

*Definitive Technology*<sup>®</sup>  
*The Leader in High-Performance Loudspeakers*<sup>®</sup>

# UIW RSS II<sup>TM</sup>

Reference Series In-Wall/In-Ceiling Surround Speaker

## **Owner's Manual**

### *Congratulations*

Congratulations on your purchase of the Definitive Technology UIW RSS II Loudspeaker. This reference quality loudspeaker provides the highest level of sonic performance and construction quality and is designed for easy flush-mount installation in ceilings or walls of homes and commercial spaces. Six years of intensive research and development by Definitive engineers, working in collaboration with one of the world's leading industrial design firms, has produced the finest architectural loudspeakers on the market. The beautiful upscale designer styling of this model is perfect for the finest homes belonging to the most discriminating homeowners.

## The UIW RSS II Loudspeaker

The RSS II:

- Incorporates high-power, high-definition cast-basket Definitive bass/midrange drivers combined with pressure-coupled low-frequency radiators and state-of-the-art Definitive 1" dome tweeters.
- Incorporates polypropylene cones with butyl rubber surrounds.
- Incorporates a complete precision crossover system designed by Definitive engineers for seamless driver blending.
- Incorporates a completely sealed non-resonant mediate enclosure to assure you of laboratory reference quality performance in your home.
- Is moisture resistant to allow use in bathrooms, etc.
- Is easily paintable and comes complete with mounting templates and plastic paint masks.
- Can be used as an exceptional rear/side surround or main speaker in a state-of-the-art home theater system or as stereo pairs in a 2-channel music system.

## The Sound Quality Is Extraordinary

The UIW RSS IIs have been voiced by Definitive engineers (using the superb facilities of the Definitive Technology Advanced Research Facility) to the same high-end standards as all Definitive loudspeakers. The drivers and baffles are perfectly integrated into the design to minimize the diffraction problems that are inherent with most other in-wall loudspeakers. To ensure that you experience the finest performance possible from your UIW RSS IIs, we encourage you to read this owner's manual to familiarize yourself with the proper installation and set-up procedures.

## Unpacking Your UIW RSS II Loudspeakers

### Please Inspect For Shipping Damage

Each loudspeaker leaves our plant in perfect condition. Any visible or concealed damage most likely will have occurred in handling after it left the plant and should be reported at once to your Definitive dealer or the delivery company that delivered your loudspeakers. Please unpack your system carefully. Save all cartons and packing materials in case you move or need to ship your system. Record the serial numbers found on the carton of the UIW RSS II Loudspeakers in the appropriate place on your warranty card.

## **UIW RSS II Applications**

The UIW RSS II is designed to be mounted in ceilings or in walls as a rear or side surround speaker in stealth home theater systems of the highest quality. In addition, they can be used as a front left, right or center main speaker in a home theater or as a left or right stereo speaker.

## **UIW RSS II Positioning**

Definitive's UIW RSS II Loudspeakers are designed to be mounted in walls or ceilings with excellent results. Because of their wide dispersion characteristics and other aspects of their superb sonic performance, mounting position in your room is very flexible. Due to the different requirements of the wide variety of room shapes and sizes, we recommend that you consult with the custom installation specialist at your Definitive Technology dealer regarding your own particular needs.

As a general guide when using the RSS II as a surround speaker:

- Try not to locate the RSS IIs forward of the main listening position.
- If ceiling-mounting these speakers directly on either side of the main listening position, the speakers should be oriented so that one set of drivers shoots at the listening position and the other set shoots away from the listening position.
- If ceiling-mounting the speakers directly behind the main listening position, orient the speakers so that one set of drivers shoots towards the listening position and the other set shoots back away from the listening position.

## **Your Complete Definitive Home Theater**

For best results, we recommend that you use Definitive speakers in combination with your RSS IIs for the best overall sonic performance.

## **Painting Your UIW RSS II Loudspeakers**

The UIW RSS II Loudspeakers are easily paintable and are shipped with plastic paint masks (which should be retained even if you initially decide not to paint the speakers). The grille and frame must be painted separately, and for best results, prior to installation.

For the grille, spray painting is the recommended method. Follow the paint manufacturer's directions for ventilation and correct spraying procedure. Be very careful not to clog the speaker grille with too heavy a coat of paint as this will impair system sonic performance.

For the frame, spray painting is preferred but brush or roller will also give good results. The supplied frame masks should be put in place to protect the speaker components for whichever method you choose.

## Installation Procedure Overview

The RSS II is designed to be installed inside the wall or ceiling of your home quickly and easily. Because of its superb sonic performance, installation location within your room is very flexible. Your room is not like anyone else's room, and because of its unique size and shape will have its own requirements for optimal sonic performance. We recommend that you consult with the Custom Installation Specialist at your Definitive Technology dealer regarding your special needs or if you are at all uncertain about the best and safest way to install your RSS II.

- Installation of this product must follow all local and state building code requirements. We strongly recommend using a qualified, professional installer who is knowledgeable of local building codes.
- The UIW RSS II is designed for both In-Wall and In-Ceiling mounting.
- For In-Ceiling mounting, you will need to shim (or frame in the enclosure) with appropriate framing material.
- Before starting construction or modification of your ceiling, you should familiarize yourself with any applicable local fire and building codes
- Make sure the locations you select do not conceal studs, electrical wiring or plumbing. Prior to installation, hold the speaker in your chosen location to make sure it meets the clearance requirements around obstacles such as studs, corners, beams, lighting fixtures and door/window frames
- For In-Wall mounting, the speaker requires 1/4" of clearance inside the wall, on all four sides of the cutout, to clear the lock arms. If the desired location is closer than 1/4" to a stud on one of the long sides of the speaker, the long side of the speaker enclosure must be installed directly against the stud to prevent rattling.
- For In-Ceiling mounting, the speaker enclosure must be directly against two joists and/or framing material on the two long sides that are to be fastened with the screws. 1/4" of clearance is required on the two remaining sides of the enclosure to clear the lock arms.
- For all mounting applications, 1" of clearance is required around the cutout, on the outside mounting surface, to clear the speaker bezel.
- Also note that the installation of the RSS II may require some modification of the joist structure in your ceiling. This should only be done by a competent professional who will configure the studs to maintain their structural integrity and make sure that everything is in compliance with all local and state building code requirements.

## Installation Procedure Overview (continued)

- Speaker wire must be run inside your ceiling as part of the installation process of in-wall loudspeakers. Plan the connection before you start your loudspeaker installation.

## Step-by-Step Installation

### Mounting options overview

- Installation of this product must follow all local and state building codes. We strongly recommend using a qualified, professional installer who is knowledgeable of local building codes.
- The UIW RSS II is designed to be mounted vertically In-Wall, and either in-line with or at 90° to joists In-Ceiling.
- For In-Ceiling mounting, you will need to shim (or frame in the enclosure) with appropriate framing material along one or both of the long sides of the speaker.

### Required cutout and cavity size for In-Wall Installation

- Template cutout size: 11<sup>5</sup>/<sub>8</sub>"W x 9<sup>7</sup>/<sub>8</sub>"L.
- Minimum size of cavity required inside wall is as follows:
  - Depth: 3<sup>7</sup>/<sub>8</sub>"
  - Height: 13<sup>7</sup>/<sub>8</sub>"
  - Width: 12<sup>1</sup>/<sub>8</sub>" *See Diagram 1, page 10 for reference.*
  - Width: 11" (where desired location is closer than 1<sup>1</sup>/<sub>4</sub>" to a stud on one side) *See Diagram 2, page 10 for reference.*
  - Width: 9<sup>7</sup>/<sub>8</sub>" (where desired location is closer than 1<sup>1</sup>/<sub>4</sub>" to a stud on two sides) *See Diagram 3 & 4, page 11 for reference.*

### Required cutout and cavity size for In-Ceiling Installation

- Minimum size of cavity required inside wall is as follows:
  - Depth: 3<sup>7</sup>/<sub>8</sub>"
  - Width: 9<sup>7</sup>/<sub>8</sub>" between joists/framing material on sides with wood screws.
  - Height: 13<sup>7</sup>/<sub>8</sub>" between obstructions at ends where lock arms are to be used (top & bottom ends) (1<sup>1</sup>/<sub>4</sub>" of space required on each end of the speaker to clear lock arms).

## Hole location options and requirements

- In-Wall installation for studs spaced 16" on-center (or more):
  - Place template at least 1<sup>1</sup>/<sub>4</sub>" away from existing studs (to clear lock arms). Template does not need to be centered between studs.
  - Trace around template with pencil.
  - Cut hole.  
*See Diagram 1, page 10 for reference.*
  
- In-Wall installation for studs spaced 16" on-center (or more) where desired location is closer than 1<sup>1</sup>/<sub>4</sub>" to stud:
  - Place template against inside of existing stud.
  - Trace around template with pencil.
  - Cut hole.  
*See Diagram 2, page 10 for reference.*
  
- In-Ceiling installation, in-line with joists spaced 16" on-center (or more):
  - Place template against inside edge of existing joist.
  - Trace around template with pencil.
  - Cut hole.
  - If required, install supporting cross braces inside cavity.
  - Install framing material inside cavity, running parallel to existing joists, leaving 9<sup>7</sup>/<sub>8</sub>" between frame sides.  
*See Diagram 3, page 11 for reference.*
  
- In-Ceiling installation, centered, in-line with joists spaced 16" on-center (or more):
  - Center template between inside edges of existing joists.
  - Trace around template with pencil.
  - Cut hole.
  - If required install supporting cross braces inside cavity.
  - Install framing material inside cavity, running parallel to existing joists, leaving 9<sup>7</sup>/<sub>8</sub>" between frame sides.  
*See Diagram 4, page 10 for reference.*

- In-Ceiling installation, 90 degrees to joists spaced 16" on-center (or more)
  - Place template at least 1 1/4" away from existing joists (to clear lock arms).
  - Template does not need to be centered between joists.
  - Trace around template with pencil.
  - Cut hole.
  - Install framing material inside cavity, running 90° to existing joists, leaving 9 7/8" between frame sides.

*See Diagram 5, page 12 for reference.*

## **Gasket requirements and application**

- There are two sizes of gasket strips included in the accessory pack with the owner's manual.
  - 5 short gaskets.
  - 2 long gaskets.
- For ALL installations where cavity depth is 4" or less, the gaskets are to be applied as follows:
  - 3 SHORT gaskets are to be applied across the back of the wooden enclosure.
- For In-Ceiling and In-Wall installations where the side of the enclosure ends against a joist, stud or installed framing material:
  - One SHORT gasket is to be applied to each side of the enclosure that will be against the framing material. The SHORT gasket is designed to fit behind the bezel, between the lock arm openings.
  - One LONG gasket is to be applied to each side of the enclosure that will be against the framing material.

## **Connecting the speaker**

- Run color-coded wires between the speaker cavity and amplifier unit. When running the wires inside the ceiling to the opening, leave a minimum of 18" of additional length in the cavity to facilitate speaker connection.
- Fish wiring out of hole.
- Connect the speaker wires to the UIW RSS II taking care to make red to red (+) and black to black (-) terminal connections.
- Refer to your amplifier or receiver loudspeaker wiring instructions, turn off the unit and connect the speaker wires to the appropriate colored output terminal on the unit, again making red to red (+) and black to black (-) connections. This will ensure absolute phase throughout the system.

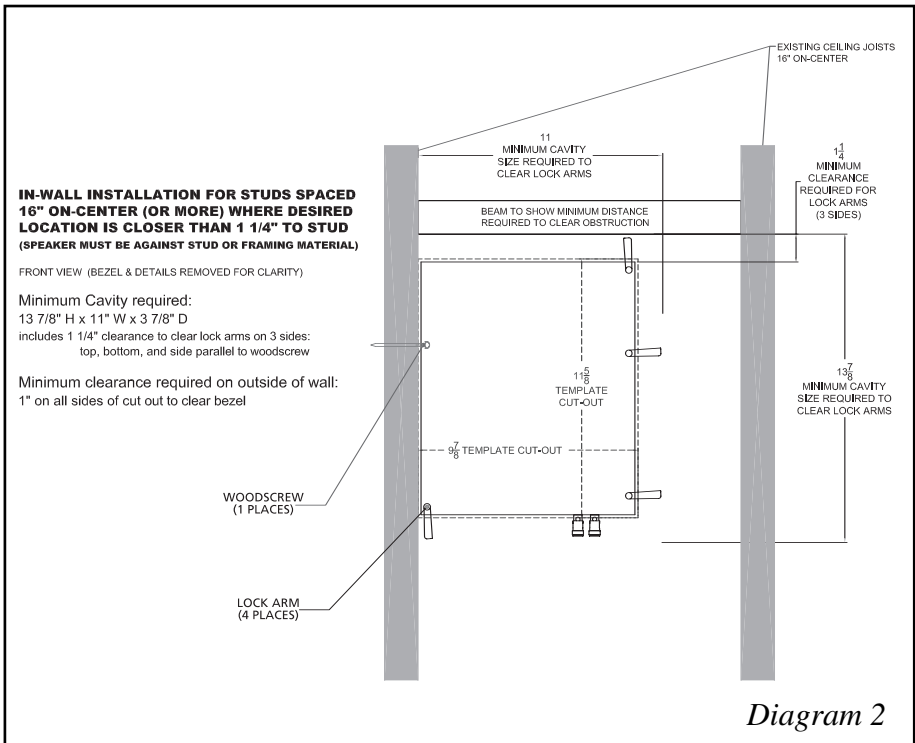
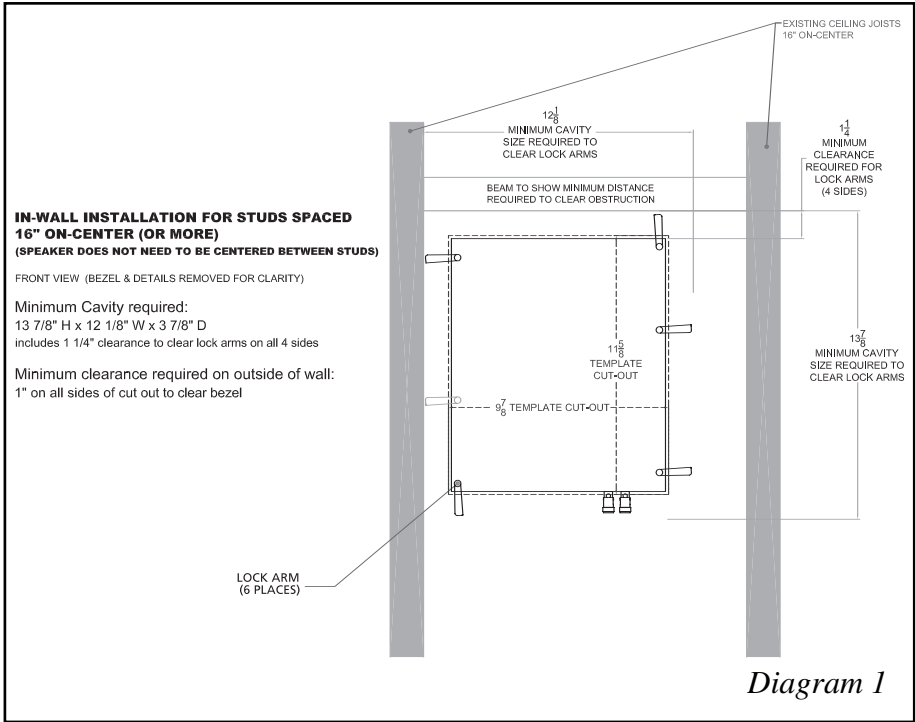
## Securing speaker

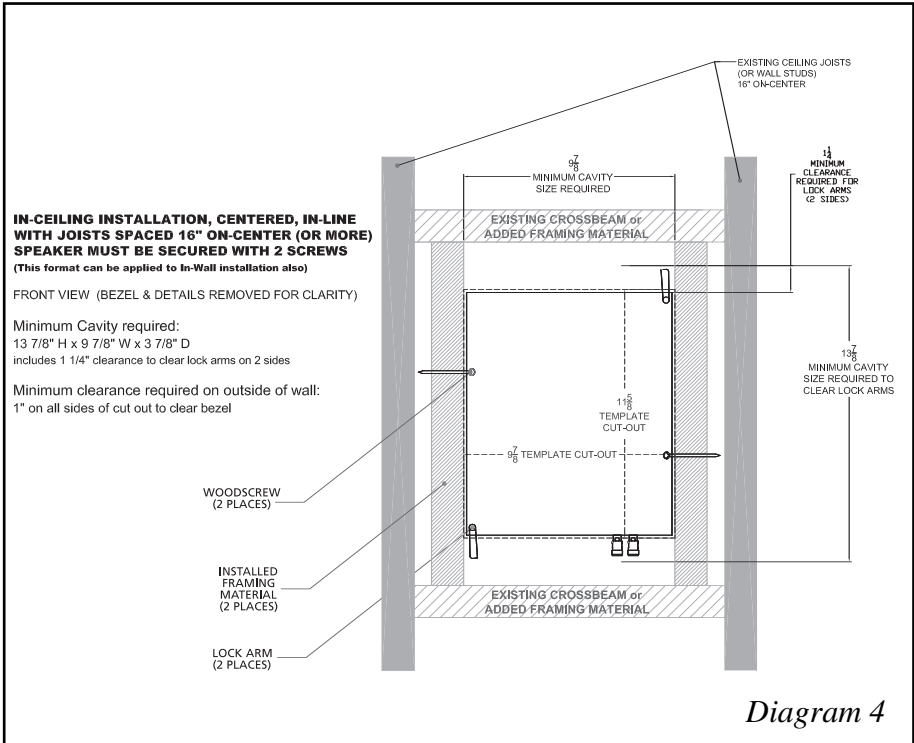
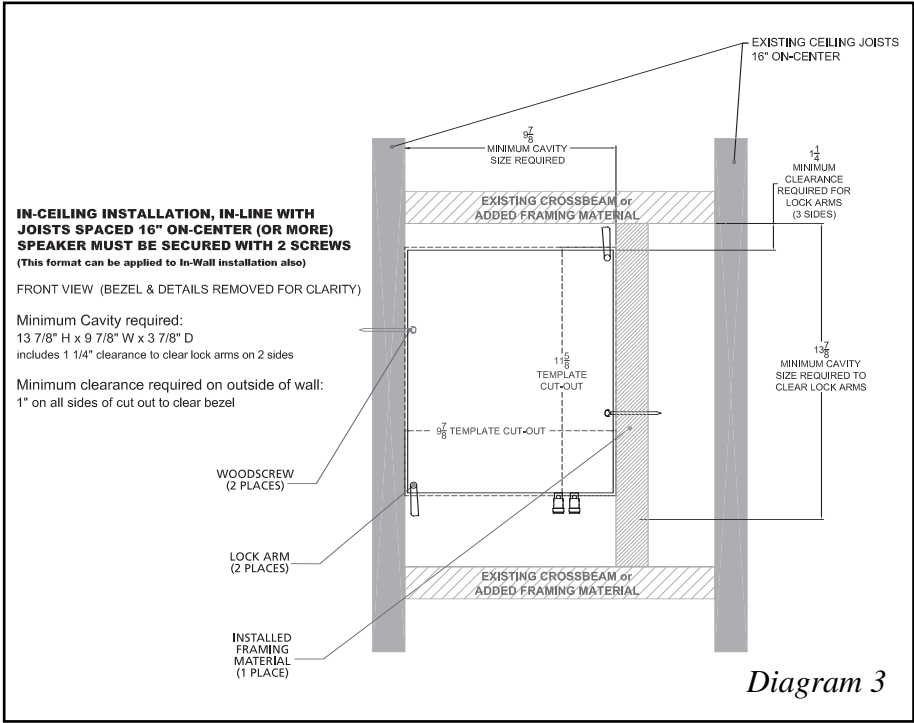
- Installation of this product must follow all local and state building code requirements. We strongly recommend using a qualified, professional installer who is knowledgeable of local building codes.
- We recommend holding the unit by the bezel and outer edges of the speaker to avoid damaging the drivers.
  
- For In-Wall installation as illustrated in *Diagram 1, page 10*:
  - Place speaker in hole and secure all six lock arms.
  
- For In-Wall installation as illustrated in *Diagram 2, page 10*:
  - Place speaker in hole and secure wood screw through the hole in the front baffle to stud.
  - Secure four lock arms (one top, one bottom and two on side not against stud).
  
- For In-Ceiling installation as illustrated in *Diagrams 3 and 4, page 11, and Diagram 5, page 12*:
  - The speaker **MUST** be secured using two screws provided. Screws insert in hole of front baffle.
  - Place speaker in hole and secure to joists (or framing material) with two screws provided. Tighten screw on one side before installing and tightening opposing side.
  - Secure two lock arms (top and bottom).

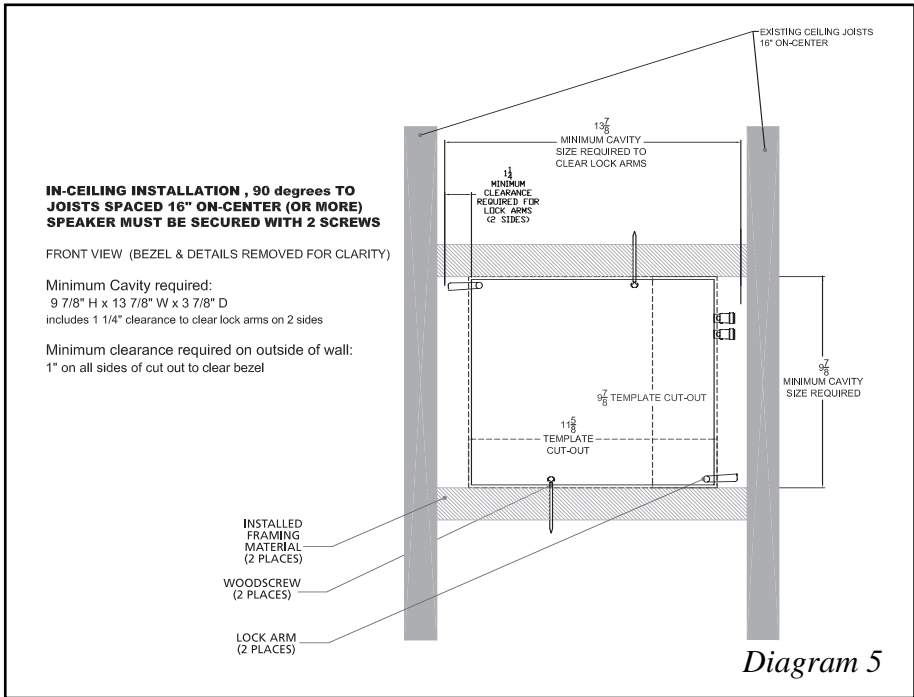
### **\*VERY IMPORTANT\***

**Please note that the pivoting lock arms are not designed to support the weight of the speaker in In-Ceiling installations. They only provide a secondary support and are there to pull the speaker tight to the ceiling and prevent it from rattling. Do not use them for supporting the speaker in In-Ceiling installations. The screws going through the speaker and into the joists are to support the speaker and must be installed properly.**









## Troubleshooting Your UIW RSS II Speakers

If you experience any difficulties with your UIW RSS II Loudspeakers, try the suggestions described below. If you are still having problems, please consult your Definitive Technology authorized dealer for assistance.

- Make sure all your system interconnections and power cords are solidly in their place.
- Check to be sure that the power cords and/or speaker wires have not been damaged.
- Many amplifier/receivers have sophisticated internal protection circuitry. If for some reason the protection circuitry is tripped, please turn down the system's volume and wait five minutes before trying the system again.

## Technical Assistance

It is our pleasure to offer assistance if you have any further questions or comments. Please feel free to contact our technical support staff at Definitive Technology, 11433 Cronridge Dr., Suite K, Owings Mills, MD 21117 or call (410) 363-7148.

## Service

Service and warranty work on your Definitive loudspeakers will normally be performed by your local Definitive Technology dealer. However, if you wish to return the speaker to us, please contact us first, describing the problem and requesting authorization as well as the location of the nearest factory service center. **Please note that the address given in this booklet is the address of our offices only. Under no circumstances should loudspeakers be shipped to our offices or returned without contacting us first and obtaining return authorization.**

Definitive Technology Offices  
11433 Cronridge Dr.  
Suite K  
Owings Mills, Maryland 21117  
Phone: 410-363-7148

## UIW RSS II Specifications

### UIW RSS II

<b>Outer Dimension:</b>	12 <sup>3</sup> / <sub>4</sub> " W x 11" H
<b>Cut-out Size:</b>	11 <sup>5</sup> / <sub>8</sub> " W x 9 <sup>7</sup> / <sub>8</sub> " H x 3 <sup>7</sup> / <sub>8</sub> " D
<b>Recommended Amplification:</b>	10 – 200 watts
<b>Frequency Response:</b>	26 Hz – 30 kHz
<b>Nominal Impedance:</b>	Compatible with 8 ohm outputs
<b>Driver Complement:</b>	Two 4 <sup>1</sup> / <sub>2</sub> " high-definition cast-basket bass/midrange drivers, two 4 <sup>1</sup> / <sub>2</sub> " pressure-coupled low bass radiators, two 1" pure aluminum dome tweeters

Specifications subject to change without notice.

## **Limited Warranty: 5-Years for Drivers and Cabinets, 3-Years for Electronic Components**

Definitive Technology warrants to the original retail purchaser only that this Definitive Technology Loudspeaker Product (the "Product") will be free from defects in materials and workmanship for a period of five (5) years covering the drivers and cabinets, and three (3) years for the electronic components from the date of the original purchase from a Definitive Technology Authorized Dealer. However, this warranty will automatically terminate prior to the expiration of five (5) years for the drivers and cabinets and three (3) years for the electronic components if the original retail purchaser sells or otherwise transfers the Product to any other party. The original retail purchaser shall hereinafter be referred to as "you." Defective Products must be shipped, together with proof of date of purchase, prepaid insured to the Authorized Dealer from whom you purchased the Product, or to the nearest factory service center. Product(s) must be shipped in the original shipping container or its equivalent; in any case the risk of loss or damage in transit is to be borne by you. If, upon examination at the Factory or a Definitive Technology Authorized Dealer, it is determined that the unit was defective in materials or workmanship at any time during this Warranty period, Definitive Technology or the Definitive Technology Authorized Dealer will, at its option, repair or replace this Product at no additional charge, except as set forth below. All replaced parts and Product(s) become the property of Definitive Technology. Product(s) replaced or repaired under this Warranty will be returned to you, within a reasonable time, freight collect.

*This Warranty does not include service or parts to repair damage caused by accident, misuse, abuse, negligence, inadequate packing or shipping procedures, commercial use, voltage in excess of the rated maximum of the unit, cosmetic appearance of cabinetry not directly attributable to defects in materials or workmanship, or service, or repair or modification of the Product which has not been authorized by Definitive Technology. Definitive Technology makes no Warranty with respect to its Products purchased from dealers or outlets other than Definitive Technology Authorized Dealers. This Warranty is in lieu of all other expressed Warranties. If this Product is defective in material or workmanship as warranted above, your sole remedy shall be repair or replacement as provided above. In no event will Definitive Technology be liable to you for any incidental or consequential damages arising out of the use or inability to use the Product, even if Definitive Technology or a Definitive Technology Authorized Dealer has been advised of the possibility of such damages, or for any claim by any other party. Some states do not allow the exclusion or limitation of consequential damages, so the above limitation may not apply to you.*

*All implied warranties on the Product are limited to the duration of this expressed Warranty. Some states do not allow limitation on how long an implied Warranty lasts, so the above limitations may not apply to you. This Warranty gives you specific legal rights, and you also may have other rights which vary from state to state.*



**This product complies with the essential requirements of EMC directives 89/336/EEC and 73/23/EEC (inclusive of 93/68/EEC) and carries the CE mark accordingly.**