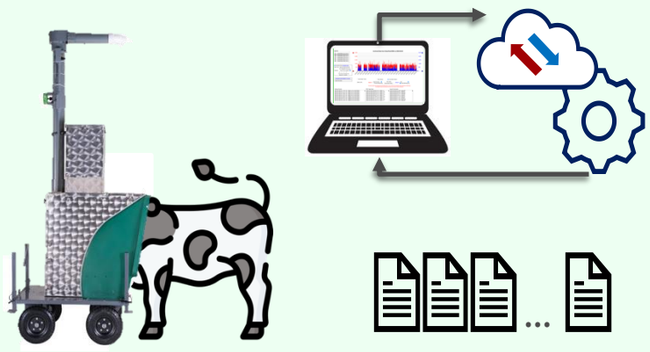
Data processing with greenfeedr : : CHEAT SHEET

Basics

greenfeedr provides a set of functions that help you to download, report, and process GreenFeed data



The 5 main functions are:

get_gfdata() downloads GreenFeed data via API

report_gfdata() generates reports of GreenFeed data

process_gfdata() processes and averages GreenFeed data

pellin() processes pellet intakes from GreenFeed

viseat() processes GreenFeed visits

Installation

You can install the development version of greenfeedr from https://github.com/GMBog/greenfeedr

```
# install.packages("pak")
pak::pak("GMBog/greenfeedr")
```

Downloading data

get_gfdata(user = <LOGIN USER>, pass = <LOGIN PASSWORD>, exp = <NAME>, unit = <GF UNITS>, start_date = <MM/DD/YY>, end_date = <MM/DD/YY>, save_dir = <DIR>)

Some fields are required, and others are not required. By default, the end date is the current date to use when a study is ongoing.

The function returns an Excel file:

NAME_Gfdata.csv

Processing data

process_gfdata(file_path = <GF DATA>, start_date = <MM/DD/YY>, end_date = <MM/DD/YY>, input_type = <DAILY/FINAL>, param1 = <records>, param2 = <days>, min_time = <2>)

There are 3 parameters that are required for data processing and that will have a high impact on the total number of records:

- **param1** is the number of records per day.
- **param2** is the number of days with records per week.
- **min_time** is the minimum duration of a gas record (by default C-Lock Inc. used 2 minutes)

Extra functions

pellin(file_path = <GF DATA>, unit = <GF UNITS>, gcup = <34>, start_date = <MM/DD/YY>, end_date = <MM/DD/YY>, save_dir = <DIR>, rfid_file = <RFIDFILE PATH>,

viseat(file_path = <GF DATA>, unit = <GF UNITS>, start_date = <MM/DD/YY>, end_date = <MM/DD/YY>, rfid_file = <RFIDFILE PATH>)

Reporting data

Complete the template below to generate a R-markdown report:

report_gfdata(user = <LOGIN USER>, pass = <LOGIN PASSWORD>, exp = <NAME>, unit = <GF UNITS>, start_date = <MM/DD/YY>, end_date = <MM/DD/YY>, input_type = <DAILY/FINAL>, save_dir = <DIR>, plot_opt = <ALL/CH4/CO2/O2/H2>, rfid_file = <RFIDFILE PATH>, file_path = <FINAL REPORT>)

Two reports could be created by **process_gfdata()**:

- Daily GreenFeed Report
- Final GreenFeed Report