



Good practice identified during action A1

Number/code: OM/SM14

Title: COOKING-OIL MANAGEMENT

Guidelines section:



Description

The Yankee Stadium is the stadium of the New York Yankees, club of Major League Baseball has a strong composting and recycling program. In particular, during the course of the season, all the cooking oil from the stadium are recovered and recycled to produce biodiesel fuel.

At the Stade Geoffroy Guichard (Saint-Etienne) an effective circular economy concept was put in place in order to demonstrate the value of waste. Cooking oil was collected in the fan zone – not only to raise awareness, but also because Stade Geoffroy Guichard's lighting is powered by biodiesel. As part of the renovations completed prior to hosting the European Football Championship 2016, the generators for the stadium lighting are powered by biodiesel made from locally collected, recycled and processed cooking oil. This was possible with the help of the local organization Ondaine Agro, already well experienced in recycling waste bread into animal feed. The used cooking oil is mainly collected from catering establishments, but the objective is to reach 100,000 liters per year by extending the collection to individuals, even the most remote, thanks to a mobile waste unit. Once collected, the frying oil becomes biodiesel simply by passing through a machine that uses a process called transesterification.

Environmental benefits

During a typical season at the Yankee stadium, this practice allows to recover and recycle more than 20,000 gallons of cooking oil, which is used to produced 18,600 gallons of biodiesel. According to their estimates, when used in vehicles, this biodiesel results in a carbon reduction of more than 30,000 pounds-the equivalent of removing approximately 27 cars from the road for a year.¹ Therefore, both the recycle and then the use of biodiesel allowed at the same time to reduce the amount of waste sent to landfills and the amount of carbon emitted.

¹ https://www.mlb.com/yankees/ballpark/information/sustainability-initiatives

The environmental benefits of this innovation also relate to raising awareness about recycling frying oil, which removes it from the wastewater system and limits transport before treatment. Recycling one liter of cooking oil means three kilos less greenhouse gases going into the atmosphere2. With an estimated 1 liter of cooking oil used per person per year, 400,000 liters of biodiesel can be produced across the whole of Saint-Étienne.

Economic benefits

The practice allowed the club to reduce the costs related to collection and disposal of waste and fuel consumption.

Applicability and replicability potential

The practice is applicable but the replicability depends on the ability and needs of the single actors.

<u>Source</u> <u>Yankee Stadium</u> <u>Stade Geoffroy Guichard</u> (p. 37)

² https://www.livingcircular.veolia.com/en/eco-citizen/le-chaudron-lit-recycled-cooking-oil