



SSAFE CASE STUDY REPORT Recycling Plastic Film

Kendal: Lexington

Location: Lexington, VA 24450

Recorder: Anita C. James, resident

Date Submitted: 04/17/2023

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Keywords: Recycling plastic film for TREX[®] benches

Summary:

TREX[®] corporation offers a 48” “Yacht Club” bench in exchange for the recycling of targeted plastic film within a six-month period. Kendal at Lexington (KaLex) began the program on June 1, 2021, and has recycled 3,059 pounds of plastic film as of April 15, 2023.

Objective: The primary objective was to recycle plastic film that, when placed in a landfill, takes centuries to decompose. The secondary objective was to receive TREX[®] benches for placement on campus and to offer to organizations in the community.

Project Description:

The TREX[®] plastic film recycling project is campus-wide and includes residents, staff, and administrators. Residents in the nursing facility are not expected to participate.

Brief description/characterization of community/campus

- Kendal at Lexington rests on 85 acres at the southern edge of Lexington, VA.
- There are approximately 200 independent living residents, 25 assisted living residents, and 40 nursing residents (the majority of whom are not KaLex residents).
- Independent living residences are divided into 95 cottages and 55 apartments.
- Kendal at Lexington is a not-for-profit organization.
- Kendal at Lexington is a community-driven facility based on Quaker principles.

The project is applicable to any campus or community with independent residents who shop, etc., can collect plastic film and take it to a recycling container.



Methodology (Activities, Steps):

- The Sustainability Committee approved implementation of the TREX[®], now NexTREX, program of collecting plastic film.
- TREX[®] contacted through the website, enrollment completed, access to recording site confirmed. One resident.
- Recycling containers (n=5) purchased and placed inside campus buildings. Note: TREX[®] will provide up to three containers but we opted for sturdier containers (1 resident).
- Initially, one resident volunteer monitored each container for the coordinator. After about six months, enthusiasm disappeared, and volunteers dropped out.
- Containers emptied when full, items sorted to ensure compliance with TREX[®] guidelines, bagged, and weighed, recorded (2 residents).
- Two to three bags of plastic film are delivered to participating grocery store and deposited. Average of 31 trips and 81 bags per collection period (2 residents).
- Data for each bag recorded on spreadsheet for monthly transfer to TREX[®] official website (1 resident).
- When 500 or more pounds is recorded within a six-month period, recording ceases and the bench is ordered, received, and assembled. Bench arrives as a flat pack with four pieces and 11 bolts (2 residents).

Funding Needed (Amount, Sources):

Initial funding for six containers (we used flip top plastic garbage containers), plastic bags, scale, and copies of TREX[®] list of acceptable items (cost \$293.43). Ongoing expense of plastic bags. Funding comes from the Sustainability Committee budget.

Involvement or Support of Community Administration:

The KaLex administration is very supportive. The administration encouraged staff.

Key Challenges:

- Maintaining involvement of volunteers.
- Educating residents about TREX[®] guidelines for acceptable materials (ongoing since new residents move in monthly).
- Location to store filled bags when one cycle is completed, and another cannot begin for days or weeks.



Outcome (Results):

- Primary outcome=many residents are conditioned to save and deposit items of plastic film.
- 5,039 pounds of plastic film diverted from the landfill and into a commercial product.
- Six TREX® benches obtained in 22 months. Bench color is green to reflect sustainability focus.

Lessons Learned:

Learned: This is a tremendous undertaking that would be easier with a core of dedicated volunteers. Leaving everything to one person is burdensome but it is also difficult for several people to handle the recording tasks. Pick-up, sorting, weighing, and transporting to the drop-off site would be helpful.

Learned: An available storage area would be helpful if lots of bags are collected and/or there is a time lag between six-month periods.

Learned: Kendal at Lexington is operating two projects, i.e., Kendal at Lexington and KaLex Collectors, staggered by three months to ensure plastic film is not trashed and benches are received more often.

Would do: Re: Strong collections. Establish three projects—one to begin every two months—maximizing collections. Although TREX® requires each project to last six months, once a couple of community organizations were contributing their plastic film to us, we began averaging two and a half months to achieve the required 500 pounds.

Next Steps or Follow Up:

Resources:

Primary reference point: <https://nextrex.com/view/programs>, scroll down to “Looking for a community or university program?”

Photos: (see following page)



Senior Stewards Acting for the Environment



TREX[®] 48" Yacht Club Bench in Green



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