

Oxygen & Specialties

**LIDA<sup>®</sup>**

# Flex Anodes

**The LIDA<sup>®</sup> Flex Anode integrates our existing product line for impressed current cathodic protection of pipelines and tanks.**

This system is ideal where the space is limited and the anode is to be installed closed to the cathode (close-by cathodic protection).

The anode is available with a mesh sock or sleeve that offers protection against anodes to cathode shorts. The system includes backfill in order to optimize current distribution and low groundbed resistance. The core is a precious metal oxide catalyst on a titanium wire substrate. Available in two different diameters and a standard length of 500 m, the LIDA<sup>®</sup> anode wire is connected to the header cable at pre-set intervals around the loop. The spacing of the connections is determined at the design stage.

**Applications:**

- Especially designed for maximum distribution and minimum anode current attenuation in confined spaces.
- Ideal for distribution of small amounts of CP current on a large surface area.
- Above Ground Storage Tank Bottoms with secondary containment liner (new constructions and replacements).
- Parallel Anode Pipeline CP



Tanks Farm

LIDA<sup>®</sup> Flex Anode



Pipeline



**System strengths and advantages for customers:**

- Easy to Install - Cost Effective
- Ready to Lay in Place - Reduced installation time
- Follows Structure Symmetry - maximum CP efficiency achieved by running a continuous anode parallel to the cathode
- 100% Factory Connections - high QC
- Continuous Anode Distribution - Optimized protection current spreading
- Optimized Power Efficiency - Energy saving
- Optimized Low Groundbed Resistance - Suitable to high resistivity environments

**Material specifications:**

**Dimension:**

Anode Diameter	1.5 mm or 3 mm Ø Titanium wire
Lengths	500 m
Header Cable cross section	10 mm <sup>2</sup> or 16 mm <sup>2</sup> typically connected every 10 m to the anode*
Header Cable Insulation	XLPE insulated and PVC sheathed unarmoured cable or KYNAR/HMYPE unarmoured copper cable
Cable Tail	From 1 m to 5 m at one end or both ends for connection to T/R

\*Customized Anode Specification is possible on request for application in congested plants.

**Anode performance:**

Maximum Current Density (CD) @ Anode	100 A/m <sup>2</sup>	
Wire anode diameter mm	1,5 mm Ø Ti	3 mm Ø
Linear Current Rating @ Max CD, mA/m	470 mA/m	940 mA/m
Expected Life	30 years	
Anode Coating	Iridium Oxide, Mixed Metal Oxide	



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