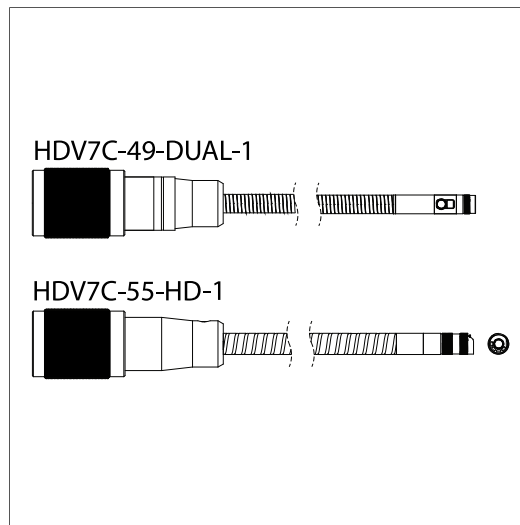


EXTECH

User Manual

Camera Probes

Models HDV7C-55-HD-1 and HDV7C-49-DUAL-1. For use with the HDV700 VideoScope.



Introduction

The probes covered in this manual are designed for use with the HDV700 High Definition VideoScope. The probes are controlled by the touch-screen icons on the HDV700.

The HDV700 user manual and additional translations of this probe manual are available from the support site

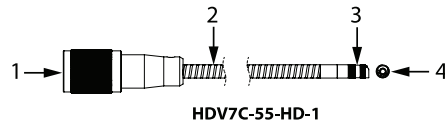
Probe Descriptions

The probes are described in the following sections, see the Specifications and Safety sections for additional information.

The HDV700 offers many useful features including capturing still images and video, changing camera views, and controlling worklights; please refer to the HDV700 user manual for complete information.

HDV7C-55-HD-1 HD Camera Probe

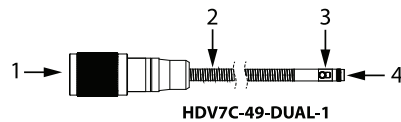
The HD camera probe head is 0.2 in. (5.5 mm) in diameter and its probe length is 3.3 ft. (1 m). The camera resolution is 1280 x 720.



1. HDV700 connector
2. Probe
3. Probe head
4. HD camera lens and worklights

HDV7C-49-DUAL-1 Dual HD Camera Probe

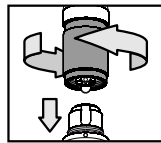
The dual HD camera probe head is 0.19 in. (4.9 mm) in diameter and its probe length is 3.3 ft. (1 m). The camera resolution is 1280 x 720.



1. HDV700 connector
2. Probe
3. Side view camera and worklights
4. Forward view camera

Connecting the Probe

The steps below explain how to safely connect the probe to the HDV700 monitor. Always turn the HDV700 power off before replacing the probe.



1. Align the white dot on the probe connector with the white dot on the HDV700 connector.
2. Plug the probe into the HDV700, ensuring proper alignment and full insertion.
3. Tighten the collar nut to secure the connection. Do not overtighten.

Safety

Safety Note

Please read and understand all safety cautions before use.

 CAUTION	
Do not insert the probe into flammable liquid or gas. This product is designed for industrial use only. It is not intended for use in human or other biological inspection.	
 CAUTION	
To clean the probe, wipe with a soft cloth dampened with a mild detergent and clean water. Do not use abrasives, corrosives (alcohol), or solvents to clean the probe. Use a high quality lens cleaning fluid and a lint-free swab to clean the camera and worklight lenses. Do not disassemble the product, damage to the product and electrical shock may occur. Avoid direct sun exposure. Store in a cool, dry, and well-ventilated area.	
	The probe contains sensitive circuitry that controls the optics and electronics of the camera. Do not strike the probe or allow it to impact objects forcefully.
	Immerse probes only in approved liquids (see the Specifications section).

Specifications

Camera resolution	1280 (H) x 720 (V) pixels
Frame rate	30 frames per second (fps), approximately
Probe Diameter	0.2 in. (5.5 mm) for HDV7C-55-HD-1 0.19 in. (4.9 mm) for HDV7C-49-DUAL-1
Field of View	90°
Depth of Field	0.4 to 4.0 in (10 to 100 mm)
Probe tip length	0.78 in. (20 mm) for HDV7C-55-HD-1 0.85 in. (21.6 mm) for HDV7C-49-DUAL-1
Probe length	3.3 ft (1 m)
Side-view camera	HDV7C-49-DUAL-1 only
LED Worklights	Worklights are controlled from the HDV700 Four forward worklights on HDV7C-55-HD-1 Five forward and one side worklight on HDV7C-49-DUAL-1
Operating temperature	14 to 140°F (-10 to 60°C)
Storage temperature	-4 to 140°F (-20 to 60°C)
Relative Humidity	10 to 95 % non-condensing
Approved liquids for digital camera probes	Approved for use in brake and transmission fluid, diesel fuel, unleaded gasoline, engine oil, and CPC hydraulic fluid (46AWS).
Ingress rating	Probe tip and body: IP 67 (IEC 60529) Protected from submersion in water up to 3.3 ft (1 m) for 30 minutes maximum. In use: rain, splashes, and accidental submersion

Two-Year Warranty

FLIR Systems, Inc. warrants this Extech brand instrument to be free of defects in parts and workmanship for **two years** from date of shipment (a six-month limited warranty applies to sensors and cables).