000 Ohms Balanced

Max Input Level:
• +28dBu

Output Impedance:
• nominal 130 Ohms Balanced

Output Clip Level:
• +25dBm

Power Consumption:
• 75mA @ ±15Vdc 2.25 Watts

The CurvOmatic module is a versatile set of high and low pass variable resonance sweep flters combined with a very sweet sounding version of Peter J. Baxandall's classic 1950 tone control circuit. Used in combination these sections provide a surprising amount of tone carving and shaping capability that is unlike anything you can get from standard equalizers and cutof flters. Each section (lo pass, hi pass and tone tipper) has a switch that bypasses or removes that section. There is a "hard" bypass "BYP" that passes the module input directly to the output.

The wide sweep ranges for the hi and lo pass flters overlap from 160Hz to 2,700Hz. The resonance controls vary from 3dB to 15dB of peak in the Hi Pass flter (at cutof) and 0dB to 12dB of peak in the Low Pass flter (at cutof). The ToneTipper EQ is a non-shelving tone control which is very organic and natural sounding. The curves are smooth and continuous across the entire spectrum, as opposed to a shelving type control that ramps up to a plateau or down to a valley at one end of the spectrum or the other.

The CurvOmatic is transformer-balanced in and out. The output is capable of driving loads as low as 300 Ohms, while the input can take very high levels without overloading. Internal operating level is very low, allowing for max boost without clipping.