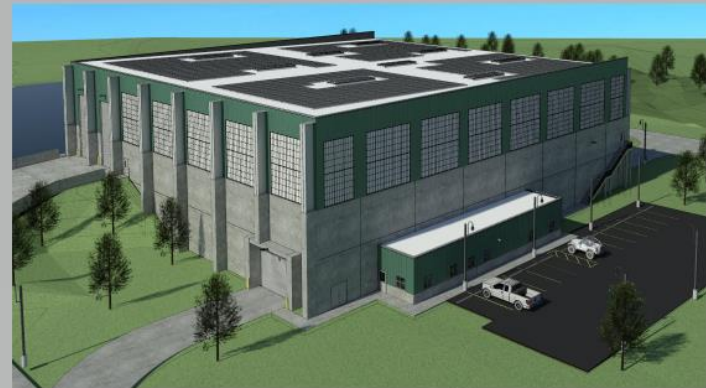




Proposed Meadowview Material Transfer Facility

Waste Management of
Illinois, Inc.

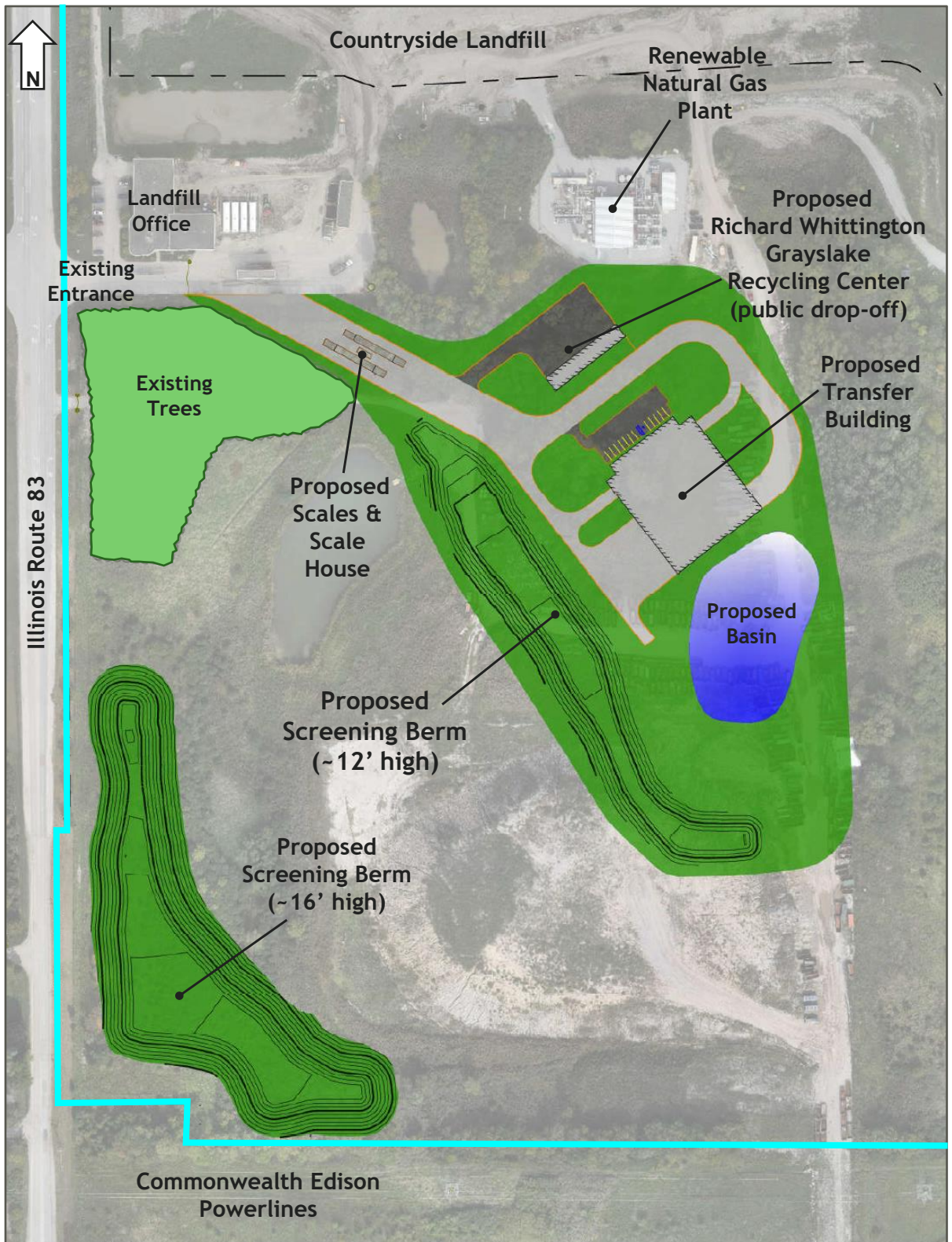


Location Map



Conceptual Site Plan

Proposed Meadowview
Material Transfer Facility



Operating Information

Material Transfer Facility

- 31,450 square foot transfer building
- 1,000 ton per day capacity
- Wastes accepted for transfer: municipal solid waste, construction & demolition waste, landscape waste
- Operating hours: 6:00 am - 6:00 pm M-F
- Gate hours: 6:30 am - 3:30 pm M-F
- Closed Saturdays, except for holiday make up days, i.e., when there is a holiday during the previous week: New Year's Day, Memorial Day, 4th of July, Labor Day, Thanksgiving and Christmas
- For Saturday holiday make up days, operating and gate hours will be 6:30 am - 2 pm

Recycling Center

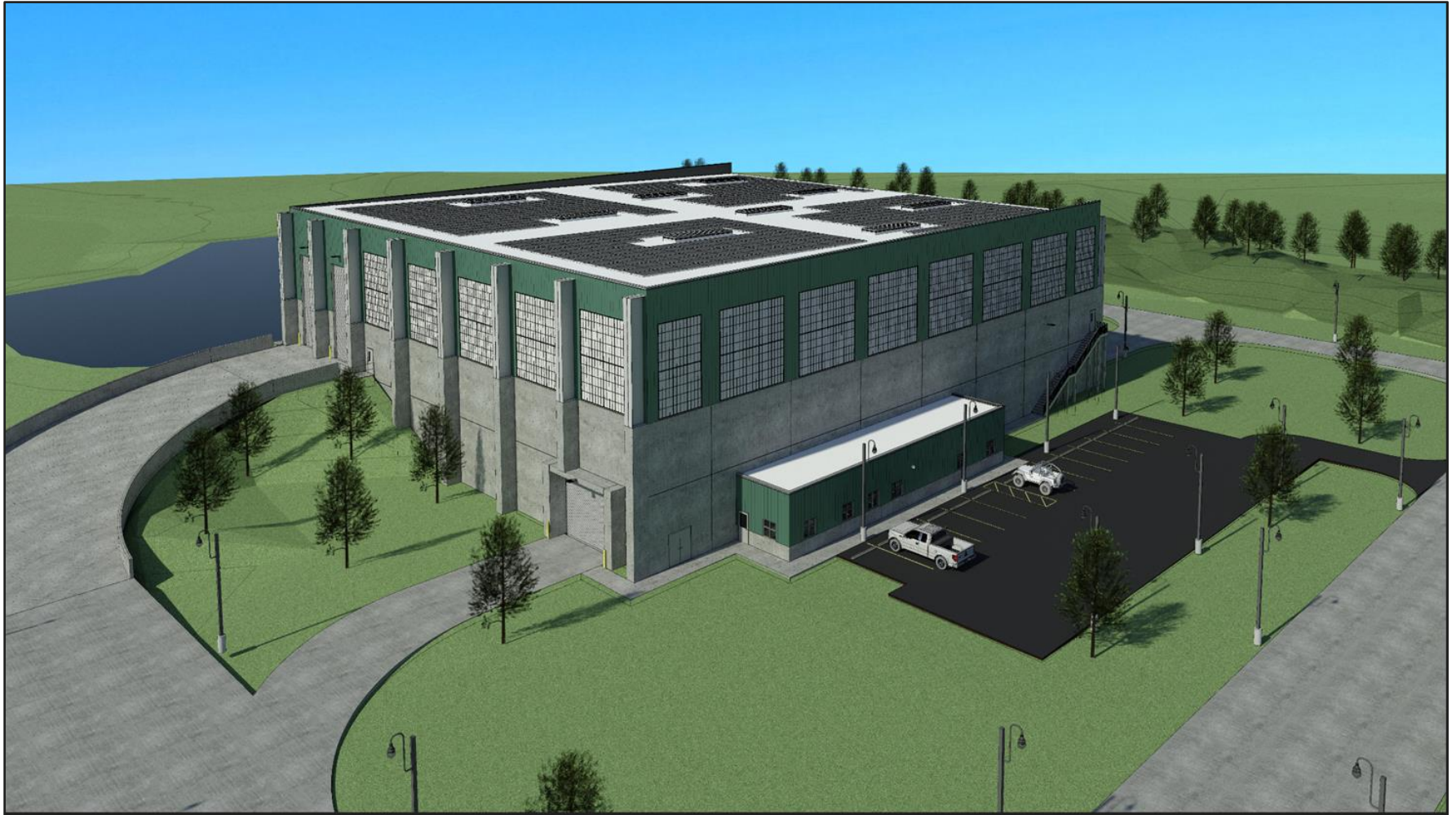
- 3,500 square foot recycling building
- Recyclables accepted: household materials such as electronics, textiles, shoes, food scraps, fiber, plastics, metal cans, carpet. Other materials may be added as agreed to by Lake County and SWALCO
- Gate hours: 6:30 am - 3:30 pm M-F, 8 am - 12 pm Saturday

Conceptual Site Plan - Traffic Flow



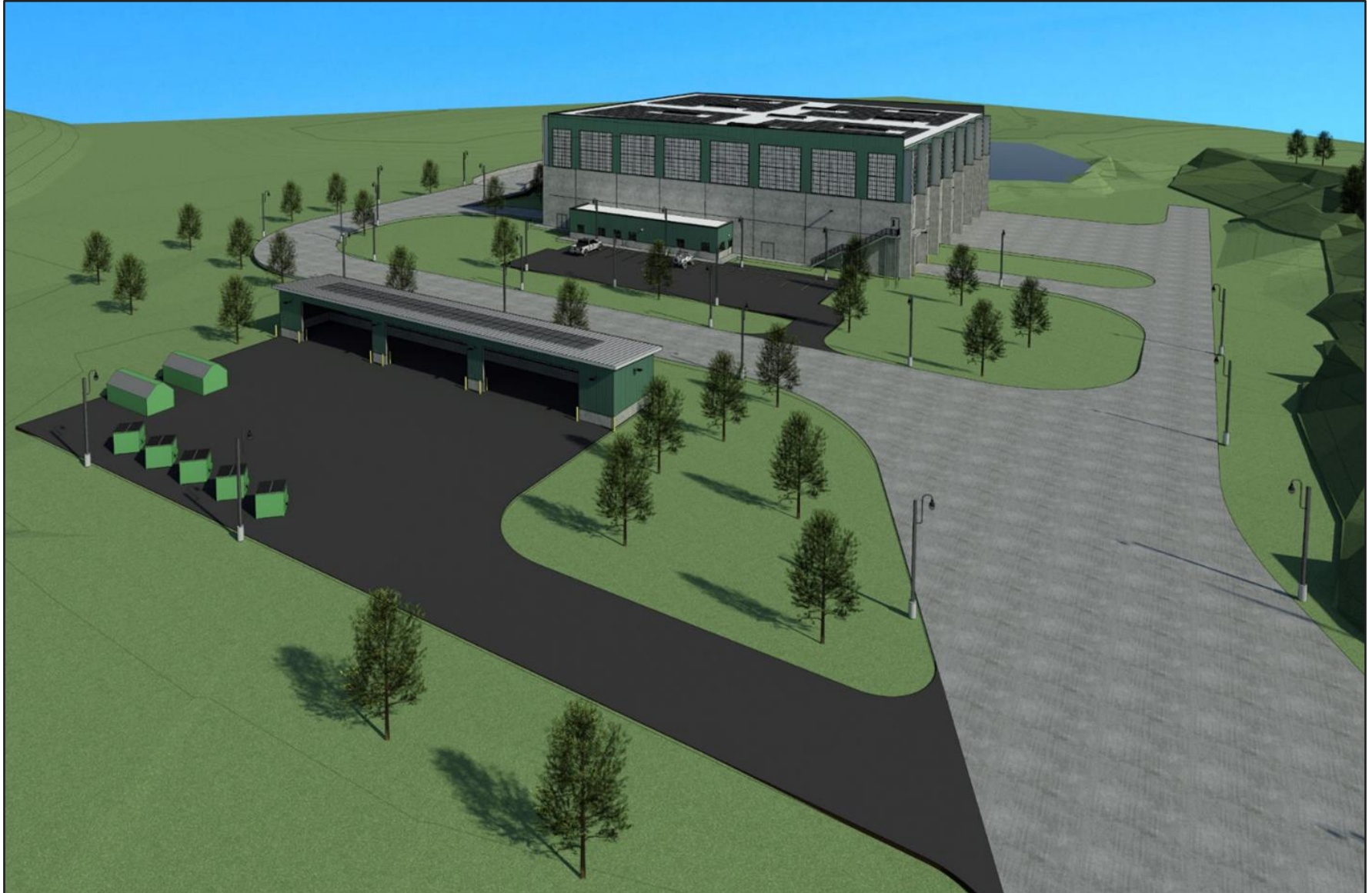
Architectural Rendering - Southwest View

*Proposed Meadowview
Material Transfer Facility*



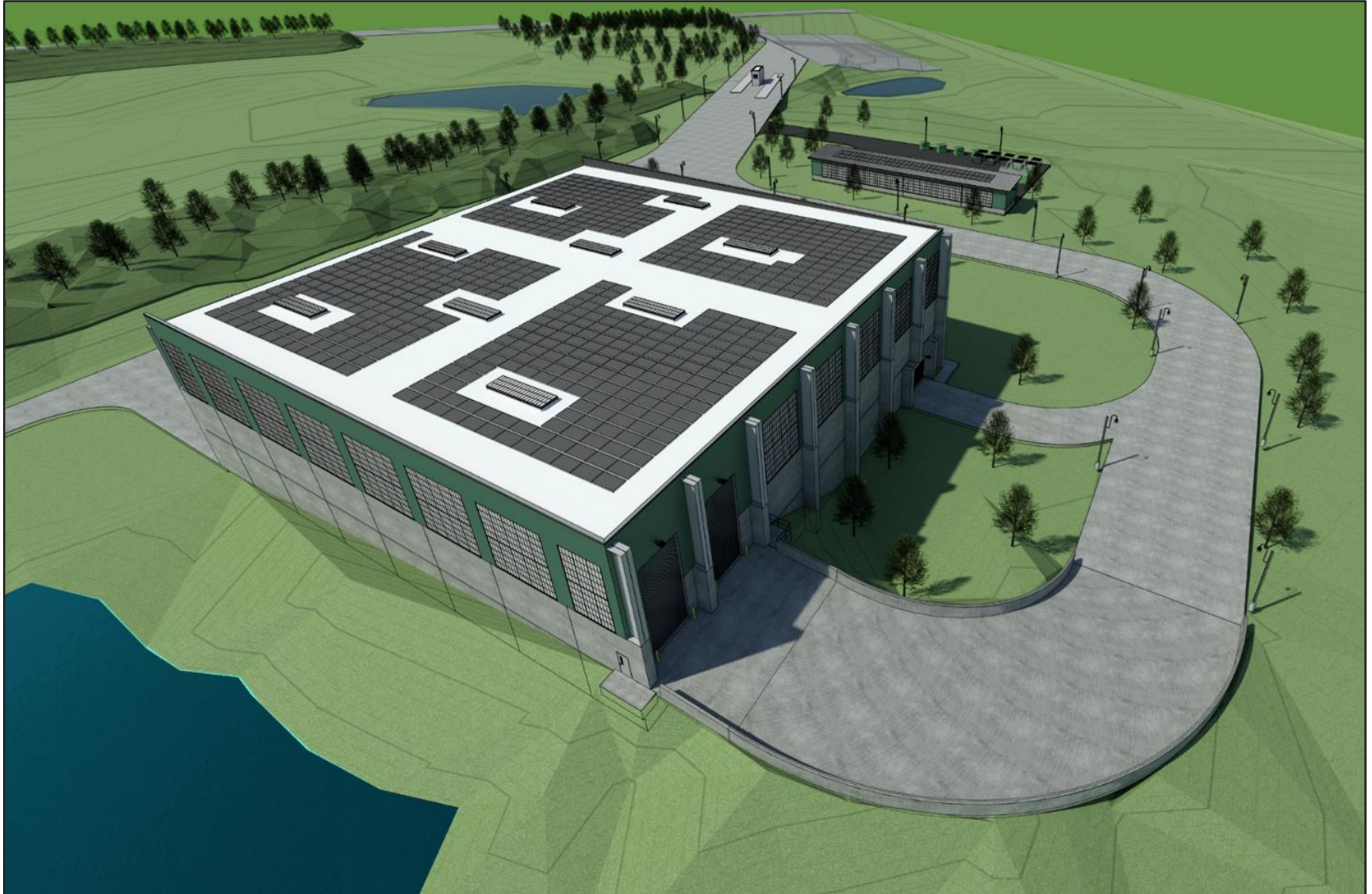
Architectural Rendering - Southeast View

Proposed Meadowview
Material Transfer Facility



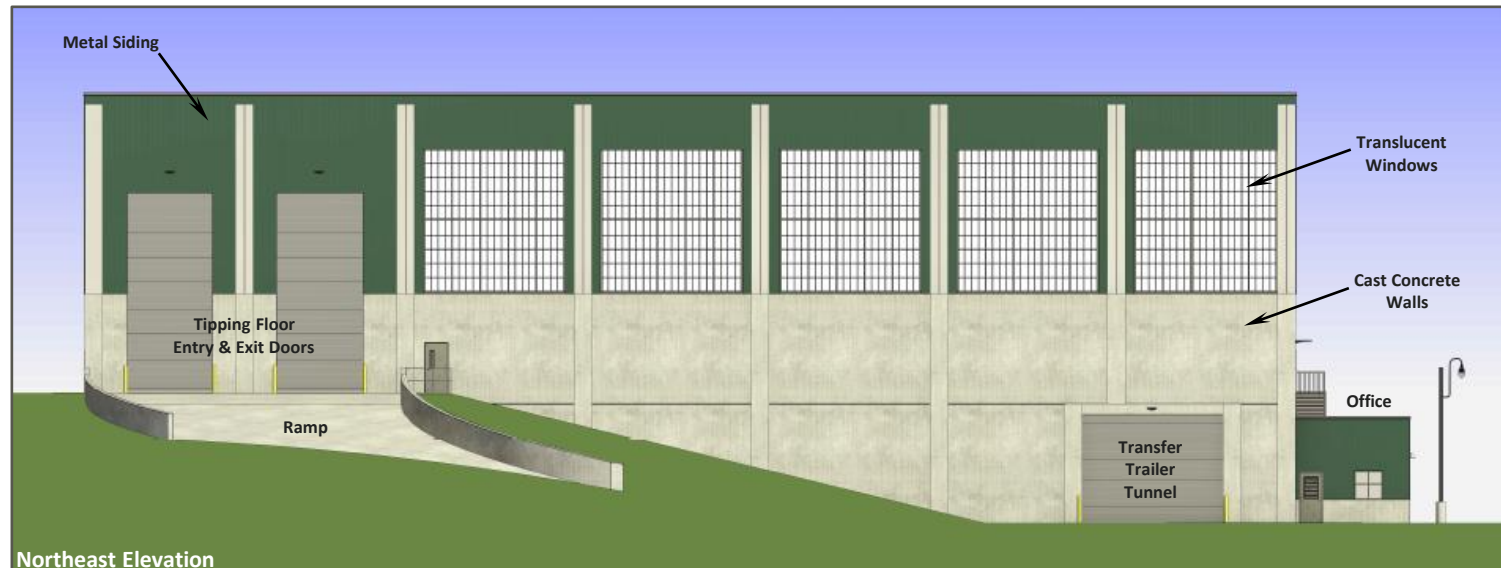
Architectural Rendering - West View

Proposed Meadowview
Material Transfer Facility



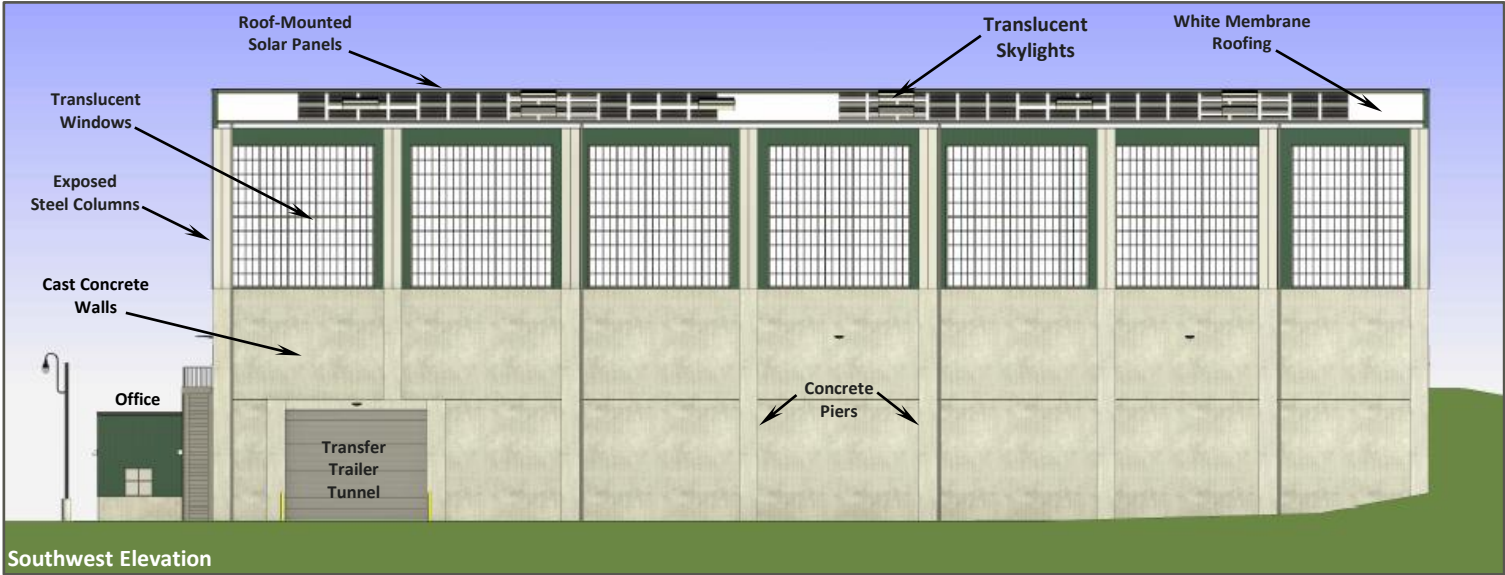
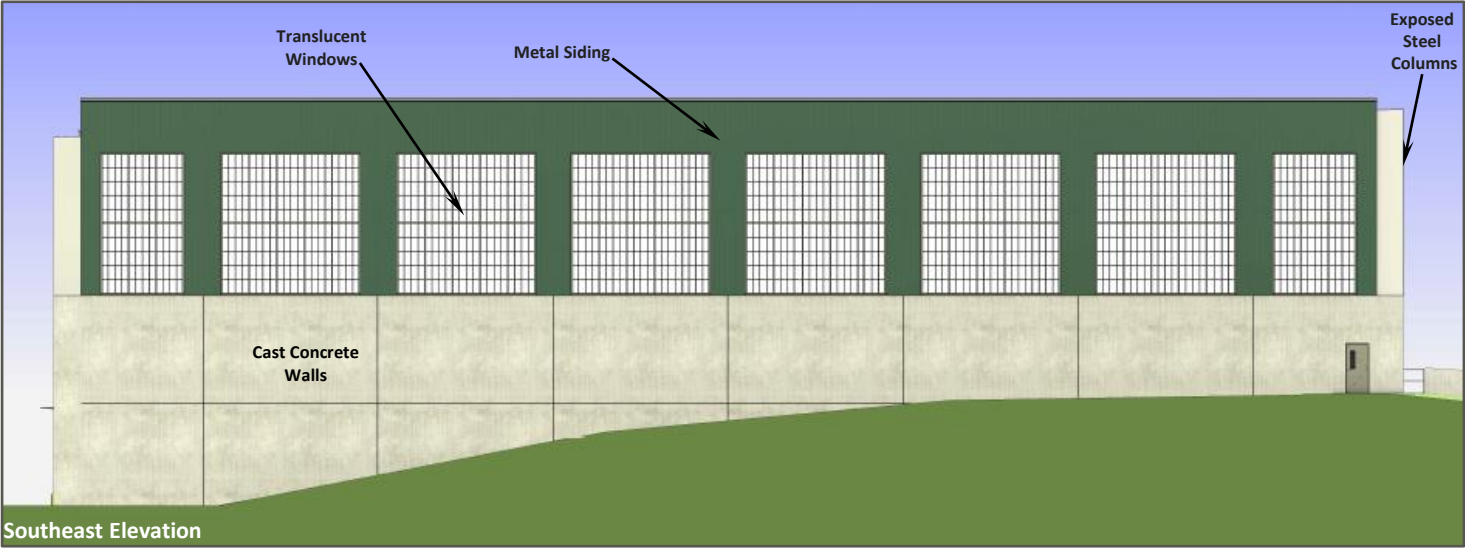
Building Elevations - Transfer Building

Proposed Meadowview
Material Transfer Facility



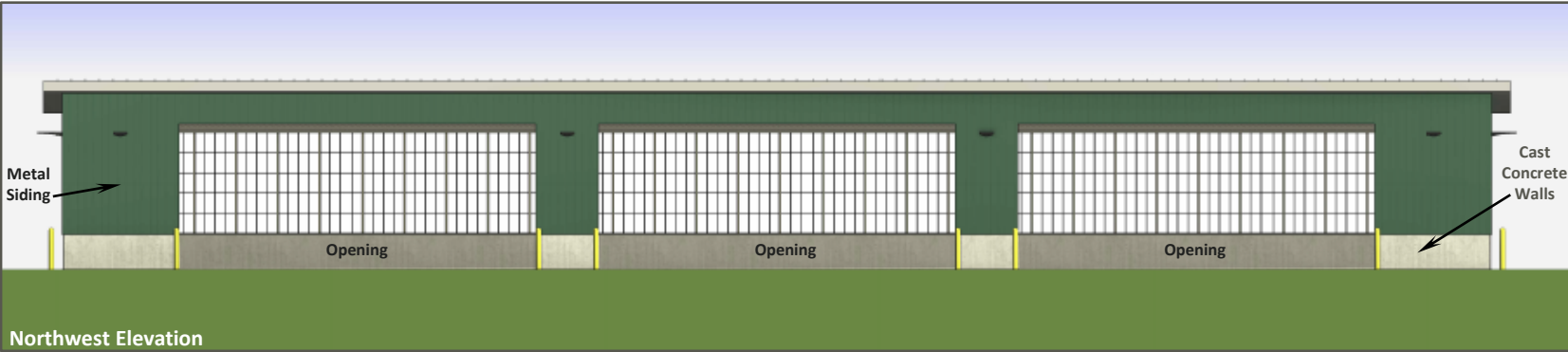
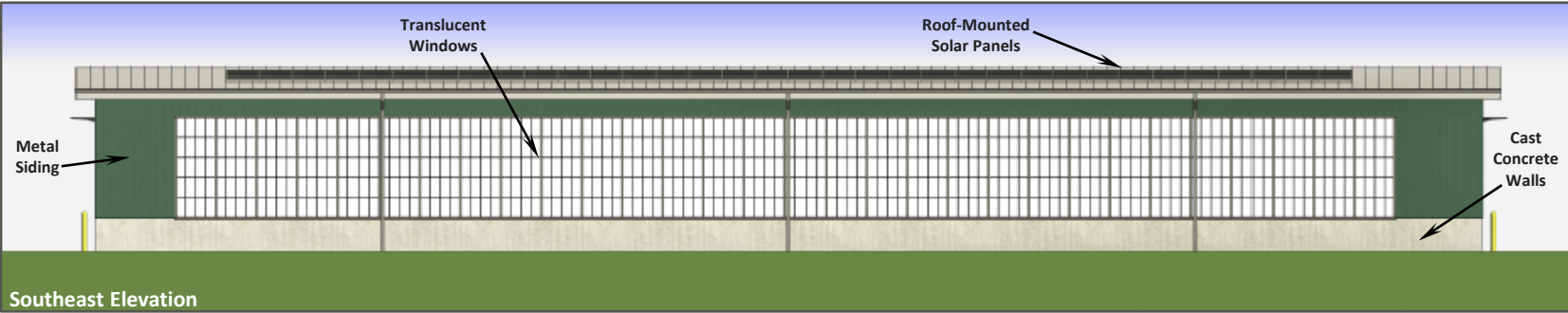
Building Elevations - Transfer Building

Proposed Meadowview
Material Transfer Facility



Building Elevations - Recycling Building

Proposed Meadowview
Material Transfer Facility

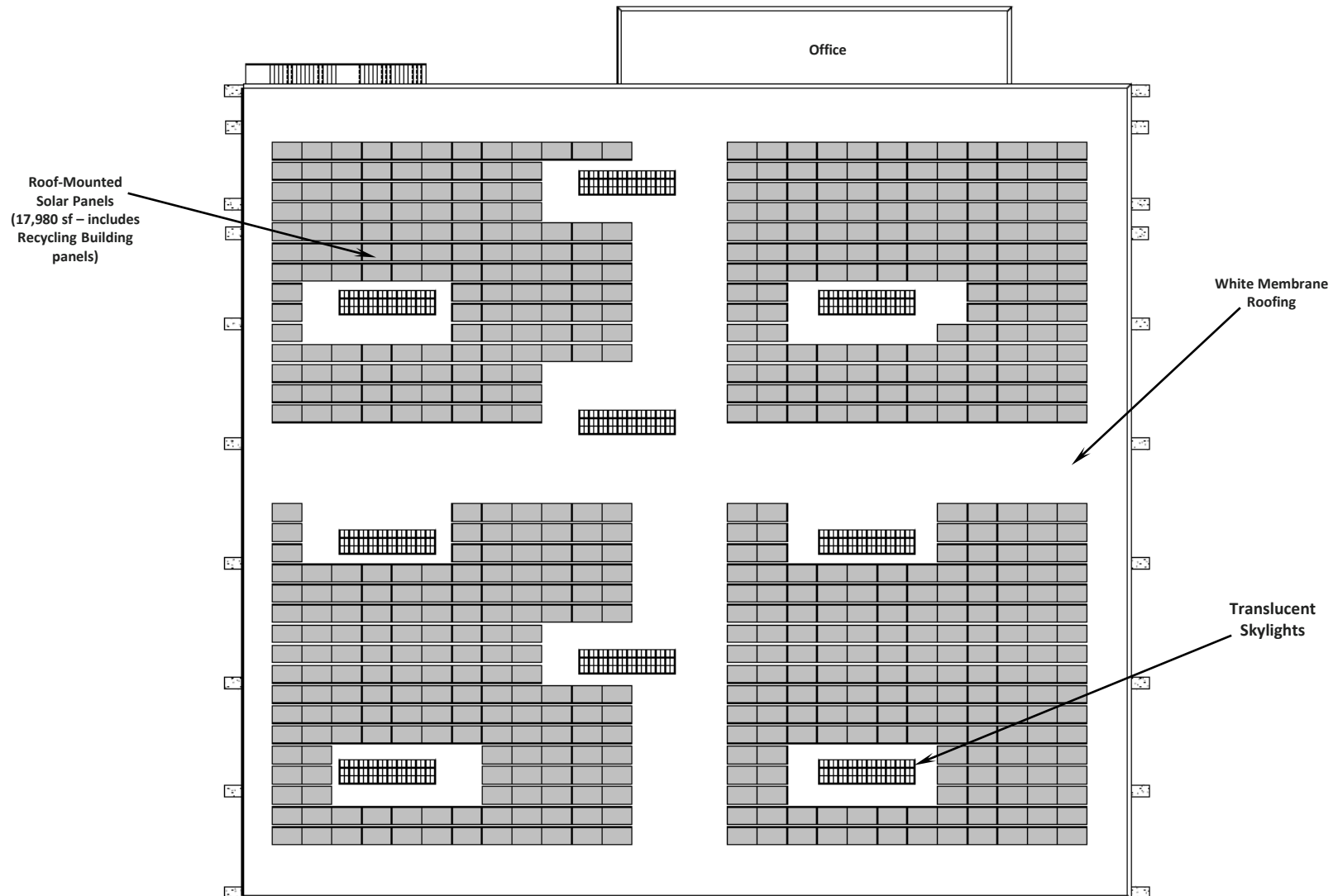


Proposed Green Building Features

- Solar panels on transfer station building and recycling center
- White roof - heat island reduction
- Collection and reuse of rainwater
- Translucent panels and skylights to reduce lighting requirements
- LED indoor lighting
- Light pollution reduction through compliant outdoor light fixtures
- Native landscaping

Roof Solar Panel Layout - Transfer Building

Proposed Meadowview
Material Transfer Facility



Solar Panel Energy Production

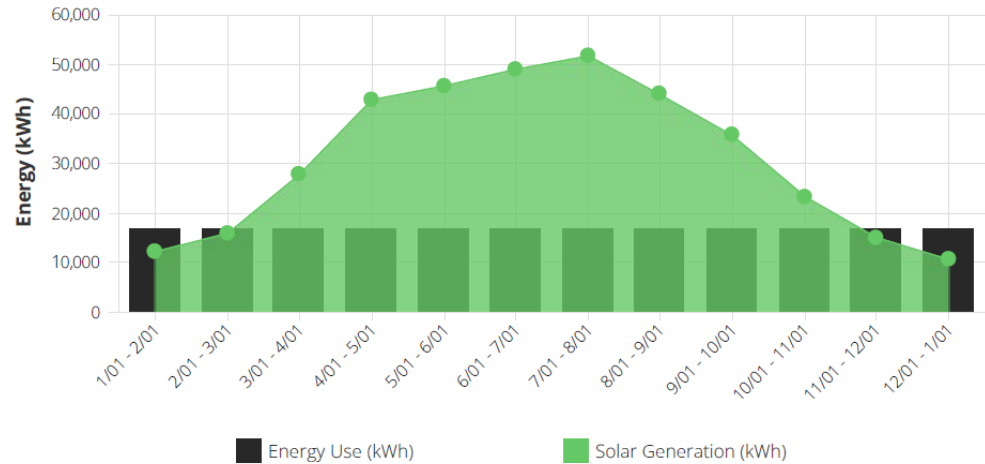
Energy Production

Solar PV Year One Production = 374,270 kWh
Current Annual Consumption = 203,004 kWh
Solar PV Offset = 184.4%

System Size

Equipment Power Rating: 345.9 kW-DC
Nameplate Power Rating: 290.0 kW-AC

Monthly Energy Use vs. Solar Generation



CO₂ Offset From Solar

- Utilizing solar energy offsets CO₂ emissions from fossil fuel electrical generation
- In Illinois, on the average, 1 kWh of fossil fuel electrical production creates 0.639 lbs of CO₂ emissions¹
- 374,270 kWh/year x 0.639 CO₂ lbs/kWh = 239,158 lbs CO₂ x 1 ton/2000 lbs = 119.6 tons CO₂ per year
- Over a 30-year period, CO₂ emission offset = 3,587 tons

Notes:

1. Based on the Illinois 2022 Electricity Profile, U.S. Energy Information Administration
<https://www.eia.gov/electricity/state/illinois/>

- A Life Cycle Assessment (“LCA”) was prepared for the transfer facility as required by the 2019 Lake County Solid Waste Management Plan Update
- The LCA must demonstrate the facility is superior to the current system for at least three of the four parameters (carbon dioxide emissions, nitrogen oxide emissions, sulfur oxide emissions and net annual energy consumption)
- The LCA compared a “build” scenario and “no build” scenario over a 20-year and 30-year period as it relates to overall transportation, heavy equipment operation and energy consumption emissions (excluding solar benefits)
- Construction and operation of the transfer facility results in reductions of carbon dioxide and nitrogen oxide emissions and net energy consumption (diesel gallons) as summarized below:

20-Year Totals

- CO₂ emission decrease 16,971 tons
- NO_x emissions decrease 47 tons
- SO_x emissions increase 0.61 tons
- Diesel fuel consumed decreases 3,838,021 gallons

30-Year Totals

- CO₂ emission decrease 26,415 tons
- NO_x emissions decrease 73 tons
- SO_x emissions increase 0.92 tons
- Diesel fuel consumed decreases 5,972,699 gallons

End of Presentation