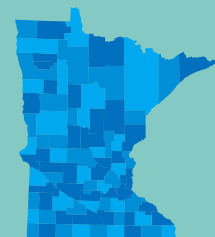


February 2026

Minnesota Preliminary Assessment

A report of findings on Minnesota's current management of packaging and paper products covered under the Packaging Waste and Cost Reduction Act including tonnage of materials, inventory of existing infrastructure, and inventory of available markets.



Preliminary Assessment for the Packaging Waste and Cost Reduction Act

About this report

The Minnesota Pollution Control Agency (MPCA) hired Eunomia Research and Consulting (Eunomia) in partnership with Foth Infrastructure & Environment (Foth) to complete the Preliminary Assessment. This report captures the current state of knowledge of understanding to be built upon in the full Needs Assessment.

Legislative charge

Minnesota Statute, Chapter 115A.1450, Subdivision 1 (a) & Subdivision 3.

(a) By December 31, 2025, the commissioner must complete a preliminary assessment according to this section.

*Subd. 3. **Content of preliminary assessment.***

A preliminary assessment must be completed for a preceding period of no less than 12 months and no more than 36 months, that includes:

- (1) identification of currently or recently introduced covered materials and covered materials types;*
- (2) tons of collected covered materials;*
- (3) the characteristics of recycling and composting programs, including a description of single-stream and dual-stream recycling systems offered in the state and prevalence of their use, average frequency of collection of covered materials for recycling and composting, types of collection containers used, commonly accepted materials for recycling and composting, and total costs by type of covered entity;*
- (4) processing capacity at recycling facilities, including total tons processed and sold, composition of tons processed and sold, current technologies utilized, and facility processing fees charged to collectors delivering covered materials for recycling;*
- (5) capacity of technology used by, and characteristics of compost facilities to process and recover compostable covered materials;*
- (6) capacity and number of drop-off collection sites;*
- (7) capacity and number of transfer stations and transfer locations;*
- (8) average term length of residential recycling and composting collection contracts issued by political subdivisions and an assessment of contract cost structures;*
- (9) an estimate of total annual collection and processing service costs based on registered service provider costs;*
- (10) available markets in the state for covered materials and the capacity of those markets; and*
- (11) covered materials sales by volume, weight, and covered materials types introduced by producers.*

Minnesota Pollution Control Agency

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List of acronyms

AI	Artificial intelligence
CAA	Circular Action Alliance
EPA	U.S. Environmental Protection Agency
EPS	Expanded polystyrene
GIS	Geographic Information System
HDPE	High-density polyethylene
LDPE	Low-density polyethylene
MN	Minnesota
MPCA	Minnesota Pollution Control Agency
MSW	Municipal Solid Waste
MMSW	Mixed Municipal Solid Waste
NC	North Central
NE	Northeast
NW	Northwest
OCC	Old corrugated containers
PET	Polyethylene terephthalate
PP	Polypropylene
PRO	Producer Responsibility Organization
PS	Polystyrene
PVC	Polyvinyl chloride
REC	Minnesota Recycling Education Committee
SCORE	Select Committee on Recycling and the Environment
SE	Southeast
SSOM	Source separated organic material
SW	Southwest
SWMP	Solid Waste Management Plan
TCMA	Twin Cities Metropolitan Area

Glossary of terms

Contamination: Presence of harmful, hazardous, or unwanted substances or materials that compromises the recovery, recycling, or composting of waste streams by increasing processing costs, reducing material quality, and/or limiting end-market viability.

Commercial, Industrial, and Institutional waste: Waste generated by businesses, industrial facilities, and institutions.

Commercial composting facility: composting facilities that receive and process food scraps and compostable covered materials that have been separated at the point of generation.

Compostable covered material: A covered material that: (1) meets, and is labeled to reflect that it meets, the American Society for Testing and Materials Standard Specification for Labeling of Plastics Designed to be Aerobically Composted in Municipal or Industrial Facilities (D6400) or its successor; (2) meets, and is labeled to reflect that it meets, the American Society for Testing and Materials Standard Specification for Labeling of End Items that Incorporate Plastics and Polymers as Coatings or Additives with Paper and Other Substrates Designed to be Aerobically Composted in Municipal or Industrial Facilities (D6868) or its successor; (3) is comprised of only wood without any coatings or additives; or (4) is comprised of only paper without any coatings or additives (Minn. Stat § 115A.1441, subd. 6).

Composting: A controlled microbial degradation of source separated compostable materials, including compostable materials to yield a humus-like product (Minn. Stat. § 115A.1441, subd. 7).

Covered Entity: A person or location that receives covered services for covered materials in accordance with the requirements of the Packaging Waste and Cost Reduction Act, including: (1) a single-family residence; (2) a multifamily residence; (3) a school as defined in sections 120A.22, subdivision 4, and 136A.62, subdivision 3, clauses (1) and (2); a nonpublic school as defined in section 123B.41, subdivision 9; postsecondary educational systems as defined in section 142E.01, subdivision 20; a provider as defined in section 142E.01, subdivision 20; and any other location where education or child care is provided; (4) a nonprofit corporation with annual revenue of less than \$35,000,000; and (5) a state agency, political subdivision, public area, public entity as defined in section 115A.151, or other governmental unit (Minn. Stat. § 115A.1441, subd. 9).

Covered material: Are packaging and paper products introduced. Covered material does not include exempt materials (Minn. Stat § 115A.1441, subd. 10).

Packaging: means a container and any appurtenant material that provide a means of transporting, marketing, protecting, or handling a product. "Packaging" includes pallets and packing such as blocking, bracing, cushioning, weatherproofing, strapping, coatings, closures, inks, dyes, pigments, and labels (Minn. Stat. § 115A.03, subd. 22(b)).

Food package: means a container applied to or providing a means to market, protect, handle, deliver, serve, contain, or store a food or beverage. Food package includes: (1) a unit package, an intermediate package, and a shipping container; (2) unsealed receptacles, such as carrying cases, crates, cups, plates, bowls, pails, rigid foil and other trays, wrappers and wrapping films, bags, and tubs; and (3) an individual assembled part of a food package, such as any interior or exterior blocking, bracing, cushioning,

weatherproofing, exterior strapping, coatings, closures, inks, and labels (Minn. Stat § 325.075, subd. 1(b)).

Paper product: means a product made primarily from wood pulp or other cellulosic fibers but does not include bound books or products that recycling or composting facilities will not accept because of the unsafe or unsanitary nature of the paper product. Paper product does not include exempt materials (Minn. Stat § 115A.1441, subd. 24).

Exempt materials: means materials, or any portion of materials, that: (1) are packaging for infant formula, as defined in United States Code, title 21, section 321(z); (2) are packaging for medical food, as defined in United States Code, title 21, section 360ee(b)(3); (3) are packaging for a fortified oral nutritional supplement used by persons who require supplemental or sole source nutrition to meet nutritional needs due to special dietary needs directly related to cancer, chronic kidney disease, diabetes, malnutrition, or failure to thrive, as those terms are defined by the International Classification of Diseases, Tenth Revision; (4) are packaging for a product regulated as a drug or medical device by the United States Food and Drug Administration, including associated components and consumable medical equipment; (5) are packaging for a medical equipment or product used in medical settings that is regulated by the United States Food and Drug Administration, including associated components and consumable medical equipment; (6) are drugs, biological products, parasiticides, medical devices, or in vitro diagnostics that are used to treat, or that are administered to, animals and are regulated by the United States Food and Drug Administration under the Federal Food, Drug, and Cosmetic Act, United States Code, title 21, section 301 et seq., by the United States Department of Agriculture under the federal Virus-Serum-Toxin Act, United States Code, title 21, section 151 et seq.; (7) are packaging for products regulated by the United States Environmental Protection Agency under the Federal Insecticide, Fungicide, and Rodenticide Act, United States Code, title 7, section 136 et seq.; (8) are packaging used to contain liquefied petroleum gas and are designed to be refilled; (9) are paper products used for a newspaper's print publications, including supplements or enclosures, that include content derived from primary sources related to news and current events; (10) are paper products used for a magazine's print publication that has a circulation of less than 95,000 and that primarily includes content derived from primary sources related to news and current events; (11) are packaging used to contain hazardous or flammable products regulated by the 2012 federal Occupational Safety and Health Administration Hazard Communication Standard, Code of Federal Regulations, title 29, section 1910.1200, that prevent the packaging from being waste reduced or made reusable, recyclable, or compostable, as determined by the commissioner; (12) are packaging that is being collected and properly managed through a paint stewardship plan approved under section [115A.1415](#); (13) are exempt materials, as determined by the commissioner under section [115A.1453](#), subdivision 6; or (14) are covered materials that: (i) a producer distributes to another producer; (ii) are subsequently used to contain a product, and the product is distributed to a commercial or business entity for the production of another product; and (iii) are not introduced to a person other than the commercial or business entity that first received the product used for the production of another product (Minn. Stat § 115A.1441, subd. 16).

Curbside: Waste collection service using a side-load truck with one driver or a rear load truck with two staff (either a driver and a helper or two drivers) to collect from carts in a residential area where a hauler is going house-to-house. This type of service is typically available to single-family homes to four-plex housing units and also includes services to town home associations other housing associations.

Environmental center: Locations that accept a wide variety of materials including recyclable materials, problem materials, and household hazardous waste. This includes the definition of a “recycling center” from Minn. Stat. § 115A.555, including specific opening hours requirements.

Extended Producer Responsibility (EPR): An environmental protection strategy to reach an environmental objective of a decreased total environmental impact from a product, by making the manufacturer of the product responsible for the entire life cycle of the product and especially for the take-back, recycling and final disposal of the product. Extended Producer Responsibility is implemented through administrative, economic, and informative instruments. The composition of these instruments determines the precise form of the Extended Producer Responsibility.¹

Greater Minnesota: Includes all counties outside of the Twin Cities Metropolitan Area.

Market: A facility that reuses, recycles, composts, or otherwise recovers materials and disposes of contaminants.

Mechanical organics separation: The process of physically isolating organic materials from the waste stream by using physical processes and equipment.

Multi-family residences: Residential buildings containing multiple separate housing units, such as apartments, condos, or townhomes.

Municipal Solid Waste (MSW): Household waste, commercial waste, waste generated by other nonindustrial locations, waste with characteristics similar to that generated at a household or commercial business, or any combination thereof. MSW does not include municipal wastewater treatment sludges, industrial process wastes, automobile bodies, combustion ash, or construction and demolition debris.

NAICS Codes: Standardized codes from the North American Industry Classification System used to classify business establishments by industry.

Organics: Food scraps and compostable covered material; more formally referred to as source separated organic material (SSOM). This does not include yard waste.

Organics recycling drop-off collection sites: Locations where collection containers are made available for residents to drop-off acceptable materials for organics recycling for composting.

Organics recycling for composting: Programs that accept food scraps and compostable covered material (source separated organics) to be delivered to a commercial composting facility for composting. These programs are typically separate from yard waste collections.

Organized collection services: Collection services that are coordinated by a local unit of government for trash, recycling, and or organics recycling collection services to some or all households within the jurisdiction.

Open market collection services: Collection services where individuals, households or property owners independently procure trash, recycling, and/or organics recycling collection through a hauling company.

¹ Lindhqvist, T. and Lifset, R. (1997). What’s in a Name: Producer or Product Responsibility? *Industrial ecology*, 6-7. Retrieved from: <https://doi.org/10.1162/jiec.1997.1.2.6>.

Recycling collection system: Collection of covered materials for recycling through a single stream or separate streams.

Recycling drop-off collection sites: Locations where collection containers are made available for residents to drop-off single-stream or multi-stream recyclables. These sites are minimally or not staffed. Collection containers are typically carts, dumpsters, or roll-off containers (some covered and some sectioned by material).

Recycling facility: A facility where only recyclable materials are received and prepared for reuse in their original form or for use in manufacturing processes that do not cause the destruction of the materials in a manner that precludes further use. The recyclable materials must: A. fit the definition of mixed municipal solid waste prior to separation for recycling; B. not include items which have been prohibited by state law from disposal or placement in mixed municipal solid waste, unless approved by the commissioner; C. have been separated from other mixed municipal solid waste by the generator prior to collection; and D. not be hazardous as defined in chapter 7045, except for household hazardous waste. Recyclable materials that are defined as household hazardous waste in part 7045.0131, subpart 1, and Minnesota Statutes, section 115A.96, subdivision 1, paragraphs (a) and (b), may be accepted at the facility for recycling if they are managed in accordance with part 7045.0310. "Recycling facility" does not include an individual generator of recyclable materials, such as a homeowner, a business, or a government agency, and it does not include a manufacturer using recyclable materials as feedstock (Minn. R. 7035.0300, subp. 88).

Process residuals: Non-recovered materials from sorting or composting operations which typically consist of non-recyclable debris, inert and non-compostable fragments.

SCORE funding: State grants provided to counties by the state to support waste reduction, recycling, or organics management initiatives as established in Minn. Stat. § 115A.557.

Single-family residences: Residential buildings designed to house one family, typically a standalone home with its own entrance and utilities.

Single-stream (or single-sort) recycling material: Covered materials that are collected in one single stream to be further sorted, often at a recycling facility, before being sold. This includes corrugated cardboard, mixed paper, aluminum, metal cans, bottles and jars, and plastic bottles and tubs.

Source separated: Refers to the practice of sorting waste at the point of generation (home, business, institution) into distinct categories in preparation for collection.

Source separated organic material (SSOM): Materials that are (1) source-separated compostable materials and yard waste, as defined under Minnesota Statutes, section [115A.03](#), except sanitary products and diapers; (2) vegetative wastes generated from industrial or manufacturing processes that prepare food for human consumption; and (3) compostable materials that meet the standards in ASTM D6400 and ASTM D6868, incorporated by reference under part [7035.0605](#). B. Unless specifically permitted by the commissioner under part [7001.0150](#), source-separated organic material does not include: (1) animal wastes such as manure or carcasses; (2) fish wastes generated from industrial or manufacturing processes; (3) meat by-products generated from industrial or manufacturing processes; (4) sanitary products; or (5) diapers. C. Source-separated organic material does not include: (1) septage; or (2) sewage sludge, as defined in part [7041.0100](#), subpart 49 (Minn. R. 7035.0300, subp. 105(A)).

Throughput capacity: The maximum amount of material that a facility or system can process over a specific period, usually measured per hour, day or year.

Tons per hour: A unit of measurement expressing the total weight of a material, substance, or waste stream processed over the course of one hour.

Tons per day: A unit of measurement expressing the total weight of a material, substance, or waste stream generated, processed, or disposed of over the course of one day.

Tons per year: A unit of measurement expressing the total weight of a material, substance, or waste stream generated, processed, or disposed of over the course of one year.

Twin Cities Metropolitan Area (TCMA): Area of the state that includes the counties of Anoka, Carver, Dakota, Hennepin, Ramsey, Scott, and Washington.

Waste-to-energy: A process or facility that processes waste collected as trash to capture usable forms of energy, such as electricity, heat, or fuel, typically through combustion, gasification, or other thermal technologies.

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Introduction

Background

The Minnesota (MN) Legislature has recognized the need for effective solid waste management to protect the environment and human health of Minnesotans. This commitment is demonstrated by the passage of the Waste Management Act (Minn. Stat § 115A) in 1980 to the passage of the Packaging Waste and Cost Reduction Act (Minn. Stat § 115A.144 to 115A.1463) in 2024. Throughout that time the MN Legislature has continued to discuss and pass laws that help prioritize moving materials up the state's waste management hierarchy as shown in Figure 1.

Figure 1. Minnesota's waste management hierarchy.

Minnesota's waste management hierarchy



Source: MPCA

The Packaging Waste and Cost Reduction Act creates an extended producer responsibility (EPR) program for covered materials, which includes certain packaging and paper products, statewide. EPR policies aim to require and incentivize more sustainable design and hold producers responsible for reducing the environmental impacts of the items they produce and managing them throughout the entire life cycle. Minnesota's Packaging Waste and Cost Reduction Act goes beyond recycling and composting and includes waste reduction and reuse, which will be covered in the Needs Assessment. Program requirements apply to covered materials which generally include the following materials sold, offered for sale, distributed, or used to ship a product within or into MN, including online purchases and shipments:

- Packaging: materials to transport, market, protect, or handle a product;
- Food packaging: materials to market, protect, handle, deliver, serve, contain, or store food and beverages; and
- Paper products: products made from wood or cellulosic fibers.

The Packaging Waste and Cost Reduction Act is designed to achieve the following objectives:

- Less packaging overall and toxicity reduction. More sustainable packaging options (refill and reuse) result in overall reduction in packaging materials manufactured and marketed, plus more efficient use of durable packaging. The program will also incentivize more sustainable design through eco-modulated fees that prioritize reducing impacts on the environment and human health, notably through waste and toxicity reduction of covered materials.
- More packaging that is refillable, reusable, recyclable, and compostable. All covered materials must be refillable by the consumer, reusable, recyclable, or compostable by 2032. Today, a lot

of items are single-use and disposable (e.g., multilayer plastic packaging); even if Minnesotans wanted to, they could not easily refill, reuse, recycle, or compost these covered materials.

- More curbside collection and places to recycle. Curbside services for recyclables and compostables will be expanded where they are currently limited or unavailable, and there will be more options, such as drop-off collection sites, for materials that are best collected through other methods. Some Minnesotans have limited or no access to curbside services and others have limited access to drop off recyclable or compostable materials that cannot be picked up curbside.
- Reduced costs. Producers will reimburse service providers for at least 90% of the cost of activities directly related to the refill, reuse, recycling, or composting (e.g., collection, transportation, sorting, preparation, etc.) of covered materials for covered entities, which includes single and multi-family housing, schools and childcare, colleges and universities, most nonprofits, and public buildings and spaces. This reduces what residents, local government, and others must pay.
- Expanded infrastructure and jobs. Producers will invest in infrastructure and responsible markets, resulting in more green jobs and business development related to collecting and managing covered materials.
- Investment in education and clear standards. The program includes public education to help people know what packaging is refillable, reusable, recyclable, or compostable as well as collection lists so Minnesotans can recycle and compost the same items throughout the state.

The Minnesota Pollution Control Agency (MPCA) is responsible for:

- Gathering the initial data for program development through a Preliminary Assessment and the Needs Assessment (repeated every five years);
- Establishing statewide requirements for the Producer Responsibility Organization (PRO) to meet in respect of waste reduction (including refill), reuse, recycling, composting, and use of postconsumer materials in new production;
- Developing collection lists for “commingled” recycling, composting, and alternative collection of recyclable and compostable covered materials not suited for a “commingled” collection system;
- Reviewing and approving the PRO stewardship plan (revised every five years) and annual reporting that tracks program progress and outcomes;
- Approving the selection of independent auditors to perform annual financial audits of the PRO;
- Approving covered material exemptions if a specific federal or state health and safety requirement prevents the material from being reduced or made reusable, recyclable, or compostable; and
- Ensuring program compliance and enforcement, including prohibiting the sale of products by producers who are not compliant.

In 2025 the MPCA confirmed registration of Circular Action Alliance (CAA) as the PRO which will be responsible for:

- Implementing the program on behalf of producers;
- Developing stewardship plans (revised every five years) and annual reports that track program progress and outcomes;
- Collecting producer fees;
- Reimbursing service providers for collection, transfer, processing, administrative costs, and refill and reuse; and

- Providing technical assistance to producer members, ensuring they collectively meet statewide requirements and performance targets.

An Advisory Board made up of 17 voting members representing a broad scope of impacted parties and one non-voting representative from the MPCA is responsible for:

- Reviewing all program documentation, including the stewardship plans and annual reports; and
- Providing program guidance and recommendations to the MPCA and PRO.

Purpose of the Preliminary Assessment

The MPCA contracted with Eunomia to complete a Preliminary Assessment and Needs Assessment as required in the Packaging Waste and Cost Reduction Act (Minn. Stat. § 115A.144 to 115A.1463). This report captures the current state of knowledge of understanding to be built upon. The Preliminary Assessment does not set the baseline and is a preliminary review of the recycling and composting system.

The Preliminary Assessment includes:

- An overview of the characteristics of recycling and composting programs in MN;
- An overview of existing infrastructure;
- A summary of the amount and types of covered materials introduced by producers in the state, along with the tonnages collected for recycling in the state; and
- High-level insight into contractual arrangements for collection.

The goal of this assessment is to generate a shared understanding of the state of the current recycling and organics recycling collection systems for covered materials. It is important to understand demographics as part of this assessment, as factors such as population density and urban/rural split will influence service demand, cost, access and effectiveness. This assessment relies on data and information available from existing reporting and planning structures.

The Preliminary Assessment sets the stage for the Needs Assessment, which, unlike the Preliminary Assessment, must be repeated every five years. The Needs Assessment is the next report in this series due on December 31, 2026, and it will include:

- An official baseline for program measures and outcomes – including proposals for statewide requirements;
- Recommendations on where investments should be made in collection, sorting, and responsible markets;
- A recommended methodology for reimbursement rates for service providers;
- An evaluation of environmental improvements and accountability; and
- An assessment of best practices for education and outreach.

Primary research will be carried out as part of the Needs Assessment. This data will supplement reported data and be used to revise the analysis carried out for the Preliminary Assessment and carry out additional analysis to meet the specific Needs Assessment requirements set out in the Packaging Waste and Cost Reduction Act.

Scope for composting

Yard waste collection programs, yard waste composting sites, and community composting (sites that classify as a small compost site as defined in Minn. R. 7035.0300 subp.99(A)) are not included in this assessment.

Yard waste is garden wastes, leaves, lawn cuttings, weeds, shrub and tree waste, and prunings as defined in Minn. Stat. § 115A.03 subd. 38.

Minnesota has a robust yard waste collection system and network of yard waste composting sites throughout the state. Minn. Stat. § 115A.931 prohibits yard waste from being placed in MSW or sent to a landfill or waste-to-energy facility. Understanding this robust collection network may help understand opportunities for expanding collection of compostable covered materials and may be evaluated further in the Needs Assessment.

Community composting (small compost sites) could help bridge the gap between backyard composting and commercial scale composting at commercial composting facilities. Community compost sites are not permitted by the MPCA. These sites have size requirements and are allowed to accept a specific scope of materials, which includes compostable covered materials. There is very limited information available on these sites.

While community composting sites are allowed to accept covered compostable materials per Minn. R. 7035, further research is needed to determine if they currently are, or if they have the ability to accept these materials and be a part of a collection and composting network. Research into the role of community composting will be conducted during the Needs Assessment.

Yard waste only compost sites were also not evaluated in this assessment, because compostable covered materials are prohibited from being accepted and composted at these sites. Yard waste compost sites will be assessed as part of the Needs Assessment to evaluate opportunities for expanding collection and composting of compostable covered materials across the state in the event the facility could transition to accepting source-separated organics or the options for community composting. Only technologies or composting systems that are composting compostable covered materials can contribute to the composting rate as defined in the law.

Structure of the Preliminary Assessment

The report is structured as follows:

- **Methodology for data gathering:** Provides a high-level overview of the main data sources and data collection methods used in the Preliminary Assessment.
- **Minnesota community profile:** Provides an overview of the demographics in MN, including an overview of population, population density, and urban/rural split. It also introduces the region groupings that are used throughout the report as a means of grouping data and explores covered entities across the state.
- **Recycling and composting programs:** Introduces the list of covered materials. Details the characteristics of recycling and composting programs, for each, outlining available data on service coverage, accepted materials, types of collection containers, and coverage of drop-off collection sites.
- **Data on covered materials:** Provides an overview of covered material tonnages introduced by producers, as well as tonnages collected.

- Contractual arrangements: Provides indicative insight into contractual arrangements for a sample of recycling and organics recycling collection systems.
- Overview of infrastructure: Provides an overview of the waste infrastructure across the state, including transfer stations, recycling facilities, and commercial composting facilities.
- Markets for covered materials: Provides discussion surrounding markets for covered materials collected for recycling.

Throughout the report information on the level of data completeness, key sources used and actions that will be taken as part of the Needs Assessment to adjust any data gaps and challenges are identified. The template for how this information will be included in each section is shown in Table 1.

Table 1. Template to identify data completeness, key data sources, and additional research.

Indicators	Status
	Red. <i>Significant data gaps and/or limited data. Content may be commentary only.</i>
	Amber. <i>Incomplete data and analysis is limited.</i>
Data completeness	Green. <i>No significant data gaps.</i>
Key data sources	Summary of key data sources used in section.
Needs assessment	Summary of how content will be developed further as part of the Needs Assessment.

Methodology for data gathering

This section provides an overview of the main sources of information used to inform this assessment. This assessment gathers data on the existing waste management systems in operation across the state—and draws predominately on published documentation and datasets.

There are multiple pre-existing reporting and planning requirements set in the MN Waste Management Act and Minnesota Rules, which have provided valuable data sources, including the following:

Solid waste facility permitting and reporting

- Solid waste permits are required to treat, store, process, transfer, or dispose of solid waste². Permit information was used to identify facilities and provide details on each location.
- Annual facility reporting is required for solid waste permitted sites to complete annual reports on waste activities. These reports were also used to provide insight into the characteristics of facilities across MN.
 - These reports are automatically assigned based on the waste activity at the facility and the information provides details on waste collection at permitted facilities in the state to track the flow of waste by material types (any data classified as proprietary by facilities was not shared, only public data was used to inform this report).

County planning and reporting

- Solid Waste Management Plans (SWMPs) are required to be completed by all counties in the state (Minn. Stat. 115A.46) and include information on waste reduction, reuse, and recycling programs. Data was taken from plans that have been completed in the past five years, since waste collection systems change over time and older data might therefore not be representative of current systems and approaches. SWMPs from 32 counties were reviewed, covering over 75% of statewide population.
- SCORE reporting is an annual data collection system to track activities relating to laws proposed and enacted by Governor's Select Committee on Recycling and the Environment (SCORE). Part of these laws was the establishment of SCORE grants to counties to support recycling programs, waste reduction efforts, and management of household hazardous wastes and problem materials. The data collected through this reporting provides details on waste collection system performance, including collected tonnages.
 - Every five years an additional survey is included in annual SCORE reporting, referred to as "program details". This collects information on county recycling and organics recycling programs through a supplemental survey.

Hauler reporting

- **MPCA solid waste hauler reporting** requires haulers to submit data on tons of materials collected and delivered by haulers annually and provides insight on collection system operation and characteristics. This requirement was established in Minn. Stat. 115A.93.

Service provider registration

- The Packaging Waste and Cost Reduction Act established the requirement for **service provider registration**. The MPCA service provider registration was in place as of 2024 and captures

² Full permit requirements and exemptions detailed in Minnesota Administrative Rules [7001.3050](#). Retrieved from [7001.3050 - MN Rules Part](#)

information on the cost of collection, processing services, and transfer operations by those who are classified as a “service provider” in the Packaging Waste and Cost Reduction Act.

Additional datasets utilized in the Preliminary Assessment include

- United States Census Bureau and the State of Minnesota State Demographic Center’s data on population, rurality, and housing stock characteristics;
- The Minnesota Department of Education School Program Locations database to provide locations of schools and libraries throughout MN;
- The Minnesota Office of Higher Education database to provide locations for postsecondary education institutions;
- The North American Industry Classification System (NAICS) data provides locations of organizations by sector, particularly for public spaces and non-profit organizations; and
- Information on covered material sales introduced by producers was informed by the registered PRO, CAA.

Data gaps

This assessment relied on existing data sources listed above. These data sources were evaluated against the requirements set out in the Packaging Waste and Cost Reduction Act.

Across data sources, covered materials are reported using different terminology and categories. Where possible in the Preliminary Assessment, assumptions have been made to align data, and these assumptions are detailed in the assessment. Further work will be completed in the Needs Assessment to finalize a list of covered materials and ensure that data presented aligns with statute as clearly as possible.

Many of the sources of data did not provide complete coverage across all counties. The exclusion of SWMPs not updated within the past five years, for example, leaves an incomplete picture of programs in Greater MN. In addition, some program details needed for this assessment are not included by all counties in SWMPs.

There is a data gap on information about programs at the city and township level. Cities and townships are the most common local government unit to have organized collection agreements for recycling service for their residents. There is no direct reporting to the state by cities or townships on recycling and organics recycling programs. This creates a gap on both programmatic details for this report and the cost of services. Registration of service providers, which includes local governments that have organized collection agreements with waste management companies was limited and not a robust data set to inform this report.

To provide cross-checks against the validity of the data obtained from the sources listed in the methodology for data gathering section, the project team:

- Contacted four of the MPCA’s solid waste planners who regularly work with counties in Greater MN;
- Obtained details from the websites of haulers who are active across the county, in addition to local government websites aimed at providing information to residents; and
- Completed informal outreach with several facilities across MN, to help provide insight into MN’s infrastructure.

Data gaps and the implications of these data gaps are summarized within each relevant section, with a focus on the actions that will be undertaken during the Needs Assessment to improve data completeness.

The Needs Assessment will include substantial primary data collection to elaborate on the information provided in this Preliminary Assessment. Primary data collection will be completed through outreach to interested parties including the advisory board, counties, cities, and townships, service providers like haulers and recycling facility operators, CAA, and other interested parties such as environmental and community organizations within the state.

Further references to data sources and how they were used are provided throughout this assessment. Additional detail is provided in Appendix A – Technical Appendix.

Minnesota community profile

This section establishes regions of the state for future planning purposes, reviews demographic information, and estimates the number of covered entities located in the state.

Regions used in the Preliminary Assessment

Minnesota's legislature split the state into two regions within the Solid Waste Management Act (Minn. Stat. § 115A):

- The Twin Cities Metropolitan Area, also known as the TCMA, which includes seven counties consisting of Anoka, Carver, Dakota, Hennepin, Ramsey, Scott, and Washington; and
- Greater MN, which includes all other counties outside the TCMA.

For the purposes of this assessment, the state has been split into six regions. These regions use MN Department of Employment and Economic Development planning areas³ as a basis and amended boundaries to avoid breaking up solid waste joint power agreements which enable the pooling of resources and sharing facilities and waste infrastructure. The counties organized under solid waste joint power boards and a solid waste management district are shown in Figure 2, and outlined in Table 2.

Figure 2. Map of MN solid waste joint power districts.

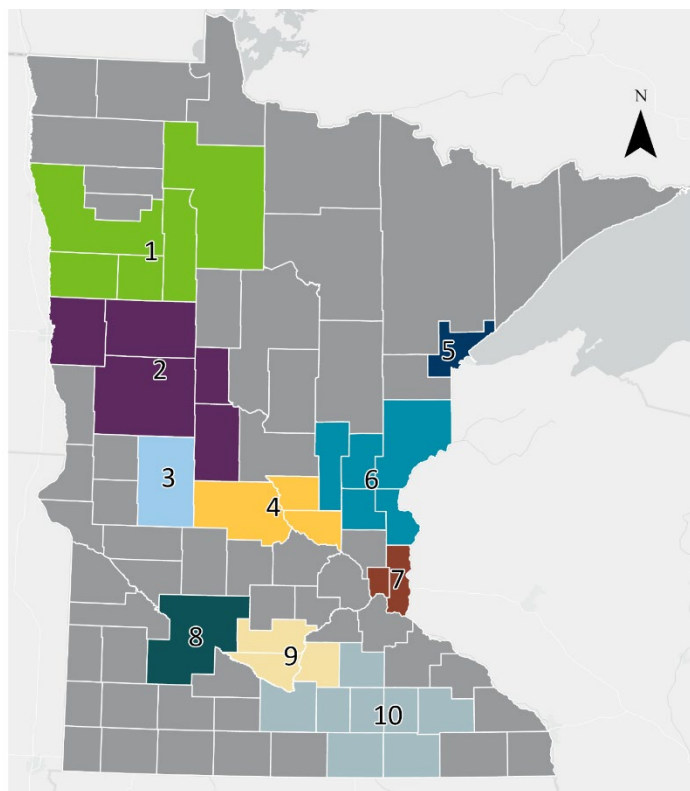


Table 2. Minnesota solid waste joint power districts.

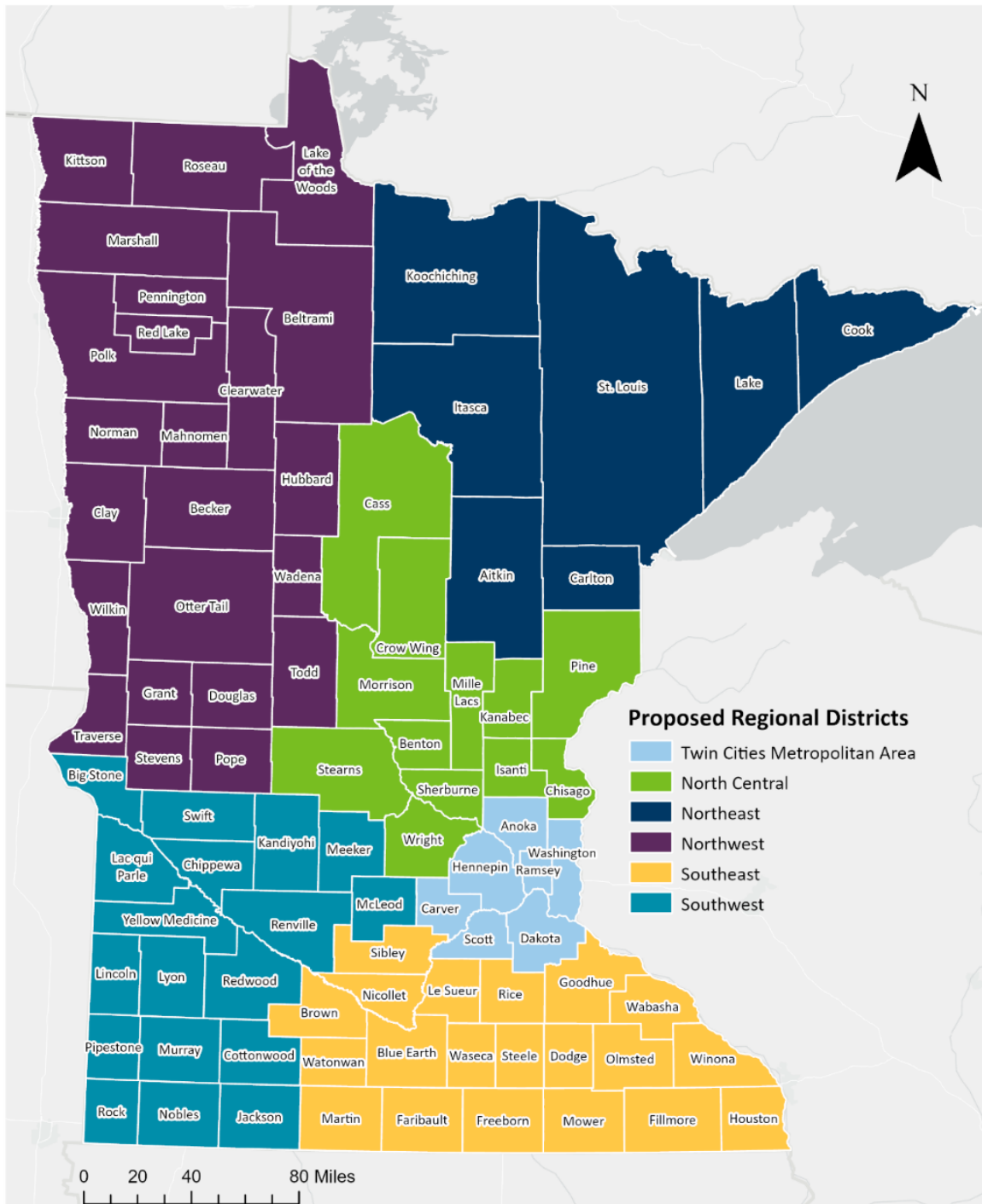
Joint power district	Label
Five County Advisory Board	1
Prairie Lakes Municipal Solid Waste Authority	2
Pope/Douglas Solid Waste Management	3
Tri-County Solid Waste Management Commission	4
Western Lake Superior Sanitary District	5
East Central Solid Waste Commission	6
Ramsey & Washington Recycling and Energy Board	7
Redwood/Renville Regional Solid Waste Authority	8
Tri-County Solid Waste	9
The Southeast Minnesota Recyclers' Exchange	10

Source: MPCA compilation of counties participating in a joint power districts or solid waste management district

³ Minnesota Government (n.d) apps.deed.state.mn.us/assets/lmi/areamap/plan.shtml (Accessed November 11, 2025)

The six regions used in this analysis are the Twin Cities Metropolitan Area (TCMA), the Northeast Region (NE), the Northwest Region (NW), the North Central Region (NC), the Southeast Region (SE), and the Southwest Region (SW) and shown in Figure 3 along with the counties within each region (see Appendix B for a full list of the counties within these regions).

Figure 3. Map of regions for the MN Preliminary Assessment.



Source: MPCA

Minnesota demographics

Table 3 shows the distribution of MN's population across the six regions, showing how demographics vary across regions and highlighting the differences in population concentration and urbanization levels across the state. Table 3 also shows the percentage of MN's population that were living below the U.S. Census's poverty thresholds in 2023 and the percentage of MN's population over five years of age for whom English is not their first language. The urbanization levels used in Table 3 are based off the US Census which classify areas with a population of at least 5,000 as urban and those with a population of less than 5,000 as rural.⁴

Table 3: Minnesota population, population density, and urban/rural split by region in 2024.

	TCMA	NE	NW	NC	SE	SW	Total
Population	3,247,971	327,259	440,378	775,462	763,764	287,554	5,842,388
Proportion of population	56%	6%	8%	13%	13%	5%	
Population density (population/sq mile)	9,223	113	428	1,156	1,294	431	
Urban (% of population)	94.67%	51.66%	30.99%	49.26%	54.53%	30.36%	
Rural (% of population)	5.33%	48.34%	69.01%	50.74%	45.47%	69.64%	
Population below poverty threshold (%) ⁵	8.48%	12.69%	11.57%	8.43%	9.76%	10.29%	
Population over 5 whom English is not their first language (%) ⁶	6.26%	0.74%	1.59%	1.87%	3.77%	4.38%	

Source: U.S. Census Bureau. 2023 data.

The TCMA is the most populous region, with over 3.2 million residents, representing more than half of MN's population. This region also has the highest population density of over 9,200 persons per square mile and is predominantly urban with over 94% of residents in the region residing in urban areas. This region includes Minneapolis and St. Paul.

The NW and SW regions are the most rural with approximately 69% of their populations residing in rural areas. These regions also have much lower population densities, with the NW region having a population density of 428 persons per square mile and the SW region having a population density of 431 persons per square mile. The SE and NC regions exhibit more balanced distributions between urban and rural populations, showing a mix of cities and agricultural communities. They also have higher population density than seen in the NW and SW regions. The NE region also shows a balanced

⁴ U.S. Census Bureau. (2024, December 16). *Urban and rural*. U.S. Department of Commerce. Retrieved January 12, 2026, from <https://www.census.gov/programs-surveys/geography/guidance/geo-areas/urban-rural.html>

⁵ U.S. Census Bureau. (2024, December 12). *American Community Survey 5-Year Data (2009–2023)*. <https://www.census.gov/data/developers/data-sets/acs-5year.html>

⁶ U.S. Census Bureau. (2024, December 12). *American Community Survey 5-Year Data (2009–2023)*. <https://www.census.gov/data/developers/data-sets/acs-5year.html>

distribution between rural and urban populations; however, the population density in this region is significantly lower at approximately 113 persons per square mile.

The percentage of individuals living below the poverty threshold varies slightly by region. More than 10% of the populations in the NE, NW, and SW regions are living below the poverty threshold. The TCMA, NC and SE regions all have between 8% and 10% of their populations living below the poverty threshold. The share of residents by region whom English is not their first language also varies by region. It is highest in the TCMA at 6.26%, followed by the SW and SE regions at 4.38% and 3.77%.

Minnesota covered entities

Table 4. Data completeness, key data sources, and additional research – covered entities.

Indicator	Status
Data completeness	Green. No significant data gaps.
Key data sources	US Census Bureau (American Community Survey), MN Department of Education, MN Office of Higher Education, SIC/NAICS database.
Needs Assessment	Evaluate sites identified as public buildings and areas to ensure the list is inclusive and evaluates if covered materials are likely to be generated at the building or area.

Covered entities that are eligible to receive covered services for covered materials⁷ under the Packaging Waste and Cost Reduction Act are:

Households

- Explanation: All residences within the state, including all single-family to multi-family residences.
- Statutory Definition: Minn. Stat. § 115A.144 subd. 9. (1) a single-family residence; (2) a multi-family residence.

Schools, childcare, universities, and colleges

- Explanation: Locations where education or childcare is provided including all schools, public and nonpublic K-12 schools, any postsecondary school including tribal colleges, nonprofit and for-profit colleges and universities.
- Statutory Definition: Minn. Stat. § 115A.144 subd. 9. (3) a school as defined in sections 120A.22, subdivision 4, and 136A.62, subdivision 3, clauses (1) and (2); a nonpublic school as defined in section 123B.41, subdivision 9; postsecondary educational systems as defined in section 142E.01, subdivision 20; a provider as defined in section 142E.01, subdivision 20; and any other location where education or child care is provided.

Covered non-profits

- Explanation: Locations where a nonprofit corporation with annual revenue of less than \$35,000,000 is housed.
- Statutory Definition: Minn. Stat. § 115A.144 subd. 9. (4) a nonprofit corporation with annual revenue of less than \$35,000,000.

Public buildings and spaces

⁷ Minnesota Statutes § 115A.144 (2025). Retrieved from <https://www.revisor.mn.gov/statutes/cite/115A/full#stat.115A.144>

- Explanation: Any locations where the state, an office, agency, or institution of the state, any other agency or department doing business as a public entity on behalf of the state, the legislature, the courts, a county, a statutory or home rule charter city, a town, a township, a school district, a special taxing district is officed or public areas owned by these entities. This includes any public areas owned and maintained by these entities including sidewalks, parks, and gathering spaces inside or outside a building.
- Statutory Definition: Minn. Stat. § 115A.144 subd. 9. (5) a state agency, political subdivision, public area, public entity as defined in section 115A.151, or other governmental unit.

Table 5 shows the total covered entities identified in Minnesota. These will be further evaluated as part of the Needs Assessment. Understanding the services available at these locations, the costs, as well as identifying locations that may not have recycling nor trash services – particularly public spaces. Systems of reuse will also be evaluated as part of the Needs Assessment.

Table 5. Number of covered entities by type in 2024.

Type of covered entity	Total
Households	2,265,170
Single-Family households	1,772,517
Multi-Family households	435,441
Mobile Homes	57,212
Schools and childcare	2,139
Childcare	375
K-12 schools	1,669
Colleges & Universities	95
Non-profits (less than \$35M in revenue)	3,912
Public buildings and spaces	8,347

Source: United States Census Bureau, Minnesota Department of Education and NAICS Association.

Table 6 includes the estimated number of covered entities across MN's regions. Households' data used in this section was aggregated from the U.S. Census's American Community Survey⁸, schools and childcare data was aggregated from MN GIS maps on school program locations throughout the state from the Minnesota Department of Education⁹, college and university data was aggregated from the MN Office of Higher Education¹⁰, and non-profits and public buildings data was extracted using SIC codes for public spaces under the "Public Administration" industry group and SIC codes for non-profits, removing those with a sales volume range greater than \$35 million.¹¹

The TCMA contains the largest share of covered entities throughout the state, reflecting its population density. There are over 932,000 single-family homes and 309,000 multi-family units in the region. The TCMA contains almost half the total number of universities, colleges, and K-12 schools and childcare facilities, at 900. There are over 1,690 non-profits identified and 2,390 public buildings and spaces identified in the TCMA.

⁸ United States Census Bureau. (2025, September 29). *American Community Survey (ACS)*. Available at: <https://www.census.gov/programs-surveys/acs/>

⁹ Minnesota Department of Education. (2025). *Minnesota Department of Education*. Available at: <https://education.mn.gov/mde/index.htm>

¹⁰ Minnesota Office of Higher Education. (2025). Enrollment data. Available at: <https://ohe.mn.gov/reports/student-enrollment-data>

¹¹ NAICS Association, LLC. (n.d.). *NAICS code & SIC identification tools*. <https://www.naics.com/search/>

Outside the TCMA, housing is more dispersed and primarily characterized by single-family homes. The NC and SE regions contain the highest number of single-family homes outside the TCMA with the NC region containing over 236,000 single-family homes and the SE region containing over 250,000 single-family homes.

Mobile homes account for approximately 57,000 units statewide. The TCMA, NW, NC, and SE regions all contain over 10,000 mobile homes while the NE and SW regions both contain less than 6,000 mobile homes. The SE region contains the highest number of non-residential covered entities outside of the TCMA, followed by the NW and NC regions. The NE and SW regions contain the smallest number of schools and childcare facilities and also the smallest number of residents.

Table 6. Number of covered entities by type and region in 2024.

	TCMA	NE	NW	NC	SE	SW	Total
Households	1,257,984	129,024	175,961	283, 139	305, 521	116, 541	2,265,170
Single-Family (up to 4 units)	932,861	107,017	142,103	236,679	252,282	101,575	1,772,517
Multi-Family (5+ units)	309,449	16,097	23,510	34,603	40,232	11,550	435,441
Mobile Homes	15,674	5,910	10,348	11,857	10,007	3,416	57,212
Schools and childcare	900	74	292	292	362	219	2,139
Childcare	87	17	71	62	81	57	375
K-12 schools	773	55	207	220	263	151	1,669
Colleges & Universities	40	2	14	10	18	11	95
Non-profits	1,693	165	535	522	661	336	3,912
Public buildings and spaces	2,390	525	1,483	1,179	1,748	1,022	8,347

Source: United States Census Bureau, MN Department of Education, MN Office of Higher Education, and NAICS Association.

Recycling and composting programs

This section details the services currently in place for collecting and managing covered materials. It provides an overview of what covered materials include, the characteristics of recycling and organics recycling for composting collection programs.

Recycling legislation and requirements in Minnesota

Minnesota's Waste Management Act establishes a foundation that has created the recycling programs in existence today. Minnesota's waste management is guided by a waste management hierarchy established in law (Minn. Stat. § 115A.02), which puts waste reduction and reuse as the first order of priority followed by recycling and composting (see Figure 1).

In 2014, the state legislature updated the recycling targets for counties in the TCMA to achieve a 75% recycling rate by 2030, based on the total weight of solid waste generated (Minn. Stat. § 115A.551). For counties in Greater MN the goal is 35%, as seen in Figure 4.

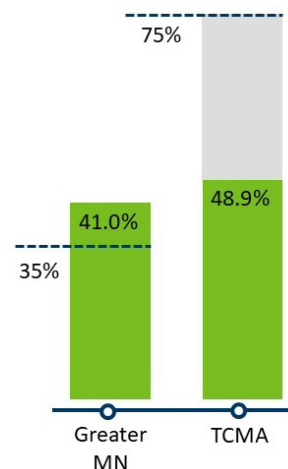
In 2023, the statewide combined recycling rate (which includes organics recycling for composting, yard waste composting, and recycling) was 45.3% percent with Greater MN counties achieving a 41% rate and counties in the TCMA achieving a 48.9% rate.¹²

The Waste Management Act establishes funding mechanisms for recycling including SCORE funding (Minn. Stat. § 115A.557), capital assistance project funding (Minn. Stat. § 115A.54), and state waste management bonds (Minn. Stat. § 115A.58). The combination of these funding streams supports reliable funding streams for programmatic costs as well as public solid waste infrastructure projects.

Additional funding streams to support reuse, recycling, and organics recycling are environmental assistance loans that provide financial assistance to accelerate the application and/or improvement of environmental processes and technologies in Minnesota by providing assistance for the capital costs (machinery and equipment) of eligible projects. Eligible projects include those focused on source reduction and reuse, recycling, and organics recycling. The MPCA has dedicated market development staff and issues recycling market grants including \$5.3 million to 11 grant recipients in 2024 to bolster local markets¹³.

The MPCA has multiple reporting requirements including an annual report from counties (SCORE report), reporting from haulers (Minn. Stat. § 115A.93), and reporting from facilities to track activities at permitted facilities. In future years a waste composition study requirement (Minn. Stat. § 115A.412) will go into effect. It directs owners and operators of most waste facilities in the state to complete waste composition studies on a rotating schedule. This waste composition requirement builds on an existing practice of routine waste composition studies at waste-to-energy facilities as part of air permit requirements.

Figure 4. Progress toward recycling targets set by MN Legislature.



Source: MPCA

¹² MPCA Data (2023). SCORE Reporting. [Workbook: SCORE report 2023](#)

¹³ MPCA (October 2024) [MPCA invests \\$5.3 million to grow recycling markets in Minnesota | Minnesota Pollution Control Agency](#) (Accessed January 15, 2026)

The Waste Management Act also includes a range of programmatic policy, including the requirement for solid waste management plans (Minn. Stat. § 115A.46), collection licensing (Minn. Stat. § 115A.553), and volume- or weight-based pricing (Minn. Stat. § 115A.9301).

The Opportunity to Recycle law (Minn. Stat. § 115A.552) requires all counties to ensure that all residents have an opportunity to recycle (curbside, recycling drop-off collection sites, or an environmental center). The law states that an opportunity to recycle must include:

1. a local recycling center in the county and sites for collecting recyclable materials that are located in areas convenient for persons to use them;
2. curbside pickup, centralized drop-off, or a local recycling center for at least four broad types of recyclable materials in cities with a population of 5,000 or more persons; and
3. monthly pickup of at least four broad types of recyclable materials in cities of the first and second class and cities with 5,000 or more population in the metropolitan area.

Sports facilities and certain commercial buildings must collect and recycle at least three recyclable materials (such as, but not limited to, paper, glass, plastic, and metal) (Minn. Stat. § 115A.151).

The Metropolitan Solid Waste Management Policy Plan¹⁴ as required in Minn. Stat. § 473.149 is a specific requirement for the TCMA region. This plan sets goals and policies for the metropolitan solid waste system. The most recent plan establishes mandatory pre-processing of waste to recover recyclables at waste-to-energy (resource recovery) facilities and landfills by 2030 and making residential curbside organics recycling collection available in cities with a population greater than 5,000 by 2030.

The state has a Recycling Education Committee which is a public-private partnership to develop acceptable material lists across the states based on input from MRFs and educators as well as an engaged Minnesota Composting Council that has complimented this work for organics recycling.

The Packaging Waste and Cost Reduction Act is a next step in establishing MN as a leader in moving materials up the waste management hierarchy.

Covered material categories for Preliminary Assessment

Table 7. Data completeness, key data sources, and additional research – covered material categories.

Indicator	Status
Data completeness	Amber. Incomplete data and analysis is limited.
Key data sources and gaps	SCORE program details survey, hauler reporting data, Minnesota Recycling Education Committee Recycling Outreach Guide, SWMPs, and interview with MPCA solid waste planners. SWMPs completed in the last five years covered 75% of the state population. Some plans provide narrative and do not provide complete data as needed for this analysis. SCORE data is collected by counties and has variability in the resources applied and data sources used for reporting, additionally material categories used differ by county. The Packaging Waste and Cost Reduction Act does not include a waste composition

¹⁴ MPCA. (January 2024). Metropolitan Solid Waste Management Policy Plan 2022-42. MPCA. <https://www.pca.state.mn.us/sites/default/files/w-sw7-22.pdf> (Accessed December 23, 2025).

	study specific for covered materials to inform this assessment nor the Needs Assessment.
Needs Assessment	The covered material list will be further developed and refined in the Needs Assessment in collaboration with the MPCA, Advisory Board, and CAA. The Needs Assessment will also be informed by stakeholder surveys which will provide further granularity on collection practices taking place across the state.

For the Preliminary Assessment, covered materials are broken down by currently introduced material and categories as presented in Table 8. This is a preliminary list that will be further developed and refined as part of the Needs Assessment. A more detailed list identifying specific material types as informed by the advisory board was developed, but due to the data limitations a simplified list was necessary for this assessment. Because these material categories do not match existing reporting categories, this list was further refined for the purposes of this report as shown in Table 9. Where possible, materials were mapped to the categories listed in Table 8.

Table 8. Provisional covered materials list, by material and category.

Material	Material category
Paper	Corrugated cardboard and boxboard
	Newspaper and magazines*
	Mixed paper
	Other paper
	Gable-top and aseptic cartons
Plastic	PET #1 bottles
	PET #1 non-bottle
	HDPE #2 bottles
	HDPE #2 non-bottle colored and natural combined
	PP#5
	PS #6
	Mixed plastics - rigid #3-#7
	Plastic film and flexibles
Glass	Glass bottles and jars
	Glass non-container
Metal	Aluminum cans
	Aluminum other
	Steel cans
	Steel other
Compostable	Compostable paper
	Plastic compostable

Source: informed by the MPCA and Eunomia

**Newspapers and magazines only include newspaper and magazine print publications related to news and current events and small magazines with less than 95,000 in circulation.*

Current data on collection system performance is based on information in the MPCA's SCORE report¹⁵, which collates data on materials collected by county for 2023, as reported by counties. The limitations with this data include:

- Counties are not the primary generator of the data and as such are unable to access information accurately by material-type. This means that there is a lack of consistency in the reporting e.g. some counties report all rigid plastics under the material category 'mixed plastic containers and rigids', while other counties split out PET and HDPE but report all other polymers under 'mixed plastic containers and rigids'.
- Tonnage reported could include materials other than covered materials. This is most noticeable for metals.

Due to inconsistency in data reporting, for this assessment the following actions were taken to calculate the tons of covered material by covered material type as accurately as possible:

- Tons recycled are reported for commonly reported materials in SCORE data. Not every county reports into SCORE with the same granularity, thus only the most consistently reported materials had their tonnage data included.
 - This includes boxboard and cardboard, aseptic containers and drink boxes, plastic wraps, and film, aluminum cans, and aluminum.
- Where only a few counties reported against material category in their SCORE reporting, these materials were grouped together to form a higher tier material category;
 - For example, tons of mixed glass containers, brown glass containers, clear glass containers, and green glass containers were all grouped into an overall glass containers category;
 - The groupings used for all materials are detailed in Table 9.
- Some counties did not report PET and HDPE separately and reported all rigid plastics under one category. An assumption was applied to separate out PET and HDPE for these counties based on the proportion of PET, HDPE and mixed plastic containers seen in counties that reported separate PET, HDPE and mixed containers in SCORE reporting; and
- Ferrous metal tons were assumed to include scrap metal as well as covered materials, as tons reported in SCORE were very high. Therefore, 63% of ferrous tons were assumed to be scrap, based on composition data in SCORE reporting and cross-checked to the Minneapolis characterization study¹⁶, and were removed from the ferrous tons reported in this assessment.

Further details on the methodology and assumptions used to adjust the data are set out in Appendix A.

These adjustments mean that reporting in this Preliminary Assessment has been done using the material categories in Table 9. To produce a consistent covered material list for the report:

- SCORE material categories were mapped as closely as possible with the covered materials list shown above (Table 8).
- For some categories it was not possible to break down tons to the same level of detail as those in Table 9 at this stage without obtaining further waste composition data from facilities.

¹⁵ MPCA, 2023 SCORE Report, Available at: [Workbook: SCORE report 2023](#)

¹⁶ Minneapolis (2022), Residential Waste Characterization & Capture Rate Study, Methodology and Baseline Results

Table 9. Reporting categories used in this report adapted from the provisional covered materials list mapped to SCORE data categories.

Material	Material category used for reporting	SCORE categories included in material category	SCORE data availability
Paper	Cardboard (OCC and boxboard)	Boxboard/Cardboard	85 counties report against this category in SCORE.
	Newspaper and print	Catalogs/Magazines Newspaper Telephone directories/phone books	Included and good coverage in SCORE data; however, some of this material category are exempt and not covered materials as defined in Minn. Stat. § 115A.1441, sub. 16.
	Other paper	Office paper Mixed paper Shredded (paper) Kraft paper/bags Plastic-lined paper bags	The breakdown of paper products was reported to varying levels by the different counties in SCORE. Therefore, these were combined into an 'other paper' category.
	Cartons	Aseptic containers/drink boxes	10 counties reported cartons separately in SCORE.
Plastic	#1 PET	PET bottles PET clam shells	48 counties report against PET Bottles in SCORE. Assumptions were applied to other counties to split out PET bottles from mixed rigid plastics.
	#2 HDPE	HDPE bottles - natural HDPE bottles - colored HDPE - injection grade	44 counties report to this level in SCORE. Assumptions were applied to other counties to split out HDPE bottles from mixed rigid plastics.
	Other mixed rigid plastics #3 – #7	Mixed plastic containers PP bottles, containers, and bulky PS rigids EPS block/shapes and foam food service LDPE tubs and lids	Very few counties report down to the individual polymer level, therefore these were combined into a mixed category. 42 counties reported against mixed plastic containers and rigids in SCORE. An assumption was applied to split out PET and HDPE
	Flexible plastics (mixed bags, wraps and film)	Mixed retail bags/wrap film	This includes mixed retail bags, wraps and film, but excludes ag film and boat wrap, which is not included in the covered materials.
Glass	Glass containers	Mixed glass containers Brown glass containers Clear glass containers Green glass containers	81 counties report total container glass in SCORE, with only three counties splitting container glass by color.
	Non-container glass	Non-Container Glass	Covers any other glass reported.

Material	Material category used for reporting	SCORE categories included in material category	SCORE data availability
Metal	Aluminum cans	Aluminum cans	68 counties reported aluminum can tons in SCORE.
	Aluminum	Aluminum	57 counties reported aluminum tons in SCORE, although it is not clear if some of these tons are aluminum cans where these were not separately reported. Food service ware was assumed to be primarily aluminum. 2 counties reported very low tons against this category.
	Ferrous metals	Ferrous metals	79 counties reported ferrous metals in SCORE. A proportion was assumed to be scrap metal and was removed from the SCORE reported tons.

Source: Eunomia analysis using SCORE data for 2023

Materials not used from SCORE data are included in Table . SCORE material categories and types mapped against covered materials within Appendix A.

In addition to the covered materials collected as part of recycling programs, some covered materials are compostable and will need to be composted. Compostable packaging already collected in the organics recycling stream was determined using tons reported as source-separated organic materials collected in SCORE, and a Residential Waste Characterization & Capture Rate Study for Minneapolis, which looked at the composition of waste collected in organics charts. A combination of the Minneapolis study, waste-to-energy waste characterization studies, and an MPCA Food Waste Generation and Composition Study¹⁷ were used to assess the amount of compostable packaging in the trash. Further detail of these calculations are provided in Appendix A.

Characteristics of recycling programs

Table 10. Data completeness, key data sources, and additional research – characteristics of recycling programs.

Indicator	Status
Data completeness	Amber. <i>Incomplete data and analysis is limited.</i>
Key data sources and gaps	SCORE program details survey, hauler reporting data, Minnesota Recycling Education Committee Recycling Outreach Guide, SWMPs, interviews with MPCA solid waste planners Data on residents served by recycling collection programs, the number of drop-off sites, commonly accepted for recycling materials has reporting available.

¹⁷ RRS / GRG Analysis (2022) Food Waste Generation and Composition Study Analysis, Report for the MPCA

	Data on the types of containers used for collection services is not available. Data on the frequency of collection services is only available by haulers for the TCMA and has not gone through a quality analysis and quality control review. No data was available on the capacity of recycling drop-off sites.
Needs Assessment	The characteristics of recycling programs will continue to be researched in the Needs Assessment, to inform the development of a baseline, and to complete an evaluation of covered materials in the disposal, recycling, and composting streams. Data on capacity at drop-off sites, frequency of recycling collection services, and types of containers used will be gathered through a county and municipal survey and complimented with secondary research. Key focus areas will be on more rural areas and on provision for covered entities other than single family households. Research and analysis will be completed using primary and secondary research methods.

Recycling service characteristics

This section sets out the characteristics of the recycling programs. Information presented here was gathered from county SWMPs updated in the last five years and discussions with MPCA solid waste planners. This was supplemented where necessary by data from the websites of key haulers providing services across MN.

Information is provided on services to household and commercial properties. In considering these services, it should be noted that multi-family residences are typically serviced on commercial waste collection routes. Commercial waste collection service providers also provide waste collection to commercial entities covered under the statute¹⁸ such as schools, childcare centers, some non-profit organizations, and public buildings and spaces.

Collection of recyclables is provided by several different methods in MN including:

- Single-stream collection whereby all recyclables are placed in one container and no further sorting by the resident is necessary;
- Dual-stream method asks residents to sort recyclables into two categories, usually separating glass from other recyclables; and
- Multi-stream collection where recyclables are source separated by the generator and requires separation of recyclables into three or more groups (see examples below).

Single-stream recycling is the most prominent collection system across MN. Some of the counties identified as not having single-stream include:

- **Cass County** (NC Region): recycling drop-off collection sites have source separated collection in multiple streams: mixed paper and metals, plastics, and glass;
- **Becker County** (NW Region): recycling drop-off collection sites have source separated collection in three streams: glass, commingled metal and plastic containers, and mixed paper. Curbside residential recycling is single-stream, without glass. Commercial collection will transition to single-stream in 2026, but is currently source separated;
- **Clay County** (NW Region): recycling drop-off collection sites have source separation of glass from other recyclables;

¹⁸ Minnesota Statutes § 115A.144 (2025). Retrieved from <https://www.revisor.mn.gov/statutes/cite/115A/full#stat.115A.144>

- **Mower County** (SE Region): recycling drop-off collection sites have source separation into four streams: plastic containers, cardboard, mixed paper, and glass and cans; and
- **Otter Tail County** (NW Region): recycling drop-off collection sites have source separated collection in five streams: glass, cans, paper, cardboard, and plastics. Otter Tail County is beginning to roll out single-stream curbside recycling in 2026, with glass source separated.

A review of all counties will be completed for the Needs Assessment and expanded to review city-level recycling programs and services. Surveys and interviews will be carried out to gain additional representative data.

Recycling service coverage

This section outlines the characteristics of recycling service coverage across MN, focusing on the population served by residential curbside recycling collection programs. The data presented in Table 11 was aggregated from the SCORE program details survey which was completed by all counties in MN. Responses from Pope County and Douglas County were grouped together as well as Redwood County and Renville County, and quantitative responses have been split based on population.

Table 11 below details the percentage of residents served by curbside recycling collection services by region in MN. This data was calculated by dividing the number of residents per county served by curbside recycling collection programs by the total number of residents per county. The data was then aggregated at a regional level.

Over 75% of residents in the TCMA and the NC and SE regions are served by curbside recycling collection services. Over 65% of the residents in the SW region are served by curbside recycling collection services. Only approximately 14% and 42% of residents in the NE and NW regions are served by curbside recycling collection programs.

Table 11. Residents served by curbside recycling collection programs by region (%).

	TCMA	NE	NW	NC	SE	SW	Total
% of Residents	75.19%	14.04%	42.15%	75.65%	75.29%	65.30%	68.86%

Source: Calculation based on SCORE program details survey

The most common curbside recycling collection frequency across MN is every other week, with ~63% of households receiving services as this frequency, this information was gathered from the county SWMPs. Interviews with MPCA solid waste planners confirmed that every other week collection is typical and that there is no unified collection frequency for all households. One identified exception is Dakota County which requires, through its ordinance, weekly collection. Monthly collection frequencies were found to be more common in rural areas; however, MPCA solid waste planners indicated that some requests for municipal monthly services go unanswered. In areas where there is an open market households can choose their collection frequency.

The MPCA hauler program data available for haulers operating in the TCMA also provided details on the frequency of recycling collection and whether recycling collection is on the same day as trash collection. This data represented all seven counties in the TCMA. 70 haulers provided data for approximately 448 cities that recycling collection services are offered within, throughout the TCMA. Based on this data, haulers reported that they offer recycling collection services every other week for 64% of the cities they operate in and approximately 24% of cities that haulers operate in receive weekly collection. Haulers also reported that recycling collection takes place on the same day as trash collection for approximately 97% of the cities that they operate within, in the TCMA.

Types of collection containers used

Interviews with MPCA solid waste planners indicate that the most common collection container for curbside recycling is a 96-gallon cart. For multi-family residences and some rural areas, dumpsters are used. Some outliers to this norm include:

- **Swift County:** utilizes a 3-bag system for trash, recycling, organics recycling; and
- **Mower County:** utilizes totes because they source separate into multiple material streams.

MPCA solid waste planners stated that some areas trialed using carts smaller than 96-gallons when first rolling out single stream recycling; however, when services were provided every other week smaller carts were insufficient to hold the volume of recyclables.

Additional research on hauler websites, recycling contracts, and SWMPs indicates that 64-gallon and 32-gallon carts are also available in some areas and are usually linked to lower service costs to households.

Commonly accepted materials for recycling

The Minnesota Recycling Education Committee (REC) created the Recycling Outreach Guide for MN, which details the accepted and not accepted materials for different recycling programs.

Table 12 shows the material acceptance of covered materials based on REC data material descriptions. The table also includes material acceptance according to hauler survey data. Haulers who collect recycling have reported material acceptance data to the MPCA. The data for haulers is categorized into three different groups based on the frequency that a given material is collected.

1. Frequently Collected: material that is collected by at least 80% of haulers
2. Sometimes Collected: material that is collected by between 30% and 80% of haulers
3. Rarely collected: material that is collected by less than 30% of haulers.

The hauler data is also divided into different populations, separated by whether a hauler provides services in the TCMA or in Greater MN. The hauler survey material categories were mapped to the proposed covered materials list, as indicated in Table 8. The matched categories are shown in Appendix A.

Table 12. Material acceptance from REC and hauler data.

Material type	Material category	Material description	REC material acceptance status (MRF based analysis)	Hauler acceptance status (statewide average - all haulers in MN)	Hauler acceptance status (haulers who Service TCMA only)	Hauler acceptance status (haulers who service Greater MN area only)
Paper	Corrugated cardboard and boxboard	Carboard boxes	Always Accepted	Frequent (>80%)	Frequent (>80%)	Frequent (>80%)
	Newspaper and magazines*	Newspapers, magazines, catalogs, inserts	Always Accepted	Frequent (>80%)	Frequent (>80%)	Frequent (>80%)
	Mixed paper	mail, office and school papers	Always Accepted	Frequent (>80%)	Frequent (>80%)	Frequent (>80%)

Material type	Material category	Material description	REC material acceptance status (MRF based analysis)	Hauler acceptance status (statewide average - all haulers in MN)	Hauler acceptance status (haulers who Service TCMA only)	Hauler acceptance status (haulers who service Greater MN area only)
	Other paper	Freezer boxes, pizza boxes, kraft paper	Sometimes Accepted	Sometimes (>30% and < 80%)	Frequent (>80%)	Sometimes (>30% and < 80%)
	Gable-top and aseptic cartons	Milk and juice cartons, soup broth and wine cartons	Sometimes Accepted	Frequent (>80%)	Frequent (>80%)	Sometimes (>30% and < 80%)
Plastic	Plastic PET #1 bottles	soda, juice, water bottles	Always Accepted	Frequent (>80%)	Frequent (>80%)	Frequent (>80%)
	Plastic PET #1 Non-bottle	clear berry and produce containers	Always Accepted	Sometimes (>30% and < 80%)	Frequent (>80%)	Sometimes (>30% and < 80%)
	Plastic HDPE #2 bottles	Milk and juice jugs	Always Accepted	Frequent (>80%)	Frequent (>80%)	Frequent (>80%)
	Plastic HDPE #2 non-bottle colored and natural combined	shampoo, soap and lotion bottles	Always Accepted	Frequent (>80%)	Frequent (>80%)	Frequent (>80%)
	Plastic PP#5	Yogurt, pudding and fruit cups	Sometimes Accepted	Sometimes (>30% and < 80%)	Frequent (>80%)	Sometimes (>30% and < 80%)
	Plastic PS #6	Styrofoam	Never Accepted	Rarely (<30%)	Rarely (<30%)	Rarely (<30%)
	Plastic Mixed Plastics Rigid #3-#7	Plastic straws, pumps and sprayer tops, chip bags	Never Accepted	Rarely (<30%)	Sometimes (>30% and < 80%)	Rarely (<30%)
	Plastic film and flexibles	Plastic bags, film and wrap	Accepted at Drop Off	Rarely (<30%)	Rarely (<30%)	Rarely (<30%)
Glass	Glass bottles and jars	Food and beverage bottles and jars	Always Accepted	Frequent (>80%)	Frequent (>80%)	Frequent (>80%)
	Glass non-container	Ceramics/pott ery, drinking glasses	Never Accepted	No Data	No Data	No Data
Metal	Aluminum cans	Food and beverage cans	Always Accepted	Frequent (>80%)	Frequent (>80%)	Frequent (>80%)
	Aluminum other	Aluminum foil and trays	Sometimes Accepted	No Data	No Data	No Data

Material type	Material category	Material description	REC material acceptance status (MRF based analysis)	Hauler acceptance status (statewide average - all haulers in MN)	Hauler acceptance status (haulers who Service TCMA only)	Hauler acceptance status (haulers who service Greater MN area only)
	Steel cans	Food and beverage cans	Always Accepted	Frequent (>80%)	Frequent (>80%)	Frequent (>80%)
	Steel other	N/A	No Data	No Data	No Data	No Data
Compostable	Compostable paper	Plastic coated paper takeout containers	Never Accepted	No Data	No Data	No Data
	Plastic compostable	N/A	No Data	No Data	No Data	No Data

Source: Minnesota Recycling Education Committee Recycling Outreach Guide and hauler survey data

From the table above, it appears that for higher value material such as aluminum cans, PET and HDPE bottles, and higher value paper (e.g., cardboard, office paper), there is not much difference between the regions in Minnesota. Lower value material including cartons and non-bottle plastics are less frequently collected in Greater MN than in the TCMA.

Figure 5 below plots each of the materials in the hauler survey based on how frequently the material is collected, and color codes based on the geography of the hauler. In this graphic, it is easier to see the gap between the acceptance of lower value material across the different geographies. Materials with no data are categorized as having 0% acceptance, however they could be collected in a few cases and this will be investigated further in the Needs Assessment.

While the hauler data is meant to correspond to curbside recycling material acceptance, it is possible that some haulers have provided information for both their curbside recycling and recycling drop-off collection programs. The inclusion of both program types could inflate the proportion of certain materials which are considered “accepted”, particularly for materials that are traditionally less frequently accepted. For example, the project team checked the haulers which state in the survey that they accepted plastic film and flexibles in their program versus their corresponding recycling guidance online. In multiple cases, the survey data did not align with the information published online. This is an area for further investigation in the Needs Assessment as primary data will be compared with the MPCA hauler data to validate which materials are accepted in curbside recycling programs versus drop-off collection programs. In particular, the materials which need further investigation are:

- Plastic PS;
- Mixed rigid plastics #3-7; and
- Plastic film and flexibles.

The materials listed above are not frequently collected, however their acceptance is potentially still inflated in the hauler survey results.

Hauler survey data indicated a gap in acceptance between the TCMA only and greater Minnesota on the following materials:

- Other paper;
- Gable-top and aseptic cartons;

- PET Non-bottle; and
- Plastic PP.

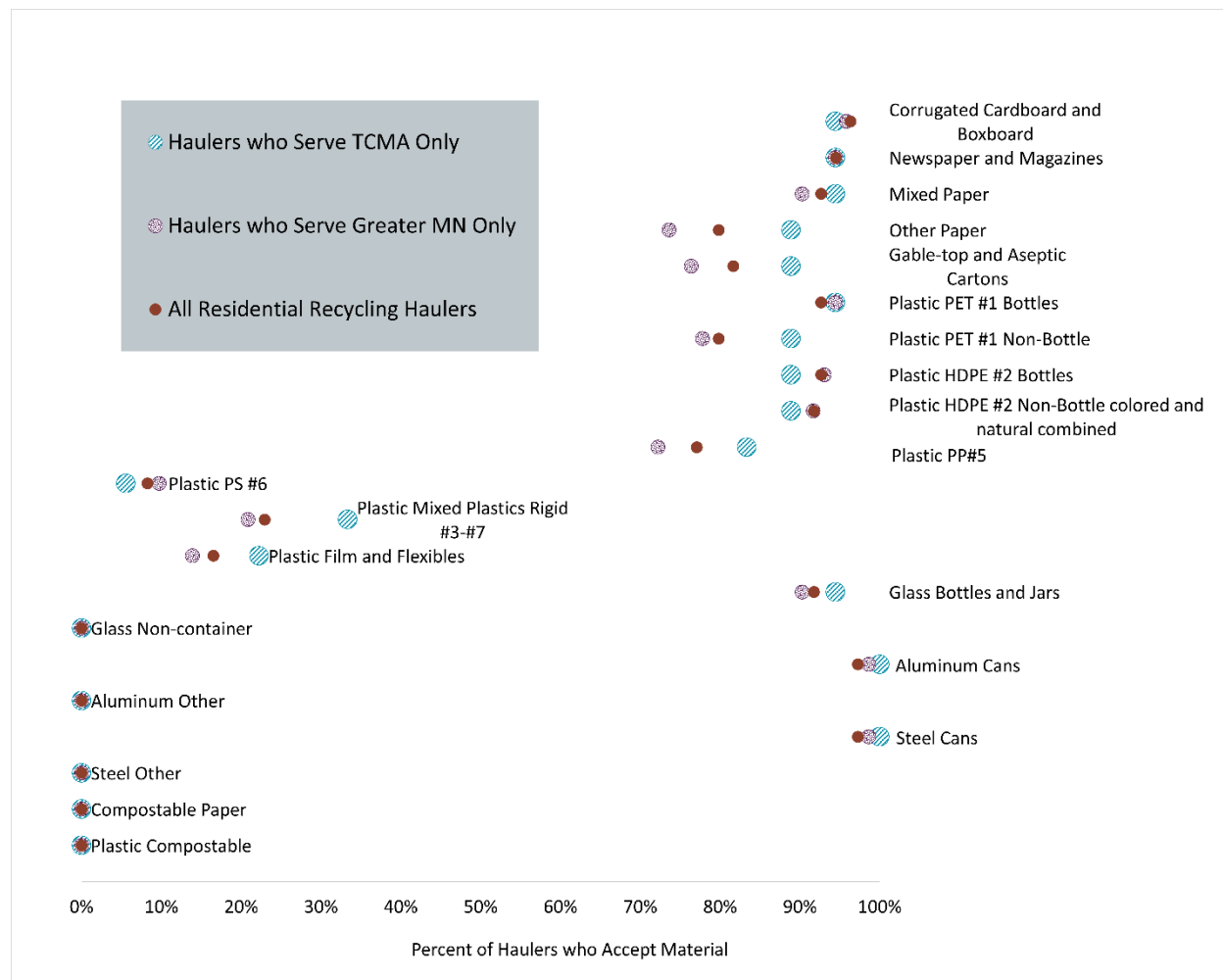
These items are accepted more frequently in the metro area by 10 percentage points compared to the greater MN area.

In both greater MN and TCMA there is a clear distinction between which materials may be “commonly accepted”, and those which are not commonly accepted. Several materials are accepted less than 40% of the time in both areas:

- Plastic PS;
- Plastic mixed rigids #3-#7;
- Plastic film and flexibles;
- Glass non-container;
- Aluminum other;
- Steel other;
- Compostable plastic; and
- Compostable paper.

There are no materials in either region that are accepted by between 40% and 70% of haulers. The next lowest material accepted is Plastic PP at between 75%-85% of haulers, depending on the region. Considering how to potentially incorporate the less frequently accepted material in future collections will be critical towards planning for EPR.

Figure 5. Percentage of residential recycling haulers who accept material in MN.



Source: Eunomia analysis of hauler survey data

Coverage of recycling drop-off collection sites

As detailed in Table 13 there are over 600 recycling drop-off collection sites throughout MN. Recycling drop-off infrastructure is more concentrated in rural regions, where curbside collection services are more limited. The NW region has the greatest number of recycling drop-off collection sites (207), followed by the SW region (127), and the SE and NE regions (107 and 102).

The TCMA has 23 drop-off collection sites, as reported by counties, despite having the state's largest population. This is likely because of the region's extensive curbside collection coverage (see Table 11). The picture is similar for the NC region where there are only 43 drop-off collection sites and approximately 75% of residents are served by curbside recycling collection programs.

Table 13. Number of recycling drop-off collection sites by region.

	TCMA	NE	NW	NC	SE	SW	Total
Number of Drop-off Sites	23	102	207	46	107	127	612

Source: SCORE program details survey

Drop-off collection sites are equipped with carts, dumpsters, or roll-offs and where space is limited the ability to manage more material can be addressed through adjusting the container size or frequency the

collection containers are emptied. There is no data collected on each site and their capacity or generation of material. This information will be collected to inform the Needs Assessment.

Characteristics of organics recycling programs

Table 14. Data completeness, key data sources, and additional research – characteristics of organics recycling programs.

Indicator	Status
Data completeness	Amber. <i>Incomplete data and analysis is limited.</i>
Key data sources and gaps	SCORE program details survey, Minnesota Composting Council Organics Recycling Guide and drop-off site map, interviews with the MPCA solid waste planners, SWMPs Data on residents served by organics recycling collection programs, the number of drop-off sites, commonly accepted materials for organics recycling for composting programs has reporting available. Data on the types of containers used for collection services is not available. Data on the frequency of collection services is only available by haulers for the TCMA and has not gone through quality analysis and quality control. No data was available on the capacity of organics recycling drop-off sites.
Needs Assessment	The characteristics of organics recycling programs will continue to be researched in the Needs Assessment, to inform the development of a baseline, and to complete an evaluation of covered materials in the disposal, recycling, and composting streams. Data on capacity at organics recycling drop-off sites, frequency of recycling collection services, and types of containers used will be gathered through a county and municipal survey and complimented with secondary research. Key focus areas will be on more rural areas and on provision for covered entities other than single family households. Research and analysis will be completed using primary and secondary research methods.

This section outlines the characteristics of organics recycling for composting collection programs across the state.

Information was gathered from recent county SWMPs, permit data, a county level SCORE program details survey, and through discussions with MPCA solid waste planners. This was supplemented with data from the websites of key haulers and county information providing services across the state.

The data used to calculate the percentage of households served by curbside organics recycling, shown in Table 15, was aggregated from the SCORE program details survey which was completed by all counties in MN (see Appendix C). Responses from Pope County and Douglas County were grouped together as well as Redwood County and Renville County and quantitative responses have been split based on population.

The region with the highest proportion of households reportedly served by curbside organics recycling collection programs is the TCMA. The TCMA accounts for 56% of the statewide population and 61% of the total MN residents with access to curbside organics recycling collection. No households in the NE or NW regions are reportedly served by curbside organics recycling collection programs.

Table 15. Households served by curbside organics recycling services by region in 2024.

	TCMA	NE	NW	NC	SE	SW
Curbside organics recycling collection programs	15.03%	0.00%	0.00%	2.81%	2.87%	3.88%

Source: SCORE program details survey

Currently, MN residents rely primarily on drop-off sites for organics recycling. The MPCA has set a requirement in the most recent Metropolitan Solid Waste Management Policy Plan requiring all TCMA counties to offer residential curbside organics recycling collection in cities with populations above 5,000 by 2030.¹⁹ The status of curbside organics recycling collection in the TCMA area includes the following:

- **Hennepin County:** Since 2022 all cities with 10,001 or more inhabitants are required to offer curbside organics recycling collection or require haulers to provide curbside collection of organics. Cities with 10,000 inhabitants or less must establish a drop-off collection site for organics.
- **Ramsey and Washington Counties:** Since a pilot program started in 2023, these counties are in the process of rolling out a food scrap collection system. This uses a weekly collection system that will separate the co-collected durable food scraps bags from the trash at the Recycling & Energy Center or contracted transfer stations, using robot artificial intelligence (AI) arms to remove the durable food scraps bags from the trash. Residents can order 120 food scrap bags per calendar year, and coverage is for households in both multi-family and single-family dwellings.²⁰
- **Anoka County:** Curbside organics recycling collection is not offered county-wide. Residents within several municipalities have an option for curbside organics recycling collection.
- The cities of Circle Pines, Columbia Heights, and Fridley have organized curbside organics recycling collection. Circle Pines offers a 35-gallon cart. ²¹ Columbia Heights offers 7-gallon containers.²² Fridley offers a 32-gallon cart.
- Cities of Coon Rapids and Lino Lakes residents can access curbside organics recycling collection if they have Walters as their waste hauler.
- **Carver County:** Curbside organics recycling collection is not offered county-wide. There are drop-off sites in the county available for residents to use. Curbside collection services were piloted to a limited number of Chaska and Chanhassen residents, however this program discontinued at the end of 2025.
- **Dakota and Scott Counties:** Curbside organics recycling collection is not yet offered in these counties. There are drop-off sites available for residents to use.

There are some areas in Greater MN counties providing curbside organics recycling collection to at least some of the counties' households. The status of known curbside organics recycling collection efforts in the greater MN area include the following:

¹⁹ See <https://www.pca.state.mn.us/sites/default/files/w-sw7-22.pdf>

²⁰ Food Scraps Pickup Program. (n.d.). *Food scraps pickup program*. Retrieved January 12, 2026, from <https://foodscrappickup.com/> (accessed January 12, 2026).

²¹ See <https://www.ci.circle-pines.mn.us/organics>

²² See

https://www.columbiaheightsmn.gov/departments/public_works/refuse_and_recycling/yard_waste_organics.php

- **McLeod County (SW region):** The City of Hutchinson collects commingled organics recycling and yard waste. The city owns the compost site, and it is the only known facility in the state that commingles organics and yard waste.²³
- **Rice County (SE region):** Northfield Curbside Compost provides curbside collection to residents in their service area using 5-gallon buckets.²⁴
- **Goodhue County (SE region):** The City of Redwing piloted curbside organics recycling collection and did not continue the program.
- **Saint Louis County (NE region):** The Western Lake Superior Sanitary District (which serves the Duluth area) requires restaurants, colleges, hospitals, nursing homes, assisted living facilities, food processors, and caterers operating within the district to separate pre-consumer food waste for organics recycling collection.²⁵

Hauler reporting data available for haulers operating in the TCMA also provided details on the frequency of organics recycling collection and whether organics recycling collection is on the same day as trash collection. This data represented all seven counties in the TCMA. 70 haulers provided data for approximately 90 cities in which they offer organics recycling collection services, throughout the TCMA. Based on this data, haulers offer organics recycling collection services weekly for approximately 51% of the cities they operate in. Haulers also reported that organics recycling collection takes place on the same day as trash collection for 88% of the cities that they operate in within the TCMA.

Types of collection containers used

In terms of the types of collection containers used, curbside containers for organics recycling collection are typically 32-gallon. As was described above, Ramsey and Washington counties use durable compostable bags co-collected with trash service; similar bag systems co-collected are also in operation for some cities in Hennepin and Anoka counties.

Other containers referenced by MPCA solid waste planners include totes and clear bags. For organics recycling, Swift County residents are instructed to leave the clear bags untied so that they can be easily emptied by the collection service. The City of Lino Lakes in Anoka County also uses a bag system for organics recycling collection. Lino Lakes instructs residents to use BPI certified compostable bags that are tied and placed on top of trash inside the trash cart for curbside pickup. These are the only two programs using bags that were indicated through MPCA solid waste planner interviews and may be an incomplete list.

Commonly accepted materials for organics recycling

The Minnesota Composting Council produced the Organics Recycling Guide (last updated in 2025), which details the accepted, not accepted, and maybe accepted materials for organics recycling collection programs²⁶. Table 16 details whether the compostable covered materials are accepted or not accepted in organics recycling collection programs in Minnesota. The table lists only the covered materials which are manufactured to be composted. The guide states that paper which can be both recycled or composted should always be recycled, so those materials have not been included in the table as the document does not assess the acceptance of those materials by facilities.

Table 16. Minnesota Composting Council organics recycling material acceptance.

²³ Interview with MN Regional Solid Waste Planner

²⁴ See <https://www.curbsidecompostmn.coop/about-us/>

²⁵ See <https://wlssd.com/services/food-waste/for-businesses/>

²⁶ Minnesota Composting Council. Available at [organics_recycling_outreach_guide_-_2025_clean.pdf](#)

Material type	Material category	Material description	MN Composting Council material acceptance status
Compostable	Compostable Paper	If BPI certified: plates, cups, containers, parchment, wax paper	Accepted
	Compostable Paper	If not BPI certified: plates, cups, containers, parchment, wax paper	Not Accepted
	Compostable Plastic	If BPI Certified: products marked PLA, biodegradable	Accepted
	Compostable Plastic	If not BPI Certified: products marked PLA, biodegradable	Not Accepted

Source: 2025 Minnesota Composting Council Organics Outreach Guide

A more complete list of acceptable items for organics recycling, as relevant to compostable covered materials, is shown in Table 17 below. Table 17 details the commonly accepted materials for organics recycling for composting meaning materials that are collected and brought to a commercial composting facility.

Table 17. Minnesota Composting Council organics recycling guide 2025.

Accepted	Not accepted	Maybe (depends on program/facility)
Paper *must have BPI on the product or product container **some composters will accept these items but prefer they are not promoted on educational materials to the general public due to potential contaminants that come with them and because they cannot obtain BPI certification at this time		
- Napkins, and food-soiled paper towels - Paper egg cartons (remove sticker labels) - BPI certified plates, bowls and containers* – cups, plates and bowls*, containers* - Paper bags (recycle if not soiled) - BPI certified parchment and wax paper* - Paper bags (recycle if not soiled) - Parchment and wax paper*	- Paper that can be recycled - Products labeled “biodegradable” or PLA that are not BPI certified - Cartons (milk cartons, juice boxes, soup, broth and wine cartons) - Paper products (plates, bowls, cups) without BPI certification - Paper products used with chemical-based cleaners - Refrigerated and frozen food boxes - Fast food wrappers (fry bags and burger/sandwich wrappers [unless BPI certified]) - Butcher paper, parchment paper, wax paper, muffin cups (unless BPI certified) - Microwave popcorn bags - Ice cream containers - Take-out food pails (unless BPI certified) - Paper coated with foil - Wax/produce cardboard boxes	- Pizza boxes from delivery** - Facial tissues**

Accepted	Not accepted	Maybe (depends on program/facility)
	• Wrapping paper and tissue paper (gift wrap / packing) • Shredded paper • Receipts	
Other compostable/household food related items *must have BPI logo on product or product container ** some programs accept commingled organics and yard waste. Be sure to check with the composting facility your material goes to verify if they accept commingled materials		
• Tea bags (no synthetic filter or metal) • Wooden items such as wood chopsticks, popsicle sticks and toothpicks • BPI certified compostable products*: cups, plates and bowls*, utensils and straws*, bags*, containers*, bamboo products*, bagasse products*	• Recyclable materials (glass, plastic, paper, metal) • Non-BPI certified plastic (bags, containers) • Products marked PLA or labeled as “biodegradable” or other misleading terms included in the symbol/logos section on page 3, unless they are BPI certified. • Rubber and rubber bands • Wax (wax paper, [unless BPI certified], candle wax, car wax, waxed bones) • Tape of any kind	• Cotton balls and paper swabs

Source: MN Composting Council²⁷ Organics Recycling Outreach Guide – 2025.

A review of commercial compost facilities and the materials they accept will be included in the Needs Assessment as well as more information from units of local government on accepted materials for organics recycling programs offered within their jurisdictions.

The MPCA is finalizing guidance for the implementation of compostable product labeling law (Minn. Stat. § 325E.046). This evaluation includes determining approved certification entities. When completed, guidance on approved certifiers for compostable products will be posted at MPCA's Compostable Product Labeling Law webpage²⁸.

Coverage of organics drop-off collection sites

Table 18 shows the number of organics recycling drop-off sites by region in MN. In total there are 186 organics recycling drop-off collection sites throughout the state. The TCMA region has the greatest number of organics recycling drop-off collection sites.

²⁷Minnesota Composting Council. [organics_recycling_outreach_guide_-_2025_clean.pdf](#)

²⁸ MPCA. Compostable product labeling law webpage. Available at: [Compostable product labeling | Minnesota Pollution Control Agency](#)

Table 18. Number of organics recycling drop-off sites by region.

	TCMA	NE	NW	NC	SE	SW	Total
Number of organics recycling drop-off collection sites	127	12	22	8	14	3	186

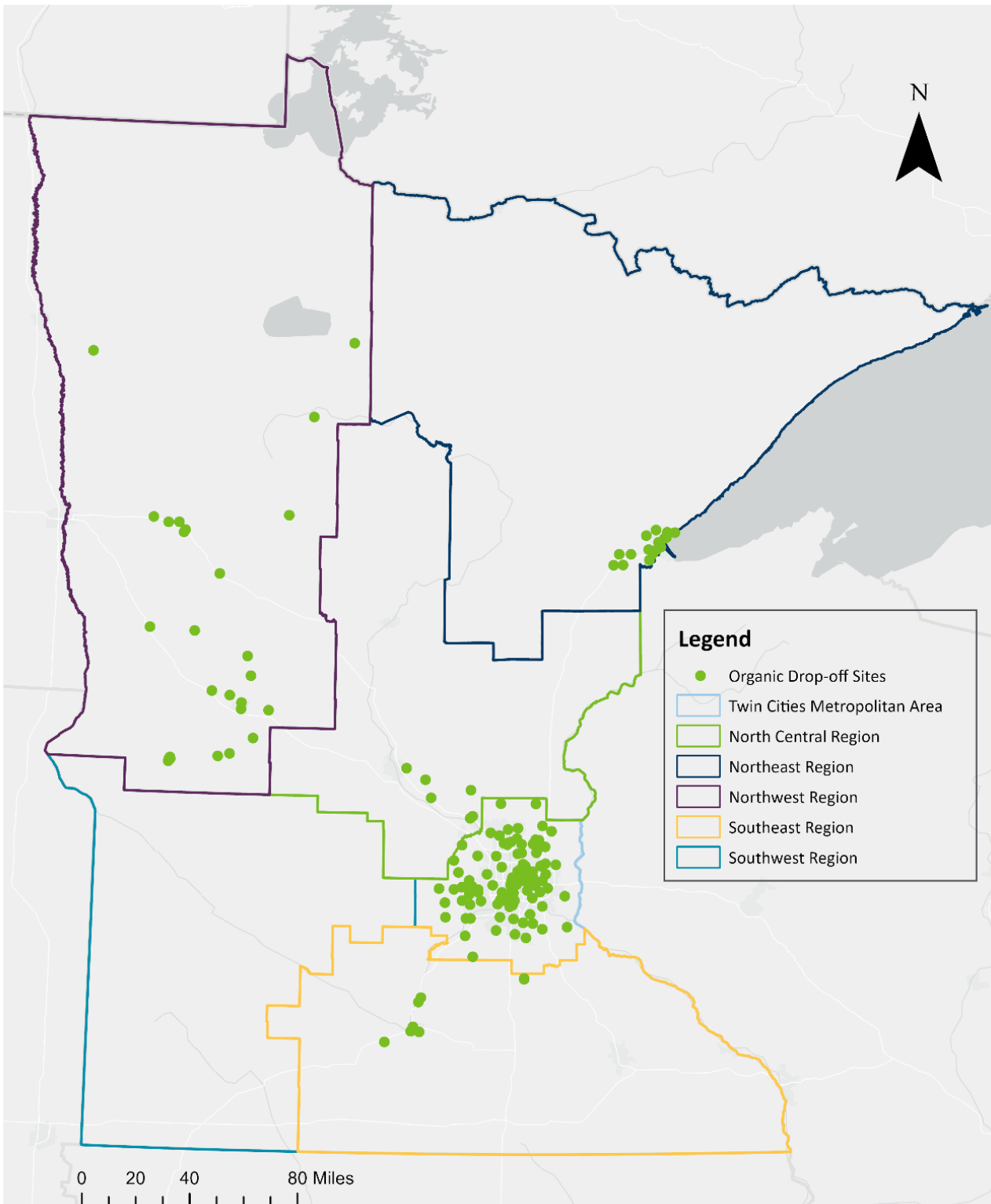
Source: SCORE program details

In the TCMA region, Carver, Dakota, and Scott counties use drop-off sites to provide collection options for organics recycling to residents. Examples of counties with organics recycling drop-off collection sites in Greater MN include:

- **Sherburne County (NC region):** five organics recycling drop-off collection sites.
- **Pope, Douglas, and Becker Counties (NW region):** nine organics recycling drop-off collection sites in Pope/Douglas, five organics recycling drop-off collection sites in Becker, one organics recycling drop-off collection site in Hubbard.
- **Carlton County and WLSSD (NE region):** one organics recycling drop-off site in Carlton and 15 organics recycling drop-off collection sites throughout Duluth, Hermantown, and Proctor.
- **Blue Earth and Nicollet Counties (SE region):** three organics recycling drop-off collection sites in Blue Earth and two organics recycling drop-off collection sites in Nicollet.

Figure 6 displays the organics recycling drop-off collection sites available to residents across the state from the Minnesota Composting Council.

Figure 6. Map of Minnesota residential organics recycling drop-off collection sites.



Source: MN Composting Council. Available at <http://www.mncompostingcouncil.org/residential-collection--drop-off-programs.html>.

Data on covered materials

This section includes a summary of introduced covered materials by producers and outlines the estimated number of tons collected by single-family residential generators.

Covered materials introduced by producers

Table 19. Data completeness, key data sources, and additional research – covered materials introduced.

Indicator	Status
Data completeness	Red. <i>Significant data gaps and/or limited data. Content may be commentary only.</i>
Key data sources and gaps	Producer reported tonnages in Canadian jurisdictions, CAA data, GlobalData, Minneapolis (2022), Residential Waste Characterization & Capture Rate Study, How Circular is Glass report, How to Scale the Recycling of Flexible Film Packaging. Placed on market data for covered materials has been based on guidance provided by CAA, the PRO. The guidance provides high and low values for material placed on the market per capita with recommended methods. The data has several limitations for this assessment as it is not specific to Minnesota, neither matching exactly the definitions of covered materials nor covered entities. This information was supplemented with additional secondary research but remains indicative.
Needs Assessment	Material introduced for sale by covered material type, weight and volume will be calculated using additional research in collaboration with the PRO and cross-referenced with GlobalData where appropriate. The methodology for this approach will be agreed with the MPCA based on the quality of existing data, and the need to complete a new bottom-up assessment.

A requirement for this assessment was to provide covered materials introduced by producers. This is the amount of covered material placed on the market in MN by producers, and it differs from covered materials collected for recycling, organics recycling, or trash. The difference in the amount of covered materials introduced by producers and collected as recycling, organics recycling, or trash differs for multiple reasons. One key reason is that these estimates are by weight (pounds or tons). The estimated weight of one unit of packaging introduced by producers (i.e., sold) will be less than the estimated weight of that packaging collected as recycling, organics recycling, or trash. This is because the weighing of recycling, organics recycling, or trash is done in bulk and will include additional weight from contamination or residue in the waste stream. Without any other differences in the data, this will skew the estimated collected tons to be higher than the estimated tons introduced by producers. Additionally, there are other differences in the data. Due to the lack of MN-specific data, the estimated amount of covered materials introduced by producers relies on data from other jurisdictions' EPR programs—all of which differ from MN's EPR legislation in terms of covered materials.

Currently, MN-specific data on covered materials introduced by producers is not available. MN-specific data on introduced materials is not anticipated until a plan is approved and fee collection and reporting begins. In the absence of this data, the total tonnage of covered materials introduced by producers in 2024 was estimated using data from other jurisdictions. The project team also requested input from CAA Minnesota, the PRO for MN's EPR program, to help best estimate covered materials introduced by

producers in the absence of MN-specific supply data. The project team assessed these inputs with MN data to generate estimates of covered materials introduced by producers in MN.

Table 20 provides an estimated range of tons per capita of covered materials that was used to estimate tons supplied by producers in MN. The various data sources that informed these estimates are described below.

Canadian jurisdictions – producer reported tonnages

The Canadian jurisdictions referenced include British Columbia, Manitoba, Saskatchewan, and Ontario, which have mature EPR for packaging and paper programs with publicly available annual reports detailing producer-reported tonnages by material category (e.g., paper, flexible plastic, rigid plastic, metal, glass). The data from these jurisdictions cannot be used directly to estimate the potential amount of covered material introduced by producers in MN for the following reasons:

- The covered generators are not the same (e.g., some jurisdictions include paper and packaging generated by government entities and the de minimis levels vary – tons supplied into the jurisdiction and gross revenue);
- The covered materials are not the same (e.g., no Canadian jurisdiction includes reusable/refillable packaging; all exempt packaging materials that are covered in other policies such as beverage deposit return or EPR for household hazardous and special products);
- Consumption levels are different as are other factors such as average household expenditures, household income, and gross domestic product; and
- There is limited data on compostable packaging and paper.

The data from these jurisdictions was adjusted to account for the differences noted above to produce an estimated range for MN.

Preliminary producer ranges incorporating US states with packaging EPR producer reported tonnages

CAA provided aggregated high and low ranges of pounds per capita based on a combination of Canadian and US jurisdictions, including British Columbia, Manitoba, Ontario, Saskatchewan, Oregon, Colorado, and a modeled estimate for California.

Databases on packaging sold in the US

The project team also used packaging-specific datasets and past reports to validate the producer reported tonnages and bolster these estimates. The following sources were used:

- GlobalData: this dataset is not EPR-specific but provides national-level estimates of packaging placed on the market across material categories²⁹;
- “How Circular is Glass?” Report: Eunomia’s previous report on glass production in four countries includes an analysis of glass packaging sold in the US³⁰; and
- “How to Scale the Recycling of Flexible Film Packaging” Report: Eunomia’s previous report on flexible film packaging includes an analysis of flexible plastic sold in the US.³¹

Across the jurisdictions reviewed, EPR for packaging and paper programs vary in scope and obligations, which affects how tonnage data can be interpreted for MN. Canadian programs such as British Columbia, Ontario, Manitoba, and Saskatchewan generally cover both packaging and printed paper, while MN’s planned program exempts some printed paper. Oregon’s program does not include alcoholic

²⁹ See <https://www.globaldata.com/product/packaging-primary-packaging-outers-volume-database/>

³⁰ See <https://eunomia.eco/reports/how-circular-is-glass/>

³¹ See <https://plasticsrecycling.org/wp-content/uploads/2024/08/Pyrolysis-Role-in- FFP-Recycling-Report.pdf>

beverages because they are covered under Oregon's Bottle Bill, whereas MN does. These differences in covered materials and entities were considered when applying data from these jurisdictions to MN to avoid over- or under-estimating tonnages to the extent possible with the available data.

These per capita estimates were then applied to MN state population to obtain a total estimate for the amount of covered materials introduced by producers shown in Table 20.

Table 20. Estimated covered materials introduced by producers annually.

Material category	Estimated Introduced (lbs/capita)	Proportion of covered materials	Total tons
Paper	124	44% – 54%	362,228
Rigid Plastic	42	13% - 15%	122,690
Flexible Plastic	40	5% - 14%	115,695
Metal	19	7% - 8%	55,503
Glass	52	17% - 19%	152,614
Compostable	7	1% - 2%	20,448
Total	284	100%	829,178

Source: Producer reported tonnages in Canadian jurisdictions, CAA data, GlobalData, Eunomia reports

The Packaging Waste and Cost Reduction Act requires that measurement moves beyond a single measure. Recycling and composting rates are predominantly measured by weight. To improve the accuracy of measurement this program is required to consider where unit-based and volume-based measurement adds value. This assessment is required to include the volume of materials introduced. Material volumes were calculated using the composition of recyclables and using volume conversions of recyclables as shown in Table 21 using EPA's Volume-to-Weight Conversions Factors.³²

Table 21. Estimated covered materials introduced by producers annually, by volume.

Material category	Volume converter (Lbs per cubic yard)	Estimate converted from weight to cubic yards
Paper	312	2,325,164
Rigid Plastic	29	8,566,563
Flexible Plastic	35	6,611,143
Metal	87	1,282,268
Glass	380	803,232
Compostable	35	1,168,457
Total	-	20,756,827

Source: Eunomia calculations using EPA's volume-to-weight conversion factors

³² See https://www.epa.gov/sites/default/files/2016-04/documents/volume_to_weight_conversion_factors_memorandum_04192016_508fnl.pdf

Covered materials collected

Table 22. Data completeness, key data sources, and additional research – covered materials collected.

Indicator	Status
Data completeness	Amber. <i>Incomplete data and analysis is limited.</i>
Key data sources and gaps	SCORE data, Minneapolis (2022), Residential Waste Characterization & Capture Rate Study, City of Seattle data on multi-family collection, The Recycling Partnership state of curbside report. Missing data includes tons from covered entities that have collection services through commercial collection routes. This includes multi-family residences, schools, childcare facilities, colleges and universities, covered non-profits, and public buildings and areas. Note, multi-family tons collected for recycling and tons collected for trash were estimated based on assumptions and not included in the final tables.
Needs Assessment	Data on collection from all covered entities will be collected as part of the Needs Assessment through surveys to municipalities, haulers, and directly to covered entities to create a data sample to complete collection and cost analysis necessary.

A requirement of this assessment was to provide the covered materials collected from covered entities, which include single-family and multi-family households, childcare facilities, schools, universities and colleges, non-profits, and public buildings and spaces. At this stage tons of covered materials collected from non-residential covered entities is not known and analysis includes tons of covered material from single-family residences only (typically classified as “residential” service in SCORE and hauler reporting) covered entities only. SCORE reporting includes commercial tons collected for recycling, however apportioning those tons to only the non-residential covered entities was not feasible for the preliminary assessment due to lack of data on those entities. Non-residential covered entity tonnage will be addressed in the Needs Assessment.

Collected for recycling

Data on the tons of collected covered materials by covered entity is presented in Table 23 which shows the materials collected for recycling by residential single-family residences. Property types covered by organized recycling collection service contracts range between three-plex to eight-plex dwellings, and some include all residences including any multifamily residences. Four-plex dwellings were selected to estimate at this time with the assumption they are typically collected via curbside collection routes and included with tons reported as residential. Collection depends on the specific dwelling and efficiency and routing choices by an individual hauler and this will be refined in the Needs Assessment.

Table 23. Total tons of covered material collected for recycling in 2024 by region – single-family residential (households with 4 or less units).

Material type	Material category	TCMA	NE	NW	NC	SE	SW	Total
Paper	Cardboard (OCC and boxboard)	38,932	7,504	6,753	10,818	13,292	8,193	85,492
	Newspaper and Print	61,888	3,468	2,747	8,671	7,138	4,619	88,531

Material type	Material category	TCMA	NE	NW	NC	SE	SW	Total
	Other Paper	58,037	4,420	2,700	8,146	11,943	5,865	91,111
	Cartons	216	0	5	8	234	10	473
	Total Paper	159,073	15,392	12,204	27,643	32,608	18,687	265,608
Plastic	#1 PET	4,384	342	668	770	1,912	488	8,564
	#2 HDPE	1,842	196	761	483	1,365	483	5,131
	Other Mixed Rigid Plastics #3 – #7	8,350	920	645	1,676	1,371	1,119	14,081
	Flexible Plastics (Mixed Bags, Wraps and Film)	67	4	386	289	78	3	828
	Total Plastic	14,644	1,462	2,459	3,218	4,727	2,093	28,603
Glass	Glass Containers	42,458	4,903	4,165	8,241	8,064	3,991	71,822
	Non-Container Glass	0	0	0	362	813	432	1,607
	Total Glass	42,458	4,903	4,165	8,603	8,877	4,423	73,429
Metal	Aluminum Cans	2,375	427	1,043	718	755	443	5,761
	Aluminum	2,376	150	204	681	956	143	4,511
	Ferrous Metals ³³	2,901	2,237	2,805	1,783	3,709	2,635	16,071
	Total Metal	7,652	2,814	4,053	3,182	5,421	3,220	26,342
Total	Total	223,827	24,572	22,881	42,647	51,632	28,424	393,982

Source: Eunomia calculations based on SCORE tonnage data

Other covered entities

Multifamily residences recycling collection services are not always collected along curbside routes and are commingled with what are classified as commercial generators. Reporting to the state on collection is split by residential versus commercial, and due to the way contracts are structured in cities and townships with organized collection – curbside collection is often limited to a specific number of units per dwelling (e.g. three-plex, four-plex, eight-plex).

Other covered entities are schools, childcare, colleges and universities, non-profits with an annual revenue of less than \$35,000,000 and public buildings and spaces. It was not possible to split out tons collected for recycling from covered commercial entities from the commercial SCORE data.

No tonnage estimates were available for other covered entities that have their tons classified as commercial. This will be estimated as part of the Needs Assessment.

Collected for composting

In order to estimate the compostable covered material that is collected in the organics recycling collection stream, data from a Minneapolis waste characterization study was used³⁴. This study showed 4.1% of material in organics recycling collection carts was compostable covered materials of the overall collected source separated organics which included both food waste (not covered) and compostable

³³ Ferrous metal tons were assumed to include scrap metal as well as packaging materials, as tons reported in SCORE were very high. Therefore, 63% of ferrous tons were assumed to be scrap, based on MRF composition data, and were removed from the ferrous tons reported in this Preliminary Assessment.

³⁴ Minneapolis (2022), Residential Waste Characterization & Capture Rate Study, Methodology and Baseline Results

covered materials. The percentage of compostable packaging in the organics stream was applied to the tons of organics collected for recycling reported in SCORE. A total of 55,000 tons of SSOM was reported as residential and collected for composting in SCORE in 2023³⁵. Applying 4.1% to this figure gives an estimated quantity of 2,261 tons of compostable covered materials collected organics recycling for composting from single-family residences.

It was not possible to determine the amount of compostable covered materials in the commercial organics recycling waste stream generated from covered entities that are classified as “commercial” including multi-family residences, schools, childcare centers, universities and colleges, covered non-profits, public buildings and areas. This analysis will be completed as part of the Needs Assessment.

Collected for disposal (trash)

The 2023 SCORE data reports total trash (landfilled, sent to waste-to-energy, or disposed onsite). This reported amount includes trash from residential and commercial entities. Some of the commercial entities included in this amount are not considered covered entities. It is therefore necessary to apply some adjustments to the data to reflect this; as such, the following assumptions were used to estimate the proportion of waste that is generated from residential single-family residences.

An average waste generated figure of 1.27 tons per household per year was assumed, based on data from Minneapolis³⁶. The material reported as residential waste collected for recycling in SCORE (including non-covered materials), per household, was subtracted from the 1.27 tons generated to give an estimate of the tons of trash per household for each county. Statewide this equated to 1,354,966 tons of trash from single-family homes. Data from Washington state suggest that the multi-family homes produce approximately 79% of trash produced by single-family homes, on a per household basis.³⁷ This is four points higher than the 75% used in The Recycling Partnership’s 2020 State of Curbside Recycling report.³⁸ This percentage was applied to the trash produced per single-family home calculated above, and multiplied by the number of multi-family homes to give an estimate of 262,963 tons trash produced by MN multi-family homes.

To calculate the proportion of trash that is covered materials a number of composition studies were used:

- Minneapolis - Residential Waste Characterization & Capture Rate Study (2022);
- Olmsted waste-to-energy facility;
- Perham waste-to-energy facility;
- Wilmath Generating Plant waste-to-energy facility;
- Prairieland Solid Waste Management Facility;
- Ramsey/Washington Recycling & Energy Center; and
- Great River Energy – Hennepin Energy Recovery Center (HERC).

These compositions were applied to the tons of trash produced by single-family residences, as detailed in Appendix A. The total amount of covered material in the trash from single-family residential homes was calculated at 422,650 tons as seen split by region in Table 25. This data does not include all covered

³⁵ MPCA, 2025, 2023 SCORE Report, Available at: [Workbook: SCORE report 2023](#)

³⁶ Minneapolis (2022), Residential Waste Characterization & Capture Rate Study, Methodology and Baseline Results

³⁷ Seattle Public Utilities (2023). Waste Prevention and Recycling Report

³⁸ The Recycling Partnership (2020), State of Curbside Recycling Report. [2020-State-of-Curbside-Recycling.pdf](#)

entities such as multi-family residences, schools, childcare facilities, colleges and universities, covered non-profits, and public buildings and spaces.

Table 24. Estimates of tons of covered materials in trash per region (single-family residential).

	TCMA	NE	NW	NC	SE	SW	Statewide
Single-family	190,132	40,014	47,306	61,610	67,206	16,382	422,650

Source: Eunomia calculations using waste-to-energy composition studies

An estimate of the tons of trash produced by covered entities that have waste collected on commercial routes and are therefore classified as “commercial” was not possible. Tons collected and reported as commercial are missing from the total.

Total tons of covered materials collected

The tables in this section bring together the data in the previous sections to arrive at a total figure for the amount of covered materials that have been collected across the state. The total tons of covered materials collected includes the amount collected for recycling, organics recycling for composting, and disposed of as trash. Note that these are estimates only. Tons from multi-family residences, schools, childcare, universities, colleges, covered non-profits, and public buildings and spaces are not included due to lack of data. This data is shown in Table 26, presenting a total of 818,893 tons as the total tons of covered materials collected.

Table 27 shows this data alongside some other data points, namely the tons of material introduced by producers (i.e., covered materials placed on the market) and the tons processed in the recycling facilities across the state. These different sources of data lead to different estimates, as the basis for the data points differs. Key points on this aspect include the following:

- Data on collected tons, particularly the material collected in trash, is calculated using waste characterization data. Specific characterization data was not available across all of the counties, and was not specific for waste collected from the residential properties. Instead, it is based on waste received at waste-to-energy facilities which includes waste collected from all commercial entities. Actual recycling may be higher than that reflected by the characterization data, and where this happens, the composition data will overestimate the amount of material remaining in the trash.
- Related to the above point, the categories in the waste characterization data did not always align with the covered collected materials. This is particularly the case for paper, where data categories included a combination of covered and non-covered materials across the different characterization datasets. Similarly, plastics categories did not always distinguish between covered and non-covered materials – non packaging plastics being included within a general “dense plastic” category, for example.
- Data on the amounts processed at the recycling facility would typically be expected to be lower than that placed on the market since this data only includes recycled materials. It should be noted that in this case, data on tons processed at the recycling facility also includes materials from non-covered entities (including all non-covered commercial entities), whereas the producer data figures aim to adjust for this. Paper received for recycling at recycling facilities is also likely to include some non-covered materials. The figures for ferrous metals likewise also include non-covered materials as there is no way to adjust for this in the data; scrap metal inclusion is likely to significantly increase the amount of material recovered for recycling.

Table 25. Estimated total tons of covered materials collected for single-family residences.

Stream	Statewide collected tons from single-family residences
Recycling	393,982
Organics	2,261
Trash	422,650
Total tons	818,893

Source: Eunomia calculations using SCORE data.

A comparison of tons of covered materials introduced by producers and tons of covered materials collected show that tons collected overall are higher than even the high estimate for tons introduced by producers. This may be due to a number of factors, including the poor data quality for both datasets, which use many assumptions. For example, SCORE data material categories are only refined to a certain level and may include some non-covered materials, although have been removed as much as possible. Further the difference in figures may reflect cross border movement of materials.

Table 26. Comparison of tons of covered materials introduced by producers, and collected (single-family residences).

	Estimated introduced	Collected for recycling and composting (single-family residences only)	Estimated collected as trash (single-family residences only)	Estimated total collected (single-family residences only)
Paper	362,228	265,608	188,224	453,832
Plastic	238,385	28,603	154,842	183,445
Glass	152,614	73,429	28,913	102,342
Metal	55,503	26,342	19,374	45,716
Compostable	20,448	2,261	31,298	33,559
Total	829,178	396,243	422,650	963,999

Source: Eunomia calculations using SCORE data and calculations to estimate introduced as described in this section.

Contractual agreements and costs

This section provides a review of contractual agreements for collection and processing services for trash, recycling, and/or organics recycling services as applicable.

Table 27. Data completeness, key data sources, and additional research – contractual agreements and costs.

Indicator	Status
Data completeness	Red. <i>Significant data gaps and/or limited data. Content may be commentary only.</i>
Key data sources and gaps	Waste collection service contracts in TCMA: (Hennepin County) Champlin, Edina, Maple Grove, Plymouth, St. Louis Park, and Shorewood; (Anoka County) Fridley; (Ramsey County) New Brighton. Waste collection service contracts in Greater MN: Kandiyohi County, Freeborn County, and Winona County. Data from SWMPs for Steele County and Big Stone County in Greater MN. Other contract information for the following areas in Ramsey County (TCMA): Arden Hills, Lauderdale, Little Canada, Maplewood, North Saint Paul, Roseville, St. Paul, and Shoreville. Available contracts are limited in number of city, county and overall population of the state. Data is representative of 16 cities and five counties throughout MN. Cost data was only available in nine contracts reviewed.
Needs Assessment	Contracts will be a valuable data source, particularly for cost and service information, to inform the Needs Assessment. Further information on this topic will be incorporated into the Needs Assessment.

In some areas of the state, municipalities hold contracts directly with haulers for organized recycling collection. Contracts for recycling services were available for some cities in Ramsey County, Hennepin County, and Anoka County, in the TCMA. For Greater MN there is representation from the SW region from Kandiyohi County and Freeborn County as well as from the SE region from Winona County. Some contract information for Steele County (SE) and Big Stone County (SW) was available in SWMPs. This section of the report is based on the available information listed above and is not a fully representative sample of all recycling service contracts in MN.

Based on the sources mentioned above, Table 26 shows the number of contracts reviewed and the minimum, average, and maximum contract lengths for the TCMA and Greater MN. The average length of these samples, not including contract extensions, is 5 years for both the TCMA and Greater MN. Of the contracts reviewed, 21 contracts included trash and recycling, and three contracts included trash, recycling, and organics recycling for composting.

Table 28. Number of contract review and minimum, average, and maximum contract lengths.

Contracts	# Cities & county's	Min. term (years)	Average (years)	Max term (years)
TCMA	16 cities	2	5	7
Greater MN	5 counties	2	5	7

Source: Waste collection and processing contracts from a sample of cities and counties.

Data on the set annual cost increases for these contracts was available for three cities within Ramsey County and one city in Winona County and were as follows:

- the lower of 5% or the consumer price index (CPI), capped at 5%;
- the higher of 5% or the CPI, capped at 8%;
- 3%; and
- the lower of 3% or the consumer price index (CPI).

Cost data was available in contracts for eight of the city contracts from the TCMA. These contracts listed the costs per unit for each year of the contracts with costs typically increasing by between 3% and 6% each year. These contracts also typically stated that these costs were subject to change if there were significant changes in factors such as fuel costs or tipping fees.

Some contracts establish revenue sharing, where the city can receive revenue from the sale of recyclable covered materials. Of the contracts reviewed, four city contracts in Hennepin County provided details on revenue sharing and these were as follows:

- Edina and Maple Grove: 50% of revenue shall go to the city;
- Plymouth: Revenue in excess of \$35,000 shall be credited to the city; and
- St. Louis Park: 80% of revenue shall go to the city.

Indicative service costs

Table 29. Data completeness, key data sources, and additional research – service costs.

Indicator	Status
Data completeness	Red. <i>Significant data gaps and/or limited data. Content may be commentary only.</i>
Key data sources and gaps	Data is representative of only costs associated with single-family residences that receive collection services via an organized waste collection agreement by a municipality. Missing data includes costs associated with services to covered entities that have collection services through open collection schemes where an entity arranges for their collection service, this includes all covered entities collected via commercial collection routes. This includes multi-family residences, schools, childcare facilities, colleges and universities, covered non-profits, and public buildings and areas.
Needs Assessment	The Needs Assessment will seek complete data to provide a comprehensive picture of costs associated with recycling collection, organics recycling collection, costs associated with drop-offs, and model costs for systems of reuse. Data will be pulled from additional contracts and supplemented by primary research across all regions and covered entities through a survey of haulers and municipalities with organized collection. A particular focus will be on the cost of rural area service provision, services to multi-family households, schools, childcare, universities, colleges, covered non-profits, and public buildings and spaces.

	The Needs Assessment will provide a modelled estimate of total annual costs of current covered services. The Needs Assessment will also provide costs associated with increasing waste reduction, reuse, recycling, and composting of covered materials.
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Data on costs will be an area of focus for the Needs Assessment. Due to the data limitations, no modeling of collection and processing costs has been included in this report. 13 contracts were reviewed covering a limited sample was not determined representative. In addition, it was unclear without verification through interviews or by collecting primary data from cities, haulers, and facilities how costs are assigned. For example, most of the contracts assessed did not cite a processing fee. Only four of the contracts listed charging processing fees separately.

Cost data will be collected for the Needs Assessment through surveys, interviews, and modeling. This includes:

- A survey to townships, cities, and counties that have organized collection to identify the total cost per household for collection, transportation, and processing;
- A survey to townships, cities, and counties to identify costs associated with both recycling drop-off sites and organics recycling drop-off sites;
- A survey to haulers to identify the cost of collection, transportation, and processing associated with the collection of recycling across the state, particularly in areas without organized collection;
- Complete interviews and/or follow-up to townships, cities, counties, and haulers to clarify information or validate information received;
- Estimate and model costs associated with organics recycling collection, transportation, and composting that are covered under this law; and
- Estimate and model costs associated with covered services provided to schools, childcare facilities, colleges and universities, covered non-profits, and public buildings and spaces.
- Model future costs associated with expansion of collection, enhanced services to maximize collection and/or reduce contamination associated with recycling, organics recycling, and possible future reuse systems.

Overview of infrastructure

This section details the available infrastructure throughout the state used to manage recyclable and compostable materials collected. This infrastructure includes recycling facilities, transfer stations, and commercial composting facilities.

Table 30. Data completeness, key data sources, and additional research – overview of infrastructure.

Indicator	Status
Data completeness	Amber. <i>Incomplete data and analysis is limited.</i>
	Solid waste facility annual reports and MPCA solid waste permit database. Data used was self-reported by solid waste facility representatives through annual facility reporting and compiled by the MPCA. Material categories used in annual facility reporting do not fully align with the provisional covered materials list, requiring assumptions to reconcile differences. Reported data can include facilities that are not managing covered materials which could result in potential gaps in the material flow captured. Reported tonnages showed inconsistencies that may reflect reporting errors, misclassification of materials, or differing interpretations of reporting requirements. Some facilities primarily manage MSW and may provide incomplete or limited data on recyclable covered materials.
Key data sources and gaps	Potential double counting is present when materials are transferred between permitted facilities, as both the sending and receiving facilities may report the same quantities.
Needs Assessment	In the Needs Assessment surveys, interviews and site visits will be conducted directly with facility operators to verify reported quantities and clarify discrepancies. Permit capacity information in the MPCA permitting database was not applicable to this report. The needs assessment will establish facility capacity as relevant to this program in the interviews, surveys and site visits that will be completed in 2026.

Due to the limits on verifying activities at sites and information being based on annual reporting and limited permit information, the sites identified and included in this report is not a complete inventory of infrastructure. Additions are anticipated, clarifications of activities at facilities is anticipated, and discrepancies between information logged for a permit versus annual reporting will be clarified in the Needs Assessment.

This assessment includes facilities:

- That have a MPCA solid waste permit; and
- That did not indicate that they closed in 2024.

Data supplied by permittees in their annual facility reports was used to indicate the type of waste managed at a given facility. Facilities are categorized as follows:

- A **recycling facility** is any facility that reported recycling waste activities and indicated that those materials were sent to markets or sent to a facility for secondary processing.

- Facilities that only recycled tires were not included.
- A **transfer station** is a facility that reported transferring materials. This section identifies if these facilities transferred recycled materials, compostable materials, municipal solid waste or several different types of materials.
- A **commercial composting facility** is a facility that reported accepting source separated organic materials, which includes food scraps, and the facility's permit allows for acceptance of compostable covered materials.

Table 32 shows the number of facilities which reported recycling, transferring, and composting by region throughout MN. There are 116 recycling facilities, 177 transfer stations, and 12 commercial composting facilities. A full list of facilities included is shown in Appendix D.

Table 31. Recycling facilities, transfer stations, and commercial composting facilities by region.

Facility type	TCMA	NE	NW	NC	SE	SW	Total
Recycling facilities	32	20	19	16	19	10	116
Transfer stations	49	29	30	27	26	16	177
Commercial composting	4	1	3	3	0	1	12

Source: MPCA solid waste permits with 2024 annual facility report waste activity responses from permitted facilities

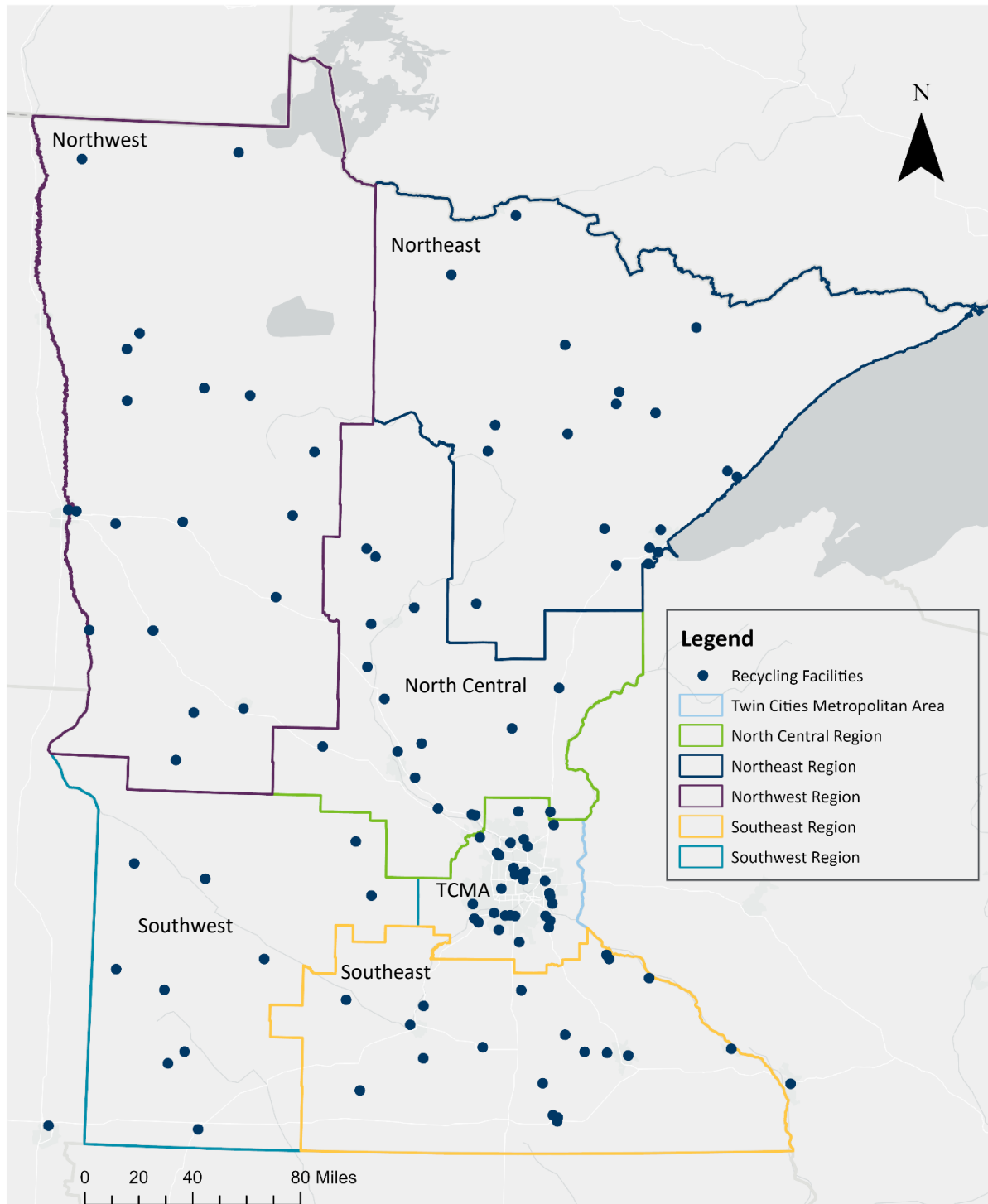
There are at least three known out-of-state recycling facilities that accept covered materials generated in MN. These facilities are not included in Table 32 because they are not permitted by the MPCA. There may also be recycling facilities, transfer stations, and/or commercial composting facilities on tribal land within the boundaries of the state that are not accounted for if they have chosen not to be permitted by the MPCA.

Recycling facilities

The MPCA does not define a material recovery facility and instead uses the definition for a recycling facility. For the purposes of this assessment the term recycling facility is used, which includes many different recycling activities. Figure 7 below provides the locations of the 116 recycling facilities in regions throughout MN and identifies the three known recycling facilities located in neighboring states. While all regions contain at least one recycling facility there are still some parts of the state where the distance to a recycling facility is significant (between 50 and 100 miles). The three out-of-state recycling facilities shown on the map are closer in proximity than a recycling facility located in MN.

Figure 7 shows recycling facilities in Minnesota including the addition of known facilities outside the state. The three facilities outside of MN shown on Figure 7 include Millennium Recycling in South Dakota where material from counties in the SW may be delivered, Harters in Wisconsin, where material from counties in the SE may be taken, and MinnKota in North Dakota where waste may be delivered from some NW region counties. Regional maps are available in Appendix E.

Figure 7. Recycling facilities in Minnesota and surrounding states.



Source: MPCA solid waste permits with 2024 annual facility report responses from permitted recycling facilities.

Processing capacity

This assessment is required to include the processing capacity at recycling facilities, including total tons processed and sold and the composition of tons processed and sold at recycling facilities. However, data reported by facilities in their annual facility reports to the MPCA, used to inform this preliminary assessment, may not accurately reflect the true processing capacity of a facility. The reason for this is

that data is the actual tons sent to market, as reported to MPCA, by each facility annually and not specifically the processing capacity of the facility. Data on processing capacity at recycling facilities that process covered materials will need to be obtained through surveys, interviews, and/or site visits as part of the Needs Assessment. This additional primary data collection will help inform the amount of covered material that can be processed in Minnesota.

When determining the processing capacity (e.g. the amount of material in tons that can be processed over a given time) there are many factors to consider, including but not limited to:

- Seasonality (material density impacts);
- Specific material composition;
- Moisture content;
- Compaction; and
- Other variables.

These factors impact the speed at which the equipment can process material and thereby processing capacity since there is a relationship between the weight and volume of the materials being processed. The equipment processing capacity is measured in weight over a given time, but the volume of material over a given time is also limiting for the equipment. For example, a cubic yard of single stream recyclable may weigh 60-75 pounds when it is dry (in the winter) or composed of large light items, or 225-250 pounds when it is wet (in the spring) or composed of small heavy items, and the processing speed is limited by weight and volume. When material is dry or composed of large light materials the processing capacity in tons per hour may decrease compared to when wet or small heavy material is processed.

Permitted facilities reporting to the MPCA include details on the number of tons sent to end market which is not directly tied to the processing capacity of the equipment used within a recycling facility. This can have a significant impact on throughput capacity when compared to tons of material sent to end market. For example, equipment for processing recyclable covered materials can be operated at different speeds to process more or less material which will impact the sortation effectiveness and ultimately the quality and adherence to the specifications of the end markets receiving these materials. A processing facility can increase the processing speed of the equipment to clear the tipping floor or to accommodate a maintenance shift but, in turn, may reduce the quality of the material recovered.

Processing capacity will be requested in tons per hour as part of the Needs Assessment to avoid uncertainties around operating hours (actual number of hours the equipment is operational and processing materials) as that impacts annual processing capacity in tons per year. Also, this helps avoid confusion when comparing capacity in tons per day when some facilities may have operating hours over one shift and others over two shifts. Processing capacity will provide valuable information beyond the reported number of tons reported as sent to end market as required in previous years' annual facility reports. Another item that impacts processing capacity and commodities recovered is related to facility improvements through operational improvement or equipment updates. For example, Polk County is currently installing equipment to recover additional materials which will not be captured in the data provided by the MPCA. Waste Management's Twin Cities recycling facility and Eureka Recycling's recycling facility both have had upgrades in recent years.

Sortation equipment and technologies used at recycling facilities

The technology used by each facility to sort recyclables will be investigated in further detail in the Needs Assessment. Recycling facilities in MN that accept material from MN generators range in size, design, and throughput capacity. The complexity of equipment used for processing recyclables varies from simply loading single commodities into a trailer for transfer to end markets, to using a conveyor with

manual sortation (e.g. when a conveyor transfers material past an individual who manually picks recyclables from the conveyor) to state-of-the-art facilities with optical sorters and AI driven sortation. Capacities range from several tons per day to nearly 650 tons per day. The specific technology used by each facility to sort recyclables will be investigated as part of the development of in the Needs Assessment through surveys and site visits.

Since there is a wide range of equipment used at recycling facilities throughout the state, this section will provide a brief description of the types of equipment that may be encountered at recycling facilities in the state and provides a general understanding of the equipment used for sortation. Facilities with throughput capacities below 7,500 tons per year will typically have limited equipment and may include conveyors, magnets, eddy current separation, and manual sortation. Facilities with more throughput capacity will typically include some or all of the following sorting equipment:

- Presort station: Typically, an area at the beginning of a recycling facility process where a person or people physically remove contaminants or larger materials (may or may not be recyclable) that may damage downstream equipment.
- Conveyors: Device used to transfer materials from one area of the recycling facility to another or between pieces of equipment.
- Liberation device (bag opener, shredder, metering drum/wheel/bunker, etc.): Equipment used to open bagged materials to allow for sortation of the bagged contents.
- Screens: Screening equipment is a common type of equipment in recycling facilities that separate materials based on size and shape (2-dimensional vs 3-dimensional). Some examples include:
 - Star screens, debris roll screens, glass breaker screens, disc screens: Used to separate materials by size using typically a series of rotating shafts connected at both ends and spaced based on the desired material size. As they rotate, they agitate materials, allowing smaller material to fall between the rotating shafts and larger materials to pass over the top to the next piece of equipment.
 - Auger screens: Used to separate materials by size using rotating shaft connected at only one end to minimize wrapping of long, stringy materials. As they rotate, they agitate materials, allowing smaller material to fall between the rotating shafts and larger materials to pass over the top to the next piece of equipment.
 - Inclined screens: Similar to other screens used for size separation but are inclined and separate containers (3-dimensional) from flat (2-dimensional) materials and the small heavier fraction like broken glass, grit, stones fall through the screen. Three-dimensional materials fall to the back of the inclined screen and two-dimensional material traverse to the top of the incline screen.
 - Ballistic separation: Rotate long narrow “paddles” in an elliptical motion to move 2-dimensional materials like paper and cardboard over the screen, 3-dimensional materials like containers bounce or roll backwards from the screen, and small materials like broken glass fall through holes in the “paddles” that remove them from the stream. The three fractions from a ballistic separator are typically collected on three different conveyors for additional separation (3-dimensional containers), quality control (2-dimensional) and glass or residue.
 - Trommel: An inclined rotating drum or tube that rotates to agitate material as it travels from one end to another. The drum or tube has various sizes of holes around the outside perimeter of the drum that allows materials of various sizes to pass through the holes and larger material to exit at the end of the trommel. Typically, there are three different size fractions separated by a trommel. Trommels may have sharp protrusion at the start of the trommel to open bags.
 - Magnetic head pulleys: A type of pulley with a magnetic component at the discharge end of the conveyor belt. As materials move over the pulley, ferrous metals are attracted and held to the

belt while non-materials fall off. As the conveyor belt leaves the pulley metals drop off the conveyor into a container or another conveyor.

- Cross-belt magnetic separators: A magnetic piece of equipment that is mounted suspended above parallel or perpendicular to a transfer conveyor belt. Ferrous metals are lifted out of the moving waste stream and dropped into a separate chute or bin.
- Drum magnets: A rotating magnetic drum typically installed above a transfer conveyor that continuously attract ferrous metals from the waste stream as the waste stream on the conveyor passes the magnetic rotating drum. Ferrous metal removed by the rotating drum is released onto another conveyor or into a chute or bin.
- Eddy current separator: A type of sorting equipment that uses magnetic rotors to create a force called an eddy current that separates non-ferrous metals such as aluminum, die-cast metal, and copper, from non-metallic materials like paper or plastic.
- Optical sorting: A technology that includes advanced cameras, or near infrared and sensors to identify recoverable materials and use jets of air to move and sort materials into categories.
- Artificial Intelligence (AI): Equipment used to identify materials using cameras (visioning system) and “learn” using AI to improve material recognition. The visioning system and AI are used to control robotic arms or other robotic implements or means (air, etc.) used to positively or negatively sort specific material from a passing material stream.
- Air knives/air separation: Equipment used for density separation to separate heavy materials (glass, grit, rocks) from lighter materials (paper, plastics).
- Balers: Equipment used to densify recovered materials that have been separated in the MRF into a single commodity. Balers allow MRFs to densify commodities to allow for more cost-effective shipment of materials.
- Recycling shredders: Shredding machines cut materials into smaller, more uniform pieces for further processing. Shredding also reduces material volumes which makes it easier to manage and transport. Shredding machinery can be used on a wide variety of materials, including metal, plastic, paper, wood, and electronics.

Materials recycled by commodity

As stated above there are a total of 116 recycling facilities in the state. The capabilities at each recycling facility vary and will be covered more completely during the Needs Assessment through surveys, site visits, or interviews.

The categories shown below in Table 33 follow the provisional covered materials list described previously in Table 8. Table 33 was developed using data reported by recycling facilities to the MPCA as part of their annual facility reporting. Data submitted by recycling facilities is reported using the SCORE categories outlined in Table 9. The SCORE categories were mapped as closely as possible with the provisional covered materials list. For some SCORE categories it was not possible to break down tons to the same level of detail as those used in the provisional covered materials list in Table 8 without obtaining further waste composition data from facilities.

Table 33 shows the composition of the tons managed by recycling facilities that were sent to an end market destination in 2024, as reported by the facilities through their annual facility reporting. Annual material tonnages managed by recycling facilities are reported as a combined total and are not separated into residential and commercial sources. It is not possible to distinguish whether materials originated from residential or commercial sources. The tons reported in Table 33 may include both tons for covered and noncovered materials.

Additional information on the SCORE Categories used in this table, as well as the conversion factors methodology, is provided in Appendix A – Technical Appendix.

Table 32. Composition of recycled tons sent to end market by region (2024 data).

Material category for reporting	TCMA	NE	NW	NC	SE	SW
Corrugated cardboard and boxboard	257,122	10,825	9,238	4,415	21,579	5,443
Newspaper & magazines	26,462	125	416		173	91
Mixed paper	124,148	3,472	1,180	693	255	2,489
Other paper	3037	1312	188	9	519	275
Gable-top and aseptic carton	340			1		21
Plastic PET #1 bottles	24,257	424	684	53	268	361
Plastic PET #1 non-bottles						
Plastic HDPE #2 bottles	5,992	346	519	8	17	122
Plastic HDPE #2 non-bottles						
Plastic PP#5	2,755	100	59		385	108
Plastic PS#6	1				85	13
Mixed plastics rigid #3-#7	6,388	143	159	15	474	259
Plastic film and flexible	519	2	384	23	170	71
Glass bottles and jars						78
Glass non-container	76,828	2,287	6,176	35	519	1,958
Aluminum cans	8,550	426	713	45	20	10
Aluminum other	3,028	26	86	275	1,400	164
Steel cans	105,098	6,608	8,033	8,834	41,397	161
Steel other	12,758	100	41,417	1,194	1,036	250
Commingled/single/dual stream	6,598	13,309	3,206	4,631	12,848	5,385
TOTALS	663,881	39,505	72,458	20,231	81,145	17,259
Percentage (%)	74.2%	4.4%	8.1%	2.3%	9.1%	1.9%

Source: MPCA solid waste permits with 2024 annual facility reporting using waste activity data submissions from permitted recycling facilities.

Table 33 indicates that the TCMA region accounts for the largest share of recyclable covered materials managed, representing approximately 74% of the total recycling tonnage. The other regions manage substantially smaller portions of the statewide total. Although recycling facilities were identified in the NC and SW regions, these facilities primarily manage MSW and only minor quantities of recyclable covered materials are managed. Several inconsistencies were identified in the data reported from recycling facilities. Additional information on material quantities and other relevant information will be collected as part of the Needs Assessment through surveys, site visits, and interviews with facility operators.

Pre-processing and refuse derived fuel facilities

As explained above, equipment used and the amount of material processed depends on the type of material being processed and amount of material available for processing. Minnesota is relatively unique in that there are six facilities processing MSW to recover recyclables before the waste goes to a waste-to-energy facility for electrical generation or electrical generation and steam heat. The facilities that pre-process MSW to recover recyclables include Polk County, Perham, and Pope/Douglas in the NW

region, City of Red Wing and Minnesota Waste Processing in the SE region, and Recycling & Energy in the TCMA region. A seventh facility, Olmsted waste-to-energy facility, is anticipated to be completed in 2027. Some of these facilities already or plan to operate a separate shift dedicated to single-stream recyclables, and some facilities may be valuable to evaluate for opportunities in the future.

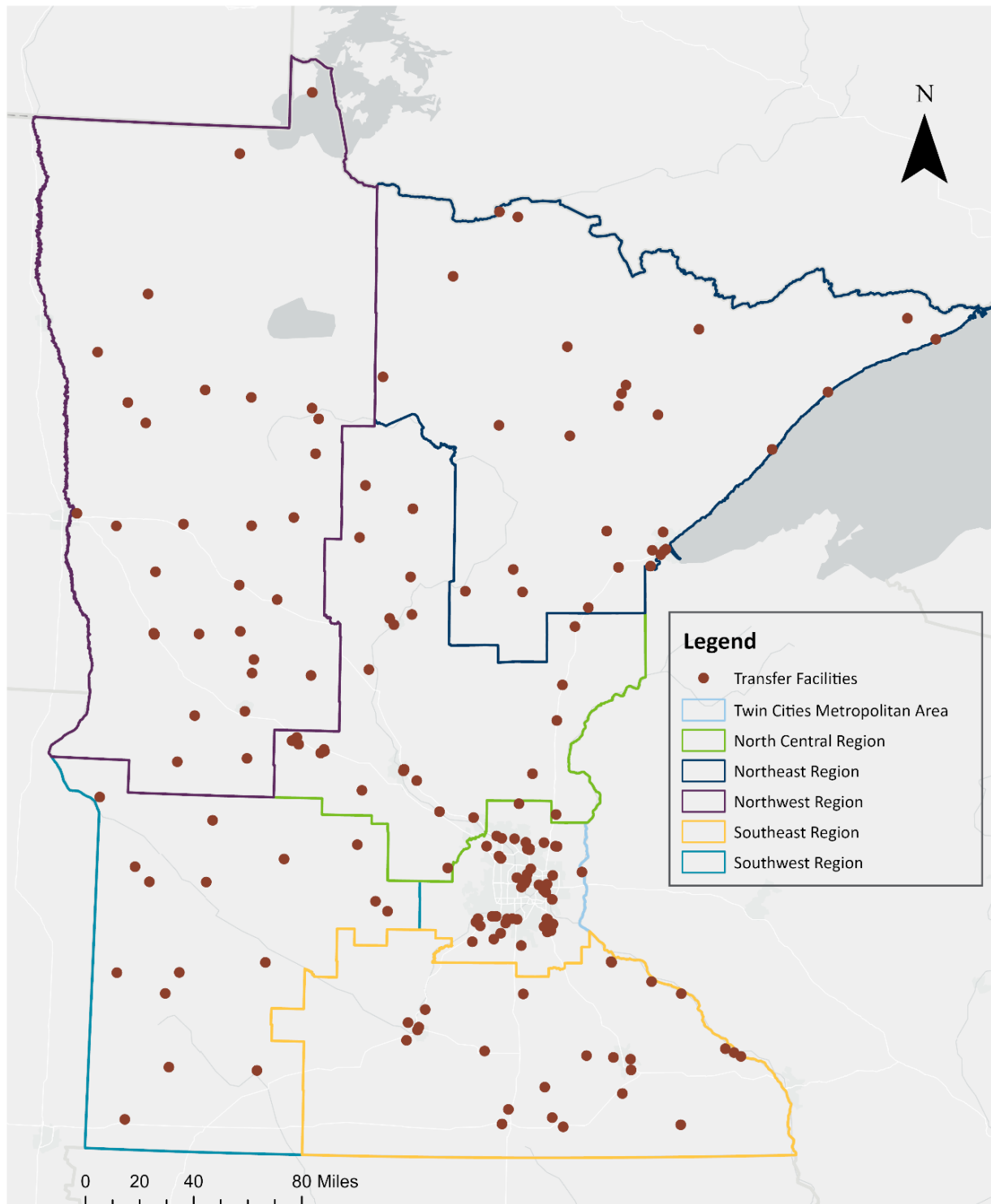
Additional information on facilities that report recyclable covered materials sent to end market that were removed from mixed waste through pre-processing of waste or refuse derived fuel production will be included in the Needs Assessment. These facilities have processing capacity that are not based on tons of single-stream recyclables received but rather MSW received. Although some may also operate a separate shift dedicated to single-stream recyclables in addition to a shift or shifts for processing MSW.

Transfer stations

Table 16 above indicates that there are 177 transfer station facilities. A transfer station is defined as any facility that only transfers materials, which include recyclable materials or compostable materials for secondary processing, or municipal solid waste materials for secondary processing or a landfill. For this preliminary assessment, it was not verified whether all of these facilities manage covered material. Additional data will be collected during the Needs Assessment to support this analysis.

Figure 8 shows the distribution of transfer stations throughout the six regions of the state. Additional maps by region are available in Appendix E.

Figure 8. Transfer stations in Minnesota.



Source: MPCA solid waste permits with 2024 annual facility report responses from permitted transfer stations and permitted sites.

Similar to recycling facilities, transfer stations report their annual materials managed data to the MPCA. When reviewing the MPCA's annual facility reporting data, facilities can be classified as either a solid waste, recycling, or compost transfer station, or a combination of the three, depending on the reported waste activity.

In preparation for the Needs Assessment, it is important to identify existing infrastructure that currently does not transfer recyclable covered materials but could potentially do so with future upgrades. Table 34 shows transfer stations that reported managing only solid waste in 2024, along with the corresponding tons handled by region of the state. Not all transfer facilities included in this report submitted data as part of the 2024 annual facility report but are included as they did not indicate being closed.

Table 33. Transfer station management of solid waste materials by region (2024 data).

	TCMA	NE	NW	NC	SE	SW	Total
Transfer Stations in region with waste activity data	30	20	25	12	19	10	116
Transfer Stations managed tonnage	1,573,508	271,424	145,392	111,691	275,780	63,069	2,440,864

Source: MPCA solid waste permits with 2024 annual facility report responses from permitted recycling facilities. 61 transfer stations (34% of transfer stations) did not report waste activity data in 2024.

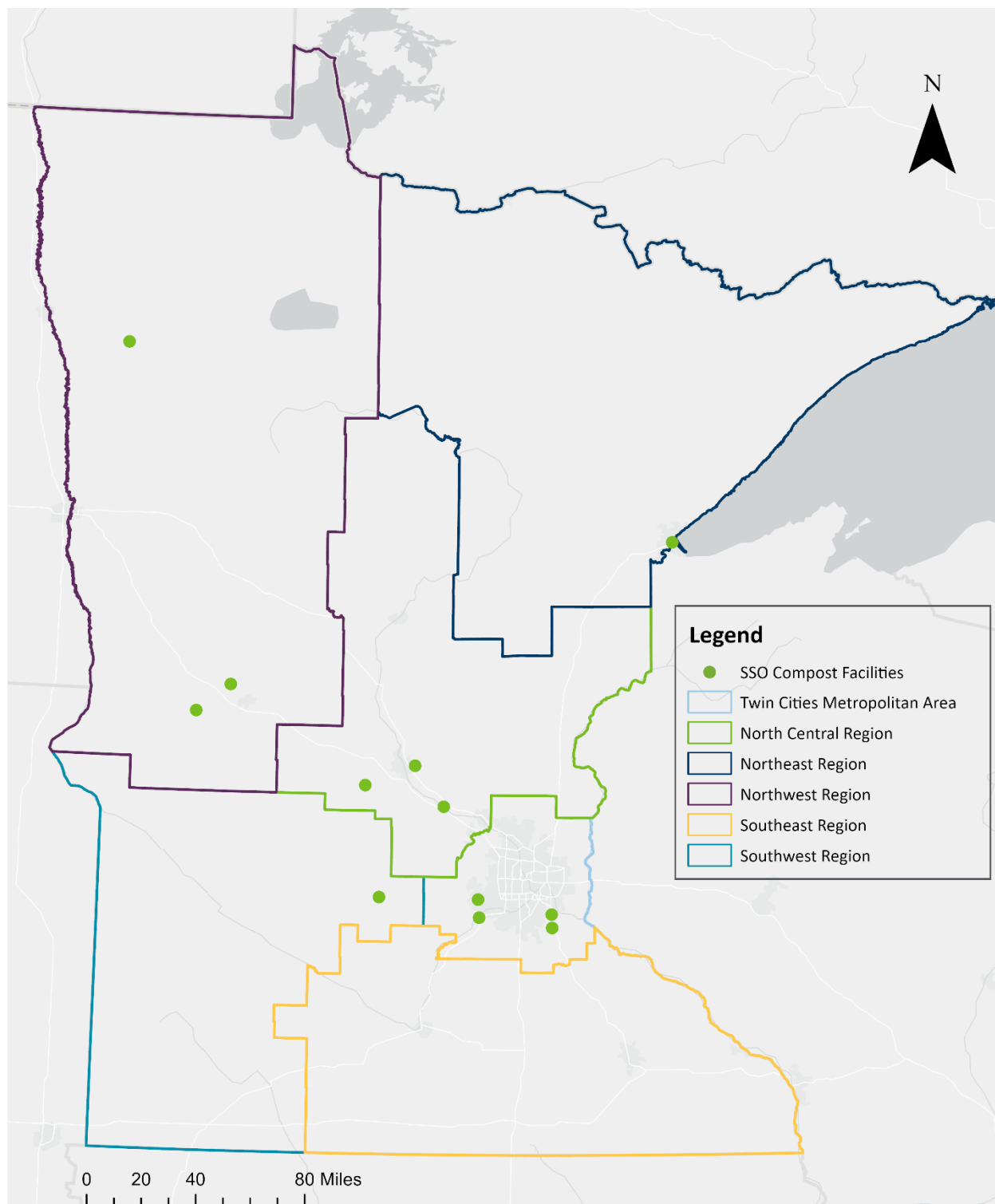
Commercial composting facilities

This assessment includes a review of commercial composting facilities that accepted source separated organics, which includes food scraps and can include compostable covered materials. Figure 9 shows the distribution of commercial composting facilities throughout the six regions of the state. Additional maps by region are available in Appendix E.

Community composting (small compost sites) are not permitted by the MPCA and therefore do not report on materials collected and composted through annual facility reporting. While small compost sites are allowed to accept covered compostable materials per Minn. R. ch. 7035, further research is needed to determine if they currently are, or if they have the ability to accept compostable covered materials. Research into the role of community composting will be conducted during the Needs Assessment.

Yard waste only compost sites were also not evaluated in this preliminary assessment but will be assessed as part of the Needs Assessment to evaluate opportunities for expanding collection and composting of food scraps and compostable covered materials across the state. Only technologies or composting systems that are composting compostable covered materials can contribute to the composting rate as defined in the law.

Figure 9. Commercial composting facilities in Minnesota.



Source: MPCA's 2024 annual facility reporting responses from permitted commercial composting facilities and permitted sites.

Table 35 shows commercial composting facilities that reported accepting source separated organics in 2024, along with the corresponding tons composted by region of the state.

Table 34. Commercial Composting Facilities by region (2024 data).

	TCMA	NE	NW	NC	SE	SW	Total
Commercial Composting Facilities by Region	4	1	3	3	0	1	12
Composted tonnage	92,938	2,529	1,902	803	0	15,736	113,908

Source: Minnesota Pollution Control Agency's 2024 Waste Activity Report using waste activity data submissions from permitted commercial composting facilities and permitted. 3 compost facilities did not report waste activity data in 2024.

Technologies used at compost facilities can include, but is not limited to the following equipment:

- Liberation device (bag opener, shredder): Equipment used to open bagged materials to allow for decomposition of bagged contents and to allow for removal of contaminants.
- Trommel: An inclined drum or tube that rotates to allow compost material to fall through holes around the outside perimeter of the drum and removes contaminants that exit at the end of the trommel.
- Windrow turner: Equipment with a rotating paddle that move through long piles (windrows) of organic material, mixing, aerating, and redistributing moisture to speed up the decomposition process.
- Frontend loader: Equipment with a scoop or bucket on an articulated arm at the front for moving organics, creating windrows and loading compost.
- Drum separator: A common equipment used to remove contamination which uses a combination of high-speed conveyors, fans, and a rotating drum to separate materials based on weight and density.

Operational methods for composting can include, but is not limited to the following:

- Turned windrow: A composting method in which organic materials are piled and arranged in a long, narrow pile. Aeration is achieved by natural convection through the windrow shape and through turning with a windrow turner.
- Aerated windrow: A windrow equipped with mechanical forced aeration.
- Aerated static pile: A composting method in which organic materials are piled and aerated using a system of perforated pipes or blowers, without the need for turning. Covered or uncovered.
- In-vessel composting: A composting method of decomposing organic waste in an enclosed container or building, allowing for precise control over temperature, moisture, and aeration to reduce decomposition time.

Larger facilities in the TCMA region have begun adding technologies such as de-packagers and shredders to their process to be able to manage large amounts of food waste coming into their facility with packaging. Majority of the facilities use front end loaders and windrow turners to process smaller amounts of source separated organics and are selective about inputs to combat contamination issues. Actual processing data and equipment data will be collected from facilities through surveys, site visits and interviews during the Needs Assessment.

Markets for covered materials

This section provides an overview of potential markets for covered materials identified in Minnesota and the surrounding states to be further evaluated as part of the Needs Assessment.

Table 35. Data completeness, key data sources, and additional research – markets for covered materials.

Indicator	Status
Data completeness	Red. <i>Significant data gaps and/or limited data. Content may be commentary only.</i>
Key data sources and gaps	MPCA’s Recycling Market Directory, EPA Recycling Infrastructure and Markets Interactive Map, and Glass Recycling Foundation Interactive Glass Recycling Map.
Needs assessment	Primary and secondary research will take place to identify all markets accepting covered material from Minnesota. Including interviews with associations, facilities, and others to identify markets. Markets will be assessed to ensure they meet the definition of a responsible market. The Needs Assessment will provide an assessment of the viability and robustness of markets for recyclable covered materials and the degree to which these markets can be considered responsible markets.

Markets are essential to the functioning of recycling and organics recycling programs. They convert the materials collected and sorted for recycling and composting into commodities or products and supply them to manufacturers for the production of new products.

The Packaging Waste and Cost Reduction Act defines a responsible market as a materials market that:

- Reuses, recycles, composts, or otherwise recovers materials and disposes of contaminants in a manner that protects the environment and minimizes risks to public health and worker health and safety;
- Complies with all applicable federal, state, and local statutes, rules, ordinances, and other laws governing environmental, health, safety, and financial responsibility;
- Possesses all requisite licenses and permits required by a federal or state agency or political subdivision;
- If the market operates in the state, manages waste according to the waste management goal and priority order of waste management practices stated in the statute; and
- Minimizes adverse impacts to environmental justice areas, as defined in the statute.

The markets listed in this Preliminary Assessment have not been verified against the above criteria. This will be done as part of the Needs Assessment.

The MPCA maintains a recycling markets directory which shows the available markets for material collected for recycling by material type throughout the state. This directory lists a variety of entity types such as those that process scrap material, those that recycle material into secondary raw materials such as glass cullet or plastics resins, and those that use secondary raw materials to produce new products such as glass container manufacturers. The EPA also maintains a recycling infrastructure and markets opportunity map which shows recycling facilities throughout the US. The map was developed from 2021-2022 to assist in efforts to meet the National Recycling Goal of increasing the US

recycling rate to 50% by 2030.³⁹ Both sources were used to identify facilities that meet the definition of a market. Table 30 shows the number of recycling markets in MN by material type according to the MPCA's recycling markets directory, which was last updated in 2015 with revisions in 2019 and the US EPA's Recycling Infrastructure Map which was developed from 2021-2022. As both sources are three to four years out-of-date at the time of this assessment, facilities that are not currently in operation in MN have been removed from further analysis.

The list shown in Table 37 of market facilities is not an exhaustive list and will be expanded and markets will be confirmed and evaluated against the definition of a responsible market as part of the Needs Assessment.

Table 36. Potential recycling markets identified by material type to be further investigated.

Source	Facility	Material	Location
US EPA and MPCA Directory	Choice Plastics, Inc	Plastic	Mound, Minnesota
US EPA	GDP Circular	Plastic	Rogers, Minnesota
Secondary Research	Avon Plastics	Plastic (HDPE)	Paynesville, Minnesota
Secondary Research	Tangent	Plastic (HDPE and film)	Worthington, Minnesota
US EPA and MPCA Directory	Liberty Paper Incorporated	Paper	Becker, Minnesota
Secondary Research	Anchor Glass	Glass	Shakopee, Minnesota
US EPA, Glass Recycling Foundation, and MPCA Directory	Sibelco - formerly Strategic Materials, Inc.	Glass	St. Paul, Minnesota
Secondary Research	EGA Spectro Alloys	Metal (aluminum)	Rosemount, Minnesota
Public Comment	Sonoco	Paper	Menasha, Wisconsin
Public Comment	Sonoco	Paper	Wisconsin Rapids, Wisconsin
Secondary research	Sustana Fiber	Paper	De Pere, Wisconsin
Public Comment	Upfactory Materials	Paper	Des Moines, Iowa
Glass Recycling Foundation	Sibelco - formerly Strategic Materials, Inc.	Glass	Delavan, Wisconsin
Glass Recycling Foundation	Sibelco - formerly Strategic Materials, Inc.	Glass	Chicago, Illinois
Secondary Research	Novelis	Metal	Greensboro, Georgia
Secondary Research	Constellium	Metal	Bowling Green, Kentucky
Secondary Research	United States Steel	Metal	Indiana
Secondary Research	United States Steel	Metal	Pennsylvania
Secondary Research	United States Steel	Metal	Illinois
Secondary Research	Cleveland Cliffs	Metal	Indiana

³⁹ EPA (2021-2022) *Recycling Map* [Interactive map]. ArcGIS Experience. <https://experience.arcgis.com/experience/6aaa6b2293eb41c4a77845e6304f176a/page/Recycling-Map> (accessed November 6, 2025)

Secondary Research	Cleveland Cliffs	Metal	Ohio
US EPA	ACE Plastic Inc	Plastic	Chatworth, Illinois
US EPA	Adams Plastics	Plastic	Rolling Meadows, Illinois
US EPA	Alpha Omega Plastics	Plastic	Elk Grove Village, Illinois
US EPA	Cedar Poly LLC	Plastic	Tipton, Iowa
US EPA	Green Earth Plastic Recycling	Plastic	Joliet, Illinois
US EPA	Resource Plastics	Plastic	Alsip, Illinois

Source: *The MPCA recycling market directory*⁴⁰, *EPA's recycling infrastructure and markets opportunity map*⁴¹, and secondary research.

Data is not publicly available on the capacity of markets and will be collected as part of the Needs Assessment. In addition to understanding the locations and capacity of available markets for materials the Needs Assessment will also require a review of these markets to ensure they meet the definition of responsible market.

Facilities outside of MN that are potentially accepting covered materials from Minnesota were also analyzed and findings are detailed below by material category.

Paper: There are several mills in Minnesota that will be further investigated as part of the Needs Assessment.

Glass: The Glass Recycling Foundation has an Interactive Glass Recycling Map⁴² which is updated weekly and includes markets, recycling facilities, and processors accepting glass throughout the US.

Metal: There are several markets for scrap metal in Minnesota that will be further investigated if they accept covered materials. Nationally, two main facilities dominate the US market for aluminum beverage cans, Novelis' Greensboro facility in Georgia and Constellium's Bowling Green facility in Kentucky. Steel recycling is also primarily dominated by two main companies in the US, United States Steel with integrated steel mills in Indiana, Pennsylvania and Illinois and Cleveland Cliffs with mills in Indiana and Ohio.

Plastic: The EPA's Recycling Infrastructure Map⁴³ was also used to identify plastic markets operating in states neighboring MN and those that are markets and are currently operating.

Available data did not provide any details of markets for compostable covered materials. This will be further explored in the Needs Assessment. As previously mentioned, the MPCA has dedicated market development staff and issues recycling market grants including \$5.3 million to 11 grant recipients in 2024 to bolster local markets⁴⁴.

⁴⁰ Minnesota Pollution Control Agency. (n.d.). *Recycling markets*. Minnesota Pollution Control Agency.

<https://webapp.pca.state.mn.us/recycling-markets/search> (Accessed November 6, 2025)

⁴¹ EPA (2021-2022) *Recycling Map* [Interactive map]. ArcGIS Experience.

<https://experience.arcgis.com/experience/6aaa6b2293eb41c4a77845e6304f176a/page/Recycling-Map>

⁴² Grimm, E. (2025, February 22). *Interactive glass recycling map*. Glass Recycling Foundation.

<https://www.glassrecycles.org/industry-tools-1/glass-map> (accessed January 12, 2026)

⁴³ EPA (2021-2022) *Recycling Map* [Interactive map]. ArcGIS Experience.

<https://experience.arcgis.com/experience/6aaa6b2293eb41c4a77845e6304f176a/page/Recycling-Map>

⁴⁴ Minnesota Pollution Control Agency (October 2024) [MPCA invests \\$5.3 million to grow recycling markets in Minnesota | Minnesota Pollution Control Agency](#) (Accessed January 15, 2026)

Appendix A – Technical Appendix

This section provides further detail on assumptions and calculations behind the data used throughout the Preliminary Assessment.

Commonly accepted materials for recycling

Hauler material categories mapped to proposed material list

To assess covered material acceptance in Minnesota using hauler survey data and REC data, the material categories in both sources had to be assigned to a covered material. That mapping exercise can be seen in Table 38 below.

Table 37. Material category mapping for covered material acceptance.

Material type	Covered material category	Hauler associated category	REC associated category
Paper	Corrugated Cardboard and Boxboard	Boxboard including corrugated cardboard (OCC)	Cardboard
	Newspaper and Magazines	Newspapers and inserts	Magazines, catalogs, newspapers and inserts
	Mixed Paper	Mail, office, and school papers	Mail, office and school
	Other Paper	Phone books	Freezer Boxes
	Gable-top and Aseptic Cartons	Milk and broth cartons	Milk and juice cartons
Plastic	Plastic PET #1 Bottles	Water, soda and juice bottles	# 1 PET Bottles
	Plastic PET #1 Non-Bottle	Containers such as those for berries, salad greens	#1 PET Non-Bottles
	Plastic HDPE #2 Bottles	Milk and juice jugs	#2 HDPE Bottles
	Plastic HDPE #2 Non-Bottle colored and natural combined	Dish soap bottles and detergent jugs	Shampoo, Soap, Lotion Bottles
	Plastic PP#5	Yogurt, pudding and fruit cups	#5 Tubs
	Plastic PS #6	Polystyrene, Styrofoam	Styrofoam
	Plastic Mixed Plastics Rigid #3-#7	Screw caps, lids	#3, #4, #6, #7 Plastic
	Plastic Film and Flexibles	Film, carrying bags	Plastic Bags
Glass	Glass Bottles and Jars	Food and beverage bottles and jars	Food and Beverage Bottles and Jars
	Glass Non-container		Other non-bottle glass
Metal	Aluminum Cans	Food and beverage aluminum/tin/bimetal cans	Food and beverage cans
	Aluminum Other		Non-can aluminum
	Steel Cans	Food and beverage aluminum/tin/bimetal cans	Steel Cans
	Steel Other		# 1 PET Bottles

Material type	Covered material category	Hauler associated category	REC associated category
Compostable	Compostable Paper		Plastic coated paper takeout cartons
	Plastic Compostable		

Table 39 below shows the detailed examples of materials in the REC guidelines.

Table 38. REC guidelines for single-sort or single-stream recycling.

Accepted	Not accepted	Maybe accepted
Plastic		
#1, #2 containers, bottles and jugs such as: Soda, juice and water bottles, Milk and juice jugs, Ketchup and salad dressing bottles, Dishwashing and laundry product bottles and jugs, Shampoo, soap and lotion bottles, Clear berry and produce containers, Clear plastic egg cartons, Clear to go cups #5 containers, bottles and jugs such as: Clear plastic egg cartons, Yogurt, pudding and fruit cups, Margarine, cottage cheese, cream cheese and other tubs and lids,	#3, #4, #6, #7 plastic Plastic straws Pumps and sprayer tops from bottles Utensils Styrofoam™, foam cartons, and foam packing material Chip bags, granola and candy wrappers Garden hoses Bulky rigid plastics (ex: Kiddie pools, laundry baskets, window blinds) Microwaveable food trays Motor oil and other containers that held hazardous products Pouches Toys Plastic gloves Meal prep packaging Drink pouches	Accepted for recycling at the majority of MRFs, but one or more MRFs (outside the TWMA) do not accept them: #5 containers like yogurt, pudding and fruit cups, margarine, cottage cheese, cream cheese and other tubs and lids and some deli containers NOT accepted for recycling at the majority of MRFs, but one or more MRFs do accept them: Black containers and bottles Clear, rigid packaging from toys, electronics and other products NOT accepted for recycling at any MRF, but commonly collected for recycling at specialty drop-off locations: Plastic bags, film, and wrap Tyvek envelopes
Glass		
Food and beverage bottles and jars	Ceramics/pottery Drinking glasses Glass dishes Mirrors Vases Window glass Glass bakeware Nail polish and hobby paint containers	Accepted for recycling at the majority of MRFs, but one or more MRFs do not accept them: Mason jars NOT accepted for recycling at any MRF, but commonly collected for recycling at specialty drop-off locations: Light bulbs
Cartons (aseptic and gable-top cartons)		
	Ice cream cartons Plastic coated paper takeout cartons Foil drink pouches	Accepted for recycling at the majority of MRFs, but one or more MRFs do not accept them: Milk and juice cartons Juice boxes

Accepted	Not accepted	Maybe accepted
		Soup, broth and wine cartons NOT accepted for recycling at the majority of MRFs, but one or more MRFs do accept them: Paper egg cartons
Metal		
Food and beverage cans Decorative popcorn and cookie tins depending on size	Batteries	Accepted for recycling at the majority of MRFs, but one or more MRFs do not accept them: Aluminum foil (must be clean) Aluminum trays, tins, or pie tins (must be clean) NOT accepted for recycling at the majority of MRFs, but one or more MRFs do accept them: Aerosol cans (e.g. shaving cream) Cardboard can (i.e. oatmeal container or crescent roll container) NOT accepted for recycling at any MRFs, but commonly collected for recycling at specialty drop-off locations: Containers that held hazardous products such as paint thinner Holiday lights Loose metal caps Paint cans Pressurized cylinders like propane and helium tanks Scrap metal, such as pots and pans, hangers, shelves, nails, auto parts, pipes and poles Wire NOT accepted for recycling at any MRF, but commonly collected for recycling at specialty drop-off locations: Hazardous aerosols
Paper		
Cardboard Cereal and cracker boxes Magazines, catalogs, newspapers and inserts Mail, office and school papers Phone books and other soft cover books Shoe boxes, gift boxes, tissue boxes and electronics boxes	Greeting cards that are shiny, play music, contains aluminum foil or plastic Paper berry cartons Paper cups, plates and bowls Paper napkins or towels Paper soiled with food or grease Shipping envelopes padded with bubble-wrap Tissue paper	Accepted for recycling at the majority of MRFs, but one or more MRFs do not accept them: Freezer boxes (most boxes today are pure boxboard without a plastic lining or plastic fibers, making them recyclable) Pizza delivery boxes Cardboard cans (i.e. oatmeal container or crescent roll container)

Accepted	Not accepted	Maybe accepted
Cardboard tubes from toilet paper, and paper towels (only the inner cardboard tube is recyclable, NOT the paper on the roll) Toothpaste, medication and other toiletry boxes Refrigerator boxes	Waxed cardboard (such as bulk produce boxes) Wrapping paper	Unlined Kraft paper such as used for shipping padding (flatten and place in a paper bag for best results) NOT accepted for recycling at the majority of MRFs, but one or more MRFs do accept them: Hardcover books Paper egg cartons Shredded paper Cardboard cans with metal lids Lined kraft bags Padded paper shipping envelope NOT accepted for recycling at most MRFs, but commonly collected for recycling at specialty drop-off locations: Shredded paper

Source: Recycling Association of Minnesota, Available at: <https://www.recycleminnesota.org/recycling-outreach-guide-for-minnesota.html>.

Covered materials collected

Covered materials collected for recycling

To understand the tons of covered materials collected for recycling, 2023 SCORE data was used as a basis⁴⁵. SCORE data is published annually by MPCA and includes tons collected for recycling by all 87 counties and Western Lake Superior Sanitary District (WLSSD).

Tons collected for recycling in the data are split into ‘residential’ and ‘commercial’ tons. It was assumed that all tons reported as ‘residential’ are tons collected from single-family homes. Tons reported as ‘commercial’ were assumed to include tons collected from multi-family homes, as well as tons collected from commercial properties. This includes commercial properties that are covered entities and those that are not covered entities.

Residential – single-family residences

The residential tons collected for recycling reported in SCORE data includes all materials collected for recycling, not only covered materials, and although this data source allows a relatively consistent approach to reporting of tons across the state, some counties report against different material categories to others. Adjustments to the data have therefore been applied to ensure consistency. To understand the proportion of these reported tons that are covered materials, the material categories listed in SCORE were mapped against the covered materials. Tons reported against material categories in SCORE that are not covered materials were removed from the total tons presented here.

Some exemptions in the law are not established and therefore these tons have not been removed:

- (Minn. Stat. § 115A.1441, subd 16(11)) “packaging used to contain hazardous or flammable products regulated by the 2012 federal Occupational Safety and Health Administration Hazard

⁴⁵ MPCA, 2025, 2023 SCORE Report, Available at: [Workbook: SCORE report 2023](#)

Communication Standard, Code of Federal Regulations, title 29, section 1910.1200, that prevent the packaging from being waste reduced or made reusable, recyclable, or compostable, as determined by the commissioner”;

- (Minn. Stat. § 115A.1441, subd 24) “paper product... does not include ... products that recycling or composting facilities will not accept because of the unsafe or unsanitary nature of the paper product”;; and
- (Minn. Stat. § 115A.1441, subd 16(13)) any covered material that is requested and approved to be an exempt material due to a “specific federal or state health and safety requirement prevents the packaging from being waste reduced or made reusable, recyclable, or compostable.”

Mapping of the SCORE material categories against the covered materials also allowed for simplification of the reporting in situations where counties had used different material category names for the same types of materials.

Table 39. SCORE material categories and types mapped against covered materials.

SCORE material category (2023)	SCORE material type (2023)	Eunomia assigned material type	Included in covered material total
Paper	boxboard and cardboard	Cardboard (OCC and boxboard)	Yes
Paper	aseptic containers and drink boxes	Cartons	Yes
Paper	newspaper	Newspaper and print	Yes*
Paper	catalogs and magazines	Newspaper and print	Yes*
Paper	phone books	Newspaper and print	Yes*
Paper	mixed paper	Other Paper	Yes
Paper	office paper	Other Paper	Yes
Paper	shredded paper	Other Paper	Yes
Paper	kraft paper bags	Other Paper	Yes
Paper	plastic lined paper bags	Other Paper	Yes
Plastic	PET bottles	[1] PET	Yes
Plastic	HDPE bottles - colored	[2] HDPE	Yes
Plastic	HDPE bottles - natural	[2] HDPE	Yes
Plastic	HDPE - injection grade	[2] HDPE	Yes
Plastic	PS rigids	Mixed Rigid Plastics	Yes
Plastic	mixed plastic containers and rigids	Mixed Rigid Plastics	Yes
Plastic	EPS block shapes and foam food service	Mixed Rigid Plastics	Yes
Plastic	LDPE tubs and lids	Mixed Rigid Plastics	Yes
Plastic	PP bottles, containers, and bulky	Mixed Rigid Plastics	Yes
Plastic	PET clam shells	[1] PET	Yes
Plastic	mixed retail bags, wraps, and film	Mixed Bags, Wraps and Film	Yes
Plastic	ag film boat wrap	Mixed Bags, Wraps and Film	Yes
Glass	mixed glass containers	Glass Containers	Yes
Glass	brown glass containers	Glass Containers	Yes
Glass	clear glass containers	Glass Containers	Yes
Glass	green glass containers	Glass Containers	Yes
Glass	non container glass	Non-Container Glass	Yes
Metal	aluminum cans	Aluminum Cans	Yes
Metal	aluminum	Aluminum	Yes
Metal	non-ferrous metals	Other non-ferrous	No
Metal	ferrous metals	Ferrous Metals	Partially
Organic	yard waste	Organics	No
Organic	fats oils greases	Organics	No
Organic	food to livestock	Organics	No
Organic	food to people	Organics	Partially
Organic	source separated organic materials	Organics	No
Hazardous	HHW residential only	Other	No

SCORE material category (2023)	SCORE material type (2023)	Eunomia assigned material type	Included in covered material total
Hazardous	antifreeze	Other	No
Hazardous	fluorescent and HID lamps	Other	No
Hazardous	latex paint	Other	No
Hazardous	used oil	Other	No
Hazardous	used oil filters	Other	No
Hazardous	vehicle batteries	Other	No
Other	Textiles	Other	No
Other	electronic devices	Other	No
Other	major appliances and white goods	Other	No
Other	waste tires	Other	No
Building materials	Ceramics	Other	No
Building materials	Metal	Other	No
Building materials	Windows and sliding doors	Other	No
Building materials	Wood	Other	No
Building materials	concrete	Other	No
Electronic devices	Electronic desktop devices	Other	No
Electronic devices	Other electronic devices	Other	No
Electronic devices	electronic devices portables includes laptop tablet cellphone etc.	Other	No
Entertainment	Books and print media	Other	No
Entertainment	Sports & recreational goods	Other	No
Entertainment	Toys	Other	No
Entertainment	music and video media	Other	No
Hazardous	ballasts	Other	No
Household	Gardening supplies	Other	No
Household	Household goods	Other	No
Household	Large appliances	Other	No
Household	Office & residential furniture	Other	No
Household	Textiles	Other	No
Household	Tools	Other	No
Household	small appliances	Other	No
Household	yard equipment includes powered equipment	Other	No
Other	batteries	Other	No
Other	concrete asphalt	Other	No
Other	furniture	Other	No
Other	inkjet cartridges	Other	No
Other	mattresses and box springs	Other	No
Other reuse	clothes hangers	Other	No
Paper	books	Other	No

SCORE material category (2023)	SCORE material type (2023)	Eunomia assigned material type	Included in covered material total
Other	shingles	Other	No
Other	carpet	Other	No
Other	sawdust for animal bedding	Other	No
Building materials	Countertops	Other	No
Building materials	asphalt	Other	No
Other	Pallets	Other	No
Other reuse	Pallets	Other	No

*All the tons in these material types were counted towards covered materials, as no information was available to determine the proportion of these streams that would be exempt.

In some instances, the material types reported in SCORE as recycled materials included a combination of covered materials and non-covered materials. Where this was the case, the data required some calculation adjustments to achieve reporting consistency. Calculations of this type were applied to ferrous metal, rigid plastics and paper categories. This approach allowed an estimate of the total tons of covered materials collected for recycling to be calculated.

Tons of metals reported as ‘ferrous metals’ in SCORE likely include ferrous packaging but also scrap metal. In this case the Minneapolis characterization study⁴⁶ was used to estimate the proportion of ferrous metals that is packaging. This data suggests that 63% of ferrous metals in the residential waste collected for recycling was scrap steel, with 37% being steel cans. Therefore, it was assumed 37% of the ferrous metals reported as collected for recycling in the SCORE data was a covered material. In addition, for one county (Stearns), the reported ferrous materials were exceptionally high. Therefore, this data was not used.

There were also 45 counties that reported all rigid plastics under one material type and did not provide separate information on recycled PET and HDPE. To allow the presentation of these streams separately, the split of PET, HDPE and other mixed rigid plastics from the 18 counties that do report the amount of these materials recycled separately was applied to the mixed plastic tons for those 45 counties that did not report these separately. The percentage split of all mixed rigid plastics used for this calculation is shown Table , based on relative proportions as reported by other counties in SCORE.

Table 40. Percentage split of mixed rigid plastics, used in calculations.

Rigid plastic	% split
[1] PET bottles	28%
[2] HDPE bottles	16%
Mixed Rigid Plastics	56%

A similar approach was taken to split out tons of newspaper and print and tons of other paper from a generic mixed paper material type that was used to report quantities of paper collected for recycling by 17 counties. Data from 50 counties that reported a separate newspaper and print category from other paper was used to estimate the split, using the data shown in Table . This data was applied to the mixed paper category, based on relative proportions as reported by other counties in SCORE.

⁴⁶ Minneapolis (2022), Residential Waste Characterization & Capture Rate Study, Methodology and Baseline Results

Table 41. Newspaper and print split, used in calculations.

	% split
Newspaper and print	51%
Other Paper	49%

It is important to note that applying these splits to the recycling data allowed us to present the tons in a way that matched the covered materials list in Table 8 as closely as possible. However, applying the splits to plastics and paper products does not alter the overall tons of covered materials collected for recycling for these types of material.

As part of the Needs Assessment additional resources will be reviewed to further evaluate the percent split of different material types, including reviews of waste composition data and capture-rate studies, including evaluations of studies completed in other states focused on packaging and paper materials.

Covered materials collected for organics recycling

In order to estimate the covered compostable materials -- compostable paper and packaging -- that is already collected in the organics recycling collection stream, data from a Minneapolis waste characterization study⁴⁷ was used, which characterizes the waste collected in organics recycling carts presented by residents.

The data is shown in Table . This suggests that almost 13% of the waste collected in organics recycling carts in the study was covered material, either targeted compostable paper and packaging, or non-target paper, plastics, glass and metals. A total of 4.1% was listed as compostable paper or packaging.

Table 42. Compostable packaging assumptions.

Material	Mean %	Of which is covered materials
Paper	4.6%	4.5%
Plastic	1.8%	1.4%
Of which compostable plastics	0.2%	0.2%
Of which #7 compostable bags	0.2%	0.2%
Glass	3.0%	3.0%
Metal	0.4%	0.2%
Organics	86.4%	3.7%
Of which compostable paper	3.7%	3.7%
Total Covered Materials		12.8%
Total compostable paper and packaging		4.1%

Covered materials collected as trash

To understand the quantities of covered materials that are collected in the trash, a number of sources and assumptions were used.

Proportion of trash that is residential – single-family

The 2023 SCORE data reports total trash (landfilled, sent to waste-to-energy, or disposed onsite). This reported value includes trash from residential and commercial entities, also including commercial entities that are not included in the covered entities. It is therefore necessary to apply some

⁴⁷ Minneapolis (2022), Residential Waste Characterization & Capture Rate Study, Methodology and Baseline Results

adjustments to the data to reflect this; as such, the following assumptions were used to estimate the proportion of waste that is from residential single-family homes.

A Minneapolis study⁴⁸ stated that total waste generated by residential households was 1.27 tons per household per year. This was assumed to be related to single-family households; it was further assumed that all single-family homes would generate the same amount of total waste across the state.

The SCORE data provides information on the tons per household collected for recycling and composting for each county (noting this includes both covered and non-covered materials). Therefore, it was assumed that the 1.27 tons figure - minus the tons collected for recycling per household for each county - would give the remaining residential trash (for single-family households). Using this method, total trash from single-family homes was calculated as **1,354,966 tons**.

Proportion of Trash that is Covered Materials

To calculate the proportion of the trash that consists of covered materials, a number of composition studies were considered.

- Minneapolis residential waste characterization & capture rate study⁴⁹;
- Olmsted waste-to-energy facility solid waste characterization study ⁵⁰;
- Perham waste-to-energy facility solid waste composition study ⁵¹;
- Composition studies completed at Wilmarth Generating Plant, Prairieland Solid Waste Management Facility and Ramsey/Washington Recycling & Energy Center ⁵²; and
- Great River Energy HERC solid waste composition analysis.⁵³
- RRS / GRG Analysis (2022) Food Waste Generation and Composition Study Analysis

The list of data provides information on trash for different sources of waste; as such, different composition data were applied to different sources of residual waste, depending on the collection systems in place within different areas. These data are summarized in Table 44. Key decisions included the following:

- For single-family homes with recycling or organics recycling collections, the Minneapolis study was used as a basis for providing a composition of trash from households that have a recycling and organics recycling collection. The composition from those receiving recycling and organics recycling was applied to all households in the TCMA region that have a separate organics recycling collection; and
- Since only relatively low numbers of households have organics recycling collection in the Greater MN area, the composition datasets for households with recycling and facility waste sampling were used for this area.

⁴⁸ Minneapolis (2022), Residential Waste Characterization & Capture Rate Study, Methodology and Baseline Results

⁴⁹ Minneapolis (2022), Residential Waste Characterization & Capture Rate Study, Methodology and Baseline Results

⁵⁰ Olmsted County (2024), Olmsted Waste-to-Energy Facility solid waste characterization study

⁵¹ Estensen Environmental (2023), Solid Waste Composition Study Results, Perham Resource Recovery Facility

⁵² Xcel Energy (2024), Solid Waste Composition Study Report, Wilmarth Generating Plant

⁵³ Burns MsDonnell (2023), Solid Waste Composition Analysis, Great River Energy HERC Services

Table 43. Composition data applied in calculations.

Region	Household type	Number of households	Composition data applied
TCMA	Single-family households with curbside organics recycling collection	140,171	Minneapolis single-family households with organics recycling collections
	Single-family households with recycling collection only	561,268	Minneapolis single-family households with only recycling collections
	Single-family households with no curbside collections	231,422	Average of waste-to-energy and other facility compositions* and Food Waste Generation and Composition Study Analysis
Greater MN	Single-family households with recycling collection	510,241	Minneapolis single-family households with only recycling collections
	Single-family households with no curbside collections	329,415	Average of waste-to-energy and other facility compositions* and Food Waste Generation and Composition Study Analysis

*Note that waste composition studies from waste-to-energy facilities include waste from commercial generators.

Applying the approach set out above results in a total of 422,650 tons covered materials in the trash produced by single-family homes, as presented in Table 45.

Table 44. Estimated tons of covered materials in trash produced by single-family homes.

Material category	Material type	TCMA	NE	NW	NC	SE	SW	State wide
Paper	Cardboard (OCC and boxboard)	25,729	3,669	5,226	8,268	9,190	1,643	53,726
	Newspaper and print	2,060	412	508	695	762	172	4,609
	Other Paper	52,173	16,488	16,806	17,463	18,531	6,323	127,785
	Cartons	1,073	83	171	343	388	46	2,104
Plastic	[1] PET bottles	9,603	1,484	2,085	3,259	3,619	660	20,711
	[2] HDPE bottles	3,069	709	816	1,027	1,115	287	7,023
	Mixed Rigid Plastics	21,494	6,723	6,557	6,250	6,549	2,531	50,103
	Mixed Bags, Wraps and Film	35,247	6,662	8,281	11,453	12,571	2,792	77,005
Glass	Glass Containers	13,615	1,485	2,481	4,424	4,966	723	27,695

Material category	Material type	TCMA	NE	NW	NC	SE	SW	State wide
	Non-Container Glass	423	228	199	143	142	82	1,218
Metal	Aluminum Cans	4,481	772	1,019	1,503	1,660	333	9,768
	Aluminum	1,504	113	247	508	575	64	3,011
	Ferrous Metals	3,023	706	764	879	945	278	6,595
Compostable packaging	Compostable packaging	16,638	479	2,146	5,396	6,191	447	31,298
Total tons covered materials		190,132	40,014	47,306	61,610	67,206	16,382	422,650

Proportion of Trash that is from Multi-Family

Data from Eunomia’s work in Washington showed that overall waste generation of a multi-family home is approximately 75% of that generated by a single-family home. This is as expected multi-family homes often have fewer occupants per unit. The data from Washington also suggests that tons of residual waste generated by multi-family homes is 79% of that generated by single-family homes per unit. Although the service offered in Washington differs to MN, in that coverage of recycling collections is relatively high (89%) even for multi-family homes, the data gives a basis for providing an estimation of the tons of trash from MN of these types of properties of 262,963 tons⁵⁴. It is possible this is an underestimation of trash produced by multi-family homes in MN, as the recycling coverage is lower in MN at 69%, meaning more material is likely to be disposed of as trash.

The average waste compositions from the following sources were applied to these tons to calculate the tons of covered material in the trash from multi-family properties. These sources were chosen as they provide a mix of residential and commercial composition rather than the Minneapolis study which is single-family only.

- Minneapolis residential waste characterization & capture rate study⁵⁵;
- Olmsted waste-to-energy facility solid waste characterization study ⁵⁶;
- Perham waste-to-energy facility solid waste composition study ⁵⁷;
- Composition studies completed at Wilmarth Generating Plant, Prairieland Solid Waste Management Facility and Ramsey/Washington Recycling & Energy Center ⁵⁸; and
- Great River Energy HERC solid waste composition analysis.⁵⁹

⁵⁴ Eunomia and partners (2020), Container deposit study: Phase III: Costs and Benefits of Residential Packaging and Paper Product Recycling in Washington State

⁵⁵ Minneapolis (2022), Residential Waste Characterization & Capture Rate Study, Methodology and Baseline Results

⁵⁶ Olmsted County (2024), Olmsted Waste-to-Energy Facility solid waste characterization study

⁵⁷ Estensen Environmental (2023), Solid Waste Composition Study Results, Perham Resource Recovery Facility

⁵⁸ Xcel Energy (2024), Solid Waste Composition Study Report, Wilmarth Generating Plant

⁵⁹ Burns MsDonnell (2023), Solid Waste Composition Analysis, Great River Energy HERC Services

It was estimated that two thirds of trash from multi-family homes is from the TCMA region (Table). This is as expected due to the high number of multi-family properties in this region.

Table 45. Estimated tons of covered materials in trash produced by multi-family homes.

		MR	NE	NW	NC	SE	SW	Statewide
Paper	Cardboard (OCC and boxboard)	6,221	430	672	885	1,059	79	9,345
	Newspaper and print	740	51	80	105	126	9	1,112
	Other Paper	31,415	2,170	3,392	4,469	5,349	397	47,192
	Cartons	113	8	12	16	19	1	170
Plastic	[1] PET bottles	2,531	175	273	360	431	32	3,803
	[2] HDPE bottles	1,302	90	141	185	222	16	1,956
	Mixed Rigid Plastics	12,961	895	1,399	1,844	2,207	164	19,471
	Mixed Bags, Wraps and Film	11,919	823	1,287	1,696	2,029	151	17,905
Glass	Glass Containers	2,328	161	251	331	396	29	3,497
	Non-Container Glass	452	31	49	64	77	6	679
Metal	Aluminum Cans	1,350	93	146	192	230	17	2,029
	Aluminum	147	10	16	21	25	2	221
	Ferrous Metals	1,322	91	143	188	225	17	1,986
Compostable packaging	Compostable packaging	54	4	6	8	9	1	81
Total tons covered materials		72,855	5,033	7,866	10,365	12,404	922	109,445

Proportion of residual waste that is from non-residential covered entities

There was no information to work out the proportion of the reported residual waste that was tons from non-residential covered entities. These tons are therefore missing from the total covered tons estimate. The total number of NGOs, Public administrators, schools, college and universities and childcare settings was 7,381, which is only a small proportion (0.3%) of covered entities.

Overview of infrastructure

The annual facility report with waste activities is self-reported data by facilities and was extensively used in the overview of infrastructure section to reflect what materials were being managed. Solid Waste permits for initial permit applications provided geographic locations that were cross-referenced with the

2024 annual facility report. The Needs Assessment will need to further confirm and refine our understanding of these facilities. Technical limitations to note on this data:

Recycling

- Facilities were not considered recycling if they did not fill-out the 2024 annual facility report
- Facilities that only reported processing or sending to markets tires or industrial waste were excluded.

Transfers

- Facilities that reported transferring waste in the 2024 annual facility report. These facilities were categorized as transferring source separated organic material, recyclables determined to include covered materials, municipal solid waste, or several types of waste depending on what waste activities were reported.
- Facilities were removed if they indicated that they were closed in the 2024 annual facility report.
- Facilities with an effective solid waste permit that indicates that they transfer materials were included if they did not submit the 2024 annual facility report. The Needs Assessment and 2025 annual facility data will confirm if they are transferring waste.

Commercial composting facilities

- One composting facility that accepts SSOM was excluded because it processed less than 100 tons of SSOM and MPCA Solid Waste Planners indicated that this site is unlikely to process covered materials.
- Facilities were removed if they indicated that they were closed in the 2024 Annual Facility Report
- Facilities with an effective solid waste permit for accepting SSOM were included even if they did not submit the 2024 annual facility report. The Needs Assessment and 2025 annual facility data will confirm why these facilities are not accepting SSOM.
- Two facilities were added because they reported in the 2024 Annual Facility Report that they processed on site over 100 tons of SSOM Their initial permit application indicated yard waste only, and the Needs Assessment will further confirm the facility infrastructure capacity to process covered materials.

Annual facility report data and categories conversion

The 2024 Annual Facility Report was used to populate the data for managed recycling tonnages at recycling facilities. Correlation between the proposed covered materials and the Annual Facility Report material categories are shown in Table 47 below:

Table 46. Correlation between preliminary material categories and reporting categories.

Material categories	Reporting categories (waste type description)
Corrugated cardboard and boxboard	Cardboard
	Boxboard
Newspaper & magazines	Newspaper
	Magazines
Mixed Paper	Mixed Paper

Material categories	Reporting categories (waste type description)
Other Paper	Other Paper
	Office Paper
Gable-top and aseptic cartons	Aseptic Containers
Plastic PET #1 Bottles	PET Bottles
Plastic HDPE #2 Bottles	HDPE Bottles - Natural
Plastic PP#5	PP Bottles, Containers & Bulky
Plastic PS#	PS Rigid
Plastic Mixed Plastics Rigid #3-#7	Other Rigid Plastic
	LDPE Tubs & Lids
Plastic Film and flexible	Mixed Retail Bags/Wraps Film
Glass Bottles and Jars	Clear Glass
Glass Non-container	Other Glass
	Glass
Aluminum Cans	Aluminum Cans
Aluminum Other	Aluminum
Steel Cans	Ferrous Metals
Steel Other	Non Ferrous Metals
Commingled/single/dual stream	Commingled/single/dual stream Recyclables

When conversions from cubic yards to tons were required, the guidance in Table 48 from the MPCA was used. More information on converting amounts of waste by waste types can be found in our published report [Volume-to-Weight Conversions](#) on the agencies' publicly-available website.

Table 47. Conversion factors.

Waste type in	Step 1: Factor for converting to tons per cubic yards	Step 2: Factor to convert tons per cubic yards to tons
MSW	275	0.1375
MSW Combustor Ash	167.1	0.08355
C&D	659.2	0.3296
Industrial	877.9	0.43895
Commingled Recyclables	113.9	0.05695
Source Separated Recyclables	113.9	0.05695
Single Stream and Commingled Recyclables	113.9	0.05695
SSOM	556.8	0.2784
Yard Waste	377.5	0.18875
Brush Wood	195.3	0.09765
Beneficial Use	167.1	0.08355
Other	167.1	0.08355

The amount processed can be multiplied by the factors provided in step 2. The final data in this report uses tons per year by the applicable material types.

Appendix B – Counties by region

Table 48. List of counties by region.

Region for Packaging Waste and Cost Reduction Act	County
Twin Cities Metropolitan Area (TCMA)	Anoka
	Carver
	Dakota
	Hennepin
	Ramsey
	Scott
	Washington
North Central (NC)	Benton
	Cass
	Chisago
	Crow Wing
	Isanti
	Kanabec
	Mille Lacs
	Morrison
	Pine
	Sherburne
	Stearns
	Wright
Northeast (NE)	Aitkin
	Carlton
	Cook
	Itasca
	Koochiching
	Lake
	St. Louis
Northwest (NW)	Becker
	Beltrami
	Clay
	Clearwater
	Douglas
	Grant
	Hubbard
	Kittson
	Lake Of The Woods
	Mahnomen
	Norman
	Otter Tail

Region for Packaging Waste and Cost Reduction Act	County
	Pennington
	Pennington
	Polk
	Pope
	Red Lake
	Roseau
	Stevens
	Todd
	Traverse
	Wadena
	Wilkin
Southeast (SE)	Blue Earth
	Brown
	Dodge
	Faribault
	Fillmore
	Freeborn
	Goodhue
	Houston
	Le Sueur
	Martin
	Mower
	Nicollet
	Olmsted
	Rice
	Sibley
	Steele
	Wabasha
	Waseca
	Watsonwan
	Winona
Southwest (SW)	Big Stone
	Chippewa
	Cottonwood
	Jackson
	Kandiyohi
	Lac Qui Parle
	Lincoln
	Lyon
	McLeod
	Meeker
	Murray

Region for Packaging Waste and Cost Reduction Act	County
	Nobles
	Pipestone
	Redwood
	Renville
	Rock
	Swift
	Yellow Medicine

Appendix C – SCORE program details survey questions

SCORE details survey questions

County solid waste collection system

Are all solid waste generators, including farmers, prohibited by county ordinance or county board resolution from:

1. Burying or dumping household wastes on-site (y/n)
2. Burning household wastes on-site (y/n)
3. # of site for self-hauling of MSW
4. Does the county provide MSW collection curbside via an organized collection system (contracted system paid through property taxes or utility bills)? (y/n)
5. How many cities provide curbside MSW collection via an organized collection system?
6. How many cities have open collection systems where residents choose their hauler and pay them directly for MSW collection?

Solid waste hauler licensing (Minn. Stat. § 115A.93)

7. All solid waste haulers licensed by the county?
8. Are all solid waste haulers who are not licensed by the county licensed by cities or towns?
9. Does your solid waste ordinance/licenses require variable-rate pricing structure for haulers (Minn. Stat. § 115A.9301 subd.2)?
10. Does the county apply a surcharge (Minn. Stat. § 115A.919, subd. 2) in addition to the tip fee to waste disposed in the county?
11. \$ Per Ton
12. \$ Per Cubic Yard
13. \$ Per Ton
14. \$ Per Cubic Yard
15. Does the county charge a service fee (i.e. line item on property tax or utility bill) to residents and/or businesses?
16. % Residential:
17. % Business:
18. Can you provide the following revenue details (E.g. Revenue generated by Service Fees)?
19. What is the total revenue generated from service fees charged to residents and businesses?
20. What is the total revenue generated from service fees charged to residents?
21. What is the total revenue generated from service fees charged to businesses?
22. How many cities have curbside recycling collection via an organized collection system run by either the county or the city?
23. How many cities have open collection systems where residents choose their hauler and pay them directly for curbside recycling collection?
24. Estimate the population served by residential curbside recycling programs.

25. Do all cities in your county with a population greater than 20,000 (cities greater than 5,000 in metropolitan counties) provide curbside recycling to residents?
26. Do all cities in your county with a population greater than 5,000 provide curbside recycling and/or recycling center to residents?
27. Does the county have a specific program to promote commercial/institutional/industrial (C/I/I) recycling?
28. How many recycling centers are there in the county?
29. How many recycling drop sites are there in the county?
30. Has the county banned any recyclable material from landfills or the disposal system?
31. Please identify grades of banned material (e.g., aluminum, plastic, corrugated). Do not include materials banned by state law.
32. Has the county enacted an ordinance requiring residents to recycle?
33. When was this ordinance enacted?
34. How many cities in the county have ordinances requiring residents to recycle?
35. Has the county enacted an ordinance requiring businesses to recycle?
36. When was this ordinance enacted?
37. How many cities in the county have ordinances requiring businesses to recycle?
38. Has the county enacted an ordinance requiring haulers to provide recycling collection services?
39. When was this ordinance enacted?
40. How many cities in the county have ordinances requiring haulers to provide recycling collection services?
41. Has the county enacted an ordinance requiring designation to a facility?
42. When was this ordinance enacted?
43. How many cities in the county have ordinances requiring designation to a facility (Minn. Stat. § 115A.8-893)?
44. Does the county license recycling collectors?
45. Does the county require recycling collectors to submit tonnage reports?
46. Do businesses in the county have access to organics recycling (composting, food-to-livestock, food-to-people)?
47. What types of programs are available (check all that apply)?
48. How many yard waste drop-off sites are there in the county?
49. How many SSOM drop-off sites are there in the county?
50. How many yard waste only compost facilities are there in the county?
51. How many SSOM or MSW compost facilities are there in the county?
52. How many yard waste curbside collection programs are there in the county?
53. How many cities offer curbside SSOM collection via an organized collection system run by either the county or the city?
54. How many cities have open collection systems where residents choose their hauler and pay them directly for curbside SSOM collection?
55. Estimate the households served by yard waste curbside collection programs.
56. Estimate the households served by SSOM curbside collection programs.

57. Does the county have an ongoing education program to inform residents how to minimize organic waste generation through on-site composting, mulching and/or low-maintenance or naturalized landscaping?
58. Does the county have an ongoing education program to inform residents how to manage organic wastes through drop-off sites or curbside collection?
59. Has the county informed residents of the prohibition on land disposal of yard waste?
60. Has the county enacted any ordinances specifically requiring compost or any percentage of compost be used in county projects?
 - Date Enacted:
 - Please list the requirements:
 - Does the county know of any cities within the county that have such requirements?
 - Please list the requirements:
61. Does your county have a sustainable purchasing policy? Which products/services does it cover?
62. During this reporting period, has the county incorporated sustainability criteria, such as energy efficiency, waste reduction, or use of 3rd party certifications, into any of its bid requests?
63. Please specify which request for bids included environmental specifications (i.e. cleaning products, office paper, etc.)
64. Does the county utilize the State's Cooperative Purchasing Venture to purchase products on State contracts?
65. How much money did the county spend on procurement of products and services this year?
66. How much money did the county spend on sustainable products, like recycled paper and products with 3rd party certifications?
67. The MPCA hosts quarterly virtual networking meetings focused on sustainable purchasing.
68. Please provide the contact information for county staff involved in procuring goods and services who might be interested in attending these meetings.

Appendix D – Facility List

The following facilities (as shown in Table 50) were included in this report to evaluate existing infrastructure that would be impacted by the Packaging Waste and Cost Reduction Act. These are reported in this table based on their solid waste permit and include how they were categorized in this report. Note that many of the facility names are not reflective of the brand or site name commonly known or used. Information on the methodology to identify these facilities is listed in Appendix A.

Table 49. List of facilities.

Facility name	Solid waste permit number	EPR packaging region	City	County	Infrastructure needs assessment categories
101 Transfer Facility	SW-672	Metro Region	Shakopee	Scott	Transfer, Recycling
Ace Solid Waste Inc - Ramsey	SW-668	Metro Region	Ramsey	Anoka	Transfer
Advanced Disposal Vasko Saint Paul Transfer Station	SW-574	Metro Region	Saint Paul	Ramsey	Transfer
Aitkin County Recycling Center	PBR000598	Northeast Region	Aitkin	Aitkin	Recycling
Albert Lea Landfill	PBR000350	Southeast Region	Albert Lea	Freeborn	Transfer
Allied Waste Recycler	SW-358	Metro Region	Inver Grove Heights	Dakota	Transfer, Recycling
Allied Waste Services Inc	PBR000833	Metro Region	Minneapolis	Hennepin	Recycling
Alpha Container Services & Recycling	PBR000347	Metro Region	Rosemount	Dakota	Transfer, Recycling
AMG - Alliance LLC	PBR000952	Metro Region	Saint Paul	Ramsey	Recycling
Anoka Recycling & Disposal Center	PBR001132	Metro Region	Anoka	Anoka	Transfer
Arrowhead Recycling Center	PBR000606	Northeast Region	Two Harbors	Lake	Recycling
Aurora (Hudson) Transfer Station	SW-348	Northeast Region	Aurora	St. Louis	Transfer, Recycling
Austin Transfer Station	SW-222	Southeast Region	Austin	Mower	Transfer
B&R Auto & Truck Salvage Inc	PBR001062	Southeast Region	Mapleton	Blue Earth	Recycling
Battle Lake Transfer Station	PBR000341	Northwest Region	Battle Lake	Otter Tail	Transfer
Becker County Highway Outshop & Waste	PBR000881	Northwest Region	Osage	Becker	Transfer
Becker County Solid Waste Management Facility	SW-311	Northwest Region	Detroit Lakes	Becker	Transfer, Recycling
Bemidji Transfer Station	SW-587	Northwest Region	Bemidji	Beltrami	Transfer

Facility name	Solid waste permit number	EPR packaging region	City	County	Infrastructure needs assessment categories
Berwald Roofing Co Inc	PBR001153	Metro Region	North Saint Paul	Ramsey	Transfer
BFI Waste Systems of North America LLC	SW-45	Metro Region	Inver Grove Heights	Dakota	Transfer, Commercial Composting
Birch Lake Township Transfer PBR	PBR000404	North Central Region	Walker	Cass	Transfer
Blackduck Transfer Station	SW-529	Northeast Region	Blackduck	Itasca	Transfer
Blaine Transfer	SW-582	Metro Region	Blaine	Anoka	Transfer
Broadway Resource Recovery C&D Recycling Facility	SW-596	Metro Region	Minneapolis	Hennepin	Transfer, Recycling
Brooklyn Park Transfer Station and Recycling Center	SW-344	Metro Region	Brooklyn Park	Hennepin	Transfer, Recycling
Brookston Transfer Station	SW-346	Northeast Region	Brookston	St. Louis	Transfer, Recycling
Buckingham Trucking Inc dba Buckingham Co	PBR000599	Metro Region	Prior Lake	Scott	Transfer, Recycling
Bueckers City Sanitation Services	SW-335	North Central Region	Sauk Centre	Stearns	Transfer
Bueckers Recycling Services Inc	PBR000492	North Central Region	Melrose	Stearns	Transfer
Bunker Hills Compost Site	PBR000614	Metro Region	Coon Rapids	Anoka	Transfer
Burnsville Sanitary Landfill	SW-56	Metro Region	Burnsville	Dakota	Transfer, Recycling
Camp Ripley WWTP	PBR000491	North Central Region	Little Falls	Morrison	Transfer, Recycling
Carlton County North Transfer Station	SW-295	Northeast Region	Carlton	Carlton	Transfer, Recycling
Cass County Transfer/Recycling Station	SW-419	North Central Region	Backus	Cass	Transfer, Recycling
Central Appliance Recyclers	PBR000909	North Central Region	Saint Cloud	Sherburne	Recycling
Clay County Landfill	SW-34	Northwest Region	Hawley	Clay	Transfer, Recycling
Clay County Resource Recovery Campus	SW-674	Northwest Region	Moorhead	Clay	Transfer, Recycling
Clearwater County Demolition Debris Land Disposal	SW-168	Northwest Region	Bagley	Clearwater	Transfer, Recycling
Commercial Container Mpls Recyc/Transfer	SW-616	Metro Region	Minneapolis	Hennepin	Transfer

Facility name	Solid waste permit number	EPR packaging region	City	County	Infrastructure needs assessment categories
Cook County Hovland Transfer Station	PBR001458	Northeast Region	Hovland	Cook	Transfer
Cook Transfer Station	SW-347	Northeast Region	Cook	St. Louis	Transfer, Recycling
Coon Rapids city of	PBR001007	Metro Region	Coon Rapids	Anoka	Recycling
Cottonwood County Sanitary Landfill	SW-143	Southwest Region	Windom	Cottonwood	Transfer
Countryside Sanitation LLC	PBR000421	Northeast Region	McGregor	Aitkin	Transfer
Crosslake Roll-Off	SW-725	North Central Region	Crosby	Crow Wing	Transfer
Crow Wing County Landfill	SW-376	North Central Region	Brainerd	Crow Wing	Recycling
Dakota Area Transfer, Inc	SW-729	Metro Region	Empire	Dakota	Transfer
Danny's Disposal Transfer/Recycling	SW-610	North Central Region	Melrose	Stearns	Transfer
Dayton Transfer Station	PBR001457	Metro Region	Dayton	Hennepin	Transfer
Dem-Con Blaine	SW-592	Metro Region	Blaine	Anoka	Transfer, Recycling
Dem-Con Materials Recovery Facility	PBR001011	Metro Region	Shakopee	Scott	Recycling
Dem-Con Recovery & Recycling LLC	SW-555	Metro Region	Shakopee	Scott	Transfer, Recycling
DeVine Enterprises Inc dba Demolicious	SW-577	Northeast Region	Duluth	St. Louis	Transfer, Recycling
Dodge County Transfer Station	SW-302	Southeast Region	Kasson	Dodge	Transfer, Recycling
East Bethel Recycling Center city of	PBR001382	Metro Region	East Bethel	Anoka	Recycling
East Central Sanitary Landfill	SW-17	North Central Region	Mora	Kanabec	Recycling
East Side Transfer and Recycling	PBR001354	North Central Region	St. Cloud	Benton	Transfer
ECC - Hinckley Transfer Station	SW-401	North Central Region	Hinckley	Pine	Transfer, Recycling
ECSWC Cambridge Transfer Station	SW-400	North Central Region	Cambridge	Isanti	Transfer
Eden Prairie Transfer Station	SW-597	Metro Region	Eden Prairie	Scott	Transfer
Elk River Landfill	SW-74	North Central Region	Elk River	Sherburne	Transfer, Recycling

Facility name	Solid waste permit number	EPR packaging region	City	County	Infrastructure needs assessment categories
Empire MSW Processing & SSOM Compost Facility	SW-601	Metro Region	Rosemount	Dakota	Transfer, Commercial Composting
Eureka Recycling	PBR000616	Metro Region	Minneapolis	Hennepin	Recycling
Express Metals	PBR001095	Metro Region	Hopkins	Hennepin	Recycling
Fergus Falls South Landfill	SW-572	Northwest Region	Fergus Falls	Otter Tail	Transfer
Fergus Falls Transfer Station	SW-624	Northwest Region	Fergus Falls	Otter Tail	Transfer, Recycling
Fillmore County Resource Recovery Center	SW-322	Southeast Region	Preston	Fillmore	Transfer
Freeway Transfer Station	SW-354	Metro Region	Burnsville	Dakota	Transfer, Recycling
Friend's Recycling LLC	PBR001087	Northeast Region	International Falls	Koochiching	Recycling
Garrison Disposal Co	SW-384	Northeast Region	Aitkin	Aitkin	Transfer
Gene's Disposal Service Inc	PBR001092	Metro Region	Hugo	Washington	Transfer
Glenwood Demolition Disposal LLC	SW-408	Northwest Region	Glenwood	Pope	Transfer
Goodhue County Recycling Center	PBR000607	Southeast Region	Red Wing	Goodhue	Recycling
Greenday Rolloff Service Inc	PBR001432	North Central Region	Brainerd	Crow Wing	Transfer
Hansen Recycling & Transfer Station	SW-649	Southeast Region	Kasota	Le Sueur	Transfer, Recycling
Hartel's Disposal - Recycle Center	PBR000983	Northeast Region	Proctor	St. Louis	Recycling
Hartel's Disposal LLC	PBR001219	Northeast Region	Proctor	St. Louis	Transfer
Harter's of Lacrosse	Not Applicable	Nearby State	La Crosse	La Crosse	Recycling
Hengel Ready Mix & Construction Inc	SW-291	North Central Region	Pillager	Cass	Recycling
Henkemeyer Demolition Landfill	SW-188	North Central Region	Sauk Rapids	Benton	Recycling
Henning Transfer Station and Demolition Landfill	SW-395	Northwest Region	Henning	Otter Tail	Transfer
Hibbing Transfer Station	SW-455	Northeast Region	Hibbing	St. Louis	Transfer, Recycling
Hubbard County North Facility	SW-315	Northwest Region	Laporte	Hubbard	Transfer, Recycling

Facility name	Solid waste permit number	EPR packaging region	City	County	Infrastructure needs assessment categories
Hubbard County South Facility	SW-318	Northwest Region	Park Rapids	Hubbard	Transfer, Recycling
Hutchinson city of - Creekside Organic Material Processing Facility	SW-569	Southwest Region	Hutchinson	McLeod	Transfer, Commercial Composting
International Paper Recycling	PBR001346	Metro Region	Roseville	Ramsey	Recycling
Interstate Disposal Service LLC	PBR001434	Southeast Region	Wabasha	Wabasha	Transfer
Itasca County Demolition Landfill/MSW Transfer Station	SW-448	Northeast Region	spans multiple cities	Itasca	Transfer, Recycling
J&J Recycling	PBR000887	Metro Region	Saint Paul	Ramsey	Transfer
John's Sanitary Removal Transfer Station	SW-571	Northeast Region	Silver Bay	Lake	Transfer
Jordan Yard Waste Collection Site	PBR001360	Metro Region	Jordan	Scott	Transfer
Keith Krupenny & Son Disposal Service	SW-579	Metro Region	Saint Paul	Ramsey	Transfer
Koochiching Co - Mizpah Canister Site	PBR000413	Northeast Region	International Falls	Koochiching	Transfer
Koochiching County Big Falls Demolition Landfill	SW-450	Northeast Region	Big Falls	Koochiching	Transfer, Recycling
Koochiching Recycling & Transfer	SW-550	Northeast Region	International Falls	Koochiching	Transfer
L & D Recycling Inc	PBR001026	Southeast Region	West Concord	Dodge	Recycling
LabUSA's Ash Processing Facility - Red Wing	SW-670	Southeast Region	Red Wing	Goodhue	Transfer
Lac qui Parle County Special Item Recycling Site	PBR001416	Southwest Region	Madison	Lac Qui Parle	Transfer, Recycling
Lake City Recycling and Disposal Transfer Station	SW-523	Southeast Region	Lake City	Wabasha	Transfer, Recycling
Lake County Demolition Landfill	SW-398	Northeast Region	spans multiple cities	Lake	Recycling
Lake State Recycling	PBR001371	North Central Region	Elk River	Sherburne	Recycling
LePage & Sons	PBR001192	Metro Region	Bethel	Anoka	Transfer
Les's Sanitation Inc	SW-628	Northwest Region	Thief River Falls	Norman	Transfer, Recycling
Lincoln County Transfer Station	PBR000447	Southwest Region	Ivanhoe	Lincoln	Transfer, Recycling

Facility name	Solid waste permit number	EPR packaging region	City	County	Infrastructure needs assessment categories
LJP North Mankato Transfer Station	SW-653	Southeast Region	North Mankato	Nicollet	Transfer, Recycling
Lloyd's Construction Services Inc Transfer	SW-445	Metro Region	Savage	Scott	Transfer
LRS - Goodview Transfer Center	SW-651	Southeast Region	Winona	Winona	Transfer
LRS - Stewartville Station and Recycling Facility	SW-623	Southeast Region	Stewartville	Olmsted	Transfer
Lyon County Sanitary Landfill	SW-23	Southwest Region	Lynd	Lyon	Transfer, Recycling
Mar-Kit Landfill Board	SW-92	Northwest Region	Hallock	Kittson	Recycling
Matejka Recycling Inc dba Red Box	SW-608	Southeast Region	Winona	Winona	Transfer, Recycling
Maximum Recycling LLC	PBR001124	Metro Region	Rogers	Hennepin	Recycling
McGregor Transfer Station	PBR000402	Northeast Region	McGregor	Aitkin	Transfer
McLeod County Solid Waste Management	PBR000593	Southwest Region	Hutchinson	McLeod	Recycling
Meeker County Demolition Landfill and Transfer Station	SW-486	Southwest Region	Litchfield	Meeker	Transfer, Recycling
Millenium Recycling	Not Applicable	Nearby State	Sioux Falls	Minnehaha	Recycling
Minden Transfer Station	SW-588	North Central Region	Saint Cloud	Sherburne	Transfer
MinnKota	Not Applicable	Nearby State	Grand Forks	Grand Forks	Recycling
Morrison County Sanitary Landfill	SW-15	North Central Region	Little Falls	Morrison	Recycling
Mower County Recycling Center	PBR000584	Southeast Region	Austin	Mower	Recycling
Murray County Demo Debris Landfill	SW-451	Southwest Region	Slayton	Murray	Transfer, Recycling
Murray County Recycling	PBR000597	Southwest Region	Slayton	Murray	Recycling
MWPC Mankato Transfer Station	SW-452	Southeast Region	Mankato	Blue Earth	Transfer
NE Otter Tail Phase II Ash & Demo Landfill	SW-544	Northwest Region	New York Mills	Otter Tail	Transfer
Nisswa Sanitation	PBR001454	North Central Region	Brainerd	Crow Wing	Transfer

Facility name	Solid waste permit number	EPR packaging region	City	County	Infrastructure needs assessment categories
Nordstrom's Solid Waste Transfer Station	SW-351	Northeast Region	Moose Lake	Carlton	Transfer
Norman County Demolition Landfill	SW-332	Northwest Region	Gary	Norman	Transfer
Norm's Demolicious of Duluth Inc	SW-654	Northeast Region	Duluth	St. Louis	Transfer
North Pine County HHW Program	PBR001336	North Central Region	Willow River	Pine	Transfer
North Shore Waste	PBR000422	Northeast Region	Grand Marais	Cook	Transfer
Northern Metal Recycling	PBR000497	North Central Region	Saint Cloud	Benton	Transfer
Northwest Angle SW Transfer Station	PBR000369	Northwest Region	Angle Inlet	Lake Of The Woods	Transfer
Northwoods Transfer Station	SW-349	Northeast Region	Ely	St. Louis	Transfer, Recycling
Olmsted County Kalmar Landfill	SW-355	Southeast Region	Rochester	Olmsted	Recycling
Olmsted County Recycling Center Plus	PBR001369	Southeast Region	Rochester	Olmsted	Transfer, Recycling
Olson Sanitation LLC	PBR000398	Southwest Region	Dawson	Lac Qui Parle	Transfer
OTI Inc Yard Waste and SSOM Facility	PBR001401	Metro Region	Shakopee	Scott	Transfer
Otter Tail County	PBR000600	Northwest Region	Fergus Falls	Otter Tail	Recycling
Parkers Prairie Transfer Station PBR	PBR000342	Northwest Region	Parkers Prairie	Otter Tail	Transfer
Pelican Rapids Transfer Station PBR	PBR000340	Northwest Region	Pelican Rapids	Otter Tail	Transfer
Pennington County Transfer	SW-285	Northwest Region	Thief River Falls	Pennington	Transfer
Polk County Sanitary Landfill	SW-124	Northwest Region	Crookston	Polk	Recycling, Commercial Composting
Polk County Solid Waste Facility	SW-640	Northwest Region	Fosston	Polk	Transfer, Recycling
Polk County Transfer Station	SW-327	Northwest Region	Crookston	Polk	Transfer
Ponderosa Sanitary Landfill	SW-87	Southeast Region	Mankato	Blue Earth	Transfer
Pope/Douglas Ash Landfill	SW-410	Northwest Region	Hoffman	Douglas	Transfer, Recycling, Commercial Composting

Facility name	Solid waste permit number	EPR packaging region	City	County	Infrastructure needs assessment categories
Pope/Douglas Solid Waste Management	SW-642	Northwest Region	Alexandria	Douglas	Transfer, Recycling
Python's of St Cloud Inc	PBR000608	North Central Region	Saint Cloud	Benton	Recycling
Ramsey Cty Arden Hills Yard Waste	PBR000653	Metro Region	Arden Hills	Ramsey	Transfer
Randy's Sanitation Inc	SW-578	North Central Region	Delano	Wright	Transfer
Ray Anderson & Sons Co Inc	SW-586	Metro Region	Saint Paul	Ramsey	Transfer, Recycling
Recycle Minnesota LLC	SW-678	Metro Region	Lakeville	Dakota	Transfer, Recycling
Recycling and Energy Center	SW-286	Metro Region	Newport	Washington	Transfer, Recycling
Red Lake County Demolition Landfill	SW-331	Northwest Region	Red Lake Falls	Red Lake	Recycling
Red Wing Solid Waste Campus	SW-661	Southeast Region	Red Wing	Goodhue	Transfer, Recycling
Redwood/Renville Counties MRF/Transfer Station	SW-664	Southwest Region	Redwood Falls	Redwood	Transfer, Recycling
Rice County Landfill	SW-123	Southeast Region	Dundas	Rice	Transfer, Recycling
Rice Creek Compost Site	PBR001191	Metro Region	spans multiple cities	Anoka	Transfer
River View Sanitation	PBR000577	Southeast Region	New Ulm	Brown	Recycling
Riverbend Recycling Center	PBR001197	Southeast Region	Mankato	Nicollet	Transfer
Rock County Transfer Station	PBR000345	Southwest Region	Luverne	Rock	Transfer
Roseau County SW Transfer Facility/Demolition Landfill	SW-518	Northwest Region	Salol	Roseau	Transfer, Recycling
Saint Louis County Regional Landfill	SW-405	Northeast Region	Virginia	St. Louis	Transfer, Recycling
Saint Louis County Solid Waste Canister Sites	SW-481	Northeast Region	Virginia	St. Louis	Transfer, Recycling
Schaap Sanitation & Recycling	PBR000591	Southwest Region	Worthington	Nobles	Recycling
Scrapbusters	PBR001086	Metro Region	Shakopee	Scott	Transfer, Recycling
Shakopee Mdewakanton Sioux Community Organic Recycling Facility	SW-721	Metro Region	Shakopee	Scott	Commercial Composting

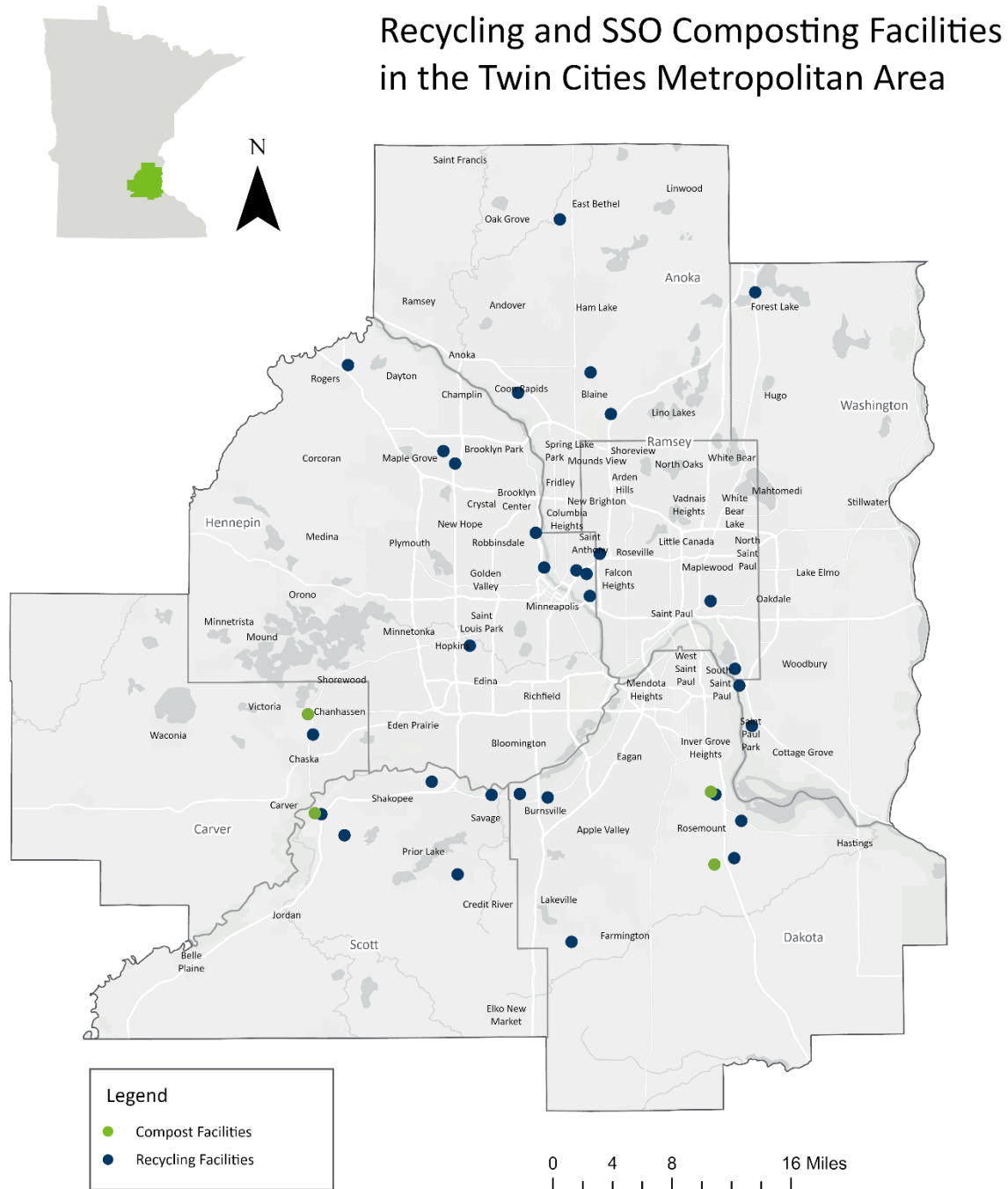
Facility name	Solid waste permit number	EPR packaging region	City	County	Infrastructure needs assessment categories
SKB Lansing Landfill	SW-514	Southeast Region	Austin	Mower	Recycling
SKB Malcolm Avenue Transfer Station	SW-525	Metro Region	Minneapolis	Hennepin	Transfer, Recycling
SKB Rosemount Industrial Waste Facility	SW-383	Metro Region	Rosemount	Dakota	Transfer, Recycling
SKB Transfer Station	SW-618	Metro Region	Blaine	Anoka	Transfer, Recycling
Slagle Demolition Landfill	SW-489	North Central Region	Remer	Cass	Transfer
South Pine Transfer Station	PBR000516	North Central Region	Pine City	Pine	Transfer
Spruce Ridge Resource Management Facility	SW-6	Southwest Region	Glencoe	McLeod	Transfer
SRC Inc Transfer Station	SW-609	North Central Region	Wyoming	Chisago	Transfer, Recycling
St Louis County Recycling Processing Facility	PBR000609	Northeast Region	Virginia	St. Louis	Recycling
State Special Waste Facility - Truman	SW-357	Southeast Region	Truman	Martin	Recycling
State Specialty Waste Facility - Chaska	PBR001142	Metro Region	Chaska	Carver	Recycling
Steele County Sanitary Landfill	SW-131	Southeast Region	Bloomington	Steele	Transfer, Recycling
Stericycle Specialty Waste Solutions Inc	PBR000367	Metro Region	Blaine	Anoka	Transfer
Stevens County Demolition and Transfer Station	SW-508	Northwest Region	Morris	Stevens	Transfer, Recycling
Swift County Compost/Recycling Facility	SW-375	Southwest Region	Benson	Swift	Transfer
TC Lighting Supplies and Recycling Inc	PBR001388	Northwest Region	Bemidji	Beltrami	Transfer
Tennis Sanitation LLC	PBR001285	Metro Region	Saint Paul Park	Washington	Recycling
Thompson Sanitation Inc	PBR000933	Southeast Region	Clarks Grove	Freeborn	Transfer
TK Demolition Disposal, LLC	SW-333	North Central Region	Cold Spring	Stearns	Transfer, Commercial Composting
Todd County Solid Waste	SW-321	Northwest Region	Browerville	Todd	Transfer
Tofte Transfer Station PBR	PBR000426	Northeast Region	Tofte	Cook	Transfer
Tom's Refuse	PBR000486	North Central Region	Melrose	Stearns	Transfer, Recycling

Facility name	Solid waste permit number	EPR packaging region	City	County	Infrastructure needs assessment categories
Tostenson Transfer Station	SW-458	Southwest Region	Montevideo	Chippewa	Transfer, Recycling
Tri-County Organics	SW-671	North Central Region	Saint Cloud	Benton	Commercial Composting
Trout Demolition Debris Land Disposal	SW-603	Northeast Region	Grand Rapids	Itasca	Recycling
Twin City Refuse Recycling & Transfer	SW-107	Metro Region	Saint Paul	Ramsey	Transfer
Twin Ports Trailer Trash	PBR001405	Northeast Region	Duluth	St. Louis	Transfer
Twin Ports Trailer Trash	PBR001437	Northeast Region	Duluth	St. Louis	Transfer
Univar Solutions USA Inc	PBR001319	Metro Region	Shakopee	Scott	Transfer
University of MN - Landscape Arboretum	SW-677	Metro Region	Chanhassen	Carver	Commercial Composting
Utopia Soils LLC	SW-722	Northwest Region	Garfield	Douglas	Commercial Composting
Valicor Environmental Services LLC	SW-726	Metro Region	Roseville	Ramsey	Transfer
Veit & Company LLC	SW-580	North Central Region	spans multiple cities	Sherburne	Transfer, Recycling, Commercial Composting
Veit Container & Transfer Facility-Mpls	SW-439	Metro Region	Minneapolis	Hennepin	Transfer
Veit Disposal Systems	SW-516	Southeast Region	Rochester	Olmsted	Transfer
Veit Disposal Systems Austin Transfer Station	PBR001100	Southeast Region	Austin	Mower	Transfer
Vonco V Duluth LLC	SW-536	Northeast Region	Duluth	St. Louis	Transfer, Recycling
Wadena County Solid Waste Facility	SW-317	Northwest Region	Wadena	Wadena	Transfer, Recycling
Walters Recycling & Refuse Transfer Station	SW-663	Metro Region	Blaine	Anoka	Transfer
Waseca County Recycling Center	PBR000897	Southeast Region	Waseca	Waseca	Transfer, Recycling
Washington County Yard Waste Transfer	PBR001345	Metro Region	Hugo	Washington	Transfer
Waste Management - Baxter Transfer Station	PBR000407	North Central Region	Baxter	Crow Wing	Transfer
Waste Management - Clarks Grove Transfer Station	SW-391	Southeast Region	Clarks Grove	Freeborn	Transfer

Facility name	Solid waste permit number	EPR packaging region	City	County	Infrastructure needs assessment categories
Waste Management - Marshall Transfer Station	PBR000595	Southwest Region	Marshall	Lyon	Transfer
Waste Management - Ortonville	SW-498	Southwest Region	Ortonville	Big Stone	Transfer
Waste Management - Saint Cloud Transfer Station	SW-235	North Central Region	Saint Cloud	Benton	Transfer
Waste Management - Twin Cities Transfer Station	SW-41	Metro Region	Minneapolis	Hennepin	Transfer
Waste Management - Twin Cities Transfers - Savage	SW-476	Metro Region	Savage	Scott	Transfer, Recycling
Waste Management of Minnesota Inc - Maple Grove Transfer	SW-594	Metro Region	Maple Grove	Hennepin	Transfer, Recycling
Waste Management Recycle America LLC	PBR000589	Metro Region	Minneapolis	Hennepin	Recycling
Waste Management Rochester Transfer Station	SW-604	Southeast Region	Rochester	Olmsted	Transfer
Waste Partners Inc	PBR001322	North Central Region	Pine River	Cass	Recycling
Watson Recycling LLC	PBR001320	Southeast Region	Austin	Mower	Recycling
West Central Sanitation	SW-675	Northwest Region	Alexandria	Douglas	Transfer
West Central Station - Sauk Centre	PBR000494	North Central Region	Sauk Centre	Stearns	Transfer
West Central Transfer Station - Willmar	SW-552	Southwest Region	Willmar	Kandiyohi	Transfer
Western Lake Superior Sanitary District	SW-558	Northeast Region	Duluth	St. Louis	Commercial Compost, Transfer
Wilkin County Recycling Facility	PBR000610	Northwest Region	Breckenridge	Wilkin	Recycling
Winnick Supply Inc	PBR001229	Metro Region	Forest Lake	Washington	Recycling
Winona Transfer Station	SW-48	Southeast Region	Winona	Winona	Transfer
WLSSD Rice Lake Transfer Station	SW-591	Northeast Region	Duluth	St. Louis	Transfer, Recycling
WM Sauk Centre Transfer Station	SW-329	North Central Region	Sauk Centre	Stearns	Transfer
Xcel Energy - Allen S King Generating Plant	SW-647	Metro Region	Bayport	Washington	Transfer

Appendix E – Regional infrastructure maps

Figure 10. Recycling facilities and commercial composting facilities in TCMA, Minnesota.



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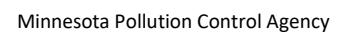


Figure 12. Recycling facilities and commercial composting facilities in Northeast Minnesota.

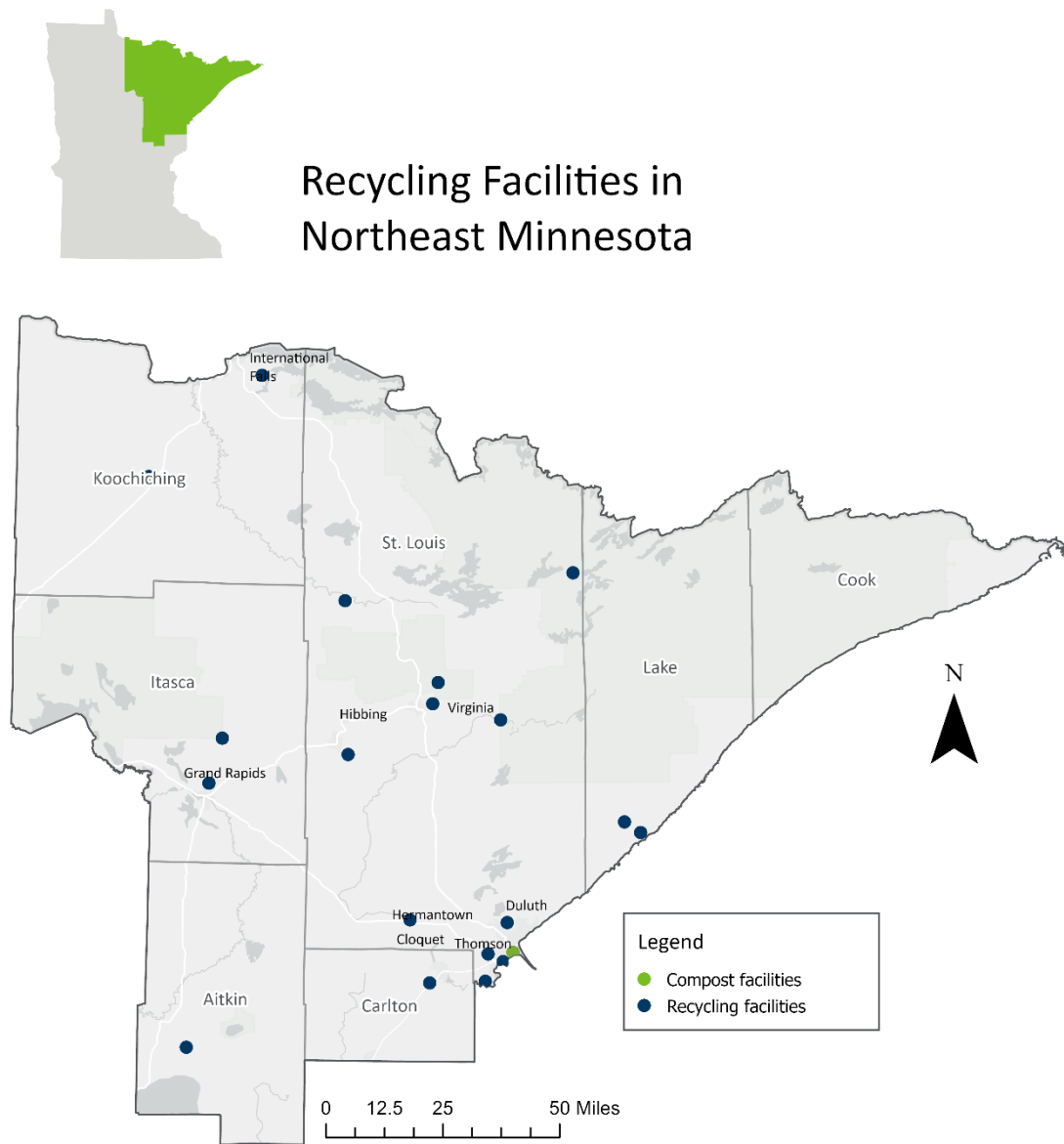


Figure 13. Transfer facilities in Northeast Minnesota.

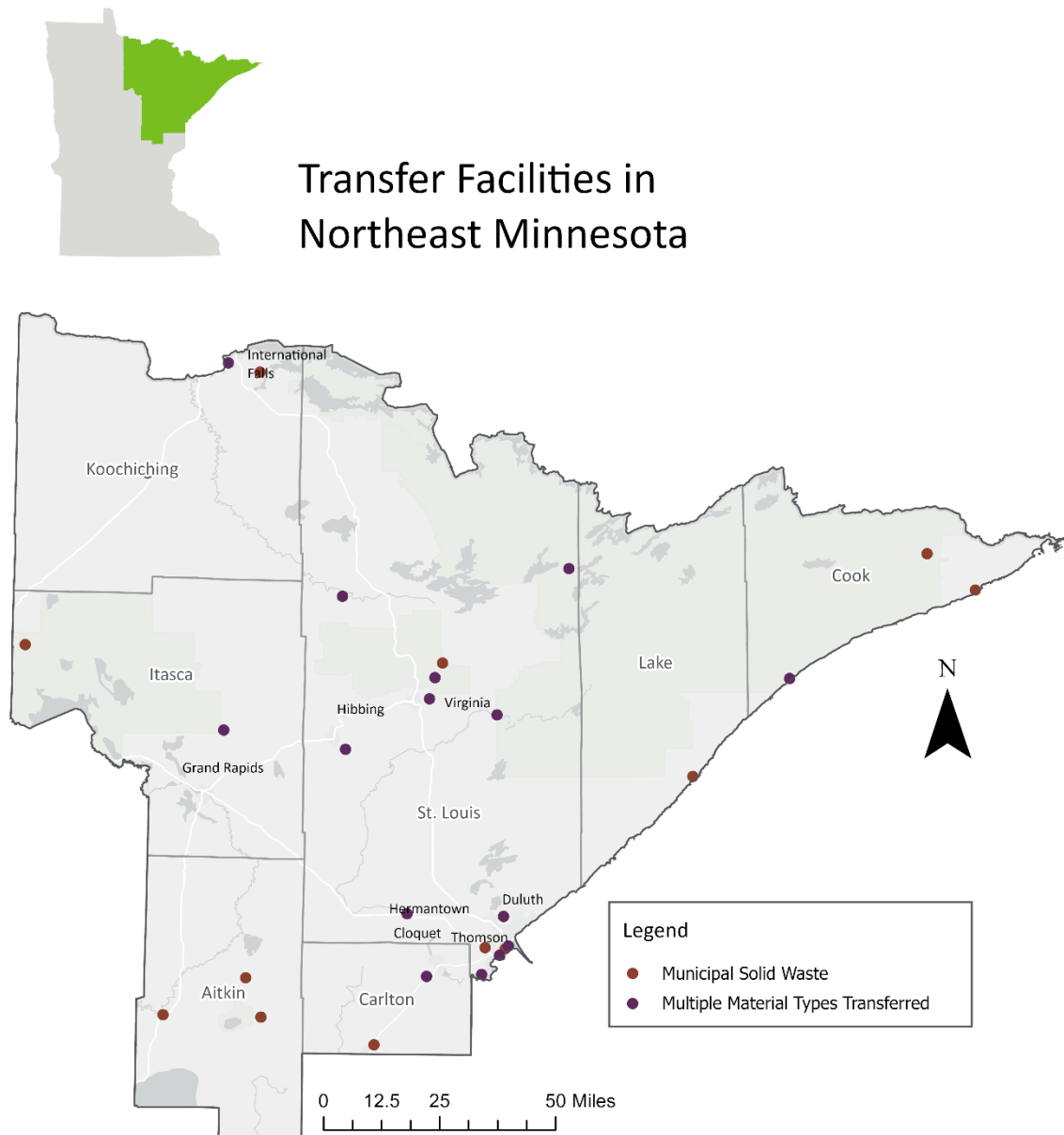
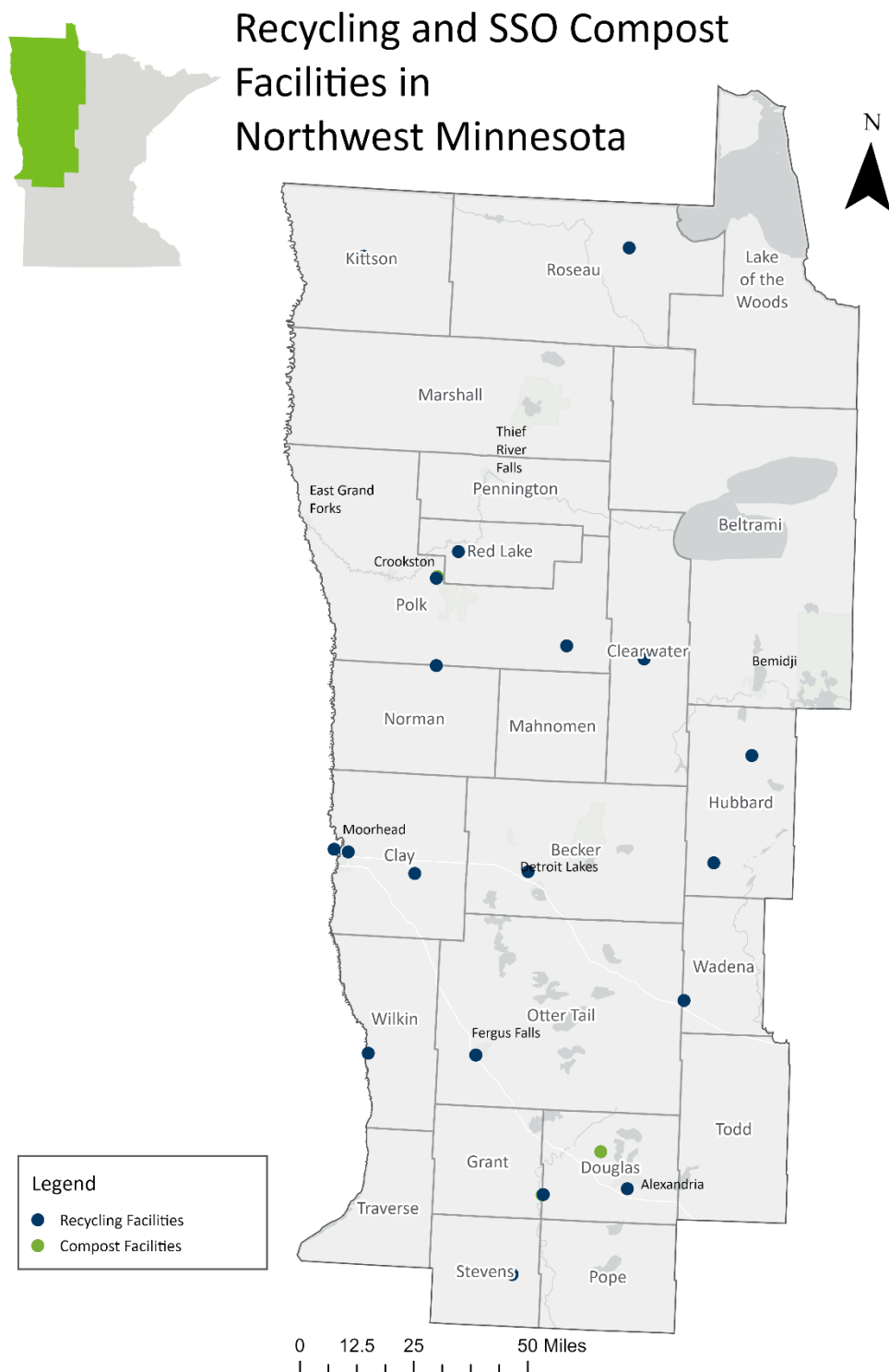


Figure 14. Recycling facilities and commercial composting facilities in Northwest Minnesota.



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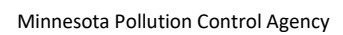


Figure 16. Recycling facilities and commercial composting facilities in North Central Minnesota.

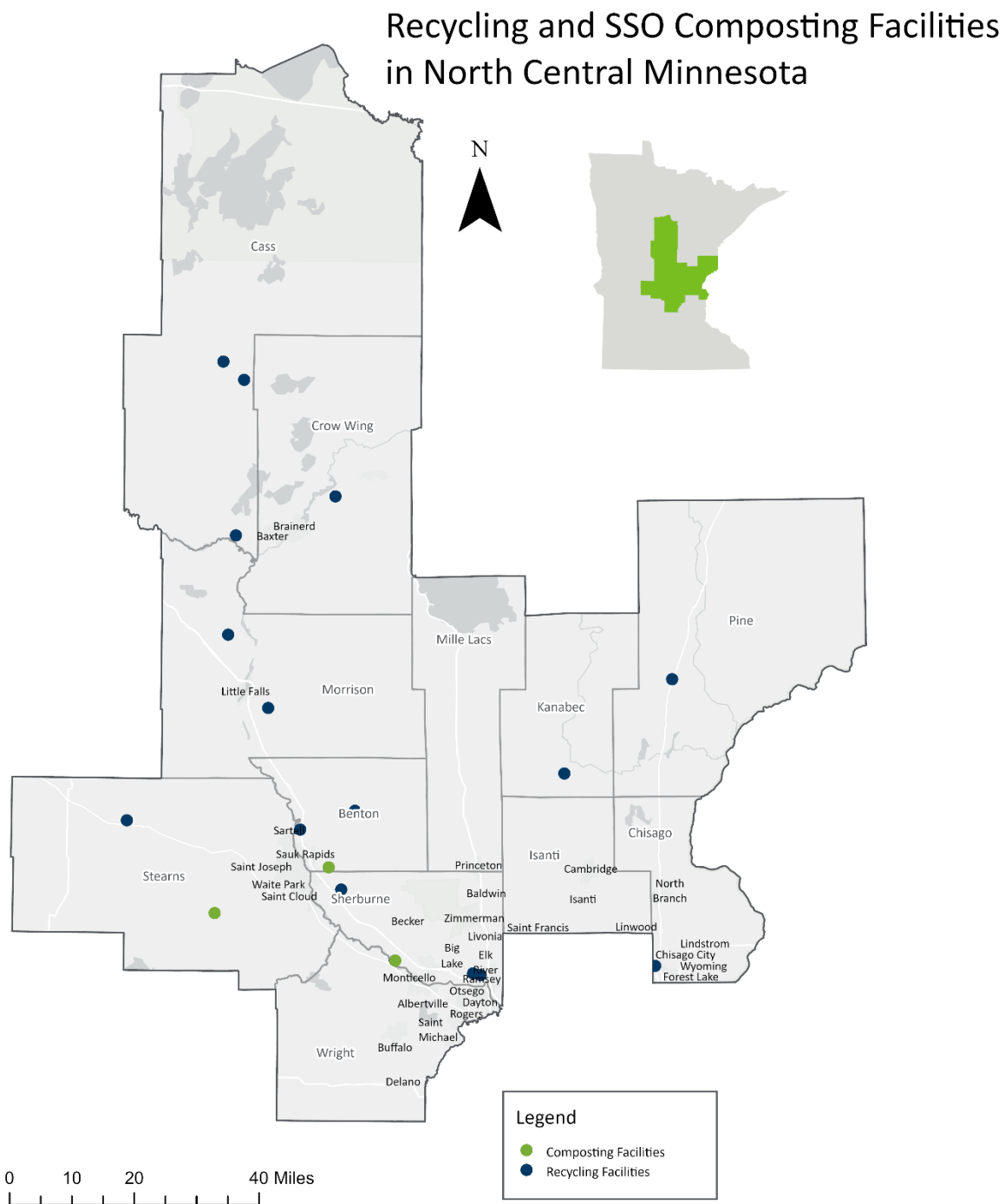


Figure 17. Transfer facilities in North Central Minnesota.

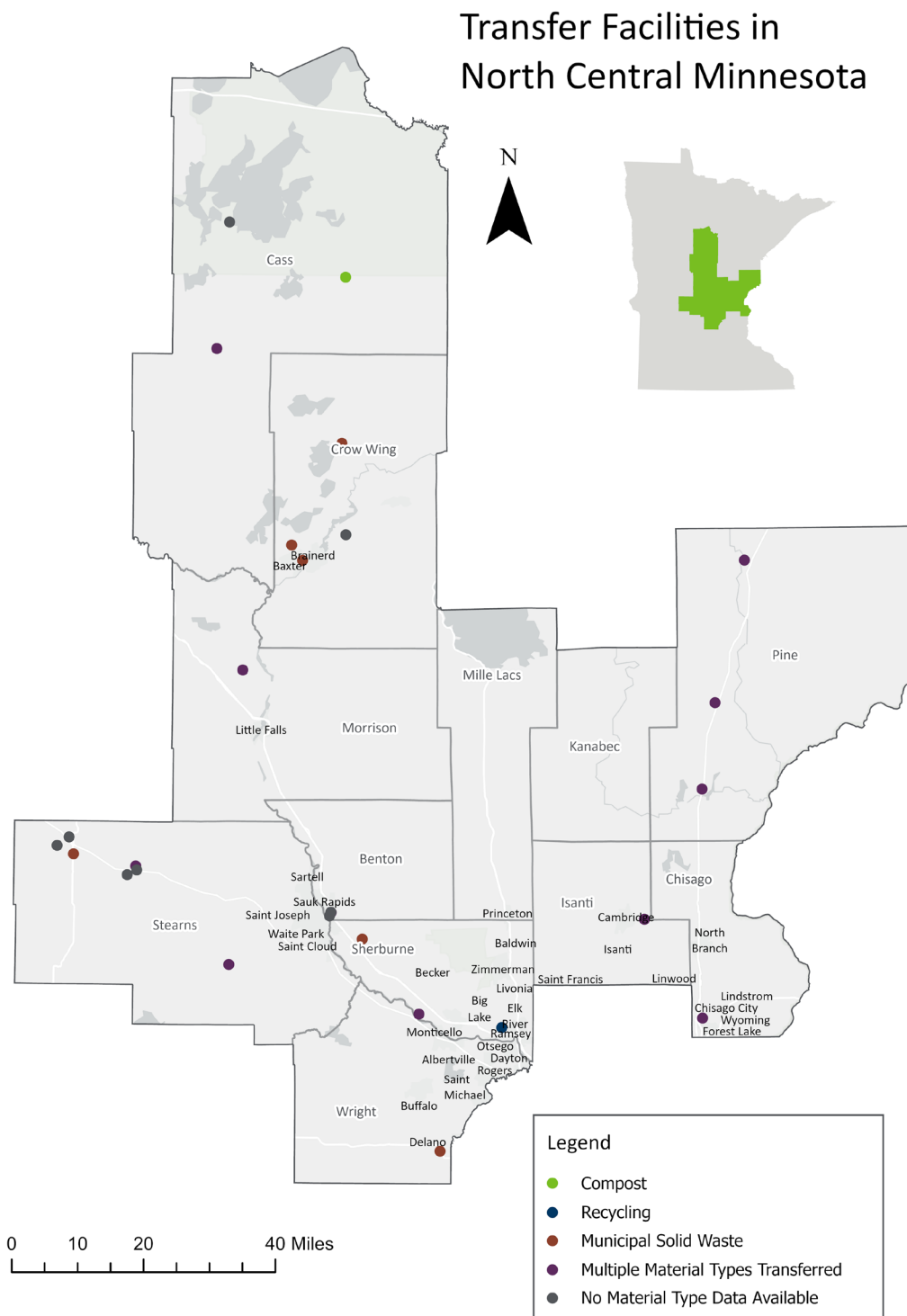


Figure 18. Recycling facilities and commercial composting facilities in Southwest Minnesota.

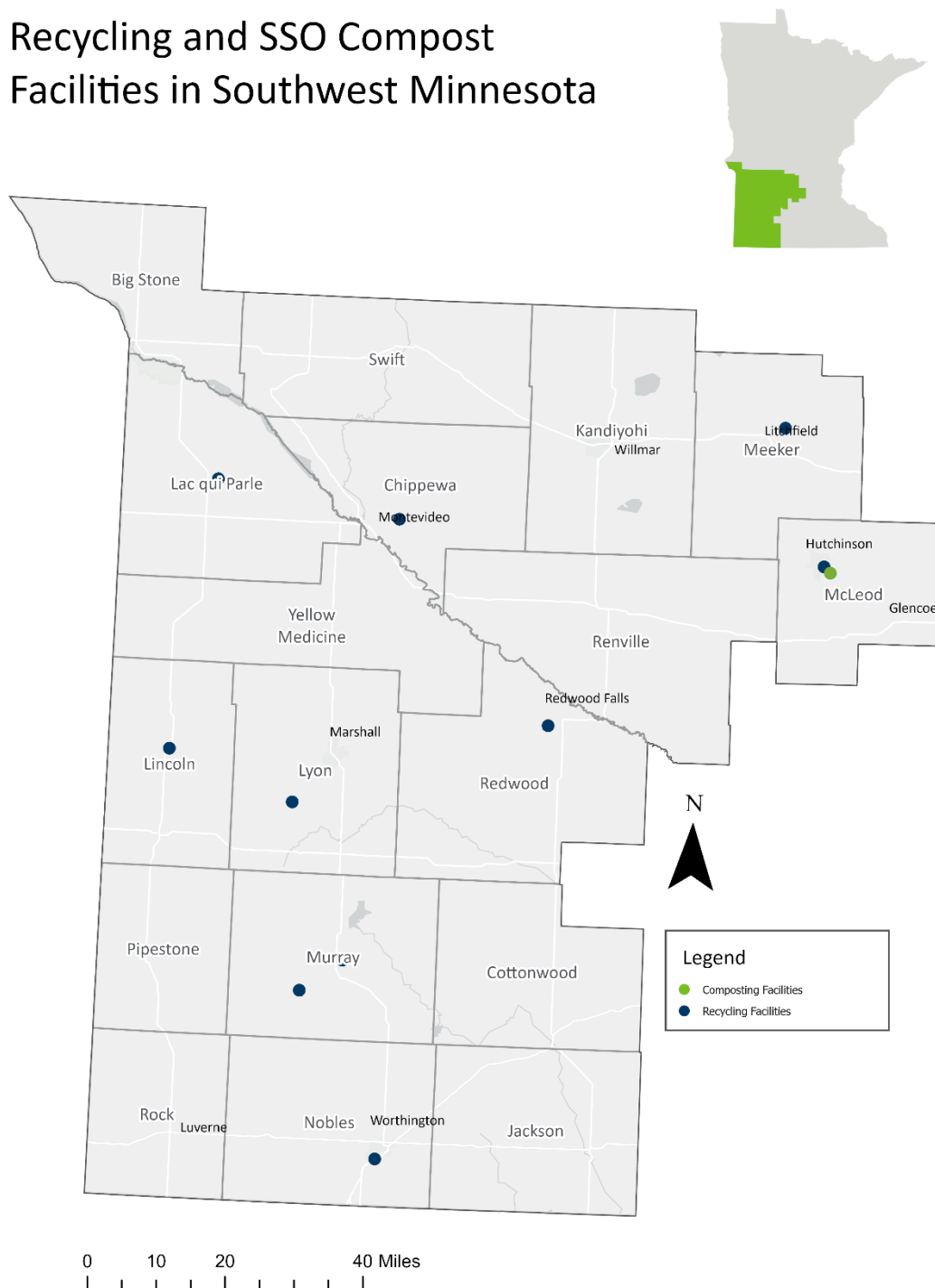


Figure 19. Transfer facilities in Southwest Minnesota.

Transfer Facilities in Southwest Minnesota

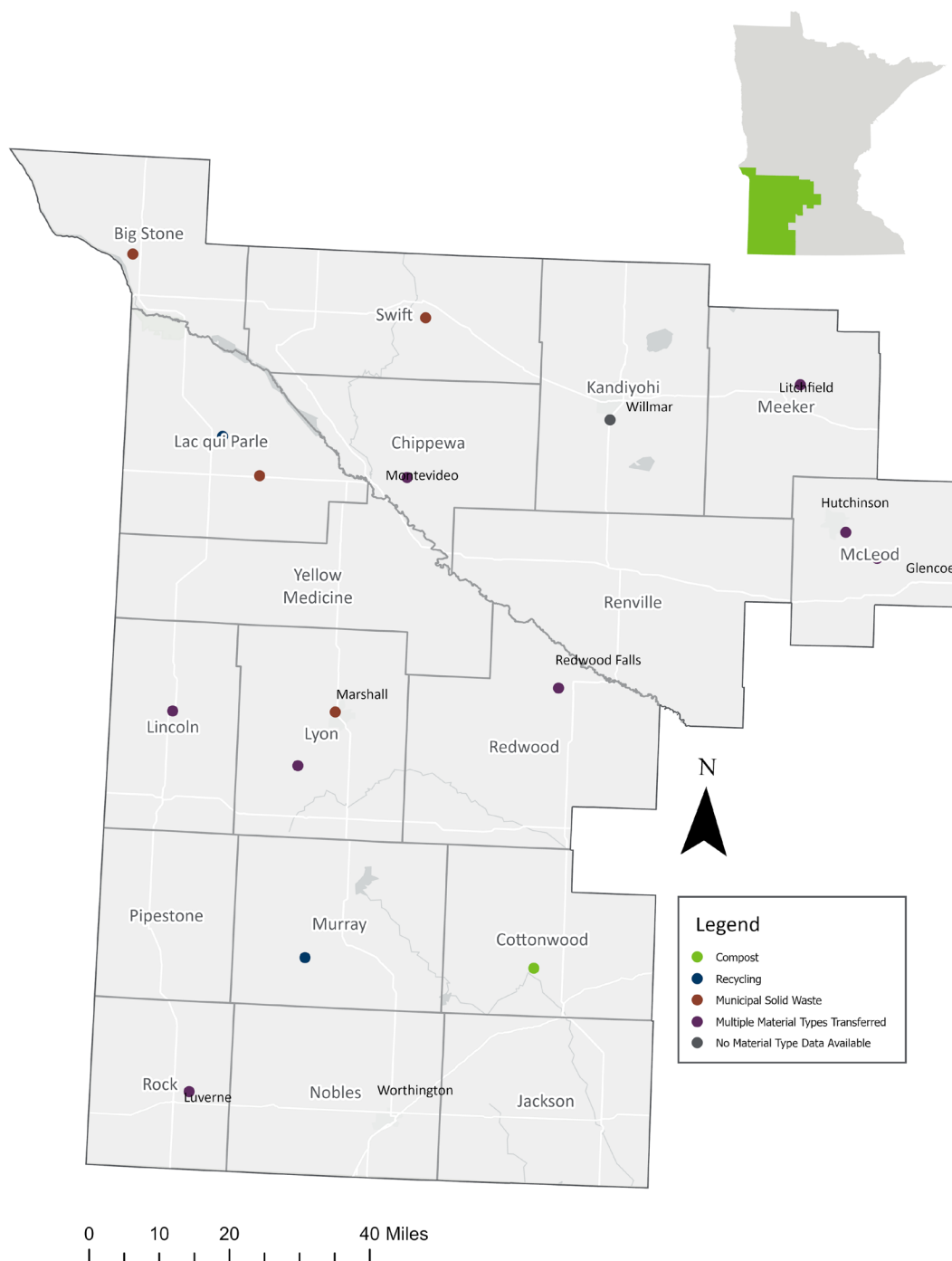


Figure 20. Recycling facilities in Southeast Minnesota.

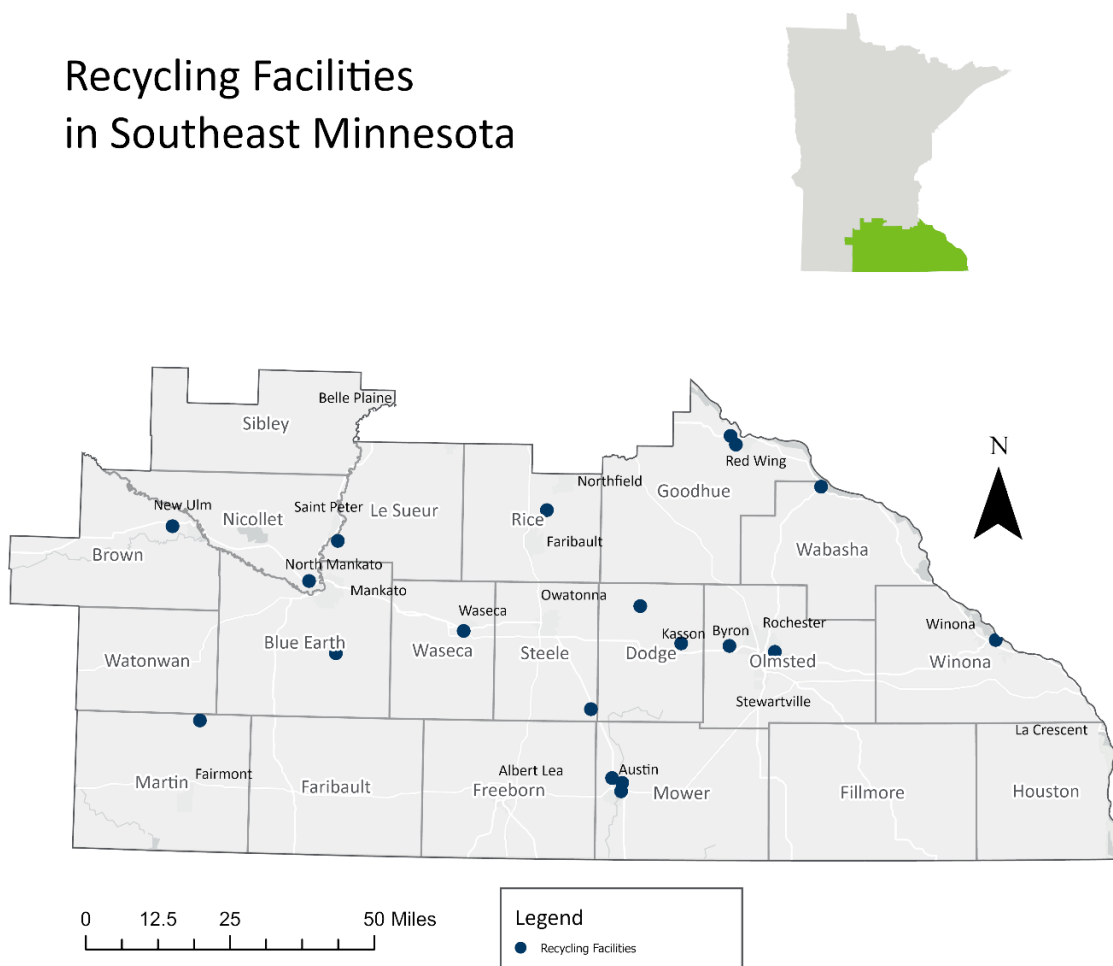
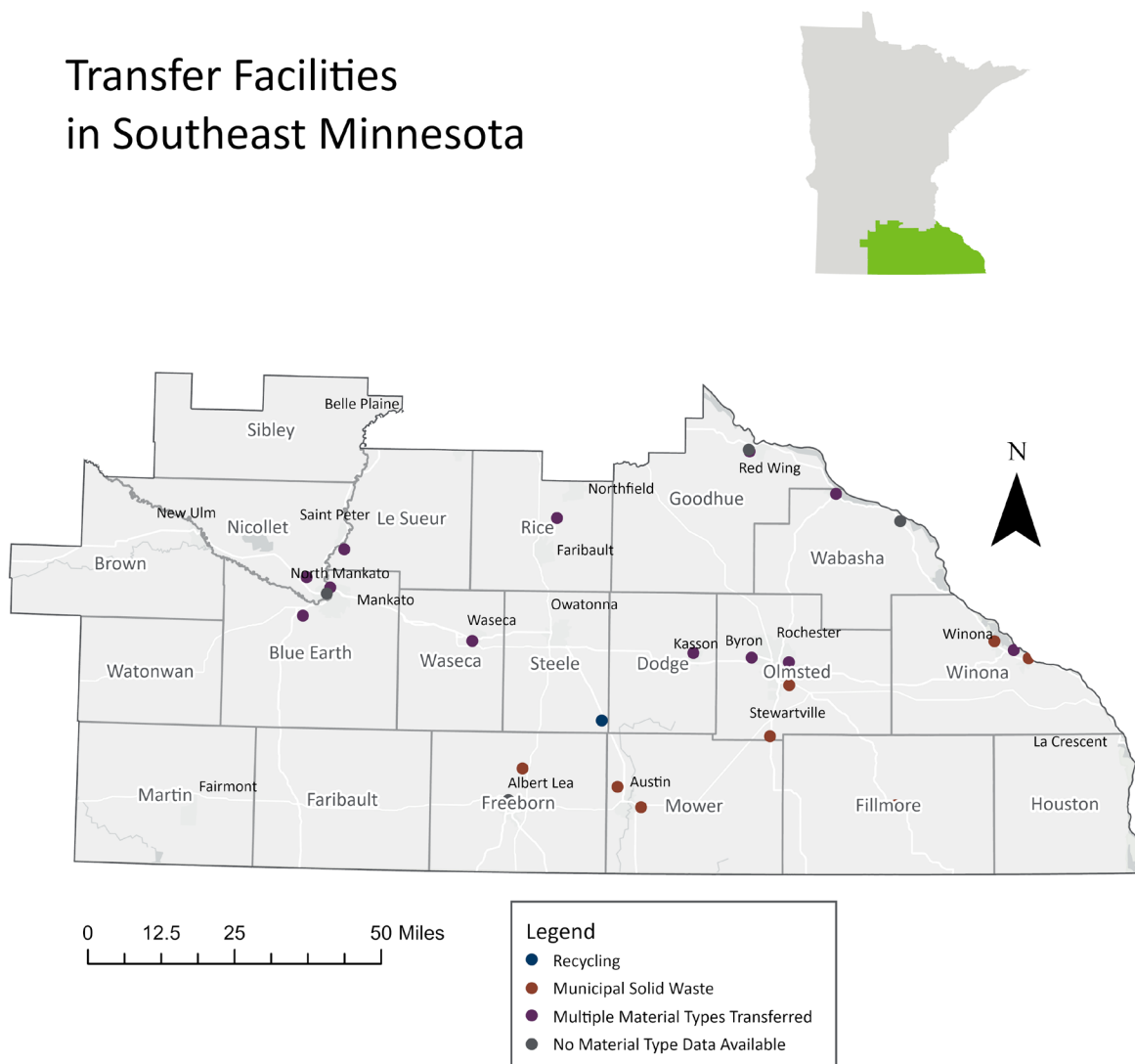


Figure 21. Transfer facilities in Southeast Minnesota.

Transfer Facilities in Southeast Minnesota



Appendix F – List of waste collection contracts

For the TCMA, the contract data available is listed below:

- Champlin, Hennepin County: had a 5-year contract with Champlin Refuse Inc from January 2021 to December 2025;
- Edina, Hennepin County: has a 7-year contract with Republic Services from January 2020 to December 2026;
- Maple Grove, Hennepin County: had a 4-year contract with Republic Services from January 2020 to December 2024;
- Plymouth, Hennepin County: has a 4-year contract with Allied Waste Services from January 2024 to December 2027;
- St. Louis Park, Hennepin County: had a 5-year contract with Waste Management Inc from October 2018 to September 2023;
- Shorewood, Hennepin County: has a 5-year contract with Waste Management Inc from January 2026 to December 2030;
- Fridley, Anoka County: has a 7-year contract with Allied Waste Services from May 2019 to April 2026.
- New Brighton, Ramsey County: has a 5-year contract with Republic Services from January 2024 to December 2028; and
- Arden Hills, Ramsey County: has a 5-year contract with Walter Recycling & Refuse Inc from May 2025 to April 2030;
- Lauderdale, Ramsey County: has a 5-and-a-half-year contract with Eureka Recycling from July 2024 to October 2029;
- Little Canada, Ramsey County: has a 4-year contract with Republic Services from January 2025 to December 2029;
- Maplewood, Ramsey County: has a 22-and-a-half-year contract with Tennis Sanitation from January 2025 to June 2027;
- North Saint Paul, Ramsey County: has 5-year contract with Tennis Sanitation from January 2024 to December 2028;
- Roseville, Ramsey County: has a 5-year contract with Waste Management from July 2025 to June 20302030;
- Saint Paul, Ramsey County: has a 5-year contract with Eureka Recycling for single family units from November 2024 to 2029 and a 7-year contract with FCC Environmental for multi-family units from November 2024 to 2032; and
- Shoreview, Ramsey County: has a 4-and-a-half-year contract with Republic Services from July 2024 to December 2029.

For Greater MN, SWMPs and contracts available and their lengths are listed below:

- Freeborn County: has a 7-year contract with Waste Management from December 2020 to November 2027.
- Steele County: has a 5-year contract with Thompson Sanitation Inc. from November 2023 to October 2028;
- Big Stone County: has a 5-year contract with Waste Management Inc; and
- Kandiyohi County: has a 2-year contract with West Central Sanitation Inc from January 2026 to December 2027.
- Winona County: had a 5-year contract with Harter’s Quick Clean-Up Inc which was originally set to conclude in December 2021 but was extended by five years to December 2026.