



# LS1 / LS1X



### Features

- Includes everything needed to make recordings
- Sample rates: 8, 16, 32, 44.1, 48, 96, 250, 300 kHz
- Wav files saved to removable microSD
- Up to 4 microSD cards for huge storage
- Continuous or duty cycle recording
- Hydrophone easily removable for travel
- Hydrophone status LED
- Interchangeable hydrophones with custom gain settings
- Alkaline batteries (12 D-cell) make transportation easy
- LS1X model has twice the battery capacity
- Housings
  - LS1 PVC (17 x 4.5"): 300 m
  - LS1X PVC (25 x 4.5"): 300 m
  - Aluminum (25 x 4.5"): 3000 m

### Applications

- Noise monitoring
- Seismic and pile driving
- Marine mammal monitoring
- Fish monitoring

Loggerhead Instruments is the industry leader in underwater passive acoustics recording with over 25 years of experience. Loggerhead recorders are in use throughout the world's oceans.

**Hydrophone Options:** HTI-96-min, HTI-99-HF, HTI-99-UHF  
 Standard sensitivity: -170 dBV re:1µPa (US, Europe)  
 Standard export (max 1000m): -180 dBV re:1µPa  
 Intense sound: -210 dBV re:1µPa (worldwide)

### Example LS1 Deployment Times (double for LS1X)

Scenario	Record Duration (s)	Sleep (s)	Power Duration (days)
Continuous (5 minute files)	300	0	40
5 minutes every 10 minutes	300	300	77
1 minute every 10 minutes	60	540	270
10 seconds every 10 minutes	10	590	560

### Mounting

Optional MB-2 mounting brackets make it easy to attach the LS1 to an underwater mooring, bottom mount, or a subsurface line.

Optional 3 m tether allows you to position the hydrophone away from the housing.