

# CARLOC® AT-RAIL

The robust solution for transport monitoring of rail cargo

## AUTONOMOUS TRACKING & TRACING

Rail cargo wagons and containers travel abroad through unknown areas. Transport progress, loading and unloading operations are difficult to determine.

CarLoc® AT-Rail units accompany transports at any time. They provide reliable information about location, schedule and load status for years.

The unit, based on proven, robust technology, with integrated antennas is specifically designed for use in harsh environment. It is easy to install almost anywhere.

High functionality combined with comfortable configuration options allow a customized operating at minimal cost.

The intelligent device logic reports interesting events of the transport, to the back-end - worldwide.

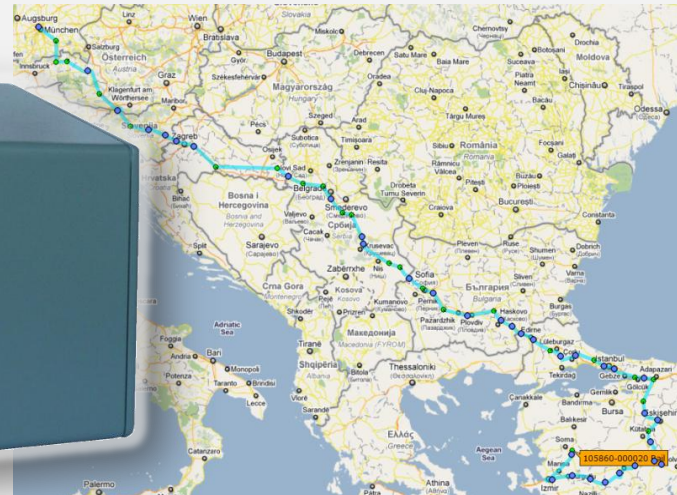


## KEY FEATURES

- Accurate positioning even in difficult environments thanks to high-sensitive GPS receiver.
- Continuous activity monitoring for
  - Shock- and movement detection
  - Mileage evaluation
  - Door control
  - Geo fencing of up to 10'000 zones
  - Monitoring of external sensors etc.
- Remote-configurable at any time
- Log-data memory for several months recording
- Worldwide communication

## OPTIONS

- PT1000 temperature sensors
- Load sensor
- Door switches, fuel level and reefer monitoring



## CARLOC® DATA

CarLoc® AT-Rail monitors and provides the following data:

- Position incl. time, speed and heading
- Asset status: stopped/parked/moved, alarm
- Mileage, time parked and time moved
- Stop-over in terminals, premises- and port areas
- Data of connected sensors and sub-systems
- Battery capacity
- Project-specific data

## OPERATION MODES

Unit configuration can be altered remotely to generate messages:

- At a specific time of day
- At pre-set time or distance intervals
- On entering / leaving of terminals, premises or harbour areas
- Whenever the asset starts or stops moving
- When a sensor or other device trips
- And many more

|                |                     |  |
|----------------|---------------------|--|
| Technical Data | Communication       | Quad-Band EGSM 850/900, 2W; 1800/1900,1W<br>Class10 GPRS and SMS   |
|                | Location            | 50 channel Super-Sense GPS-receiver  |
|                | Geo-Fencing         | 10'000 geo-zones managed at the unit   |
|                | Data Memory         | 30'000 sensor records incl. time and position  |
|                | Power               | Integrated lithium battery for 6 years endurance   |
|                | Integrated Sensors  | 3-axis g-sensor for shock and movement detection   |
|                | Ext. Interfaces for | Door switch, load sensor   |
|                | Options             | 1 x Digital Output, 3 x Digital and 3 x Analogue Input<br>for fuel level, pressure and up to 3 temperature sensors |
|                | Temperature Range   | -40°C ... +85°C  |
|                | Housing L/W/H [mm]  | 135/85/125   |
|                | Housing Protection  | IP67   |
|                | Weight              | 1,2 kg (without bracket)   |



FELA Management AG  
 Basadingerstrasse 18  
 CH-8253 Diessenhofen  
 Tel. +41 52 646 46 46  
 Fax +41 52 646 46 96  
 www.fela.ch  
 www.carloc.ch  
 e-mail: sales.carloc@fela.ch



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