

Marine Crittercam System Specifications

Physical Description

Digital Imaging System

- Profile cylindrical, streamlined
- Length 20.2 cm
[35 cm w/polyurethane flotation tail foam or extended housing]
- Outer diameter 7.6 cm
- Weight in air 1.1 kg
[1.2 kg w/polyurethane flotation tail foam]
- Weight in water 0 kg (slightly positive)
- Depth rating 1700 meters (tested)

Analog Imaging System

- Profile cylindrical, fusiform
- Length 29.1 cm
[41 cm w/polyurethane flotation tail foam]
[49 cm w/PMT & syntactic flotation tail foam]
- Outer diameter 10.2 cm
- Weight in air 2.2 kg
[2.4 kg w/polyurethane flotation foam]
[3 kg w/PMT & syntactic flotation tail foam]
- Weight in water 0 kg (slightly positive)
- Depth rating 1700 meters (tested)

Video Recording Format

Digital Imaging System

- Tape format DV format (SD mode)
- Video record time SP 83 min, LP 124 min
- Operating temperature 0 to 40°C (32° to 104° F)

Note: Hard-drive/solid state recording system in development

Analog Imaging System

- Tape format Hi-8 format
- Video record time SP 180 min, LP 360 min
- Operating temperature 0 to 40°C (32° to 104° F)

Electronics

- Standard data storage capacity 2 x 16 MByte
Upgradeable to 2 x 256 MByte
- Battery capacity 31.6Wh (7.2V)
- Image intensifier (PMT) Gen. III (optional)
- Head lights (HLMP) high efficiency LEDs (options: red, green, blue, yellow, white)
- Stand by mode current draw 2 mA

Field of view:

- 70 (H) x 50(V) x 85(D) standard
- 90 (H) x 70(V) x 113(D) with PMT image intensifier

Data

- Date & time synchronized with video
- Video color, analog or digital
- Audio up to 48 kHz
- Depth hydrostatic pressure (meters)
- Water temperature °C
- Accelerometry 3 axis
- Light level lumens (dark calibrated)
- Water resistivity ohms
- Battery level volts
- Accelerometry G's
- Compass Earth magnetic
- Velocity meters/sec

Note: Sampling rate set by user

Release

- Electronic release “squibb”
“burn-wire”
- Backup release electrolytic (Magnesium)

Tracking (options)

- Ultrasonic ~76 kHz range ~ 1 km
- VHF 150 MHz range > 10 km (line-of-sight)
- Satellite (ARGOS) range ~ global