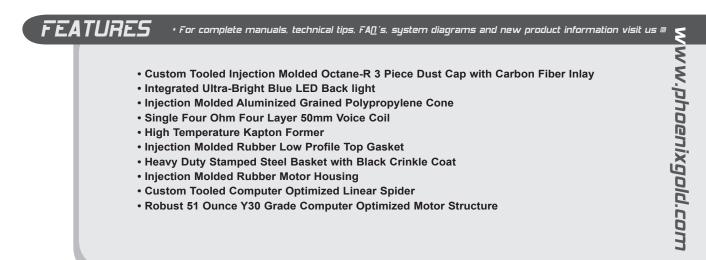
PHOENIX GOLD.



## Octane-R 15 inch High Excursion Subwoofer



## Speaker Anatomy

Injection Molded Plastic Badge that acts as a dust cap to highlight the Cosmetics of the Octane-R Amplifiers. Badge is Grained on the inside lip to match the cone and Custom plated with an Aluminum Matched color. Integrated openings for the Carbon Fiber Insert and Windows for viewing of the light emitted from the internal LED. The structural part of our proprietary three piece dust cap design. By using injection molding we can maintain a uniform wall thickness and reduce the weight normally associated with such a complicated dust cap assembly.

Low Profile Molded Rubber Gasket with Octane-R Graphics Vacuum Formed Frosted Viewing Windows that Glue to the underside of the Badge. When the internal LED is lit the Windows glow a Perfect Phoenix Gold Blue!

Aluminum Plated Injection Molded Grained Polypropylene Cone Color Matched to the Dustcap and Amplifier top plate!

> Large 51oz Computer Optimized Y30 Grade Ferrite Magnet structure with Low Carbon 1008 Steel Top and Bumped Back Plate assemblies.

Injection Molded Badge Insert with Carbon Fiber Texture and Grained Aluminum Cone Matched Hot Foil Stamping.

> Oversized Butyl Rubber surround to take advantage of the large excursion capabilities of the Octane-R woofer.

> > Integrated Large Ultra-Brite Blue LED mounted under the dust cap assembly lights the frosted windows when connect to +12v.

Heavy Duty Stamped Steel Basket with Crinkle Coat Black Powder to give the ultimate strength and "Cast" appearance. Injection Molded Rubber Magnet Housing to protect the motor assembly and Tie in the Octane-R Cosmetics.

Computer Optimized Flat Spider Design.

Four Layer High Temp Voil Coil on a Kapton Former.

## Speaker Design

The Octane-R subwoofer was developed from the ground up to compliment the amazing performance of our Octane-R Series amplifiers. Utilizing cutting edge design techniques, we can deliver a woofer that has an impressive peak to peak field excursion of up to 25mm. Coupled to a one piece injection molded polypropylene cone provides exceptional musicality at very high drive levels. All of the motor and suspension parts have been computer optimized to provide symmetrical driving force in both directions. This translates into very low distortion and exceptional output even as your amplifier is running out of steam.

# Enclosure Information

The Octane-R subwoofers are over engineered and overbuilt in virtually every way conceivable. Its very important that the enclosure is built to these same exacting standards. The enclosure must be comprised of .75 inch MDF. Screws or air staples are excellent construction fasteners when used with a strong bonding "yellow" wood working glue that can fill joint gaps. Be sure that the enclosure's panels are airtight at all joining seams. Lining the walls with a polyester matting 1 to 3 inches thick is sufficient.

Your PG dealer has extensive knowledge, tools and the experience needed for the design and construction necessary for your Octane-R subwoofer application. We also recommend you consult with your dealer for specific technical assistance related to your installation.

The charts provided should be used as a reference when building an enclosure for your Octane-R subwoofer. The charts contain several enclosure types. The Sound Quality enclosure provides deeper, tighter, and more musical output to truly reproduce the original source material. While the SPL fits the basshead's needs of maximum output while sacrificing some sound quality.

### Enclosure Recommendations

				15
	Sealed	Vented		
	volume ft <sup>3</sup> (L)	volume ft <sup>3</sup> (L)	port diameter	port length (mm)
	15	15	15	15
Musical	3.0 (85)	5.0 (141.6)	2 x 4"	10.9" (277)
SPL	1.0 (28.4)	3.0 (85)	2 x 4"	11" (280)

\*The above enclosures include the driver displacement.

15

#### Octane-R Woofer Dimensions

	15
Mounting Depth	7 1/2 in (190.5mm)
Mounting Diameter	13 3/4 in (349.25mm)
Overall Diameter	15 1/4 in (387.4mm)





Flying wires: LED Power

+ (red) = Switched 12 Volt Power

- (black) = Ground



### SPECIFICATIONS

#### Octane-R15 Subwoofer

Mounting Depth
Mounting Diameter
Overall Diameter
Peak Power Handling
RMS Power Handling400 Watts
Vdd (Driver Displacement) 0.19ft3 (5.4L

#### Octane-R15

T/S Parameters
Fs
Re
Qms
Qes
Qts
Vas
Mms
Cms
BL
SPL (efficiency)
Sd
Xmax (field)

### LIMITED WARRANTY

Phoenix Gold International, Inc. (or "Phoenix Gold") warrants its products against defects in materials and workmanship for a limited period of time. For a period of 1 year from date of original purchase, we will repair or replace the product, at our option, without charge for parts and labor. Customer must pay all parts and labor charges after the limited warranty period expires. The limited warranty period for factory refurbished products expires after ninety (90) days from date of original purchase. This limited warranty applies only to purchases from authorized Phoenix Gold Electronics/Speaker retailers.

This limited warranty is extended only to the original purchaser and is valid only to consumers in the United States. Consumers are required to provide a copy of the original sales invoice from an authorized Phoenix Gold dealer when making a claim against this limited warranty. This limited warranty only covers failures due to defects in materials or workmanship that occur during normal use. It does not cover failures resulting from accident, misuse, abuse, neglect, mishandling, misapplication, alteration, faulty installation, modification, service by anyone other than Phoenix Gold, or damage that is attributable to Acts of God. It does not cover costs of transportation to Phoenix Gold or damage in transit.

This warranty will become void if the serial number identification has been wholly or partially removed, altered or erased. Repair or replacement under the terms of this warranty does not extend the terms of this warranty. Should a product prove to be defective in workmanship or material, the consumer's sole remedies will be repair or replacement as provided under the terms of this warranty. Under no circumstances shall Phoenix Gold be liable for loss or damage, direct, consequential or incidental, arising out of the use of or inability to use the product. There are no express warranties other than described above.

PHOENIX GOLD.

PHDENIX GDLD INTERNATIONAL 9300 North Decatur Portland, OR 97203 Tel: 503.286.9300 Fax: 503.978.3380 www.phoenixgold.com