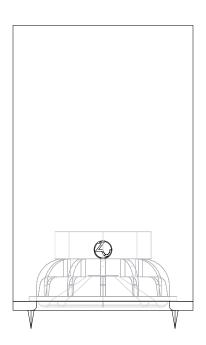
UNDERTONE Mk.I

[Rev-A]



AD COPY + SPECIFICATIONS

2012



UNDERTONE AD COPY

Undertone is designed to compliment high-resolution loudspeakers and gives excellent integration of sub-contrabass content—music or film. If you are looking for an agile, deep and powerful subwoofer system, that is flexible and incredibly musical, consider Undertone.

Undertone is designed to compliment playback systems that have great sound down to about the kick drum (50Hz or so) but lack a sense of glory and tranquility that deep bass done right can give. The stereo and home theater systems I'm referring to usually feature large monitors or medium to large floor-standing loudspeakers that get you a good impression of bass but lack sincere detail of body and weight. Undertone is for those searching for that missing majesty and space; for systems that need that added tone in the foundation of big/deep music and soundscapes—and without that slow and foggy one-note sound of a modern under-built subwoofer.

Undertone features the same electronics and awesome Eminence LAB-12 sub-woofer driver and tuning we developed for our Definition Mk.IV loudspeaker, but strips out the high cost of the machined aluminum alloy electronics enclosure and massive base. Undertone is all about giving you near state-of-the-art subwoofer performance for a very reasonable amount of cash. For those that have heard our Definition Mk.IV loudspeaker, the performance is pretty close, getting you about 85% of the quality of deep bass sound and

100% of the power.

UNDERTONE QUICK SPECS

Height: (with spikes) 25" [635 cm] Footprint: 15 x 15" [38 x 38 cm] Weight: 68 pounds [31 kg] each

Bandwidth: 14 - 80 Hz

Line-Level Input: yes, RCA (left and right summing)

Sub Line-Level Input: yes, RCA

Speaker-Level Input: yes, 5-way binding posts (L/R summing)

Tunability: very

DSP Bypass: yes, switched for those that want to integrate more elaborate signal processing but desire to take advantage of the excellent amplification of Undertone.

Driver: the awesome Eminence LAB-12 Plate Amp: Zu Subwoofer Plate Amp Mk.II

Power: Hypex UCD 400

Hypex amp module made in Netherlands Eminence LAB-12 made in Eminence, Kentucky, U.S.A.

Balance of the system designed and made In Ogden, Utah, U.S.A.



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CABINET CONSTRUCTION

Undertone is made from North American high-density composite wood plate (comp-60) and is machined on state-of-the-art CNC mills in Utah and Idaho. Undertone uses real wood veneer pressed at the plywood factory and is not laid-up post cabinet assembly. This ensures your finish will not lift or warp, and it yields the flattest surfaces and tightest seams. For glue, it's Titebond-III, for the highest joint strength and a lifetime of unfailing, moisture-proof service.

FINISH

Standard wood finishes are top coated by UV protecting premium grade conversion varnish. All finish work is done in Zu's custom finish shop in Ogden. Other finishes—anything you can dream—are available through the Zu custom shop, inquire for pricing.

ACOUSTIC TECHNOLOGY

Old-school, in all the best ways; Undertone is a medium compliance, sealed enclosure system where the restorative driver forces are shared between the driver's suspension (spider is primary) and the air in the cabinet. Undertone continues our tradition of making quick, details "sealed" subwoofers.

SUBWOOFER PLATE-AMP DETAILS

Undertone's electronics really perform and offer just enough tunability to be useful and not overwhelming. The amplifying module is the highly regarded Hypex UcD 400. And Undertone's electronics were designed to accepts unfiltered left and right RCA line-level inputs, home theater subwoofer signal, and unfiltered loudspeaker-level feeds (taping only signal). Undertone is also able to integrate with high efficiency loudspeakers like ours without having to jump through hoops with gain and volume matching. Some design highlights include:

- Hypex UCD 400 amp module.
- ALPS pots for volume and signal processing control.
- Zu Event #28 hookup wire on signal feeds.
- 3M IDC adhesive locking terminals.
- Panduit disconnect terminals.
- Neutrik RCA jacks (sound great and as tough as it gets).
- Extra large toroidal transformer and overbuilt linear power supply.
- Machined 1/4" [6.3mm] 6061 aluminum amp plate.
- Nova Color anodizing.
- Custom machined knobs.
- Insulated 5-way binding posts.
- Gain structure of preamp section is designed to accommodate both low and high-efficiency loudspeakers.



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TIPS ON GETTING GREAT SOUND FROM UNDERTONE

Undertone subwoofers only get two days of play before leaving the factory, and while it is high-intensity and shakes the bugs out, you will find Undertone to sound better after a few weeks of heavy play. And of note, if they are transported in cold weather, they take several days to "warm up" and return to giving you their best.

Make sure you have a 3/4" [20 mm] or more gap between the bottom of the loudspeakers and the floor; the down-firing woofer needs a bit of room to breath.

WHAT'S INCLUDED

Four (4x) stainless-steel ball-end footers for use with hard surface flooring. Four high strength spikes to be used to punch through and anchor the subwoofer through carpets and rugs.

Four (4x) stainless-steel low profile nuts for locking the footers in place. 9/16" wrench size; 14 mm also works but it's tight. The thread size for those interested in trying aftermarket footers is 3/8-16.

Thanks for your interest, and please don't hesitate to call or email, we love what we do and we are here to help.



UNDERTONE SPECIFICATIONS

ZU AUDIO UNDERTONE Mk.I [REV-A] SUBWOOFER SYSTEM SPECIFICATIONS

Design

Undertone is a high-resolution internally powered downward-firing subwoofer system. It accepts line-level signals including "sub" and loudspeaker-level signals. The acoustic design is a sealed system with moderate acoustic, mechanical and electrical damping. Subwoofer plate amp is built to a very high standard, yet has been engineered for field service in the unlikely event that service is needed.

Production September 2012

HWD 23 x 15 x 15 [58.4 x 38.1 x 38.1 cm] (note that height does not factor feet)

Footprint 15 x 15" [38.1 x 38.1 cm] **Weight** 68 pounds [31kg]

Packaged FlexPak, one loudspeaker per shipping box, 77 pounds [35 kg]

Driver Complement 1x Eminence LAB-12

Subwoofer Amp Type Class-D analog switching amp with heavy-duty linear power supply. Amplifier module is Hypex DS4 UcD

400-V5.

WARNINGS RISK OF ELECTRIC SHOCK. Dangerous voltages are present inside case during operation. DC output voltage

is 50 volts up and down, 100 V DC total. System is not intended for outdoor use, do not expose to rain or

moisture.

RECOMMENDATIONS We recommended unplugging your loudspeakers, main amplifier(s) and other regarded electronics during

lightning storms or when the playback system will not be used or for an extended period of time. We also

recommend that you switch the power off between daily use.

Safety Standards & Compliance 60065 | EMC 2004/108/EC | 2006/95/EC | 55103 | RoHS | CE | WEEE | Class-2 subwoofer amplifier

Mains AC Power 50/60 Hz, 115 or 230 volt (transformer is 115/230 V wound and factory wired for your region).

Mains AC Connection C13/C14

User Serviceable Fuse 115V AC mains = 10A | 230V AC mains = 8A

Should the fuse blow replace it with an equivalent part. A spare fuse is located within the fuse holder, located just below the power inlet and only accessible when the power cable is not plugged into the inlet. A

small flat-blade screwdriver is required.

Power Consumption 600 W maximum // 8 W idle

Damping Factor 500

Self Protection output short-circuit

Input Impedance Speaker Level 500 Ω

Infrasonic Filter 12 Hz // 24 dB/octave butterworth

Adjustable Gain -110 dB ~ 0 dB

Adjustable High-Pass Filter 10 ~ 110 Hz

High-Pass Filter Slope & Character 18 dB/octave linkwitz-riley

PEQ Boost 0 ~ +6 dB

PEO Boost Bandwidth 1/2 octave

PEQ Frequency 20 ~ 50 Hz

Phase 0 ~ 180° // 180° ~ 360°

NO BRIDGED MAIN AMPLIFIERS Undertone presents a virtual ground node to the external main amplifiers' speaker negative (SP-) output.

Bridged amplifiers will see this as a short and self protect. If you are using a receiver or If your main amp

does not say BRIDGED there's nothing to worry about.

Warranty & Service 2-year limited. Removing the amplifier from cabinet is simple, and though Zu and Hypex have designed the

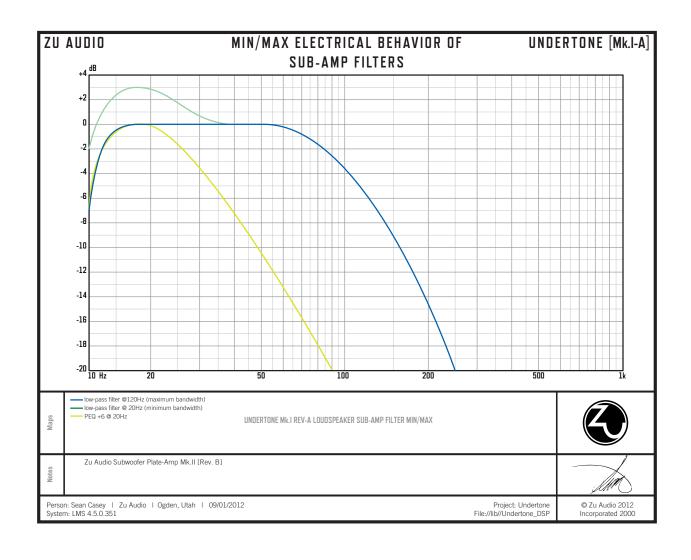
electronics to the highest standards of fidelity and durability, shit still happens. In the event that service is required, Zu offers an amplifier exchange program so you can quickly get your system back up and running

quickly and with minimal hassle.



UNDERTONE SPECIFICATIONS

ZU AUDIO UNDERTONE Mk.I [REV-A] SUBWOOFER SYSTEM SPECIFICATIONS





UNDERTONE WARRANTY

ZU AUDIO UNDERTONE Mk.I [REV-A] SUBWOOFER SYSTEM SPECIFICATIONS

Zu products are designed and manufactured to the highest quality. However, if something does go wrong Zu will fix or replace the product free of charge. Zu Undertone subwoofer have a five year limited warranty on the driver and cabinet, two years on the electronics, from date of purchase to original owner. If under normal home use you have any problems with drivers, cable, parts, cabinet, we will fix or replace the product. Loudspeaker warranty and service can usually be performed by the user, also known as DIY service, in such cases Zu will provide full technical support. This provides faster repair of product (reducing down time is always good), minimizes handling hassle and damage potential to both Zu and you, and reduces shipping costs.

Zu loudspeaker finish warranty covers color changes in paint, finish checking, and oxidizing. While we use the highest quality UV protecting topcoat finishes, we cannot guaranteed against fading and you should keep them out of direct sunlight, just like a piano. While every effort is made to ensure a perfect finish that will last a lifetime, this warranty does not cover damage from impact and abrasion, or seam / core construction visibilities in extreme high temperature / high humidity environments. Zu products are designed to be used in temperature and humidity controlled environments, namely your home or office unless otherwise stated. Warranty does not cover loudspeaker finish damage caused by the extremes of an uncontrolled environment.

If in the highly unlikely event that a Zu product arrives to you dead on arrival (D.D.A.), and after discussing it with a Zu tech, we will ship another of the same product at our expense and arrange for the D.D.A. product to be collected. If after inspection we find that you have misrepresented a returned product's condition, and that it was improperly handled or used, Zu will charge you for all damaged parts, labor, shipping and handling of the product.

Warranty does not apply to damage caused by operating the product outside the intended use, accident, another product, misuse, abuse, flood, fire, earthquake or any other external causes. Warranty does not cover damage caused by modification or service performed by anyone other than a Zu representative. Cosmetic damage is also excluded from warranty.

When a product or part is exchanged the replacement becomes your property and the suspect or damaged part becomes Zu's property. Parts provided by Zu must be used in products for which the warranty service is claimed.

WHAT YOU CAN EXPECT IF WARRANTY SERVICE IS NEEDED

If warranty becomes necessary, you must call or email for a return of material authorization (R.M.A.) number, or to arrange for user serviceable parts. This provides opportunity to assist in diagnosing the problem and helps us to schedule for rapid turnaround in the event that parts, service or repair is needed. Upon factory inspection of parts or product, warranty eligibility will be determined. While service options, parts availability and response times will vary, we do our best to keep you happy. International customers should know that Zu will comply with all applicable export / import laws and regulations, you may be responsible for custom duties, taxes, broker fees, freight, and other charges. When shipping of product or part is required, repackage the complete product, or part, in its original packaging. If you have any questions about packaging please call or email. Product damage caused from incorrect repackaging is not eligible for refund or warranty and the freight company may also reject your insurance claim. Until we have the product back in the shop and sign-off that it is eligible, the product is still your property, we recommend you insure or declare the full value when shipping. We also recommend that you only ship with a freight company that has a good reputation and offers tracking and insurance for the full amount.





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