





THE LDS1000[™] IS A LONG DISTANCE TRUNK MAIN LIVE CCTV INSPECTION AND LEAK DETECTION PLATFORM DESIGNED FOR INTERNAL INVESTIGATION AND LEAK DETECTION WORK IN LIVE PIPELINES.

The LDS1000[™] (Large Diameter System) is a long distance transmission main CCTV inspection and leak detection platform, designed for internal investigation and leak detection on pressurized pipelines. The system utilizes a light tri-sensor head incorporating a high resolution digital camera, hydrophone and an internal sonde combined as a powerful platform for condition assessment, leak detection, mapping and locating. The device is designed to be inserted through existing access points or 'hot taps' with an internal diameter of 2" or greater and uses the flow within the pipe as the driver. Parachute sizes (drogues) are selected based upon flow rates.

Drogues sit behind the tri-sensor camera head to ensure maximum visibility throughout surveys. The LDS1000[™] is capable of insertion into pressurized pipework up to 150psi and is reliably launched within 12" diameter pipelines and above with a flow rate as low as 1ft/s(0.3m/s). The LDS1000[™] comes complete as a full package with training and all items required to implement the technology into any business. This technology will not be matched on reliability and performance and has been proven around the World. The system is compatible with LiveFeed software for maximum data collection performance.



Overview

- Tri sensor head (hydrophone, camera and sonde)
- HD camera sensor
- Proven unmatchable hydrophone sensitivity
- Electronic cable drum (silent running)
- · Minimum flow of 1ft/s required
- Pipelines 12" an above diameter
- Video and acoustic capturing software for simple reporting
- Light weight heavy duty control cable for increased reliability and durability

Operational Requirements		
Operating mode	Tethered	
Application	Potable	
Pipe materials	All	
Max. operating pressure	150psi	
Min. operating pressure	No Limit for visual inspection and a Min. of 15psi for leak detection	
Min. pipe diameter	12"	
Max. pipe diameter	No Limit	
Max. flow/velocity	32ft/s (10m/s)	
Min. flow/velocity	1ft/s (0.3m/s)	
Max. inspection distance	3280ft (1000m)	

Insertion Requirements	
Access points	Most types of valves and hot taps
Min. tap diameter	2" full bore min
Min. valve size	2" full bore min
Min. external clearance	12ft (1.8m) above insertion fitting
Max. riser height	12ft (1.8m) for standard operations

Specifications

Sensor head	37mm diameter tri sensor head with HD CCTV, Hydrophone and sonde/wide angle optic fix focus (PAL system) with illumination 3LUX at F1.2
Sensor material	Ruggedized quick release connectors (150psi)
Sonde frequency	512hz
Hydrophone frequency	240Hz (Nominal)
Hydrphone beam pattern	Circumferencial: Omni +/-2dB up to 100kHz/ horizontal: Omni +/-4dB up to 100kHz
Power	110-240v (Charging)
Operating temperature	23-104F (-5-40C)
Cable length	3280ft (1000m) neutrally buoyant cable with heavy duty protective coating and kevlar strain relief
Cable drum	3280ft (1000m) electronic cable drum with 24v drive control and self reversing lead screw
Encoder accuracy	1%
Control box	Control box with Panasonic Toughbook
Chlorination	Cable roller mechanism with chlorination system/Full chlorination pump and housing
Data processing	LDS1000™ proprietary software with video, acoustic analysis and data collection
Parachute (drogue) sizes	150 - 750mm diameter
Launch tube	Stainless steel launch tube mechanism assembly with extension sections and patented roller mechanism/aluminum adjustable support legs for supporting launch tube assembly
Cable winch	Cable winch and collapsible tripod assembly with puller guide roller



www.dill-tech.com.au Email: sales@dill-tech.com.au Phone: (+61) 0407 425 315