Recycling is one of the most crucial problems in our days. A lot of materials which can be recycled end up in landfills and this results in the emission of hazardous gases. Furthermore, in order to produce new materials a lot of energy is needed and in the increase of the CO2 levels in the atmosphere. All these have significant effect in the environment and countries around the world struggle to find the solution. In Greece, the statistics of recycled products are really disappointing as the percentage is below the average EU value and a lot of action is needed. Our vision is to help our country to increase this percentage by creating a rewarding recycle model which will engage citizens, municipalities and companies. The target of the business model is to boost up the recycled products to 30% of the total trash and as a result to help our environment to mitigate on the effects of climate change.

Problem/Opportunity:

Until now recycling of products in Greece is a crucial problem as there are not so many facilities and most of the citizens don't care about the effect of their rubbish on the environment. According to our research, which was made by deploying a questionnaire, facilities seems to be the most common reason of not recycling and is followed by the lack of information as well as the time needed to separate the materials. Based on these responses and due to the new legislation about recycling which will be in force by next year, we developed our idea the BioCredit. BioCredit is a rewardable recycling model which will focus on the installation of new green bins which will operate with an off – grid system and on the development of an app which user can use to find the bins and recycle their products. After their transaction, a qr code will be printed with credits which user can redeem in the application and encashment on the deals offered by companies.

Solution & Product:

Our solution is based on a rewardable recycle model which will engage companies' citizens and municipalities. Firstly, new facilities will be installed which will operate with green energy. The bins will have a solar panel which will convert the solar radiation to electrical energy and the surplus will be stored in batteries for future use. The bins will be managed by an application where the user can see the nearest one to recycle his product. During the transaction, the material is processed by the bin automatically to check the material and then a weight meter will calculate the difference before and after the transaction and will convert the difference to credits. The user can redeem the credits via the app and then can use them in the available offers. The bins can be purchased by companies and municipalities to create new facilities. Furthermore, the services of the app can be used by companies which will want to make offers to support the user who is recycling. Last but not least the recycled product can be sold to companies which will transfer the material back to the manufacturers.

Validation of Problem:

According to researches, Greece is a later developer in recycling. EU statistics show that 81 percent of the municipal waste is going to landfills, 4 percent is composted and the rest, 16 percent, is recycled which is one of the worst records based on the other countries of the European union. In the capital, from the 4 million habitats only 13 percent of them is eligible for the recycled waste and around the country there are places with almost zero percent due to the lack of facilities. A lot of funds are given by the EU which seem to help in order to create facilities and increase the recycled waste by 1% but the problem remains because the target is to reach almost 30%. Landfill emissions are really harmful for the environment with the 99%

of them consists of carbon dioxide and methane. Carbon dioxide has significant effect on the environment and in Greece the problem is crucial if we take into consideration that the majority of waste end to landfills. To increase recycled waste new ideas and facilities needed with different approach to engage more people.

FINANCIAL PROJECTIONS

For our expenses, we have concluded that a recycle unit with all its key parts costs 2.k E per unit. Our revenue model is planned as followed. At first, we will reach agreements with recycling waste gathering businesses, which will buy our products with price per ton. The price per material per ton is being agreed with each one of the consisting businesses. Also, these companies will be informed about every recycle unit's capacity dynamically and this feature will be payed with a small amount of fee monthy or yearly. Secondly, that revenue will exceed our total construction costs for every recycle unit. Having said all that, our break-even point is accomplished at the end of our 2nd year of operations.

Go To Market Strategy

For our go-to strategy, we will start by targeting Attica region as a whole for the promotion of our bins and reach agreements with super markets, retailing companies and municipalities to install our recycling units. We will start by installing units for three different materials and will introduce a fourth one by the end of our 3rd year of operations. The marketing campaigns will be on social media and radio station. Our products offers real-time rewarding recycle process, and through that process our user will be rewarded with point that can be redeemed in our retailing partner stores. Our application will be free and will be available for downloading on the app store. Our best fits —in an ideal scenario- for installing these units are municipalities from Attica region. Our advantage position is that our recycling bins are autonomous recycling units, supported 24/7 which will notify about the capacity of every bin dynamically. The total start funding, is nearly 200k in euros for structure, marketing and offices and that funds will be repaid by the end of our 3rd year of operation. By the end of our 5th year we will expand to regions outside of Attica.