

Key components

Transformer Rectifier Unit (VSE Driver 2524)

Converts line a.c. power to low voltage d.c.current, which is discharged through the anode. The unit draws less than 2.5 Amps at 230 Volt. Also contains a control module that takes input voltage from the polarization sensor and adjusts the power output to maintain the desired levels of cathodic protection on the structure.



Polarization Monitor Controller (Polatrak® DR2-CD™)

Senses structure to seawater potential and current density, giving three signals on which the system may be monitored and controlled. Signal goes to the potential controller, which automatically adjusts system. Unit also provides regulatory system performance data, eliminating the need for periodic CP surveys. Supplementary electrodes are also deployed.



VSE Anode Sled

DC Current from the power unit is sent to the anode sled through a heavily armored and sheathed cable. The DC current discharges through the base of the sled and is picked up on the submerged and buried sections of the structure, thus eliminating natural galvanic corrosion.



Remote Satellite Monitor (Bullhorn APM-4AM SAT)

A low cost reliable 4 channel satellite monitor / transmitter system. Allows remote monitoring of system performance for literally pennies per day, fully self-contained unit.



Contact Details

Deepwater Corrosion Services Inc.

10851 Train Court, Houston, TX 77041

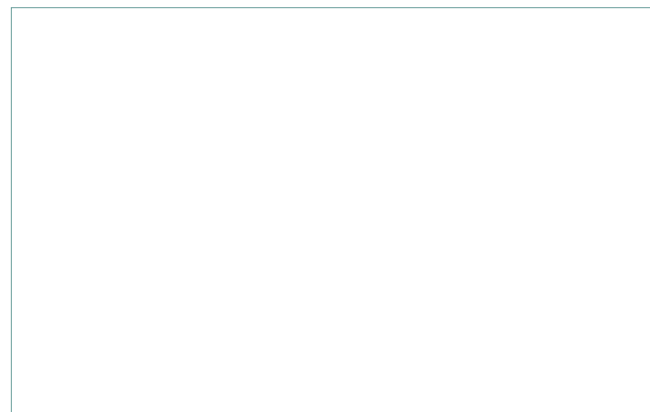
Telephone +1 713 983 7117

Fax +1 713 983 8858

Email sales@stoprust.com

www.stoprust.com

Local Exclusive Distributor



Deepwater Corrosion Services Inc.

VSE™

(Vaulted Seawater Envelope)
Impressed Current CP for Wind Turbines



DEEPWATER

www.stoprust.com

Overview

Impressed Current is the Elegant Cathodic Protection Solution

Deepwater Corrosion Services Inc. is leveraging its extensive experience in the cathodic protection of large oil and gas offshore structures to provide reliable cost effective solutions for this emerging market. The availability of power on what would be considered minimal structures to the oil and gas industry makes the use of small impressed current systems (ICCP) a natural fit.

1. ICCP will work in a wide variety of environments, and it eliminates costly engineering, providing a 'one size fits all' pre-installed solution.
2. ICCP is an "Environmentally Friendly" approach that uses power at source rather than sacrificial anodes that use non-renewable energy sources. No deposition of heavy metals or pollutants.
3. ICCP provides the lowest cost over life cycle, providing maximum ROI.

What is a Vaulted Seawater Envelope?

High efficiency impressed current electrodes operate most efficiently and reliably when surrounded by seawater. If they become silted they cannot be operated efficiently and may be subject to localized failure. The VSE system provides a filtered seawater envelope below the mud-line, allowing the anodes to be operated at maximum efficiency. Thus the anode assembly can be quite compact and still provide the low ground resistances required.



Ballast Channel

Shell Cathodic Protection

Filtered Gas Vent Ridge

Anti-Scour Fronds

MMO Activated Titanium Anode Rods

Double Steel Wire Armored Supply Cable

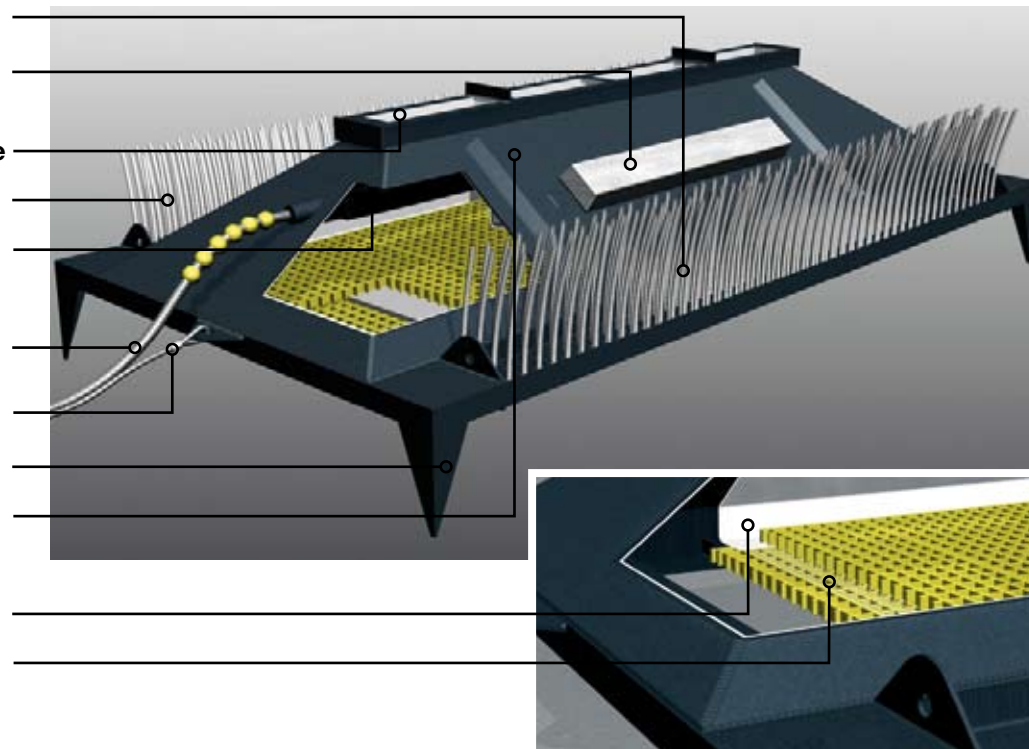
Strain Relief Tether

Anchor Foot

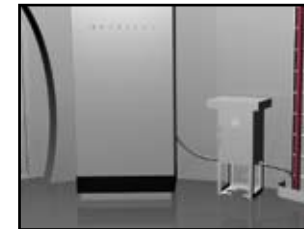
Rugged Steel Shell

Teflon Vault Liner

Footprint Sand Filter



Auto-Potential Controlled Power Unit



Remote Satellite Monitor



Polarization Monitor and Control Sensor



VSE Anode Sled

