



## **REPLACE**

regional policy action for circular economy www.interregeurope.eu/replace

# CIRCULAR ECONOMY LOCAL ANALYSIS

REPLACE DELIVERABLE February 2022

#### **Contents:**

- →Introduction
- **→**Local Analysis
- **→**Implementation
- →Main Findings
- **→**Conclusions









## Introduction

REPLACE, REgional Policy Actions for Circular Economy www.interregeurope.eu/replace, is an Interreg Europe project involving 8 regions, namely Lazio (IT), NEXA (La Réunion; FR), Lodzkie (PL), Crete (GR), Fryslàn (NL), HWWI (Hamburg; DE), North East Romania (RO) and Centro (PL). REPLACE has the objective of integrating, deploying and capitalizing on the lessons learnt through the H2020 Coordination and Support Action (CSA) project SCREEN www.screen-lab.eu. It aims at enhancing the creation, implementation and monitoring of regional policy instruments targeting circular economy transition through cross-regional cooperation. Concretely, policy-makers and managing authorities work together for the common objective of improving Regional Operational Programmes (ROPs) tackling circular economy (CE), in line with the European Commission's Circular Economy Action Plan, the Green Deal, Fit for 55 strategy and National Agendas. The partnership is composed of 8 European Regions and the advisory partner VELTHA ivwz, which is in charge of ensuring a smooth learning and exchange process, as well as an efficient and timely implementation.

#### The partnership:



- → Lead partner and coordinator: Lazio Region (IT)
- → NEXA Regional Development Agency (La Réunion; FR)
- → Region of Crete (GR)
- → Province of Fryslân (NL)
- → Hamburg Institute of International Economics HWWI (DE)
- → Lodzkie Region (PL)
- → North-East Regional Development Agency (RO)
- → Centro (PL)

REPLACE is structured in four pillars:

- 1 Local Analysis
- 2 Circular cross-regional synergies
- 3 Funding Instruments for circular economy (Memorandum of Understanding)
- 4 Assessment Criteria for circular economy

In addition, the partnership developed the **Circular Benchmark Tool**: an easy to use assessment instrument for territorial public authorities, such as regions and cities, to evaluate the state of the art of the circular economy transition.









## **Local Analysis**

The local analysis methodology was developed within the Horizon 2020 Coordination and Support Action project SCREEN, thanks to the cooperation of 17 European regions under the common aim of creating a replicable and synergic strategical framework for the circular economy transition.

The Local Analysis is a first tool to assess and identify the circularity potentials in the region.

REPLACE regions employed the SCREEN Local Analysis and mapping tool to define the state of the art of the circular economy transition, building on the data of the Regional Innovation Smart Specialisation Strategy (RIS3) through a micro-economic approach to highlight focus sectors for circular economy, namely the value chains and economic domains endowed with the highest potential for circular economy.

The Local Analysis unfolds as follow:

Step 1– Smart Specialisation Strategy (RIS 3), Strategic areas, and Swot Analysis.

Step 2 – Focus sectors and companies.

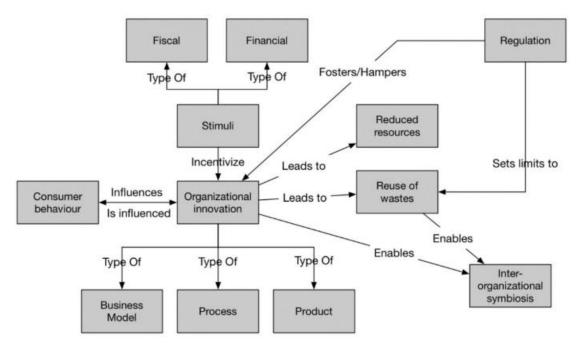
Step 3 – Research and Development and Innovation capabilities.

Step 4 – Emerging ideas.

Step 5 – Existing circular economy legislation.

Step 6 – Existing funding instruments.

The analysis follow the structure of the meta-model of circular economy here represented:











The data collected allows the depiction of the regional circularity potential, accounting for the different capabilities, the stimuli and the regulations. A summary of the Local Analysis assessment approach is reported in the table above:

Scope	Source	Description
Available resources	Step 2.1 (waste) Step 2.2 (companies)	Types and amount (if data is available) of waste resources to be used as input for circular economy applications available in the region Types of outputs produced by companies
Societal awareness of circular economy	Step 1.2 (SWOT analysis) Step 3.3 (education capabilities)	Potential opportunities and treats against the development of circular economy Actual and prospected societal behaviour towards circular economy
Stimuli	Step 6 (funding instruments)	Existing local (Regional or national) and international (EU) stimuli for circular economy innovation
Regulation	Step 5 (existing legislation)	National or regional level (existing or under development) affecting circular economy application within the region
Inter organisational symbiosis	Step 2.1 (focus sectors) Step 2.2 (companies) Step 4 (emerging ideas)	Local regional or national symbiosis: - Actual symbiosis, - Potential symbiosis or contact points between different industries
Innovation potential	Step 3.1 (R&D capital) Step 3.2 (Innovation capabilities) Step 3.3 (Educational capabilities)	Innovation potential the region can exploit in terms of circular economy applications (e.g. waste reuse, waste reduction, energy efficiency)

The Local Analysis identifies focus sectors for circular economy, paving the way to the exploration of potential interregional synergies.

Within the REPLACE consortium the following potential area of cross-regional cooperation have been evidenced: manufacturing, agri-food, textile and fashion, plastics and construction.

For each of the above mentioned value chains an exploration meeting to validate and assess potential synergies and areas of cooperation has been implemented: more info displayed on the deliverable dedicated to circular economy Cross-Regional Synergies).

For further details and information about the methodology of the Local Analysis, refer to the Methodological Notes section of the following document: <a href="http://www.screen-lab.eu/deliverables/D2.2.pdf">http://www.screen-lab.eu/deliverables/D2.2.pdf</a>









## **Implementation**

As an Interreg Europe project funded under the IV call, REPLACE activities are implemented in two different phases:

⇒Phase one: policy experience exchange, internal implementation of the 4 pillars of the project and the Circular Benchmark Tool, with completion of an action plan per policy instrument addressed, totalling eight action plans.

⇒Phase two: monitoring of the implementation of the eight action plans.

Phase one starts on August 1st 2019 and lasts until 31st of July 2022 (consisting of six semesters), while phase two has a duration of 1 year.

Due to the emergence and ongoing continuation of the COVID-19 pandemic, with all related travel restriction, the implementation of the Local Analysis is delayed: all partners completed the assessment within semester 3: the results were published in a dedicated folder on the REPLACE website (http://www.interregeurope.eu/replace/library/).

Due to the pandemic limitations on travels, the partnership was only able to validate the learning outcome during the 3<sup>rd</sup> in-person event, held in Crete (6<sup>th</sup> to 8<sup>th</sup> of October 2021) in semester 5.

After an initial presentation of the Local Analysis during the 2<sup>nd</sup> in-person event in Leeuwarden (3<sup>rd</sup> and 4<sup>th</sup> December 2019), hosted by the Province of Fryslàn, REPLACE team exploited the online tools to arrange numerous meetings tacking the implementation of the Local Analysis:









## **Main Findings**

The application of the Local Analysis allowed REPLACE partnership to identify possible areas of cooperation in Focus Sectors for the circular economy transition, namely manufacturing, agri-food, textile and fashion, plastics and construction.

The focus sectors play a crucial role in the transition of the regional economic systems toward sustainability: the partners identify possible synergies and discuss how to support local stakeholders in reaching circular economy business models.



For the **Manufacturing** sector possible areas of cooperation emerge within Lazio, Centro, Crete and Hamburg.

Lazio, Lodzkie, North East Romania, Crete and La Réunion have identified the **Agri-food** sector as one with high potential for the circular economy transition at regional and interregional evel.

In the **Textile and Fashion** sector, the regions of Lodzkie and North East Romania find common ground for potential interregional collaboration.

In the **Plastics** sector, emerging synergies are reported by Fryslân, Centro, La Réunion and Hamburg. With regard to the **Construction** sector, La Réunion and Hamburg highlighted potential synergies.









## **Conclusions**

The Local Analysis has demonstrated to be an effective instrument, capable of supporting policy-making in an effective manner, helping regional officers in mapping capabilities and potentials for circular economy in their territories.

The process of analysing and mapping is essential in promoting awareness of the local situation, ensuring the development and deployment of well-targeted policy instruments. Furthermore, the local analysis allows the mapping of relevant stakeholders to involve in the policy process.

After having successfully completed the Analysis, REPLACE partners have highlighted Focus Sectors for the Circular Economy and identified possible areas of cooperation to further exploit the interregional learning opportunities of the Interreg Europe programme.

For the targeted sectors, stakeholders have been identified and will be fully involved in the exploration of the potential synergies within the second line of work of the project, namely the circular economy cross-regional synergies.

The local analysis is now being transformed into a digital tool thanks to the EU funded DigiPrime project <a href="https://www.digiprime.eu">www.digiprime.eu</a>.

DigiPrime is developing the first circular economy federated digital platform supporting the transition toward circular economy at industrial level, exploiting data for the recovery and reuse of materials. The platform is composed of numerous services, targeting both public and private sectors.

Specifically, the local analysis methodology is digitalized, expanded and enriched through an open innovation approach: stakeholder at local level insert their data, capabilities, emerging ideas, and challenges in order to foster business cooperation across Regions and sectors. In this way, a systemic path to identify innovative cross-regional and cross sectorial value-chains and related business opportunities will be promoted. This supports decision making in a data-driven and integrated manner, allowing for a deeper connection between the public and the private spheres, as successfully demonstrated at a smaller scale by the REPLACE partnership.

The DigiPrime service that precisely digitalizes the Local Analysis methodology will be exploited by REPLACE regions to monitor the progression of the state of the art of the circular economy transition, while continuously assessing the forthcoming capabilities and potentials in detailed value-chains and sectors.



