

# Labkotec

## alarm devices for oil and grease separators



Protect the environment by preventing pollution accidents

Monitor excessive levels of liquid, grease, oil and sludge in separators

Monitor leakage in separators

Indication when separator needs emptying – reduce waste management cost

Ensure undisturbed oil and grease separator operations

Fulfills requirements of EN 858-1&2 standards

Fail-safe



LabkoNet<sup>®</sup>  
COMPATIBLE



Measures for a better tomorrow

**Labkotec**  
INDUTRADE GROUP



# Sustainable measurement solutions

## **Prevent damage**

Oil and grease separator systems play a vital part in preventing environmental damage. Reliable operation of a separator can only be achieved when separator alarm devices are installed. This is the only way to effectively prevent environmental damage, and avoid associated liability risks.

Maintenance costs can be significantly reduced with efficient alarm systems which ensure that the separator is emptied only when necessary.

## **Meet the requirements**

All Labkotec alarm systems for oil separators have ATEX approval and the sensors are suitable for installation in hazardous areas. They are compact and robust, and do not incorporate moving parts.

## **Monitor 24/7**

For areas where there are no people or supply voltage, a system with an alarm trigger offers a protective function via a mobile phone network around the clock.



The EN 858-1&2 standard stipulates that alarms must be used in oil separators, and simultaneously form the basis for the CE-mark on oil separators.

Labkotec alarm devices are approved in accordance with the ATEX directive 2014/34/EU, IECEx and UKEX.

## LabkoNet® compatible

Labkotec alarm devices can be connected to the cloud based LabkoNet system with an internal modem or with the separate Labcom modem. LabkoNet is an easy and reliable way to transfer and control alarm data. For further information on LabkoNet and its key benefits, please visit [www.labkonet.com](http://www.labkonet.com)



### The market leader

Labkotec offers the widest range of alarm devices on the market for oil and grease separators. Special attention to the design of various models, has improved reliability and performance, which benefits the environment globally.

### Key advantages of Labkotec alarm devices

- Meets the demands for various standards and regulations.
- There is an immediate alarm if, for example, a serious oil spill occurs, thus preventing severe environmental damage.
- The costs of routine servicing are kept to a minimum. The separator will be emptied only when the alarm indicates that the grease, oil or sludge levels have been exceeded.
- Separator leakage into the environment is monitored.

# Alarm devices for oil separators



## idOil® alarm devices

idOil alarm systems are designed for monitoring liquid levels in oil and sand separators.

### idOil control units



#### idOil-20 oil separator alarm

The idOil-20 is an easy to use oil separator alarm control unit that offers all necessary basic features. Up to three different types of idOil sensors can be connected polarity-free, and they are identified automatically with a one-touch commissioning feature.



#### idOil-30 oil separator alarm

The design of the new generation idOil-30 is the result of Labkotec's long experience and customer feedback, as well as the latest requirements from European norms.

Up to three idOil sensors of any type can be connected polarity-free, and

they are identified automatically with a one-touch commissioning feature. The idOil-30 offers extremely easy commissioning, flexible configuration locally via WLAN, as well as alarm logging. Available also with an internal modem and in 12 V DC operation voltage.



#### idOil-D30 oil separator alarm

The idOil-D30 has the same features as the idOil-30, but is smaller in size, and can be mounted in an electrical cabinet on DIN rails.

#### Most common application areas

- Petrol stations
- Garages
- Airports
- Motorways
- Parking lots
- Oil handling areas



## idOil sensors

All idOil sensors are polarity free digital sensors. This speeds up installation and commissioning, and saves on cabling costs.

### idOil-LIQ high liquid level sensor

Indicates when the liquid level in the oil separator rises excessively e.g. in an outlet blockage situation.

### idOil-OIL oil sensor

Detects oil and indicates when the separator's oil storage is full.

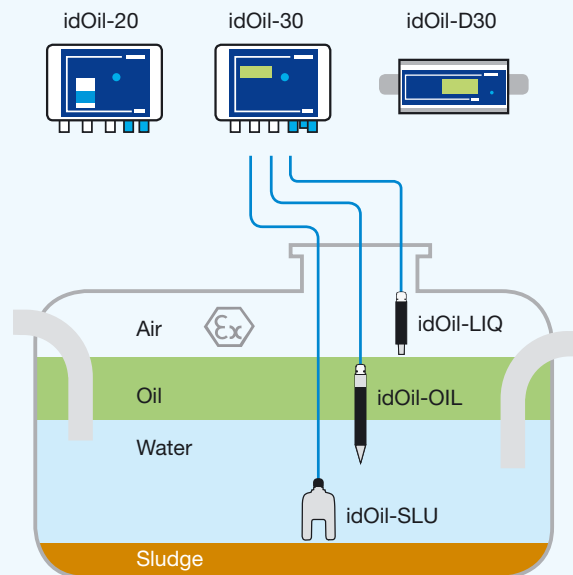
### idOil-SLU sludge sensor

Monitors the sludge layer in the oil separator and indicates when the sludge layer has reached its maximum level.



## Applications

With the idOil alarm system, excessively high liquid levels, oil layer thickness and sludge layer thickness can be monitored.

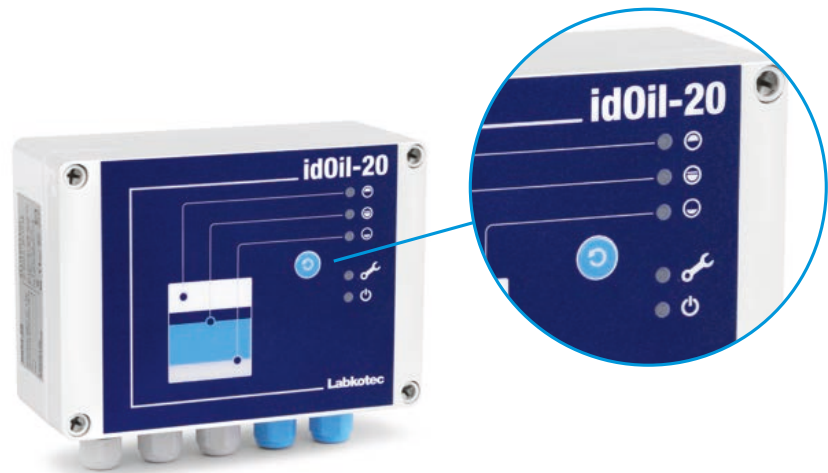


# Alarm devices for oil separators



## See the status at a glance

Thanks to the distinct LED lights you can see the status of your separator and idOil-20 alarm device at a glance.



## Integrated display and local wireless configuration



### Local display and alarms

View the system status on idOil-30 or idOil-D30 control unit display. The integrated display offers easy access to device status on most important alarms and failures on the control unit.

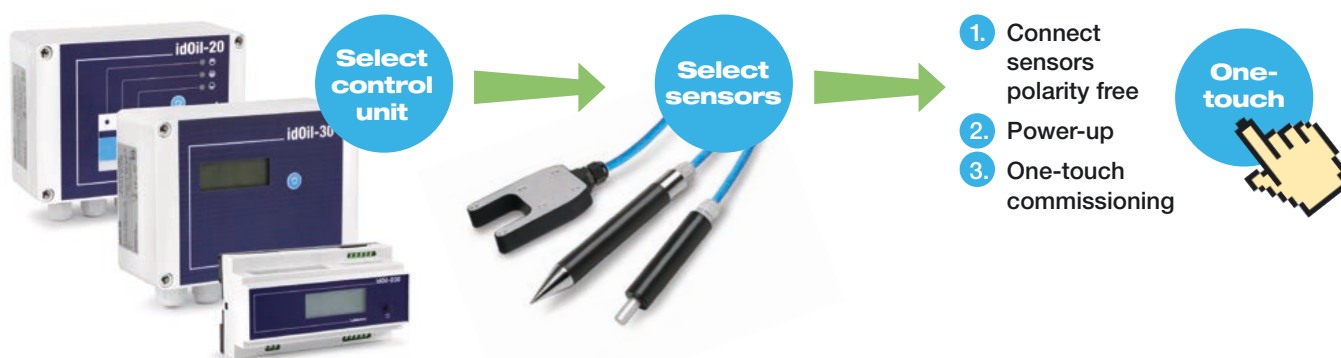


### The browser user interface for comprehensive settings and configuration

WLAN connection locally between a control unit and laptop/tablet/smartphone. When further settings and configurations are needed, they can be performed via an inbuilt browser user interface. Alarm information, the service, and maintenance diary, and the data log are accessible via the user interface.



## Flexible separator alarm system build-up



## Complete idOil alarm system packages

idOil alarm systems are available in complete packages.

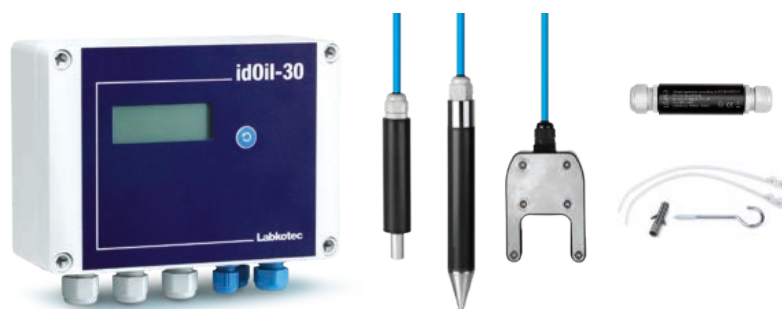
Choose a control unit and sensors and create an alarm system according to your needs.

Below is an example of a typical idOil alarm system package and coding of the package name.

**idOil-30 LOS** package consists of:

- Control unit **idOil-30**
- idOil-LIQ high liquid level sensor
- idOil-OIL oil sensor
- idOil-SLU sludge sensor
- Cable connector LCJ1-3
- Mounting kits for control unit and sensor

*idOil-30 LOS alarm system package*



# Alarm devices for oil separators



## idOil-30 special applications



*idOil Solar with  
beacon light*



*idOil Solar*



### **idOil Solar oil separator alarm**

The idOil Solar is a solar powered oil separator alarm for off-grid areas. It can be equipped with a beacon light and/or an internal modem.

In an alert situation, the beacon light will flash and/or an alarm message will be sent to the user's mobile phone. The idOil Solar control unit has the same features as the idOil-30.

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### **idOil-30 Battery special versions**

The idOil-30 control unit is also available with a 12 V DC power supply and the option of an internal modem. With the modem an alarm message will be sent to the user's mobile phone whenever an alert situation occurs.

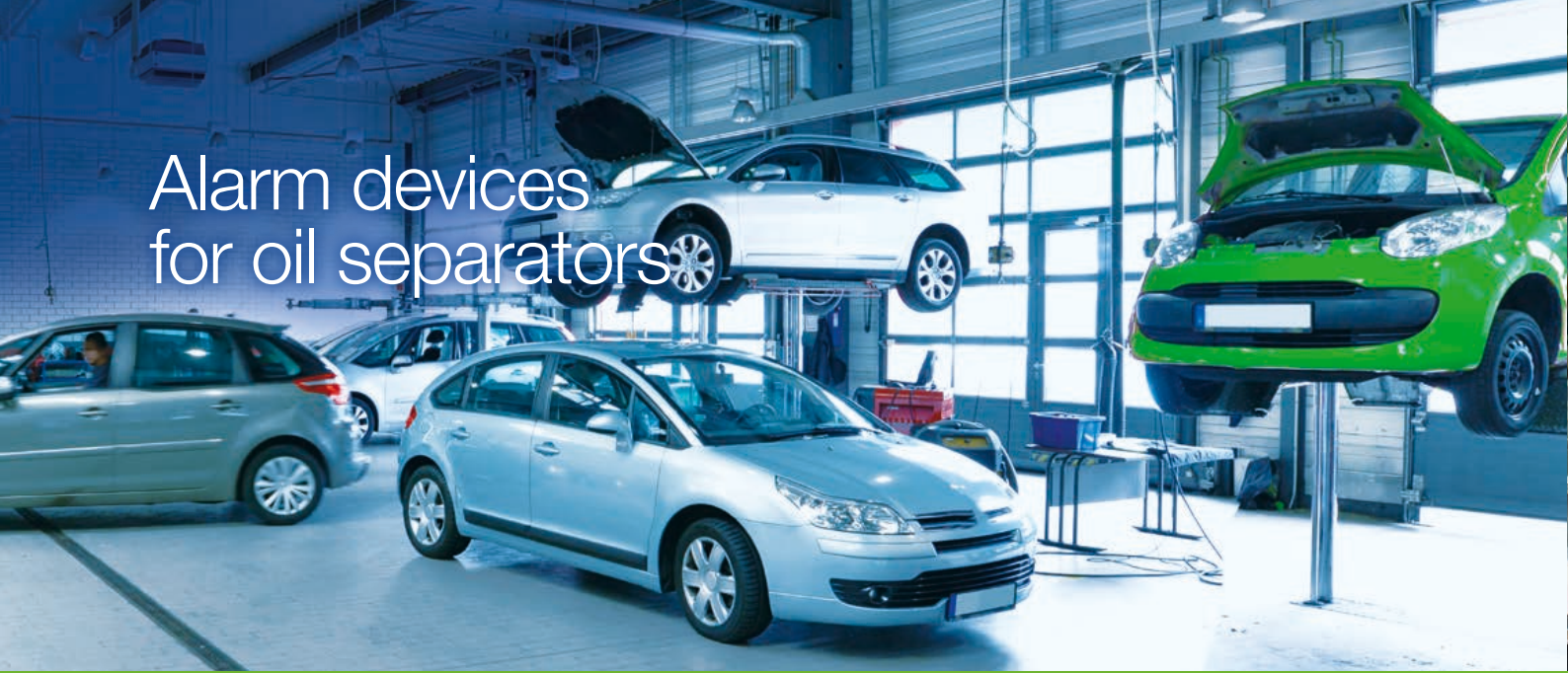


## idOil control units' main features



	idOil-20	idOil-30	idOil-D30	Notes
Mounting	Wall mounted	Wall mounted	M36 DIN rail mounted	
100-240 V AC supply voltage	✓	✓	✓	Multi voltage.
12 V DC supply voltage		idOil-30 Battery		Low power version.
Solar power		idOil Solar		For off-grid areas.
Alarm status LEDs	✓			
Display		✓	✓	4 lines monochrome LCD with backlight. Operation and alarm status indication.
Internal modem		idOil-30 3G		SMS alarm information to mobile phone.
Relay output	2 pcs, 1 alarm & 1 fault	2 pcs fully configurable	2 pcs fully configurable	
Sensor input	1-3 any different idOil sensors	1-3 any idOil sensors combination	1-3 any idOil sensors combination	
One push button quick commissioning	✓	✓	✓	
Automatic sensor type detection	✓	✓	✓	Detects automatically connected sensors and sensor types.
Polarity free sensor connection	✓	✓	✓	2 sensor wires can be connected both ways.
WLAN		✓	✓	Web browser based user interface for settings and configuration. WLAN connection locally with laptop/tablet/smartphone.
Data logging		✓	✓	Downloadable log file with time stamp for alarm, alarm reset, power break and maintenance events.
Service and maintenance diary		✓	✓	Free text input for diary marking.
Alarm repeat 24 h setting	✓	✓	✓	Alarm repeats after reset in 24 h if reason not removed.
Adjustable alarm delay		✓	✓	Delay adjustable for each sensor.
Ex classification	✓	✓	✓	II (1) G [Ex ia Ga] IIB ATEX, IECEx, UKEX

# Alarm devices for oil separators



## OMS-1 alarm device for oil separators

### OMS-1 oil separator alarm

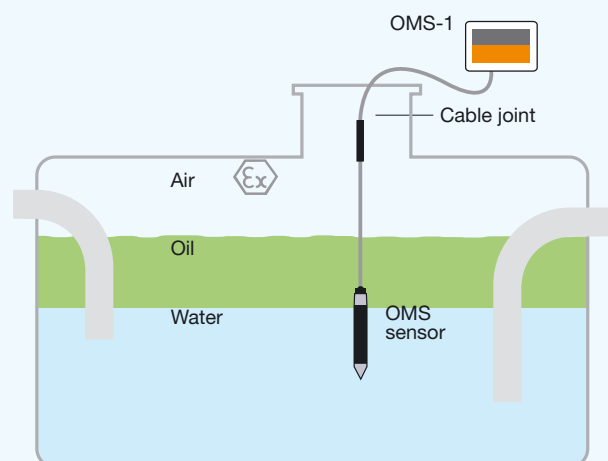
OMS-1 alarm device is specially designed for oil separators.

It indicates when it is time to empty the oil separator, which prevents harmful hydrocarbon emissions from being released into to the sewer system.

OMS-1 control unit and OMS sensor



## Application



# Alarm devices for grease separators



## GA-1/GA-2 alarm devices for grease separators

### GA-1 and GA-2 grease separator alarms

GA-1 and GA-2 alarm devices are specially designed for grease separators. They indicate when it is time to empty the grease separator, which prevents harmful grease emissions from being released into the sewer system.

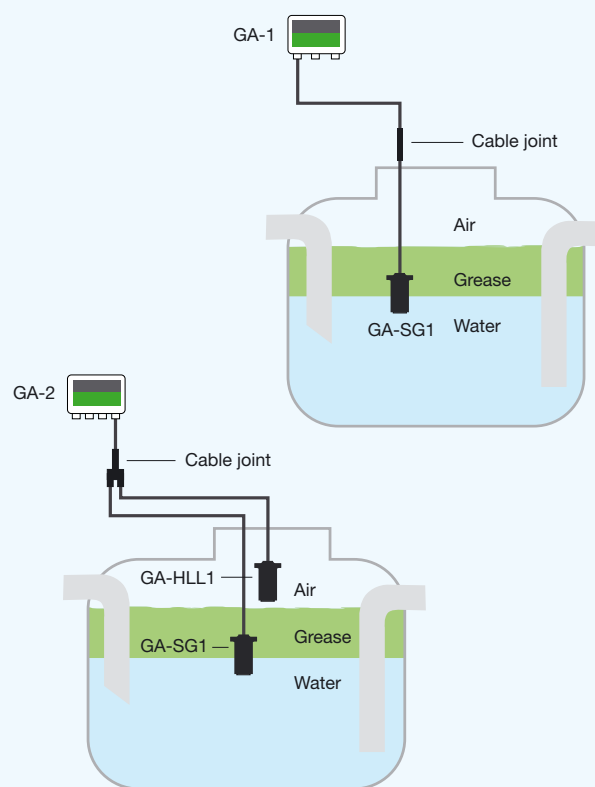


GA-1 control unit and GA-SG1 sensor

GA-2 control unit and GA-HLL1/GA-SG1 sensors



## Application



GA-1/GA-2 devices are not ATEX approved and cannot be used in oil separators.



## Measures for a better tomorrow

Labkotec is a leading measurement equipment manufacturer, and related services provider. Our mission is to provide measurement solutions which enhance our customers business and help them to protect the environment and people. Labkotec's comprehensive export product range comprises

ice detection systems, alarm devices for oil and grease separators, a wide range of level measurement and detection instruments as well as LabkoNet system, for remote on-site monitoring of measurement and alarm information.

### Sustainable competence

We are committed to sustainable business with an eye in the future. We strive to create long-term value and for us, sustainability is a driving force for developing our business to create sustainable growth.

We provide sustainable measurement solutions which help our customers not only to protect the environment and people, but also to save energy, water, materials and CO<sub>2</sub> emissions. We work systematically through continuous improvements and the efficient use of materials and resources to minimize the emissions and waste.

In our own operations, sustainability is built around three key elements: people, environment and sustainable growth.



Measures for a better tomorrow



[www.labkotec.com](http://www.labkotec.com)  
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