

OSAKI, JAPAN



POPULATION
128,763
Inhabitants (2020)

Recycling Rate Champion

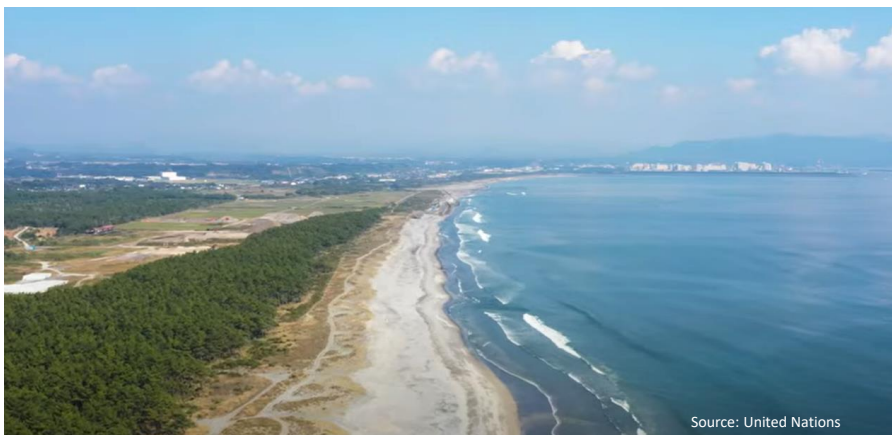
For two decades, Osaki Town, situated in Kagoshima, home to a population of 13,000, has been actively engaged in recycling, culminating in an impressive recycling rate of 83.4% in 2017. Remarkably, the town has maintained its top position in recycling rates for 13 consecutive years (in 2022), as recognized by the Ministry of Environment's annual survey.

The City primarily relied on landfill disposal for general waste due to the absence of an incinerator. However, with the disposal site's remaining capacity becoming limited, it became essential to extend its lifespan and manage general waste disposal costs more efficiently. To address this, Osaki Town introduced the Non-incineration Waste Disposal System, known as the Osaki System, which involves citizens actively participating in the sorting of waste into three categories. Waste is then collected and processed by a local waste recycling company.

The local government took the initiative to introduce this system and conducted an extensive outreach effort in collaboration with 153 self-governing associations and government offices. Over a period of approximately four months, they organized 450 briefing sessions for about 4,000 households in the town. During these sessions, the local government emphasized to citizens that "Recycling transforms waste into valuable resources," aiming to foster understanding and cooperation within the community. Subsequently, Osaki Town embarked on a recycling program that relies on a cooperative effort between the local government, private enterprises, and residents, sorting a total of 27 different types of materials. In 2017, the Osaki Town Sanitation Neighborhood Association launched the "Osaki Town Garbage Sorting App" to address various garbage-related inquiries. These issues typically revolved around challenges like unclear separation guidelines and uncertainty about garbage collection schedules.

Waste collection in Osaki is comprehensive, covering a wide range of recyclables. The town has established an efficient collection network with 210 collection places, that ensures waste is gathered regularly and transported to the appropriate recycling facilities. Crucially, Osaki has invested in recycling infrastructure. The town has facilities and programs for processing various types of recyclable materials. These facilities are essential in turning waste back into valuable resources. Osaki promotes the recycling of paper, glass, plastics and organic waste, among other materials. To incentivize recycling and reward the efforts of its residents, Osaki Town offers a system where households receive various benefits for their participation in recycling activities.

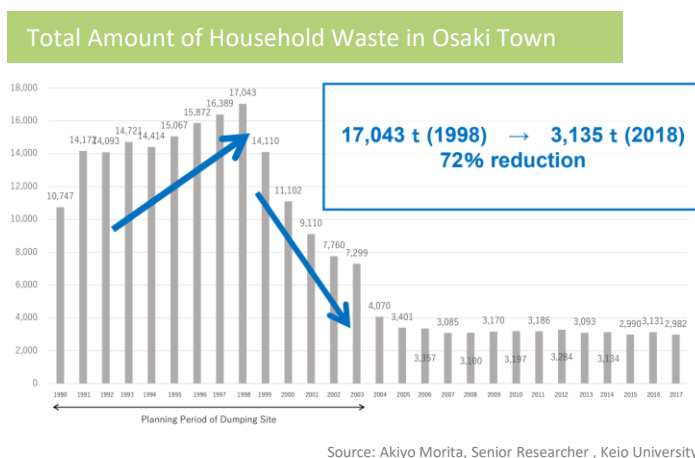
Osaki Town's recycling system serves as an inspiring example of how dedicated community involvement, education, and well-planned infrastructure can lead to remarkable recycling rates and contribute to a cleaner and more sustainable environment. Starting in 2012, Osaki Town, in collaboration with the Japan International Cooperation Agency (JICA), initiated a six-year technical cooperation project called the "Osaki System." This endeavor extended to Depok City and Bali Province in Indonesia and involved the training of 59 individuals as instructors. The primary objective was to reduce the amount of waste destined for landfill disposal.





IMPACTS TO ACHIEVE SDG 11.6.1

- Achieved 83.4% recovery rate in 2017 compared to the 20% national rate
- Achieved 72% reduction of the total amount of household waste generated between 1998-2018
- MSW generation rate in Osaki (0.9 kg/cap/day) is similar to national average (0.93 kg/cap/day)
- MSW sorted in 27 categories
- 62% reduction of waste management costs (100 USD/tonne), compared to national average (162 USD/tonne)
- Increasing landfill's lifespan by 50 years
- 64,500 USD revenues from sales of recycled materials in 2018
- Osaki Town was selected as SDG Future City in 2019
- The town's recycling centre has created 40 jobs
- Annually gift certificates which can only be used in the city, are issued to all residents, by the city, to promote and celebrate circular local economy
- Osaki System has been promoted in Jakarta, Depok (West Java Province) and Denpasar (Bali Province) in Indonesia



INSTITUTIONAL SUSTAINABILITY



All initiatives were led by the Osaki municipality which provided institutional support, however, Osaki Town's institutional stability is rooted in the continuous commitment of the local government, collaborative partnerships, extensive education and outreach, international cooperation, and sustained investments in infrastructure and incentive systems. Local government, private enterprises, and residents play the main role in the initiative's success and its sustainability.

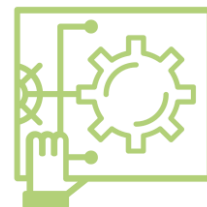
PLANNING & MONITORING



Effective planning in waste management is evident in Osaki Town's adoption of the Osaki System, community education programs, technological solutions, and the establishment of a wide collection network. In addition, the approaches are taken to increase waste recovery: Source separation into 27 categories, Osaki Town Garbage Sorting App, 210 collection points, and recycling of materials. These factors collectively contribute to the town's ability to maintain impressive recycling rates over an extended period.

The monitoring aspects involve ongoing efforts to educate, incentivize, and recognize the community's participation while collaborating with international partners to share expertise and knowledge. Furthermore, the effectiveness of the initiative is monitored through the recycling rate, generation rate, and MSWM costs.

These planning and monitoring strategies contribute to the stability and success of Osaki Town's recycling system.



APPROPRIATE TECHNOLOGY

Osaki Town's waste management system incorporates appropriate technology in various aspects, from community engagement and education to waste collection, recycling infrastructure, and international collaboration. The adoption of technology aligns with the town's commitment to efficiency, sustainability, and staying abreast of advancements in waste management practices. The following options were adopted to enhance waste recovery: waste segregation at source, recycling of paper, glass, plastics, and organic waste, and city investment in recycling infrastructure. It is operationally sustainable and replicable in similar settings.



FINANCIAL SUSTAINABILITY



Osaki Town's waste management system exhibits considerations for financial sustainability through cost-efficient waste disposal, strategic partnerships, infrastructure investment, incentive systems, international collaboration, and continuous improvement efforts. These elements collectively contribute to the town's ability to manage waste in a financially sustainable manner while fostering environmental responsibility.

The initiative was financed by local funds and other sources of funding entailed the municipality's budget. In addition to this, it made 64,500 USD in revenues from sales of recycled materials in 2018 and can therefore be considered financially sustainable.

STAKEHOLDER INVOLVEMENT / INCLUSION OF INFORMAL WASTE SECTOR



Osaki Town's waste management system involves a diverse range of stakeholders, including the local government, residents, self-governing associations, government offices, private enterprises, international partners, and community-based organizations. The main actors/stakeholders in the initiative are the local government, private enterprises, and residents.

The principles mentioned above can serve as a guide for municipalities looking to create more inclusive and sustainable waste management systems.



SOURCES

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- KUAMNEWS - https://www.youtube.com/watch?v=Lhm4Rg1Oo6M&ab_channel=kuamnews



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