



BLUFIsh HD

High Definition remote head point of view camera housing

User's manual



Table of contents

Features / 4

BLuFish HD

Getting Started / 5



Unpacking / 6



Features & Controls / 7



Preparing Camera Head / 8



Sealing the connector / 9



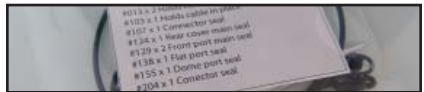
Installing Lens Port / 10-11



Installing rear cover / 12



Maintenance / 13



Specifications / 14

Weight (on Land):
Weight (in Sea water):
Weight (in Fresh water):





BLuFish underwater housing for the Iconix HD POV (HD-RH1) camera

Features

Your BLuFISH HD comes to you as a kit to assemble for the Iconix HD-RH1 POV camera head. The fully assembled system will give you access to high quality features such as:

- High Definition Images
- High Performance Controls
- Multi-Format Solution
- High Quality construction
- Corrosion resistant material
- Flat port and Dome port optics
- Pressure tested to 100 meters

BLuFISH HD

NOTE:

Before you use the system underwater for the first time, please read these instructions and test the system without the camera head and lens inside. This way should an error occur during initial O-ring installation which would cause the housing to flood you will not damage your camera.





Getting started

What to know about the ICONIX HD-RH1 1/3" Progressive 3CCD HDTV Camera

A revolutionary High Definition remote head point of view camera system providing a high-performance, multi-format solution in a small package.

Image Sensor

1/3-inch Progressive CCD

Optical System

1/3-inch 3-CCD Prism

Multi-Format:

720p @ 24,25,30,50 and 60 Hz

1080i @ 50 & 60 Hz

1080p @ 24, 25, 30, 50 and 60 Hz

700 Lines (720p), 900 Lines (1080i/p)

SDI, DVI-D, and Analog Outputs

14-Bit Quantization

Electronic Shutter and Enhancement

Programmable Gamma Function

Genlock and Remote Control



What to know about the LEMO Cable Assembly

10m Cable Part # 205004-B Price \$695

3m Cable Part # 205002-B Price \$495

Tripod Mount Part # 400015-B Price \$65





Unpacking

Thank you for buying the BLuFISH HD. This fully integrated system will provide you with all the necessary features for High Definition underwater POV imaging.

Your purchase of the BLuFISH HD comes with a 90 day warranty on parts and workmanship.

While precautions have been taken on the packaging and the shipping, some damage may have occurred during shipping. We suggest you inspect your BLuFISH HD package and the individual parts in order to see if any damage has occurred or if any parts are missing. If the external packaging appears to be damaged, we suggest you contact the shipping company directly for coverage.

When unpacking your system, you will find the following:

- BLuFISH HD Aluminum Housing
- Flatport Lens assembly
- Dome port assembly
- F-stop marker ring
- Iris ring stud
- Connector sealing assembly kit
- Connector sealing sleeve
- Rear Bulkhead
- Rear bulkhead sleeve
- O-ring tool
- O-ring lube
- Allen Key





Features & Controls

Features & Controls



- 1 - Dome port
- 2 - Iris ring
- 3 - Mounting shoe
- 4 - Flat port
- 5 - Locking screw
- 6 - Rear cover assembly
- 7 - Video cable





Preparing Camera Head

Preparing the Camera Head

Whether you are using the Fuji 2.8mm lens or the Fuji 4mm lens, the camera head preparation will be the same. The operation has to be done on the lens itself to adapt it to the BLuFISH lens adaptor. If the threaded mounting block is attached to the camera head, it will have to be removed, as the camera head will not fit into the housing with it on.

1. First, take your accessory lens (Fuji 2.8mm or 4mm) and securely screw it on the camera head.



2. Identify the philips head screw near the aperture values and unscrew it from the lens. Keep it close for use on step 3.



3. Place the Iris bushing as shown and secure it into place by screwing the philips head screw back into place. The bushing should be steady and solid. Do not over tighten the screw. This may cause damage to the lens.

By now, you should have your camera head all set for the final assembly. Leave the cover on in order to protect the lens





Sealing Connector

Sealing the connector

ASL assumes that you already have your LEMO Connector in hand before you start assembling the unit. Make sure when you prepare your cable that the cable diameter is around .215 inches or else the system will not seal correctly.

NOTE: Your BLuFISH HD Housing was shipped to you with a short piece of cable showing the order of assembly. Pay attention to this assembly as you take it apart so you'll be familiar with putting it together with your 18-pin LEMO connector.

1. First, insert the 2 rings, as shown, onto the LEMO cable. It is imperative that the smaller ring is inserted before going to step #2.

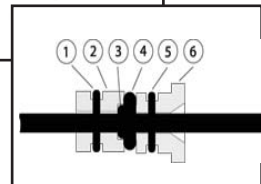
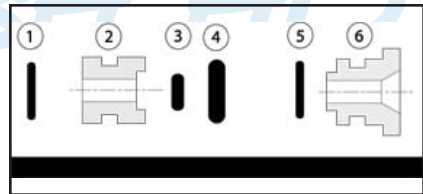
2. Prepare all the sealing sleeve parts so they line up as shown here. Insert the o-rings on the cable in the same order that you see in the diagram.

NOTE: O-rings #3 & #4 may be difficult to install on the cable. Use the o-ring tool to roll it over the connector. See image beside.

3. Respectively assemble the two pieces #2 and the two #6 as shown in the diagram. Hold them together by installing o-rings #1 & #5. Make sure that the configuration is exactly as shown. This way, you guarantee a perfect seal to your cable. Finally, push #2 and #6 together.

For more info on how to perform this operation, please refer to the instructional video at :

<http://www.airsealand.com/sales/gear/blufish/>





Installing lens port

Installing lens port

1. Locate the notch that is machined on the front lens port. Slide the camera lens into the lens port and line up the Iris bushing with the notch so the camera lens sits properly in the port. At the same time, inspect the o-rings on the lens port in order to see if there is dirt or debris. If any, gently wipe it off with your finger or a lint free tissue. Add some silicone grease (provided) if necessary.

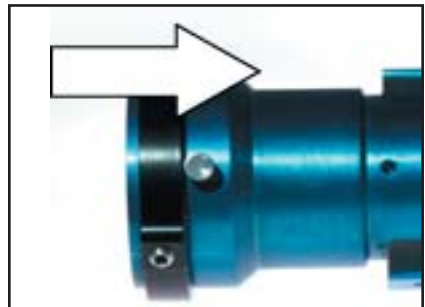


2. Pass the connector through the rear bulkhead, then through the main body. Leave enough loose cable so you can handle the connector easily. The back pre-assembly should look like the image beside.



3. Once the camera lens is securely installed in the port, push them into the main body until the white spacer rests against the main body. You may feel a bit of friction while inserting the port. This is due to the o-rings creating a correct seal.

Also, make sure that when inserting the camera head into the main body that both the camera and main body inside profile mate correctly. This way, you assure a perfect fit.

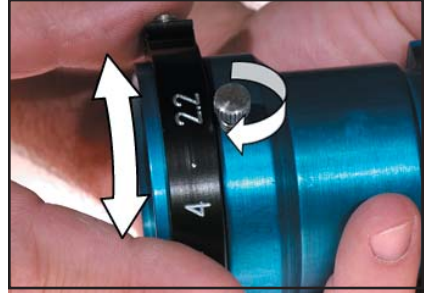




Installing rear cover

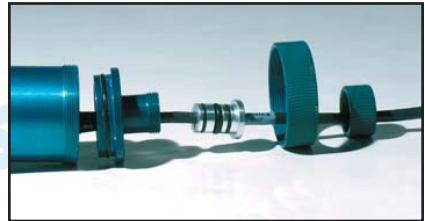
Installing lens port

4. Finally, lock the lens port onto the main body by screwing in the thumbscrew located on the front part of the port. Once completed, you may try to adjust / turn the iris dial. The dial will turn smoothly on the port and will change the camera lens' iris value.

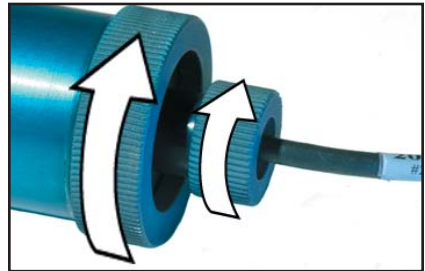


Installing rear cover

1. First, inspect all the o-rings to detect any dirt or debris. Clean them if necessary. Then insert the rear cover into the main body. Lock it into place using the bigger locking ring.



2. Once the rear cover is installed, slide the sealing sleeve assembly into the rear cover. The rear flange sits on the rear edge of the cover. Make sure that the sleeve assembly is securely installed and lock it into place by screwing the smaller locking ring onto the cover.



Fully Assembled





Maintenance

Keeping your system clean and preventing it from any damage will extend its lifetime and performance. This section will tell you how to maintain your system. Please refer to the instructional video and/or contact ASL for more info.

While assembling the unit

Inspect all the o-rings to detect any dirt or debris. If any, wipe them off with your finger or a lint free cloth. Gently lubricate them. Do not over lubricate, as this could attract more dirt and debris. It is good to sometimes remove the o-rings from their location and make an overall inspection. When replacing them on the unit, do not overstretch them so that they will keep their properties. If you use the system quite often in salt water and/or hostile environment, we suggest that you send your system for an overall service every year. Having the o-rings serviced once in a while will extend their lifetime and their performance. An o-ring that has never been serviced could lose its round profile, become dry and lose its properties.

After Every Dive

Rinse the unit in fresh water for at least 10 minutes after every dive. If you can leave it in fresh water for longer, please do so. This will prevent salt and sand to build up on and between the pieces. Use a clean towel to remove the excess water and completely dry the unit.

Storage

We suggest that you always keep your system in a dry and clean environment. Avoid leaving the unit near high sources of heat or cold since condensation may build up inside and damage the camera head.





Specifications

Specifications

All pieces are corrosion resistant Aluminum Alloy and Stainless Steel.

Length (excluding cable): 9.85 inches

Max Width: 4.50 inches

Max Height: 4.50 inches

Weight:

With Dome Port : 852g (1lb 14oz)

With Flat Port : 661g (1lb 7oz)

In Sea water including camera head / Dome port : 274g (0.604 lbs)

In Fresh water including camera head / Dome port : 290g (0.639 lbs)





Warranty

All manufactured parts of your BLuFISH HD Housing are fully covered for defects in manufacture up to 90 days under normal use. The warranty will automatically become void if the equipment has been mishandled, abused or modified in any way. Scratches or damages to the dome port or flatport are not covered under this warranty. ASL Productions, Inc. is not responsible for ANY damage to any cameras placed inside the BLuFISH HD Housing.

These warranties extend only to the original purchaser through ASL Productions, Inc. or an authorized dealer.

The expressed warranty set forth herein is in lieu of all other warranties expressed or implied, including without limitation any warranties of merchantability or fitness for a particular purpose, and all such warranties are hereby disclaimed and excluded by the manufacturer. Repair or replacement of any defective part of the Housing is the sole and exclusive remedy provided hereunder. ASL Productions, Inc. will not be liable for any further loss, damages, or expenses, including incidental or consequential damages directly or indirectly arising from the sale or use of this product.

Before returning your BLuFISH HD Housing for care, please call or e-mail our service department for an RMA# (Return Merchandise Authorization). Ship your product prepaid freight with the return number printed on the outside of the box. It is recommended that you keep your shipper's tracking number until the product is returned to you.

Caution: Do not ship your camera inside any housing. Shipping companies may drop your system from up to three feet which could damage your camera.

RETURN POLICY: Returns will be accepted within 30 days of purchase date as long as the item has not been used. There will be a 15% restocking fee for returned items. Please call or email for instructions before shipping back your item.





**Air Sea Land Gear Inc.
19-69 Steinway Street
Astoria, New York 11105-1108**

**1 888-ASL-LENS - Sales and Marketing
718-626-2646 - Sales and Marketing
718-626-1493 - Fax
sales@airsealand.com
www.airsealand.com**