

Circular Economy Webinar Session 16 Key Takeaways: Smart Cities and Circular Economy: How Citizens Recycle and Reuse to Save the Planet

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Oyster Able is a pioneering AloT circular economy solution provider in the Republic of Korea, integrating Artificial Intelligence (AI) technologies with Internet of Things (IoT) devices. The company offers an efficient recycling and reuse infrastructure that addresses the challenges posed by plastic and waste issues through the Lalaloop© AloT resource circulation solution. It creates a closed-loop cycle of recyclables and reusables as a viable alternative to the use of single-use plastics. They have successfully deployed 659 collection devices and gained 80,000 registered users, making a significant impact on the Korean collection devices market, and supporting circular economy.

Key Takeaways

- 1. Traditional approaches to address recycling challenges in the Republic of Korea have not been effective:
 - a. Regulation and Restraint while regulations can be implemented to deter improper
 waste disposal, the effectiveness of regulations depends on their enforcement.
 Cooperation from various stakeholders is required to activate and enforce regulations
 effectively.
 - b. **Campaigns** have been conducted but have not solved the problem.
 - c. **Reward Programs** are seen as potential motivating solutions but the low prices offered for recycled materials make it less effective in motivating people to participate.
- 2. Recycling can be enhanced by incorporating data, such as the type and quantity of recyclable items, the time and location of disposal, and the market share of various products. This data-driven approach can increase the value and attractiveness of recycling. Companies and organizations can also benefit from data-driven rewards by gaining insights into consumer behavior, market trends, and product demand. Retailers can optimize their operations and make more informed decisions based on this valuable information.
- 3. Oyster Able have two solutions: Lalaloop Circular Infrastructure Collecting Device and the Today Recycle Reward App. These products have been successful in increasing the recycling rate in Korea, with verified results and collaborations with governments and companies.



- 4. The recycling process is made simple and convenient through QR codes and an application. Users can easily scan their QR codes, deposit their items in the collection bin, and receive rewards. The collecting devices can be installed in residential areas, cafes, airports, and other public or commercial areas. This allows for the convenient collection of recyclable items in various settings.
- 5. The reward application incorporates gamification elements, such as levels and participation history, to make the recycling process more engaging and enjoyable for users. Participants can track their progress and see how their actions contribute to their scoring and overall participation.
- 6. By using the application, participants in the program receive financial rewards in the form of **points**, which can be automatically redeemed and spent in the program's reward mall.
- 7. The company has collaborated with municipal governments and companies to implement its recycling solutions. Examples include partnerships with a local government, a milk-based product company, Government of Bhutan, and a baseball stadium. These collaborations have led to successful recycling initiatives and improved waste management in their respective areas.

Watch the Recording here.