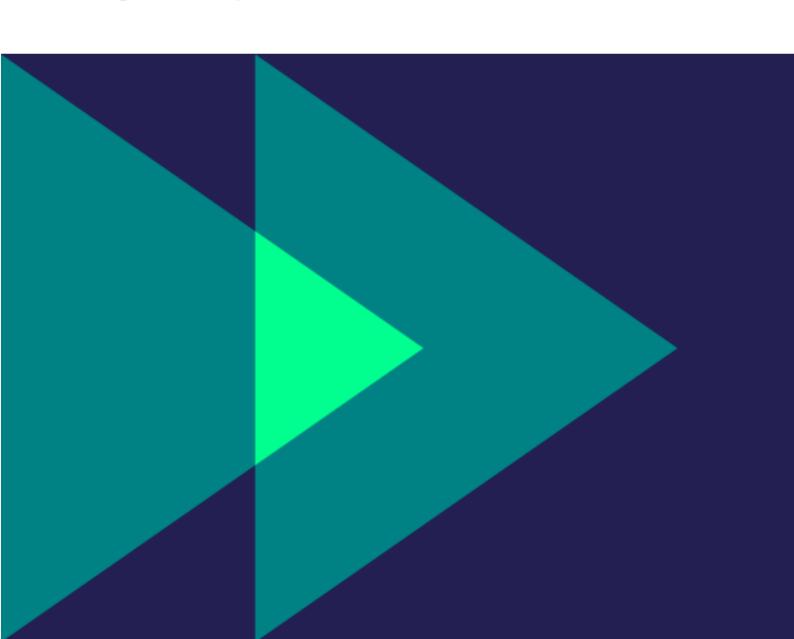
# VALIDATION REPORT

Recycllux 2022 #IG0007





### **Contents**

| Introduction and definitions                  | 3 |
|---|---|
| Valid   | 3 |
| Positive                                      | 3 |
| Significant                                   | 3 |
| Impact story                                  | 4 |
| Climate Impact Forecast and Validation result | 5 |

## Details of the validation process

|        | Validation request              | First review      | Feedback call     | Hand-in revisions                | Final review     | Wrap-up call     |
|--------|---------------------------------|-------------------|-------------------|----------------------------------|------------------|------------------|
| Date   | 23/11/22<br>15h39 IF            | 28/11/22<br>20h46 | 29/11/22<br>11h15 | 29/11/22<br>12h22                | 30/11/22<br>0h12 | 30/11/22<br>9h00 |
| Result | Invalid, Positive and Marginal. |                   |                   | Valid, Positive and Significant. |                  |                  |

### Colofon

Author/ validator: Israel Griol-Barres

Project name: Recycllux

Project CIF lead: Alexandra Cernian, CEO, <u>alexandra@recycllux.com</u>

Sorina Uleia, Chief of Innovation, <a href="mailto:sorina@recycllux.com">sorina@recycllux.com</a>

Validation ID IG0007

Published by: Impact Forecast

Date: 29 November 2022

More information: Impact-forecast.com

© Impact Forecast, Recycllux can share this report as they see fit, Black Sea 2022 receives this duplicate and can share it only with Recycllux's permission. Impact Forecast keeps a copy of this report to be able to verify the validation result, but will not share the report itself without Recycllux's permission.

### Introduction and definitions

This Validation report documents the Validation of a Climate Impact Forecast:

Validation is a review process performed by an impartial impact expert to determine if a CIF is Valid, Positive and Significant.

The Validation process usually takes two weeks and includes a first review, a first feedback call between the team and validator, time for revisions if needed, a final review and a final results call. For a detailed description see www.impact-forecast.com/cifvalidations

The review comprises a structured check using our CIF Validation tool, a sensitivity analysis and the writing of an Impact story. CIF trainers with LCA expertise are trained to perform this process in a uniform and objective way.

CIF Validations are made on the request of the project team, and possibly commissioned by an impact organisation. The results are used by teams and organisations to compare and communicate the climate impact of projects.

A Climate Impact Forecast or CIF is an LCA based calculation of the GHG reduction or climate adaptation potential of a project. Using our CIF tool, the project team found the net climate impact of the key differences between business as usual and their innovative solution.

The Impact data in this report, and in CIF in general, is calculated with information from the project team and from the CIF tool.

Technical details, amounts and assumptions in the calculation are provided by the project team. Impact factors (LCI data), impact equivalents and the calculation itself are provided by the CIF tool.

The CIF tool is used by teams to improve their impact and support design and business decisions with impact data.

CIF results are the project's potential or actual avoided emissions in tCO<sub>2</sub>eq.

Every CIF Validation result consists of three independent outcomes:

Valid Positive Significant

A CIF is valid if it is representative of the project, using appropriate data and well justified assumptions. Therefore, the CIF and its results are representative of the potential for the project to mitigate, enable or adapt to climate change.

Detailed requirements for validity are specified on www.impact-forecast.com/cif-validations. A CIF can be Valid, Plausible, Improbable and Invalid.

A CIF is positive when it shows that the project has a lower climate impact than business as usual, or improved climate resilience in the case of adaptation. A positive mitigation or enabler CIF shows the avoided GHG emissions in -tCO<sub>2</sub>eq.

This outcome depends on a sensitivity assessment. CIF results can be Positive, Positive within limits, Unclear, Sensitive and Negative.

A CIF is significant when the project has a climate impact (positive or negative) greater than 5 tonnes of CO<sub>2</sub>eq per year. This is roughly the global average annual CO<sub>2</sub> emissions per person, and the mass of a male African Elephant.

The threshold for significant impact can be set to a higher amount for a particular organisation or occasion. The result can be Significant or Marginal.

### Impact story

An impact story is a summary of how a project makes a positive climate impact. It is written by the validating impact expert and contains the key impact data from the Climate Impact Forecast.

## An innovative plastic waste collection and a smooth recycling process will avoid carbon emissions and benefit 16 million people in Romanian Black Sea coast

Recycllux provides means to adapt to changes in ocean acidification in the Black Sea that causes 5.4 tonnes of CO2 each year and millions euro in losses.

Recycllux implements a faster and more efficient collection of the 1533 tonnes of plastic waste that enter Black Sea each year from the Danube River and a smooth recycling process to turn it into secondary plastic, as a way to achieve a reduction of the carbon footprint in these circumstances.

How does Recycllux make a positive climate impact? How much, and compared to which baseline?

In the project assessed here, Recycllux targets the Romanian Black Sea coast, where 16 million people (estimated population of the Romanian Black Sea's catchment area) will benefit directly, over a period of one year.

The 1533 tonnes of plastic that enter Black Sea each year from the Danube River prevent the absorption of 5.4 tonnes of CO2.

The current lack of marine ecosystem services implies an annual loss of €326 million due to plastic pollution. In addition, there are also potential health consequences.

Recycllux will save billions of tonnes of CO2, save natural systems, the marine food chain's contamination, and the serious consequences it has on human health. For instance, a conventional intervention to collect up to 10 tonnes of plastic



waste carried out by a small/medium fishing vessel, saves 35 kg of CO2. In addition, this prevents an annual economic loss of €2.12 million.

The positive impact comes mainly from implementing faster and more efficient plastic collection and from turning it into secondary plastic.

### Validity

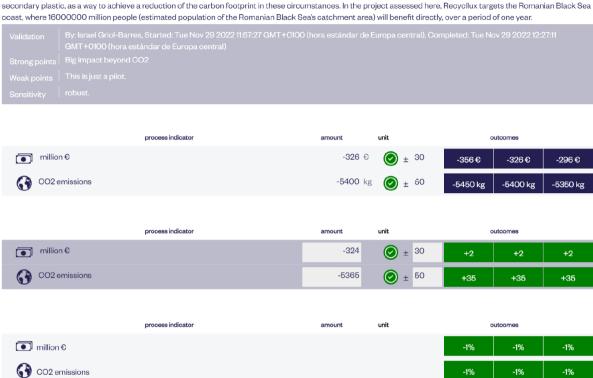
The forecast is valid, positive and significant, and the conclusion that Recycllux has a positive climate impact is robust.

The impact of one action by Recycllux is the avoidance of 35kg of CO<sub>2</sub>eq, removing 10 tonnes of plastic waste and saving losses of 2.12 million of euros.

As this action described in this report is only the first pilot, it is expected that following projects will achieve the avoidance of more than 5 tons of CO<sub>2</sub>eq per year becoming a significant impact.

## Climate Impact Forecast and Validation result

Recycllux provides means to adapt to changes in ocean acidification in the Black Sea that cause 5.4 tonnes of CO2 each year. Recycllux provides means for a faster and more efficient collection of the 1533 tonnes of plastic waste that enter Black Sea each year from the Danube River and a smooth recycling process to turn it into secondary plastic, as a way to achieve a reduction of the carbon footprint in these circumstances. In the project assessed here, Recycllux targets the Romanian Black Sea coast, where 16000000 million people (estimated population of the Romanian Black Sea's catchment area) will benefit directly, over a period of one year.



Validation quality mark can be checked on: www.impact-forecast.com

### More information

We help companies to know, show and grow their climate impact. More information about the validation process you can find on our website: <a href="https://www.impact-forecast.com">www.impact-forecast.com</a>

