

API 500 SERIES 4 BAND EQUALIZER

MODEL SV14

INTRODUCTION

Thank you for choosing this API Select SV14 Equalizer. The SV14 is a single channel four band equalizer in the popular API 500 Series formate. With a dedicated knob and/or switch for each control function, the SV14 is both easy to use and easy to re-set. By using continuously-variable controls for both frequency and boost/cut, the SV14 can be very precise in applying equalization to the selected audio material.

HISTORY

The design of the SV14 circuitry is not entirely new. For a brief period in the late 1970's and early 1980's an audio company called APSI manufactured consoles and equalizers. The APSI 562 was a 4-band Parametric equalizer which was made by APSI, but sold through API. A variety of APSI modules were included in the sales brochures and literature produced by API. The 562 has over the years remained on the 'favorites' list of a number of studio engineers. The original APSI 562's, however, have become more difficult to find and nearly impossible to find in good working condition. The SV14 is a faithfully updated re-engineered version of the original APSI 562.

LAYOUT

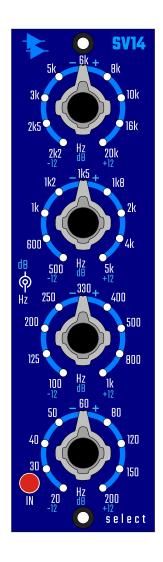
The API Select SV14 contains four dual concentric potentiometer, the lower or larger of which adjusts the level of the boost or cut applied to the audio signal, and the upper or smaller knob adjusts to center frequency to be adjusted.

The equalizer covers the range from 20Hz to 20kHz in four EQ bands of overlapping frequencies - 20Hz to 200Hz, 100Hz to 1000Hz, 500Hz to 5000Hz, and 2000Hz to 20kHz.

Each band has a boost/cut control with a range of +/- 12dB.

There is a lighted IN/OUT switch for each equalizer at the lower left.

FRONT PANEL CONTROLS



CENTER FREQUENCY KNOB

This knob (the smaller, upper knob) selects the center frequency of the chosen EQ band. The pot is continuously variable allowing very precise selection of the desired frequency.

BOOST/CUT KNOB

The larger, lower knob controls Boost or Cut within the chosen frequency range. With the pot in the straight up (12 o'clock) position, no change in the tonal balance of the selected range will be applied.

IN/OUT SWITCH

The IN/OUT switch will place the SV14 into the active audio path.

In the OUT position, the EQ circuit is bypassed. The audio still passes through the input and output buffers.

All 4 equalizer bands have peaking (also called "bell" in the UK) response characteristics. While the central frequency of that boost (or cut) is the one engraved on the panel, there is of course amplitude variation that occurs to a lesser extent on nearby frequencies. This is termed the 'Q' where higher Q's have less effect on adjacent frequencies.

Technical Specifications - SV14

Connectors: API 500 Edge Connector VPR Alliance Compliant

Input Impedance: 15KOhms Balanced

Output Impedance: 75 Ohms, Transfomer Balanced

Bandwidth: +/- 0.5db, 20Hz - 50kHz THD+N @ 1kHz, +4dBu: <0.02%

Maximum Level: +24dBu Signal-to-Noise Ratio: 115dB

EQ Bands: 4 bands, all +/-12db Peak/Dip type

Lo: 20Hz - 200Hz

Lo-Mid: 100Hz - 1kHz Hi-Mid: 500Hz - 5kHz

Hi: 2kHz - 20kHz

Power Consumption: +/- 16 VDC @ 35mA

Unit Size: 1U 500 Module, 1.5" x 5.25" x 7.0"

Shipping Size: 4.5" x 6.5" x 10"

Unit Weight: 1.5 lbs

Shipping Weight: 2.0 lbs

(Specifications subject to change without notice)

API Limited Warranty and Service Information

- a) Warranty Information: API products carry a one year factory service and five year parts warranty from date of purchase. API (Automated Processes, Incorporated) does not cover claims for damage due to alteration and/or abuse. This warranty is limited to failures during normal use, which are due to defects in material or workmanship. If any defects are found in the materials or workmanship, or if the product fails to function properly during the applicable warranty period, API, at its option, will repair or replace the product.
- b) PLEASE NOTE: The design or quality of any non-authorized third party service or vendor is beyond the control of API. Therefore, use of NON-API VPR Alliance modules in any API product including consoles may VOID this warranty. Also, service or modification of any API unit except by an authorized API representative may VOID this warranty.
- c) API reserves the right to inspect any products that may be the subject of any warranty claims before repair or replacement is carried out. Final determination of warranty coverage lies solely with API.
- d) This warranty is extended to the original purchaser and to anyone who may subsequently purchase this product within the applicable warranty period. Proof of purchase may be required.
- e) For questions regarding operation, interfacing or service of your API product, please contact your API dealer from whom you purchased the unit. Many times, your authorized API dealer is the fastest and most cost-effective way to maintain and service your product.
- f) The below steps are the best way to initiate the repair process or to submit a parts order request:

Repair procedure:

- 1. Fill out a Return Authorization(RA) form at service.apiaudio.com.
- 2. Wait to receive an e-mail from API Audio with an RA#.
- 3. Use the API original box to package the unit. Write the RA# large and legibly on the box (if the RA# is not clearly visible on the box, the unit may be rejected by our receiving department)
 - 4. Include copy of the RA form with the unit.
 - 5. Ship the product freight prepaid to:

API SERVICE DEPARTMENT 8301 Patuxent Range Road Ste A1 Jessup, MD 20794

Parts Order procedure:

- 1. Fill out online PO form (for parts and parts numbers not listed online please fill out PO form with your name, e-mail, contact phone and shipping address and describe the part you need).
 - 2. Submit online PO form.
 - 3. API will e-mail you back with part numbers and procedure how to order/pay.
- g) This is your sole warranty. API does not authorize any third party, including any dealer or sales representative, to assume liability on behalf of API or to make any warranty for API.
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