

# WasteHero Fill-Level Sensors

Install fill-level sensors to track and monitor the fill-level of containers with unpredictable waste generation patterns to determine optimal collection time.

## Problems with Fixed Collection Schedules

Waste containers with unpredictable fill-levels that are collected on fixed collection schedules are often picked up too early or too late.

When containers are collected too early, drivers are going to collect empty containers, resulting in unnecessary fuel consumption, costs for human labour and high Co2 emissions. When containers are collected too late, containers will be overflowing, resulting in trash on the streets and high volumes of citizen complaints.

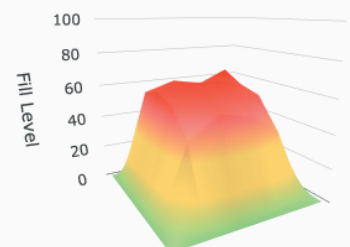
## Optimised Collection Schedules Based on Sensor Data

Through the installation of WasteHero's Fill-Level Sensor, containers are collected at the right time, every time. No more guesswork is needed for container collections, allowing route planners to achieve cost effective and sustainable operations.



## Features

- Automatically add containers to the next available route based on dynamic fill-level data, no more guesswork
- Fill-level data feeds back to the WasteHero Platform, providing graphic visualisation to understand collection efficiency
- 3D topology mapping to understand waste build-up in container
- Configure email and SMS alerts based on fill-level thresholds
- Retrofit existing containers with sensors, without the need to invest in new container infrastructure
- Optical laser technology with 16 referring measurement points to ensure high level of accuracy
- Replaceable battery to extend the lifetime of the device
- Internal antenna with option to add secondary external antenna to boost network signal
- Measures containers of 0-400cm in depth and all types of waste fractions
- GPS component for container location tracking
- Fast set-up with WasteHero Configuration App, simply plug-and-play to start tracking fill-level data immediately
- Save measurements locally, then send in bulk to platform to save on battery life and avoid losing data in the event of unstable network connectio



## Specifications

**Material:** ABS

**Battery Life:** Up to 5 years

**Temperature operating range:** -35°C to +85°C

**IP rating:** IP67

**Detection range:** 0 - 400cm

**Measurement interval:** Configurable (hourly/daily etc)

**Connectivity:** GSM, LTE-M, NB-IoT, LoRaWAN

**GPS:** Yes



## Empower dynamic container collection at the right time, every time.

### Eliminate overflowing bins

Keep city streets clean and free of litter, whilst boosting service level to improve citizen satisfaction.

### Avoid unnecessary collection

Optimise the efficiency of collection routes based on fill-level data to reduce driving time, fuel consumption, Co2 emissions and labour costs.

### Understand waste stream patterns

Identify waste generation patterns to optimise fixed collection schedules across similar waste fractions.



**Aalborg Council has reduced their  
number of collections by 40%**

Through the digitalisation of fleet assets, fill-level sensor data and weight tracking, the Danish Council of Aalborg implemented semi-dynamic, optimised collection schedules to achieve a 40% reduction in the number of collections



Learn more on  
[www.wastehero.io](http://www.wastehero.io)

**WasteHero**

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