



LIFE 19 CCM/AT/001226

Progress Report
Covering the project activities from 01/07/2020 to 28/02/2021

31/03/2021

LIFE 3R « Retradeables »

Project location:	Vienna (AT), Athens (GR), Bratislava (SK), Czech Rep (CZ), Hungary (HU)
Project start date:	10/07/2020
Project end date:	30/06/2023
Total budget:	€ 2,921,204
EU contribution:	€1,591,536
(%) of eligible costs:	55.00% of total eligible budget
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Section 1 - Overall assessment of the achievements and as to whether the project objectives and work plan are still viable

1.1 Summary of the overall progress achieved during the Reporting Period

The work progress of the project in the first reporting period (M1-M8) has been in line with the Grant Agreement (GA). All the Objectives and milestones planned for this period have been achieved. All deliverables due in this reporting period have been completed.

During the first 8 months of the project, several tasks have been running in parallel. Some of those are still ongoing (mainly within Action C1) and some have been finalized. A summary of the overall progress achieved under all groups of actions is given below.

ACTION C1

- ✓ A coherent and robust methodology is designed (for the installers) to provide the knowledge and define the practical skills to be able to sample, analyze and characterize the F-gas. The expected date of completion lays at the end of June 2021. The main results will be reported in Deliverable: Methodology & Good Practice Guidelines on M12.
- ✓ At the same time, recommendations and tips on how to undertake leak checking, recovery, installation, servicing and maintenance of stationary refrigeration, air conditioning and heat pump equipment containing refrigerants (Good Practice Guidelines - GPG) will be finalized at the end of June 2021. The main results will be reported in Deliverable: Methodology & Good Practice Guidelines on M12.
- ✓ First steps of the designing and the development of the database (definition and categorization of all individual parameters that will be considered as data entries).

ACTION C2

- ✓ The first steps of the definition of the minimum requirements of equipment and analyzers were done. The requirements are taking into account critical measures for the classification of the recovered F-gas, accuracy of the measurement, LOD & LOQ of the measuring principle, robustness, portability, durability.

ACTION C3

- ✓ Within, the F-gas circular economy ecosystem realization process (based on the "Plan Do Check Act" cycle, an interactive four step management method that is used in business for the control and continuous improvement of processes and products) several steps have been accomplished, as described briefly bellow.
- ✓ The first functional version of the 3R Marketplace platform (general set-up and architecture) of web application including both front-end (client side) and back-end (server, app, database), have been completed. The realization of the platform is the major achievement of the first eight months of the project. This platform will serve as a corner stone of the whole project, and its architecture and functionality will be tested and assessed during the demo countries roll out. As already mentioned, all feedback from the three (3) demo countries experience will be evaluated and all necessary corrective actions will be designed and realized, following the "Plan Do Check Act" cycle methodology.
- ✓ The following work packages of the platform have been completed:
Work Package: Seller - Company account management is applied for covering the relevant to R-gas sellers account management requirements.
Work Package: Buyer - Company account management is applied for covering the relevant to R-gas buyers account management requirements.

Work Package: Seller - Company user accounts management is applied for covering the relevant to R-gas sellers user accounts management requirements.

Work Package: Buyer - Company user accounts management is applied for covering the relevant to R-gas buyers user accounts management requirements.

Work Package: Seller - Installer account management is applied for covering the relevant to R-gas sellers account management requirements.

Work Package: Buyer - Company R-Market is applied by R-gas buyers to manage purchase activities when using the R-market.

Work Package: Seller - Company R-Market is applied by R-gas sellers to manage sales activities when using the R-market.

ACTION C4

- ✓ A F-gas **market follow-up** at technical, economic, environmental, and regulatory level concerning European Union (EU) has been carried out.
- ✓ **Market study** has been completed and will play a guiding role in the implementation of exploitation strategy, transferability and IPR analysis as well as replication and transferability plan.

ACTION D1

- ✓ The methodologies and tools for project monitoring have been defined. The main results will be reported in deliverable: Monitoring methodology and tools on M12.

ACTION E1

- ✓ The project logo that represents the project theme that will be used in all the internal and external communication materials has been designed.
- ✓ The website¹ that represents the main access point to key information on the project, where all the dissemination materials will be published in a timely manner has been developed.
- ✓ Dissemination and Communication plan has been completed.
- ✓ Trademark registration is going to be finalized on May (M11).
- ✓ Regarding Social Media, agreed in creating a LinkedIn page and a YouTube channel.
- ✓ All communication elements (e.g., website) that have been used as part of task E1.2 include the LIFE logo and a clear reference to the financial contribution given by the LIFE Program.

ACTION F1

- ✓ The coordination of the consortium is running smoothly with good understanding and collaboration between all partners towards the achievement of the objectives according to the Work Plan.
- ✓ An online project Kick off meeting had been organized and it took place on the 14th of October 2020.
- ✓ The first Progress meeting (teleconference) has been scheduled on May 28, 2021 under the organization of NTUA.
- ✓ The KPIs (baseline) have been recorded through the KPI webtool.

1.2 Impact of the Project so far

¹ For now, the website has been changed to www.life3r.com since Retradeables as a brand is not yet approved (estimated date of approval: May 2021)

During the first reporting period (M1-M8), a baseline has been defined. In the following months, impact/benefit for the environment, climate (Reduction of greenhouse gas emissions – CO₂ reductions), and Socio-economic (eg. jobs creation), will be reported.

After initial legal assessments in 3 pilot countries and available information from some other EU countries, the legal barriers for LIFE 3R are mostly connected to used refrigerant handling. When refrigerant is recovered from the unit, and it is not processed yet, we lack unified definition, across EU, how to define and handle such refrigerant. The biggest issue, in most of the countries, is that such refrigerant is, after recovery, declared a hazardous waste. However, this kind of definition reduces significantly the potential of circular economy as well as restricts or even blocks refrigerants trading process not only locally but nationally and internationally, too. This is quite reasonable since hazardous waste handling requires a different, very strict approach. Such situation is presented in Czech Republic and Hungary, and according to our knowledge, also in Spain.

In Slovakia, situation is very different. Recovered refrigerant from the unit is not immediately declared a (hazardous) waste, but represents a valuable resource. It can be re-used, traded and recycled, without legal barrier, on condition that standard records and log books must be properly maintained. Then, this kind of re-usable refrigerant is transported without special licences and may be freely transported to the recycling or collecting points as well as from collecting points to recycler. Refrigerant becomes a waste in the moment it is declared a waste. In this case, it must be properly disposed and records about it kept.

Finally, a big support to a R-gas circular economy would be a unified EU regulation including a precise definition that recovered refrigerant which is meant for recycling or reclaiming, it could be freely handled. The removal of existing barriers for domestic and international trading & transporting of refrigerants, suitable for recycling or reclamation, enables the usage of existing resources thus providing additional trade potential and business opportunities for SMEs, under the circular economy requirements applied by EU. Next to it, regulating in-country refrigerant handling, according to the good example of Slovakia, would further stimulate business with used refrigerants as well as support the whole range of stakeholders in the F-gas sector to learn about circular economy, protecting at the same time the environment (refrigerant has a value and its leak rate will be reduced).

Section 2 - Identified deviations, problems and corrective actions taken in the period

Thus far,

The progress has been in line with the budget, the proper implementation of the Work Plan and the achievement of project objectives.

- **No** Technical (equipment delivery is delayed, construction of infrastructure takes longer than anticipated), Financial (the costs are not likely to correspond with the budgeted amounts) or Organizational (roles of partners are changing) **problems or difficulties** encountered or foreseen.

-The only deviation from Grant Agreement that has occurred, in terms of delays of Deliverables and milestones is:

Action Deviation Description

F1 Deliverable Minutes of the Kick-off meeting
Milestone Kick off meeting
Delayed by less than 2.5 months

Justification and impact

Internal issues of the coordinator
– No impact on the project

Other deviations:

Action E1: Regarding Social Media, agreed in creating a LinkedIn page and YouTube channel, and skip the Twitter Account.

Why: Twitter is a quite time-consuming platform as there is quite a different use in the different markets/countries – especially when it comes to languages and target groups. On LinkedIn the common language is English and if not, translations are available. People connect there more internationally, and we can reach a broader audience. So, we want to focus on doing LinkedIn right instead of splitting the resources to two Social Media Platforms.

Action F1: Due to the global COVID-19 (Coronavirus) pandemic measures, the physical progress meetings have been replaced by teleconferences.

- The Baseline information has been recorded on the KPI webtool. No **anticipated significant deviations from the Key Project Indicators** targets that were initially set.