

DIOGENES OMAR



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DIODENES ONAR

Controls / Quick Guide

Function

The Diogenes ONAR is basically a pulse induction metal detector.

Short and very strong magnetic pulses are being emitted by the search coil.

Even after switching off the magnetic pulse, so-called currents remain in the metal objects for some microseconds, so clearly even from now these objects can be detected by the search coil working as a receiver.

A different mode in regard of the decay behavior, generated in the metals by using magnetic pulses, enables a more precise identification of the localized metals.

The operator is thus able to detect on the basis of sound and exact location provided by the instrument, size and depth of the located metal object.

Benefits

The pulse induction process has a lot of advantages due to the technically required time delay between sending and receiving.

There is a temporal decoupling, allowing a very high transmission power, so virtually search coils with unlimited coil sizes can be used.

Increasing search coil sizes also allow an increase of the search depth for large objects. At the same time, the sensitivity for small objects sharply decreases, which is desired in many cases.

Application

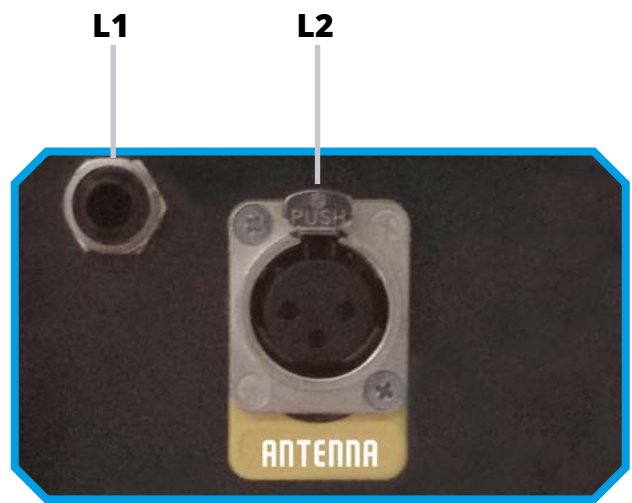
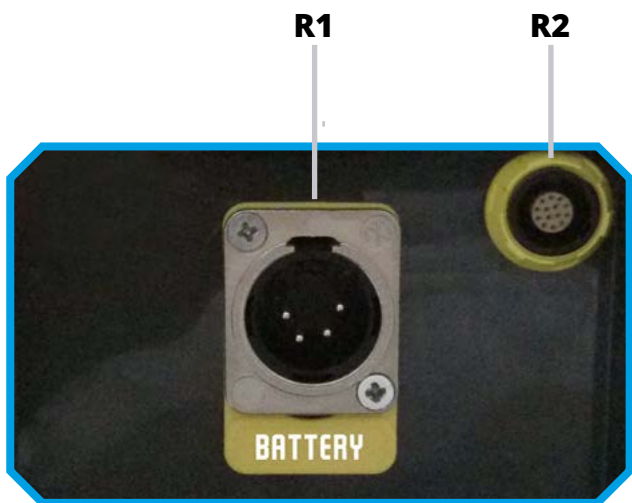
Diogenes ONAR was created for professional search tasks.

With the corresponding coils, large areas can be deeply penetrated and examined. Even very conductive soils, pylons, magnetic tiles and salt water can hardly affect the performance of the Diogenes ONAR.

It is possible to eliminate nails, thin films, splinters and other small parts during depth examination or distinguish them from deeper lying larger objects.

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Battery connector (R1)

Here, the battery pack is connected.

Data logger socket (R2)

Here the data logger is connected.

Headphones (L1)

Jack for headphones.

Antenna (L2)

Antenna connector.

Indicators

Analog instrument (F1)

LED-RED (F2)

LED-GREEN (F3)

Volume Knob (F4)

Volume control.

Bat. Control (F5)

Display of battery status.

Delay Knob (F6)

By turning the delay knob different object sizes will be faded out.

•Knob position -0 = normal search

Power knob (F7)

When turning this knob, the Device is switched on, provided that the supplied battery is charged and connected to the electronic unit.

Position 1:

Gain Level 1

Position 2:

Gain Level 2

Position 3:

Gain Level 3

Adjust knobs (F8+F9)

The device has two Adjust knobs.

COARSE (F6) coarse adjustment

FINE (F7) fine adjustment

*To adjust the ground balance, it is important to turn the adjust knobs until the 2 LED's (F2&F3) are off and a regular sound (TICK) can be heard, then the unit works perfect.

If an object is located during the search operation, the **GREEN LED (F3)** lights on, while the meter indicates the object size. (signal strength)

At the same time, it is possible to determine the theoretical depth in connection with the object's size and the values shown on the instrument's display.

If the **RED LED (F2)** lights on during the search process, it indicates the different conductivity of the soil as cavities, dig spots, bunkers etc.