

URBAN RESOURCE GROUP INC.

Affiliated with Canada Fibers Ltd.



2016 Waste Audit & Waste Reduction Work Plan

November 29, 2017

MOBILE CLIMATE CONTROL

7540 Jane St.

Vaughan, ON

This report has been prepared by Urban Resource Group affiliated with Canada Fibers Ltd. for Mobile Climate Control, 7540 Jane St., Vaughan, and their sole use. Written consent from Urban Resource Group Inc., affiliated with Canada Fibers Ltd. must be obtained prior to delivering this report or disclosing its contents to any other party.

2015
Clean50
Outstanding Contributors to Clean Capitalism

December 20, 2017

Boris Sukovski
Director of Quality, North America



7540 Jane Street • Vaughan, ON L4K 0A6 • Canada
Tel: +1-905-482-2768 • Fax: +1-905-482-2756
Mobile: +1-416-845-6568
boris.sukovski@mcc-hvac.com • www.mcc-hvac.com

Re: **Mobile Climate Control, 7540 Jane St., Vaughan, ON** – Waste Audit & Waste Reduction Work Plan Report

Dear Mr. Sukovski,

Urban Resource Group Inc., affiliated with *Canada Fibers Ltd.* is enclosing a Waste Audit & Reduction Work Plan Report that will keep Mobile Climate Control, 7540 Jane St., Vaughan, ON in compliance for 1 year for the period of December 2017 to December 2018. This report complies with Ontario Regulation 102/94 - Ministry of the Environment & Climate Change of the Environmental Protection Act. We are confident that this report will assist in gaining a better understanding of the materials currently being disposed of via the waste and recycling streams.

The methods used for this audit are appropriate for evaluating and expanding the existing waste diversion programs. However, the waste and recycling composition data was extrapolated from a one-day sample and from actual weights obtained from pick-ups and therefore cannot take into consideration all intermittent activities from the entire year. In order to maintain as accurate information as possible, numbers enclosed in this report may be a combination of the one-day sample and historical diversion reports, scaled hauling weights. Therefore, the results should not be used for any other purposes, other than those contained within this report.

Overall, Mobile Climate Control is operating at a current diversion rate of 93%

Please ensure that you sign the completed Waste Audit & Waste Reduction Work Plan Documents, as required by the Ministry of the Environment & Climate Change (MOE). The regulation also requires that the Waste Reduction Work Plan be posted in public sight on the premises of your facility. Please note that facilities that meet the threshold criteria of O. Reg. 102/94 (Waste Audits & Waste Reduction Work Plans), must also comply with O. Reg. 103/94 (Source Separation Programs).

A reminder that our team of dedicated waste management professionals can assess your waste streams, collection practices, the diversion opportunities for your waste and offer alternative means of reducing costs. Further, we can work with your organization to ensure that goals are attained. Finally, they can provide you with user-friendly reporting of your progress, so that you can inform all of your stakeholders of the positive impacts you are making to the environment.

Please do not hesitate to contact **Urban Resource Group Inc.** if you have questions or concerns related to this report.

Sincerely,

A handwritten signature in blue ink, appearing to read 'C. Caponigro', is placed above the printed name.

Carlo Caponigro
Urban Resource Group Inc., affiliated with *Canada Fibers Ltd.*
carlo@urbanresourcegroup.ca
416.527.8217

Executive Summary

In accordance with Ontario Regulation 102/94, **Urban Resource Group Inc.**, affiliated with *Canada Fibers Ltd.*, conducted a Waste Audit for Mobile Climate Control, 7540 Jane St., Vaughan, ON on November 29, 2017 and developed a Waste Reduction Work Plan based on the observations. The table summarizes audited waste weights obtained during the sorting process. The final diversion rate for 2017 (percentage of waste materials diverted from landfill) for this site is 92.78%.

Table 1. Waste Material Stream Weights – Sort Sample

MATERIAL STREAMS	DAILY WEIGHTS (1 DAY SAMPLE ACTUAL)	
RESIDUAL WASTE	136.00	kg
RECYCLING IN WASTE	55.80	kg
TOTAL WASTE GNERATION	191.80	kg

According to the graph, 29.09% destined for waste was found to be divertible using the recycling programs currently in place.

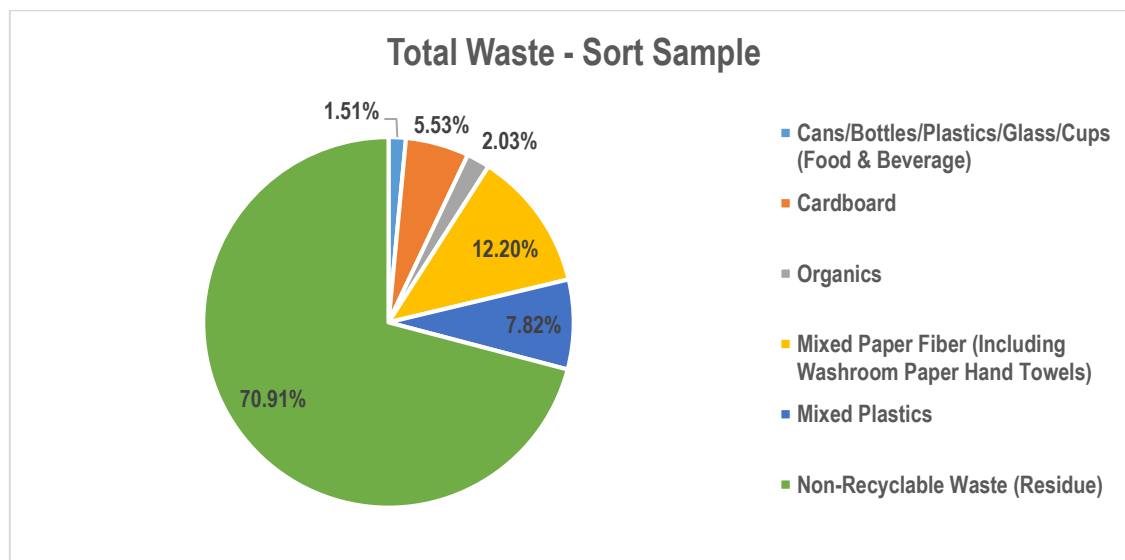


Figure 1. Total Detailed Composition of Material in the Waste Stream – Sort Sample Only

Table 2. Diversion Report - Amount of Waste Produced Annually in Metric Tonnes

	METRIC TONNES 2013	METRIC TONNES 2014	METRIC TONNES 2015	METRIC TONNES 2016	METRIC TONNES 2017
	Mobile Climate Control	Mobile Climate Control	Mobile Climate Control	Mobile Climate Control	Mobile Climate Control
WASTE TOTAL	52.8	54.1	59.75	62.47	63.61
RECYCLABLES					
Cardboard	100.6	103.3	110.99	98.68	104.07
Mixed Food & Beverage Containers and Mixed Miscellaneous Plastics	16.5	6.4	9.9	9.94	8.52
Mixed Papers	86.1	93.2	101	93.43	109.6
Scrap Metals	517	490.7	475.13	413.83	459.99
Wires, Motors, Contaminated Metals	9.4	9.8	9.5	9.56	9.56
Plastic Hose Reels	6	6.3	6.1	6.13	6.13
Scrap Wood	100.1	76.7	89.55	121.2	94.8
Electronic Waste	0.4	0.4	0.4	0.04	0.04
Fluorescent Bulbs	0	0	0.15	0.15	0.15
Batteries	0.1	0.1	0.25	0.15	0.15
Wood Pallets	17.9	18.6	18.25	18.25	18.25
Printer Toner Cartridges	0.1	0.1	0.13	0.11	0.11
Glove/Bag Reconditioning	2.7	2.7	0	0	0
Reusable Plastic Bins	2.6	2.6	3	2.73	2.73
Reusable Motor Packaging Trays	6.3	6.4	6.35	3.35	3.35
RECYCLING TOTAL	865.8	817.3	830.7	777.55	817.45
GRAND TOTAL	918.6	871.4	890.45	840.02	881.06
Diversion Rate (%)	94%	94%	93%	93%	93%

* Mixed Containers includes all Aluminum, Steel, Glass and Steel Cans/Bottles, Plastics #1-7, Polystyrene, Hot & Cold Beverage Cups, Tetra Pak Containers

* Mixed Container 95 gallon totes weights are estimated at 65 kg each (industry standard)

* Mixed Paper 95 gallon totes weights are estimated at 205 kg each (industry standard)

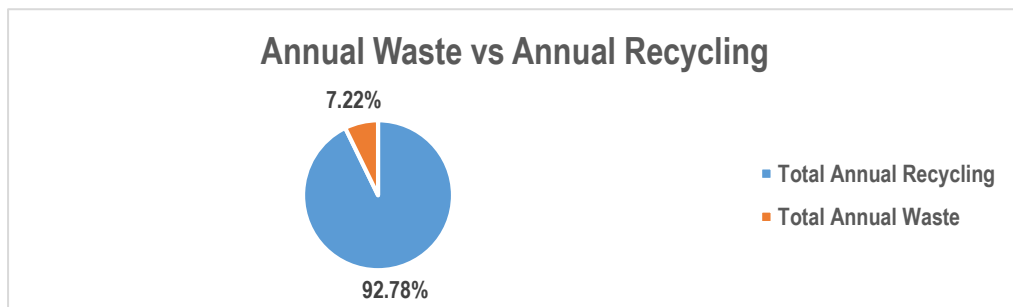


Table of Contents

1.0 – INTRODUCTION.....	1
2.0 – METHODOLOGY.....	3
3.0 – BUILDING INFORMATION.....	4
3.1 – Pre-Waste Audit Summary & Questionnaire.....	4
3.2 – Current Recycling Programs in Place.....	4
4.0 – TOTAL WASTE STREAM ANALYSIS – Sort Sample.....	5
4.1 Generation Area Waste Stream Analysis – Sort Sample.....	7
5.0 - WASTE STREAM ANALYSIS – Sort Sample in Photos.....	9
5.1 – Cans/Bottles/Plastics/Glass/Cups (Food & Beverage) – Waste Stream Analysis.....	9
5.2 – Cardboard – Waste Stream Analysis.....	10
5.3 – Organic Material (Food Waste) – Waste Stream Analysis.....	12
5.4 – Mixed Paper Fiber (Including Washroom Paper Hand Towels) – Waste Stream Analysis.....	13
5.5 – Mixed Plastics.....	14
5.6 – Other.....	15
6.0 – CONCLUSION.....	16
7.0 – WASTE REDUCTION WORK PLAN.....	16
APPENDICES.....	19

List of Figures

Figure 1. Total Detailed Composition of Material in the Waste Stream – Sort Sample Only	V
Figure 2. Total Detailed Composition of Material in the Waste Stream – Sort Sample Only	5
Figure 3. Total Waste Stream Weights by Generation Area and Material Breakdown – Sort Sample Only	6
Figure 4. Office Area Detailed Composition of Material in the Waste Stream – Sort Sample Only	7
Figure 5. Washrooms Detailed Composition of Material in the Waste Stream – Sort Sample Only	7
Figure 6. Lunchroom Detailed Composition of Material in the Waste Stream – Sort Sample Only	8
Figure 7. Outside Bins Detailed Composition of Material in the Waste Stream – Sort Sample Only	8
Figure 8. Production Area Detailed Composition of Material in the Waste Stream – Sort Sample Only	9

List of Tables

Table 1. Waste Material Stream Weights – Sort Sample	V
Table 2. Diversion Report - Amount of Waste Produced Annually in Metric Tonnes	VI
Table 3. Source Separation Programs.....	3
Table 4. Waste Stream Material Weights (Landfill) – Sort Sample Only	5
Table 5. Generators of Cans/Bottles/Plastics/Glass/Cups (Food & Beverage) in Waste	10
Table 6. Top Generators of Cardboard in Waste	11
Table 7. Generators of Organics in Waste	12
Table 8. Generators of Paper Fiber in Waste	13
Table 9. Generators of Mixed Plastics in Waste	14

Appendices

Appendix A..... i

Glossary of Items i

Appendix B..... iii

Scale Calibration iii

Appendix Civ

Material Destination and Service Schedule iv

Appendix D v

Pre-Audit Questionnaire..... v

Appendix E.....vi

Report of Waste Audit vi

1.0 – INTRODUCTION

A waste audit is an analysis of your facility's waste stream. It can identify what types of recyclable materials and waste your facility generates and how much of each category is recovered for recycling or discarded. Using the data collected, your organization can identify the feasibility of enhancing its recycling efforts and the potential for cost savings.

A waste reduction work plan (WRWP) is a plan to reduce, reuse and recycle waste. The plan sets out who will implement each part of the plan, when each part will be implemented and what the expected results are. The WRWP plan is based on the results of the completed waste audit.

Many benefits can be gained through the performance of a Waste Audit. Waste audits provide the opportunity to gain a better understanding of the materials being disposed of by a facility. Auditing both the recycling and waste streams illuminates the strengths and weaknesses of the current recycling program.

Over the past decade or so, many facilities have taken up the challenge of making their operations more environmentally sustainable. There is increasing pressure to find effective and efficient ways to improve the environmental performance of these facilities and save money simultaneously. Solid waste management has proven to be a worthwhile starting point. By diverting waste from disposal through waste reduction and reuse and recycling activities, facility owners and management are realizing significant environmental and cost saving benefits.

Specific benefits derived from implementing an energetic waste diversion program include improved system efficiencies resulting in reduced waste haulage and disposal costs and increased revenue from the sale of specific recyclables. Other benefits include reduced greenhouse gas generation and resource conservation through product and packaging reduction and reuse and the substitution of recycled materials for virgin materials during manufacturing. Finally, an important indirect benefit is the enhanced corporate image and pride that result from the waste diversion initiatives.

Solid waste reduction efforts also are being driven by Ontario Government initiatives including the Ontario Ministry of the Environment's (MOE) 3Rs regulations and the Ontario Government's goal to divert 60% of waste from landfill. More specifically, the MOE 3Rs regulations require designated facilities to participate in the Waste Audit and waste reduction planning process.

Ontario Government 3 Rs Initiatives

MOE 3Rs Regulatory Requirements

In 1994 the Ontario Ministry of the Environment & Climate Change enacted a set of environmental regulations requiring the institutional, commercial, and industrial (IC&I) sectors to address their solid waste streams. Regulations 102 and 103 require IC&I generators in designated sectors to carry out a Waste Audit and develop a Waste Reduction Work Plan. The regulations also prescribe source separation requirements for specific generators.

O. Reg. 102/94 – Waste Audits and Waste Reduction Work Plans

According to O. Reg. 102/94 Waste Audits and Waste Reduction Work Plans, a Waste Audit required under the regulation shall address:

- a. The amount, nature, and composition of the waste;
- b. The manner by which the waste gets produced, including management decisions and policies that relate to the production of waste; and
- c. The way in which the waste is managed.

An audit of the solid waste stream and the formation of an action plan for waste reduction as required under O. Reg. 102/94 is therefore an ongoing process, which make waste reduction through 3Rs activities a routine part of daily operations. The following is a list of other basic requirements for compliance with the provincial regulations.

- The Waste Audit summary sheet and Waste Reduction Work Plan are to be prepared on a form provided by the MOE or in a similar format.
- Audit and Work Plan must be held on file for at least five years.
- A work plan must set out who will implement each part of the plan, when and expected results.
- Owner/operator of facility must submit the most recent audit and work plan within 7 days to a Ministry Director when requested to do so.

You need to comply with Ontario Regulation 102/94 – Waste Audits & Waste Reduction Work Plans

Large Manufacturing Establishments

The owner or operator of a “large manufacturing establishment” is subject to O. Reg. 102/94 if persons employed at the site work in excess of 16,000 hours in any one calendar month during the preceding two calendar years. The owner or operator must conduct a waste audit covering the waste generated by the establishment operating at the site, and prepare and implement a waste reduction work plan.

The owner is also required to update the waste audit and the accompanying written report and the waste reduction work plan on an annual basis.

The owner or operator will become subject to O. Reg. 102/94 in the first calendar year following a calendar month in which persons employed at the site worked more than 16,000 hours.

The owner or operator will cease being subject to O. Reg. 102/94 if during the two preceding calendar years there was no calendar month in which the hours worked by the persons employed at the site exceeded 16,000 hours.

The Director may request that the owner or operator of a large manufacturing establishment supply proof of the total number of hours persons employed at the site worked in a month within seven days of being requested. Failure to provide satisfactory proof within the time limit will result in the owner or operator having to comply with O. Reg. 102/94.

For the purposes of a large manufacturing establishment:

- “owner” includes the operator of a manufacturing establishment, but does not include a landlord;
- “site” means one property and nearby properties owned or leased by the same person, where passage from one property to another involves crossing, but not traveling along a public highway.

O. Reg. 103/94 Industrial, Commercial & Institutional Source Separation Programs

O. Reg. 103/94 builds upon the Waste Audit and Waste Reduction planning process by stipulating which recyclable materials a designated generator must recycle.

Table 3. Source Separation Programs

Ontario Reg. 103/94 – Source Separation Programs											
FACILITY TYPE	QUALIFICATION	Aluminum Steel Cans Bottles Plastic	Cardboard	Fine Paper	Newsprint	Polyethylene	Polystyrene	Wood	Brick Cement	Drywall	Steel
Large Manufacturing Institutions	If in a calendar month, the hours worked by employees is 16,000 hours or more.	☆	☆	☆	☆	☆	☆	☆			☆

2.0 – METHODOLOGY

All waste and recycling material streams were collected from their generation areas and kept overnight on-site at 7540 Jane St. at the loading dock. The bags were labeled and identified as follows;

- Office Area
- Washrooms
- Lunchroom
- Outside Bins
- Production Area

Photographs were taken during the entire process to help illustrate certain situations. The pictures have been included to support observations and highlight the exact nature and composition of the materials being discarded.

Certain materials are removed from the site by alternative companies or are considered hazardous and require special handling. The weights from these materials are provided to **Urban Resource Group Inc.** by management and are included into our calculations.

The methods used for this audit are appropriate for evaluating and expanding the existing waste diversion programs. However, the waste and recycling composition data was extrapolated from a one-day sample and therefore cannot take into consideration all intermittent activities from the entire year. Therefore the results should not be used for any other purposes, other than those contained within this report.

A “Green Audit” was maintained throughout the entire process and all recyclable materials removed from the waste were discarded in appropriate recycling containers for landfill diversion. All Health and Safety Regulations, as prescribed in the provincial Health and Safety Act, were held in compliance throughout the audit process.

3.0 – BUILDING INFORMATION

Mobile Climate Control is located at 7540 Jane St., Vaughan, ON. There are 310 employees that work over 3 shifts in one day. The plant is closed 72 days per year.

MCC develops heating, cooling, ventilation and air conditioning for buses, trucks, construction, compact, agricultural, forestry, mining, material handling, utility and military vehicles.

3.1 – Pre-Waste Audit Summary & Questionnaire

Urban Resource Group Inc. contacted Boris Sukovski, Director of Quality, North America. During the pre-waste audit meeting, instructions for staff, cleaners and employees were provided. The generation areas and a description of the materials to be sorted, audit logistics, and methodology were also discussed.

See **Appendix D** for more information.

3.2 – Current Recycling Programs in Place

Mobile Climate Control currently see that the following materials are diverted from landfill;

- Corrugated Cardboard (OCC)
- Mixed Food and Beverage Containers including Coffee Cups
- Mixed Papers
- Scrap Metals
- Scrap Wood
- Wipers, Motors, Contaminated Metals
- Plastic Hose Reels
- Electronic Wastes
- Light Tubes/Ballasts
- Batteries
- Wood Pallets
- Printer Toners
- Reusable Plastic Bins

Materials are collected from functional areas of the facility and stored or placed into the appropriate location. Recycling containers are emptied on a scheduled service or as required by private contractors.

4.0 – TOTAL WASTE STREAM ANALYSIS – Sort Sample

The waste audit results represent a snap-shot in time and therefore cannot take into consideration all intermittent activities from the entire year. The waste audit sample size was for a full 24 hour period.

Table 4. Waste Stream Material Weights (Landfill) – Sort Sample Only

All weights are in kilograms (kg)								
MOBILE CLIMATE CONTROL	Cans/Bottles/Plastics/Glass/Cups (Food & Beverage)	Cardboard	Organics	Mixed Paper Fiber (Including Washroom Paper Hand Towels)	Mixed Plastics	Non-Recyclable Waste (Residue)	Total Weight	%
Office Area	0.50		0.30	0.90		8.40	10.10	5.27%
Washrooms	0.10		0.50	10.50		14.20	25.30	13.19%
Lunchroom	1.00	0.10	2.80	4.00		8.30	16.20	8.45%
Outside Bins	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00%
Production Area	1.30	10.50	0.30	8.00	15.00	105.10	140.20	73.10%
Daily Projection	2.90	10.60	3.90	23.40	15.00	136.00	191.80	100.00%
%	1.51%	5.53%	2.03%	12.20%	7.82%	70.91%	100.00%	-
Monthly Projection	69.60	254.40	93.60	561.60	360.00	3,264.00	4,603.20	-
Yearly Projection	849.70	3,105.80	1,142.70	6,856.20	4,395.00	39,848.00	56,197.40	-

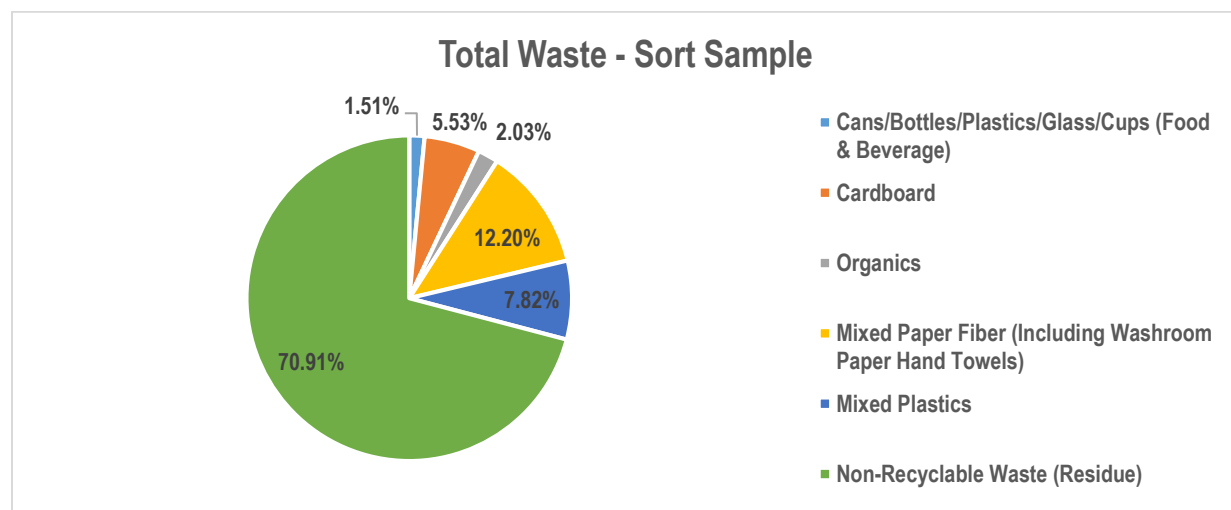


Figure 2. Total Detailed Composition of Material in the Waste Stream – Sort Sample Only

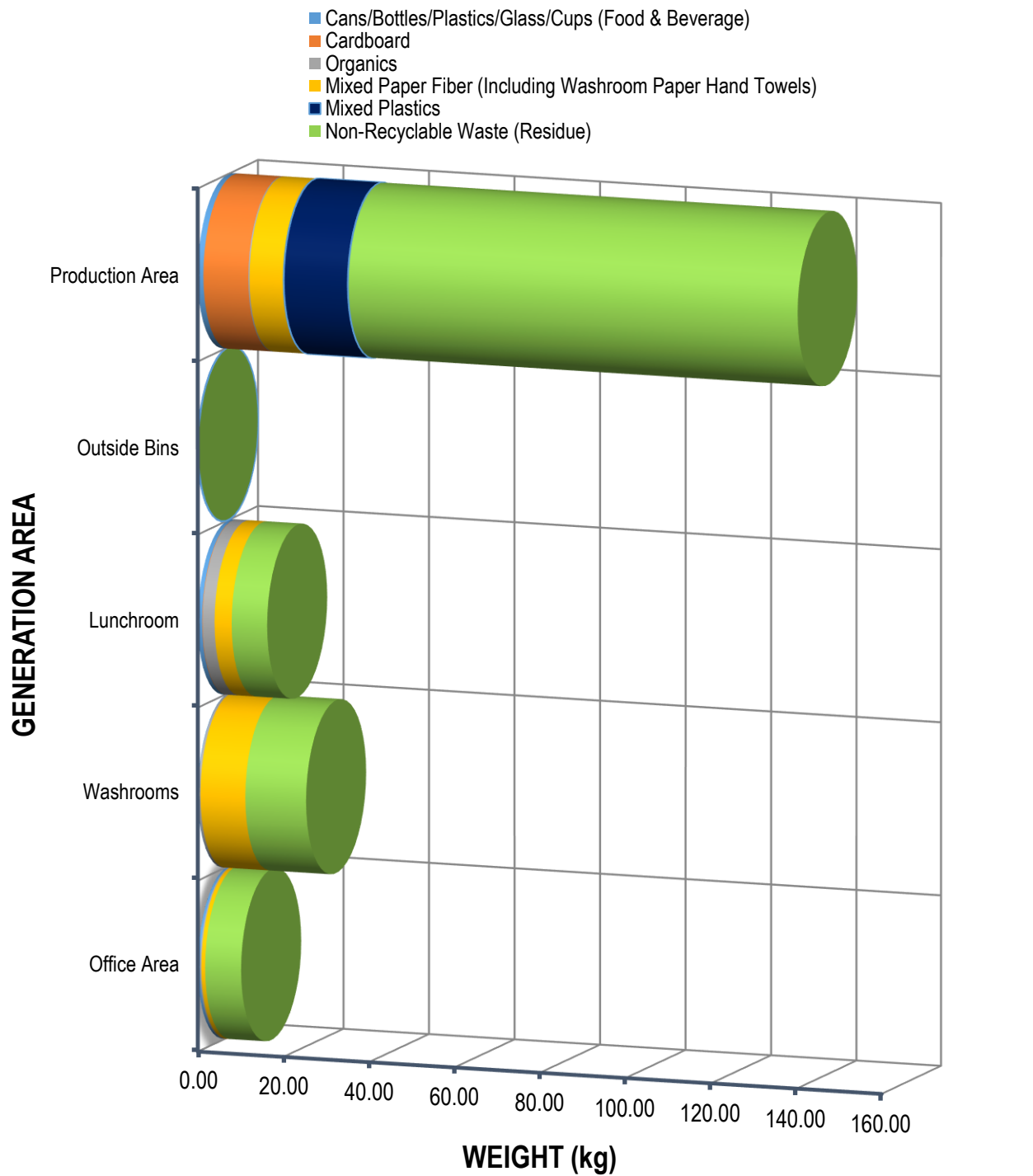


Figure 3. Total Waste Stream Weights by Generation Area and Material Breakdown – Sort Sample Only

4.1 Generation Area Waste Stream Analysis – Sort Sample

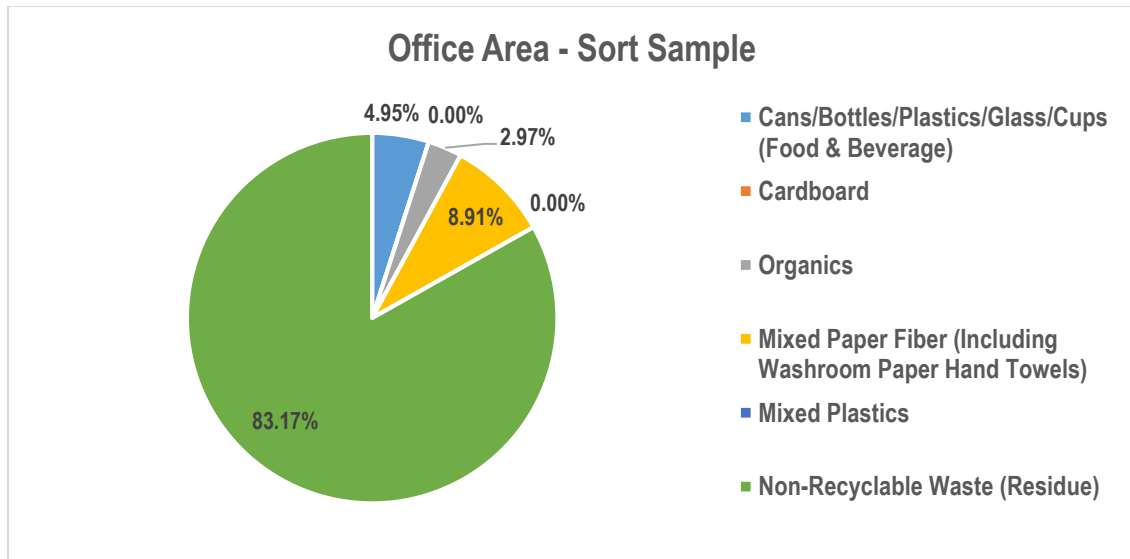


Figure 4. Office Area Detailed Composition of Material in the Waste Stream – Sort Sample Only

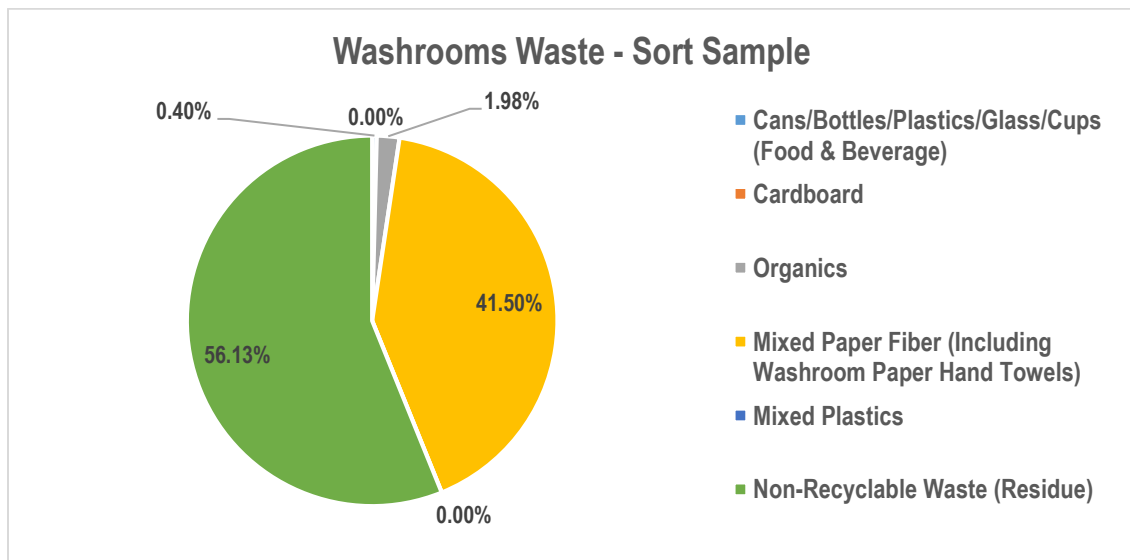


Figure 5. Washrooms Detailed Composition of Material in the Waste Stream – Sort Sample Only

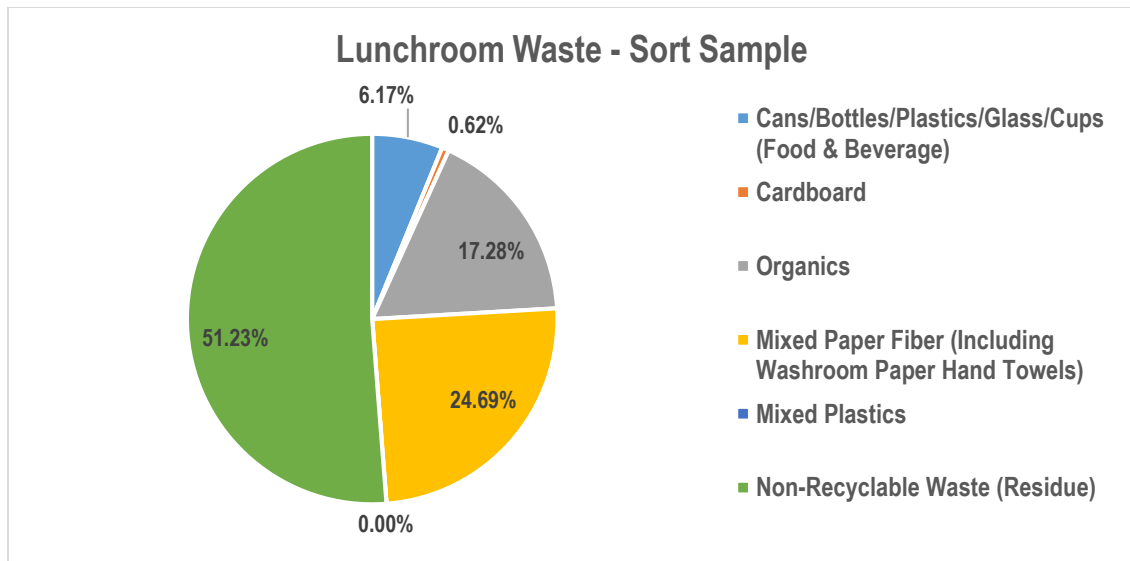


Figure 6. Lunchroom Detailed Composition of Material in the Waste Stream – Sort Sample Only

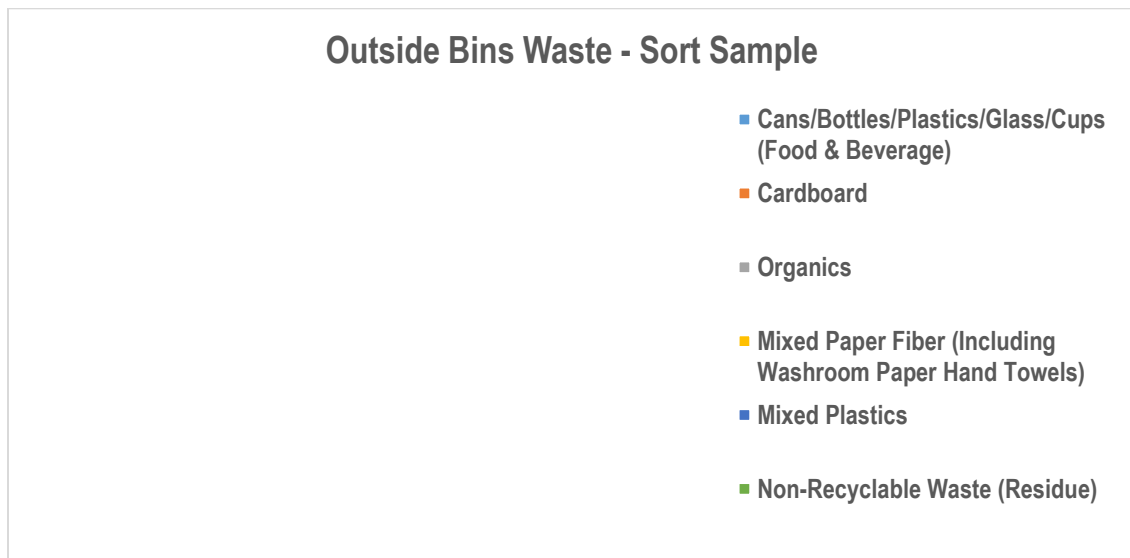


Figure 7. Outside Bins Detailed Composition of Material in the Waste Stream – Sort Sample Only

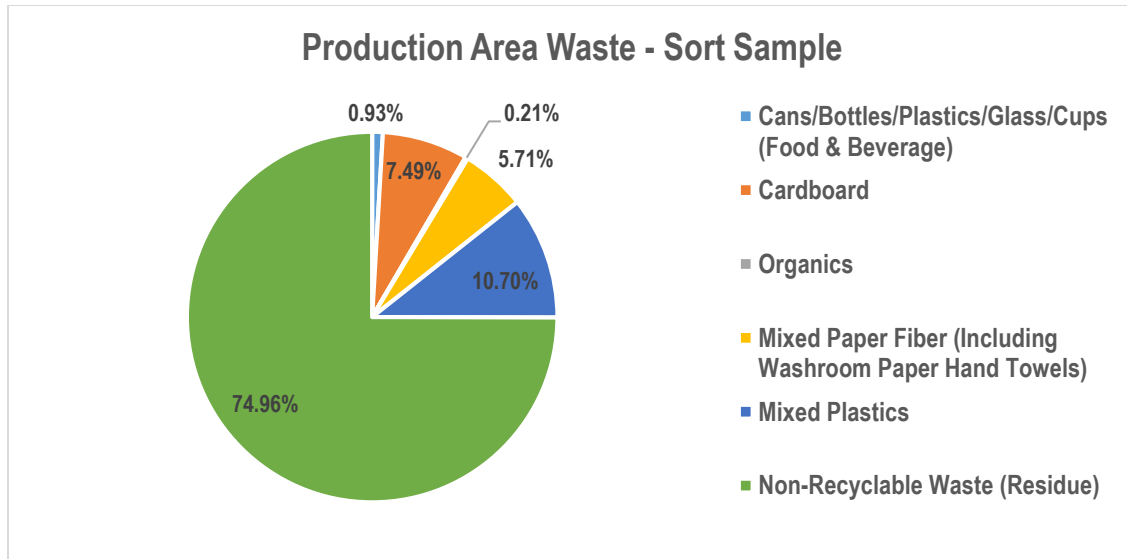


Figure 8. Production Area Detailed Composition of Material in the Waste Stream – Sort Sample Only

5.0 - WASTE STREAM ANALYSIS – Sort Sample in Photos

5.1 – Cans/Bottles/Plastics/Glass/Cups (Food & Beverage) – Waste Stream Analysis

2.90 kg of Cans/Bottles/Plastics/Glass/Cups (Food & Beverage) were recovered from the waste audit materials. Recyclable Cans/Bottles/Plastics/Glass/Cups (Food & Beverage) that were recovered include: milk cartons, plastic water bottles, aluminum pop cans, party platters, plastic takeout containers, tetra paks, hot and cold cups, etc. The pictures show what was found and **Table 5** shows the top generation areas of these materials.



coffee cups



juice box

Table 5. Generators of Cans/Bottles/Plastics/Glass/Cups (Food & Beverage) in Waste

Generation Area	Weight of Material in Waste	Percentage of Material in Waste
Production Area	1.30 kg	44.82%
Lunchroom	1.00 kg	34.48%
Office Area	0.50 kg	17.2%
Washrooms	0.10 kg	3.44%
Outside Bins	0 kg	0%

Continuous monitoring and ongoing-education of the staff will help increase landfill diversion. Signs should be posted in the building to inform and remind staff and visitors about the recycling programs available, in addition to using proper collection bins. Staff and cleaners should be trained on how to collect waste separately and where to take separated materials. Cleaning staff should be monitored in order to ensure that the recyclable materials are collected efficiently.

5.2 – Cardboard – Waste Stream Analysis

A moderate amount of cardboard weighing 10.60 kg was discovered in the audited waste. All cardboard is to be placed into the cardboard compactor for proper removal and recycling.

The pictures show what was found in the waste and **Table 6** shows the generation areas of organics in the waste.



cardboard in waste



cardboard in waste

Continuous monitoring and ongoing-education of the staff will help increase landfill diversion. Signs should be posted in the building to inform and remind staff about the recycling programs available, in addition to using proper collection bins. Staff and cleaners should be trained on how to collect waste separately and where to take separated materials. Cleaning staff should be monitored in order to ensure that the recyclable materials are collected efficiently.

Table 6. Top Generators of Cardboard in Waste

Generation Area	Weight of Material in Waste	Percentage of Material in Waste
Production Area	10.50 Kg	99.05%
Lunchroom	0.10 Kg	0.95%
Office Area		
Washrooms		
Outside Bins		

5.3 – Organic Material (Food Waste) – Waste Stream Analysis

At present an organics diversion program is not available for employees to recycle food waste, nor is one required at this time. Only 3.90 kg of organic material was found in the waste.

Organic materials that were removed from the waste include: fruit peels, coffee grounds, and pre and post-consumer food waste. The pictures show what was found in the waste and **Table 7** shows the generation areas of organics in the waste.



Reducing the amount of organics for lunches will reduce this amount going to landfill.

Table 7. Generators of Organics in Waste

Generation Area	Weight of Material in Waste	Percentage of Material in Waste
Lunchroom	2.80 kg	71.79%
Washrooms	0.50 kg	12.82%
Production Area	0.30 kg	7.69%
Office Area	0.30 Kg	7.69%
Outside Bins		

5.4 – Mixed Paper Fiber (Including Washroom Paper Hand Towels) – Waste Stream Analysis

A large amount of mixed paper fiber measuring 23.40 kg for the 24 hour sample was recovered from the waste. Mixed paper fiber includes office paper, newsprint, magazines, craft paper, boxboard, and washroom paper towel. The pictures show what was sorted and separated. **Table 8** shows the generation areas of paper fiber.



paper fiber



paper fiber



paper fibre

Table 8. Generators of Paper Fiber in Waste

Generation Area	Weight of Material in Waste	Percentage of Material in Waste
Washrooms	10.50 kg	44.87%
Production Area	8.00 kg	34.18%
Lunchroom	4.00 kg	17.09%
Office Area	0.90 kg	3.84%
Outside Bins		

Continuous monitoring and ongoing-education of the staff will help increase landfill diversion. Signs should be posted in the building to inform and remind staff and visitors about the recycling programs available, in addition to using proper collection bins. Staff should be trained on how to collect waste separately and where to take separated materials.

5.5 – Mixed Plastics

Mixed plastics removed from the waste weighed 15 kg for the day. **Table 9** shows the generation areas of this material.



plastic film



bubble wrap



pete straps



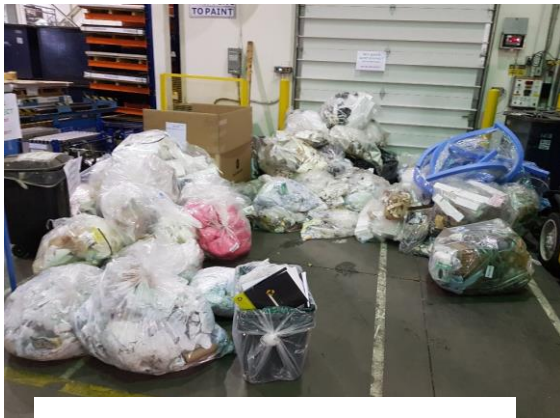
plastic hose

Table 9. Generators of Mixed Plastics in Waste

Generation Area	Weight of Material in Waste	Percentage of Material in Waste
Production Area	15.00 kg	100%%
Lunchroom		
Office Area		
Washrooms		
Outside Bins		
Lunchroom		

Urban Resource Group Inc., affiliated with *Canada Fibers Ltd.*, is a recycling specialist and collects, sorts and recycles these types of plastics generated. It is recommended to look into having these materials recycled properly.

5.6 – Other



audit load



polystyrene



metal pipe



wood

6.0 – CONCLUSION

Overall the findings presented within this Waste Audit Report show that Mobile climate Control is operating at a great level for diverting their waste from landfill. The current diversion rate is 92.78%

The waste and recycling composition data was extrapolated from a one-day sample and therefore cannot take into consideration all intermittent activities from the entire year.

The purpose of the Waste Audit was to identify material streams where further improvement in waste diversion and waste minimization could be made. All users of the program should be provided with the correct equipment and specific education. Control factors to ensure continual compliance should always be maintained.

Programs for increased waste diversion and waste reduction opportunities will be discussed and will be the focus in the Waste Reduction Work Plan presented alongside this report. The initiative that may have the greatest impact on waste diversion would be to capture more Mixed Paper and Mixed Plastics from the waste stream while reducing the amount of non-recyclable waste being generated. Communicating the need for greater participation and awareness with the existing recycling programs offered within this facility is also suggested. Monitoring all material programs with an intensified education and promotional campaign targeting specific department areas would improve the overall recycling program dramatically.

It should be recognized that the staff have a great impact on waste minimization and landfill diversion. Materials need to be collected properly and staged neatly before removal from the facility. Continual education and monitoring of the cleaners is always encouraged. The staff may also be able to provide feedback and input on areas requiring attention and how improvements may be accomplished.

7.0 – WASTE REDUCTION WORK PLAN

Please refer to **Appendix E** for the completed Ministry of Environmental & Climate Change - Waste Audit and Waste Reduction Work Plan Forms and a single page summary to be posted on a public board.

After reviewing the Waste Audit, the following Waste Reduction Work Plan was formulated which refers back to many of the observations and conclusions expressed within the Waste Audit report. Current programs are assessed and new programs could be considered to control waste costs and increase the diversion of waste from landfill.

A Waste Reduction Work Plan provides management with the ability to make continuous improvements to the facility's recycling programs, and to monitor their effectiveness. However, it should be remembered that recycling is just one way to reduce waste. To be really effective, the 4Rs hierarchy (Recycle, Reduce, Reuse, and Refuse) should be incorporated into the daily activities of all employees. Reducing the amount of waste produced is, by far, the most effective way to counter the flow of garbage to landfill.

Mobile Climate Control employs the waste and recycling removal services of Urban Resource Group Inc., *Affiliated with Canada Fibers Ltd.* Before any plan or action is undertaken, all parties associated with the waste and recycling program, including the management staff and cleaners, should be contacted and made aware of the specifics of the change.

1. **Equipment Inventory:** A thorough inspection and survey should be conducted to ensure each desk and/or workstation is fully equipped to support the various recycling programs. Before any building employee education

can begin it would be best that each area is properly equipped. This would include blue bins for waste paper, cans/glass/plastic food and beverage. Separate black bins should be used for waste collection. Easily accessible collection bins will increase the employee participation and limit health and safety issues associated with cross contaminating wastes or material staging. Once all areas have been equipped the educational aspect of the program may start.

2. **Improved Signage and Labeling:** When an area is equipped with the appropriate recycling equipment, the bins and areas surrounding should be correctly labeled to identify their specific use. The goal is to make recycling a pleasant and clean experience for the user.
3. **Use clear collection bags instead of black:** Local municipal experiences and waste studies have shown that using clear bags for garbage contributes to increased diversion of recyclables, food wastes and Hazardous Wastes from landfill. Another key benefit of using clear bags is the health and safety aspect. Clear bags help collection staff identify potential hazards, such as broken glass, needles and other sharp items that can potentially cause injuries during collection.
4. **Increase Program Accountability:** There must be strict enforcement procedures in place to ensure the program is progressing. Continual spot checks, audits, and education will help keep the program current and fresh. Information gathered for the reports must be correct, clear, and concise so that the program can be measured accurately. The cleaners and employees from each occupied space may be questioned to provide feedback in areas where the program is not working. Once a problem area is identified continual follow-up and communication may be required to ensure that a solution is reached.
5. **Monitoring Cleaners:** There is a need to continuously educate and monitor the cleaning and maintenance staff with regards to the recycling program. A cleaners meeting is encouraged to help educate them to identify those materials that are to be kept out of the waste. The cleaning personnel are the “eyes” of the program because they not only see the materials generated on a nightly basis but where they are generated also. The cleaners can help identify opportunities where equipment or signage is missing or better employee education is needed. A “Cleaners Log Sheet” is recommended and will help document and solve any concerns associated with the Recycling Program on a day-to-day basis. The log sheet also aids in keeping the program updated and acts as a constant reminder to the cleaners of the priorities they need to maintain.
6. **Consider Food Container Alternatives:** It should be encouraged to use ceramic or reusable plastic containers.
7. **Hold “Green Team” Meetings:** In an effort to, not only control the waste and recycling streams generated within the building, but also maintain the costs associated with waste management, an environmental “Green Team” is important. This “Green Team” is headed by building management and includes participation from interested building tenants, all cleaning contractors, and the waste contractor.

It is recommended that the “Green Team” should continue with their focus on the following initiatives.

- A. **Educate Staff.** The recycling program relies on proper source separation. Teaching all tenants of the acceptable processes involved with each waste stream would only increase the amount of recyclables diverted from landfill.
- B. **Increase Program Awareness.** The marketing and promotion of the recycling program is very important. Promoting the building “Green Team” diversion goals and accomplishments would increase awareness and therefore participation.

- C. **Constant Program Monitoring.** Information will always need updating. The program will benefit from the constant exchange of information between all employees and management and service contractors. Successes should be acknowledged, and failures should be examined for how to improve continuously.
8. **Promote Waste Minimization Benefits:** Waste is a resource which can lead to greater business productivity if managed correctly. Shifting from standard methods and thinking of waste disposal to processes of waste reduction can bring a range of key benefits;
- Businesses may save money through more efficient use of raw materials, packaging and technology.
 - Compliance with environmental legislation may become cheaper and more straightforward.
 - Businesses can improve their reputation among customers, suppliers, potential employees and insurers, who may want to be sure that they take their environmental responsibilities seriously.
 - Companies may also boost morale.
9. **Maintain compliance with Ontario Regulation 102/94:** It is important that your facility remains in compliance with Ontario Regulation 102/94 – Waste Audits and Waste Reduction Work Plans. The Ministry of the Environment & Climate change requires that you conduct a Waste Audit and Waste Reduction Work Plan on an annual basis. If found in non-compliance you will be given anywhere from a few weeks to 2 months to complete a Waste Audit and Waste Reduction Work Plan along with a Notice of Violation. The **Urban Resource Group Inc.**, *affiliated with Canada Fibers Ltd.*, Environmental Services team requires 6 months' notice to schedule your next Waste Audit.

APPENDICES

Appendix A

Glossary of Items

Capture Rate:

Capture rate is the percentage of recyclable materials that are diverted from landfill and captured in the recycling stream. Capture rates measure the effectiveness of a recycling program. Achieving a capture rate of 100% requires that all recyclables be placed in the recycling stream and that the waste stream consist solely of non-recyclable residual materials. The capture rate does not include 'other recycling'.

$$\frac{\text{Total Weight of Recycling}}{\text{Total Weight of Recycling + Recyclable Material in Waste}} \times 100 = \text{Capture Rate (\%)}$$

Diversion Rate:

The diversion rate reflects the percentage of all outgoing materials diverted to recycling from those disposed of as landfill. Achieving a diversion rate of 100% requires that all outgoing material be recyclable and placed in the recycling stream, in other words no residual materials.

$$\frac{\text{Total Weight of Recycling}}{\text{Total Weight of Recycling + Total Waste}} \times 100 = \text{Diversion Rate (\%)}$$

Hazardous Waste:

Waste generated during production or other activities by society that can pose a substantial or potential hazard to human health or the environment when improperly managed.

Landfill:

Designed, controlled and managed disposal site for municipal solid waste spread in layers, compacted to the smallest practical volume, and covered by material applied at the end of each operating day.

Recycling:

The process by which materials otherwise destined for disposal are collected reprocessed, or manufactured, and are reused.

Residual Waste:

Any material that is not diverted in any way and thus is disposed of via the waste garbage stream and sent to landfill.

Solid Waste:

Waste composed of solid matter from household, commercial, institutional and industrial sources.

Waste:

Unwanted materials left over from any human activity

Waste Diversion:

The redirection of waste material that was landfill bound through reuse, recycling, or recovery of that material. It does not include source reduction.

Waste Reduction:

Waste reduction is a broad term encompassing all waste management methods – source reduction, recycling, composting – that result in reduction of waste to going to a combustion facility or landfill.

Waste Stream:

The waste output of a community, region, or facility. Total waste can be categorized into different waste stream components) e.g., wet organics waste, construction waste, household hazardous waste, or white goods).

Waste-to-Energy (WtE) System:

A method of converting municipal solid waste into a usable form of energy, usually through combustion.

Appendix B

Scale Calibration



URBAN RESOURCE GROUP INC.
Affiliated with Canada Fibers Ltd.

CERTIFICATE OF CALIBRATION

Urban Resource Group Inc., Affiliated with Canada Fibers Ltd. has seen to it that the scales we use for waste auditing are calibrated on a regular basis. The scale has been checked and calibrated as per the manufacturer's specifications on scale calibration. To ensure that the scale is performing properly three checkpoints are used during calibration process. Each checkpoint has an acceptable tolerance for the scale readout.

Checkpoint	Tolerance	Readout
50 lb.	+/- 0.5 lb.	50 lb.
100 lb.	+/- 1 lb.	100 lb.
150 lb.	+/- 1.5 lb.	150 lb.

The calibrated readouts were within the accepted tolerance range at three different check points.

Next calibration date: July 2018

Appendix C

Material Destination and Service Schedule

Re: **Material Handling and Disposition**

- **WASTE** is picked up by All Waste and taken to Canada Fibers Ltd. transfer station located at 122 Arrow Road. Waste processed by Canada Fibers Ltd. may be further transported to Covanta located in the State of New York, a Waste to Energy Facility
- **CARDBOARD** is picked up by All Waste and taken to Canada Fibers Ltd. Arrow Road Material Recovery Facility. The plant is located at 122 Arrow Road, Toronto, Ontario, M9M 2M1. The cardboard is separated and sent to various paper mills depending on the market.
- **PAPER** is picked up by All Waste and taken to Canada Fibers Ltd. Arrow Road Material Recovery Facility. The plant is located at 122 Arrow Road, Toronto, Ontario, M9M 2M1. The paper is sorted and baled and sent to various paper mills across South Eastern Canada.
- **CANS, BOTTLES & PLASTICS** are picked up by All Waste and taken to Canada Fibers Ltd. Arrow Road Material Recovery Facility. The plant is located at 122 Arrow Road, Toronto, Ontario, M9M 2M1. Plastics are sent to Urban Polymers and broken down to flakes or pellets then sold to various recyclers.

Material Type	Equipment Total and Method of Service	Frequency
Waste	1 roll off compactor	on-call
Cardboard (OCC)	1 roll off compactor	on-call
Cans/Bottles/Plastics/Glass	3 x 95 gallon totes- rear load	1 x week
Mixed Paper	23 x 95 gallon totes- rear load	1 x week
Wood	1 roll off 40 yard bin	on-call

Appendix D

Pre-Audit Questionnaire

Company Name:	Mobile Climate Control
Address:	7540 Jane St., Vaughan, ON
Product Manufactured	heating, cooling, ventilation and air conditioning for buses, trucks, construction, compact, agricultural, forestry, mining, material handling, utility and military vehicles.
Number of Employees	310
Do Employees Work More Than 16,000 hours per month combined?	Yes
# of Shifts per Day:	3
Number of days operational per week and year:	293 per year
Waste and Recycling Hauler:	All Waste Removal Urban Waste Recycling Canada Fibers Ltd.
Organics Recycling Program:	No
Audit On-Site or Off-Site	On-Site
Are there any dangerous/hazardous materials that could end up in the waste? (broken glass, sharps, chemicals, etc.)?	No
Are there any current renovations taking place?	No
Onsite Contact:	Boris Sukovski
Full Contact and Mailing Information for Person Receiving Waste Audit Report:	Boris Sukovski Director of Quality, North America Mobile Climate Control 905-482-2768 boris.sukovski@mcc-hvac.com

Appendix E

Report of Waste Audit

Ministry of the Environment & Climate Change Waste Form

Industrial, Commercial and Institutional Establishments

As required by O. Reg. 102/94

- This report must be prepared 6 months after becoming subject to O. Reg. 102/94 and a copy retained on file for at least five years after it is prepared, and be made available to the ministry upon request.*
- For large construction and demolition projects, please refer to the forms included with "A Guide to Waste Audits and Waste Reduction Work Plans for Construction and Demolition Projects as Required Under Ontario Regulation 102/94" (revised July 2008)*

I. General Information

Name of Owner and/or Operator of Entity(ies) and Company Name: Mobile Climate Control			
Name of Contact Person: Boris Sukovski Director of Quality, North America Mobile Climate Control		Telephone #: 905-482-2768	Email address: boris.sukovski@mcc-hvac.com
Street Address(es) of Entity(ies): 7540 Jane St.			
Municipality: Vaughan			
Date: December 2017			
Type of Entity (check one)			
Retail Shopping Establishments	<input type="checkbox"/>	Hotels and Motels	<input type="checkbox"/>
Retail Shopping Complexes	<input type="checkbox"/>	Hospitals	<input type="checkbox"/>
Office Buildings	<input type="checkbox"/>	Educational Institutions	<input type="checkbox"/>
Restaurants	<input type="checkbox"/>	Large Manufacturing Establishments	<input checked="" type="checkbox"/>

Note: O. Reg. 102/94 does not apply to multi-unit residential buildings.

II. Description of Entity

Provide a brief overview of the entity(ties):

Mobile Climate Control is located at 7540 Jane St., Vaughan, ON. There are 310 employees that work over 3 shifts in one day. The plant is closed 72 days per year.

MCC develops heating, cooling, ventilation and air conditioning for buses, trucks, construction, compact, agricultural, forestry, mining, material handling, utility and military vehicles.

III. How Waste is Produced and Decisions Affecting the Production of Waste

Categories of Waste	How Is the Waste Produced and What Management Decisions/Policies Affect Its Production?
Aluminum food and beverage cans	Generated by occupants purchasing beverage containers in the building and by bringing containers from home and purchasing outside the building.
Glass food and beverage bottles	(same as Aluminum food and beverage cans)
Steel food and beverage cans	(same as Aluminum food and beverage cans)
PET (#1) plastic food and beverage bottles	(same as Aluminum food and beverage cans)
HDPE (#2) plastic jugs, crates, totes and drums	(same as Aluminum food and beverage cans) Additionally, may be generated from material or supplies from the facility.
LDPE (#4) plastic film	(same as Aluminum food and beverage cans) Additionally, may be generated from material or supplies from the facility.
Polystyrene (#6)	(same as Aluminum food and beverage cans) Additionally, may be generated from material or supplies from the facility.
Other Plastics	(same as Aluminum food and beverage cans) Additionally, may be generated from material or supplies from the facility.
Cardboard	Cardboard is generated through new supplies and materials from the facility. Cardboard is used for convenience packaging.
Paper Products Recycling Program: Fine paper, Newsprint, Boxboard shoe boxes, cereal boxes, etc., Glossy magazines, catalogues, flyers	Office paper is generated by occupants printing documents on the printers and from incoming faxes.
Washroom Paper Hand Towels	Generated by occupants in the washrooms. They are used for hand drying.
Confidential Shredding	Shredding is generated by occupants when they dispose of confidential documents.
Organics	Generated by occupants eating/preparing food in the building.
Scrap Wood	Generated by materials being delivered to the facility or from process conducted within the facility.
Wood Skids	Generated by materials being delivered or removed from the facility.
Toner Cartridges	Generated by occupants. Some occupants use reconditioned toner cartridges and some send back with their supplier.
Scrap Metal	Generated by materials being delivered to the facility or from process conducted within the facility.
Plastic Strapping	Generated inside the building from operations.
Batteries	Generated inside the building from operations.
Wires, Motors, Contaminated Metals	Generated inside the building from operations.
Plastic Hose Reels	Furniture can be sent to charities or recycled when occupants no longer need it.
Electronic Waste	Generated by occupants. E-waste is sent for reuse or recycling when the occupant has no further need for it.
Gloves	Generated inside the building from operations.
Reusable Plastic Bins	Generated inside the building from operations.
Fluorescent Tubes	Generated inside the building from operations.
Reusable Motor Packaging Trays	Generated inside the building from operations.

IV. Management of Waste

Category	Waste to be Disposed	Reused or Recycled Waste
Aluminum food and beverage cans	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	Occupants place in containers provided. Cleaners and staff are responsible for collecting and staging for pickup.
Glass food and beverage bottles	(same as Aluminum food and beverage cans)	(same as Aluminum food and beverage cans)
Steel food and beverage cans	(same as Aluminum food and beverage cans)	(same as Aluminum food and beverage cans)
PET (#1) plastic food and beverage bottles	(same as Aluminum food and beverage cans)	(same as Aluminum food and beverage cans)
HDPE (#2) plastic jugs, crates, totes and drums	(same as Aluminum food and beverage cans)	(same as Aluminum food and beverage cans)
LDPE (#4) plastic film	(same as Aluminum food and beverage cans)	(same as Aluminum food and beverage cans)
Polystyrene (#6)	(same as Aluminum food and beverage cans)	(same as Aluminum food and beverage cans)
Other Plastics	(same as Aluminum food and beverage cans)	(same as Aluminum food and beverage cans)
Cardboard	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	Occupants place in designated cardboard collection bin for storage before pickup.
Paper Products Recycling Program: Fine paper, Newsprint, Boxboard shoe boxes, cereal boxes, etc., Glossy magazines, catalogues, flyers	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	Occupants place in containers provided. Cleaners are responsible for collecting and staging for pickup.
Washroom Paper Hand Towels	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	Occupants place in containers provided. Cleaners are responsible for collecting and staging for pickup.
Confidential Shredding		Occupants place material into shredding bin to be destroyed by a secure contractor.
Organics	Material to be placed in waste	
Scrap Wood	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	This material is to be placed into a collection bin for storage until it is picked up.
Wood Skids	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	There is a take a skid leave a skid policy in place.
Toner Cartridges	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	Occupants send back to suppliers for reuse and recycling.
Scrap Metal	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	This material is to be placed into a collection bin for storage until it is picked up.
Plastic Strapping	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	If there is a construction project, construction/demolition material is collected in a bin.
Batteries	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	Occupants place batteries in designated bins. Batteries are stored until arrangements are made for material to be picked up by an authorized collector.
Wires, Motors, Contaminated Metals	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	This material is to be placed into a collection bin for storage until it is picked up.
Plastic Hose Reels	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	This material is to be placed into a collection bin for storage until it is picked up.

Electronic Waste	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	Occupants place E-waste in designated bins. E-waste is stored until arrangements are made for material to be picked up by an authorized collector.
Gloves	Material to be placed in waste.	
Reusable Plastic Bins	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	Reused
Fluorescent Tubes	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	Fluorescent tubes are stored until arrangements are made for material to be picked up by an authorized collector.
Reusable Motor Packaging Trays	Material is periodically disposed in garbage due to employees' lack of participation for the recycling program.	Reused

Note: When completing this form, write "n/a" in the columns where the entity will not produce any waste for a category of waste.

V. Estimated Quantity of Waste Produced Annually

V. Estimated Quantity of Waste Produced Annually												
	Estimated Amount of Waste Produced in Metric Tonnes											
	Generated			Reused			Recycled			Disposed		
Categories of Waste	"A" Base Year 2015	"B" * Current Year 2016	"C" * Change (A- B)	"A" Base Year 2015	"B" * Current Year 2016	"C" * Change (A- B)	"A" Base Year 2015	"B" * Current Year 2016	"C" * Change (A- B)	"A" Base Year 2015	"B" * Current Year 2016	"C" * Change (A- B)
Aluminum food and beverage cans	1.17	0.95	0.22				0.99	0.85	0.14	0.18	0.10	0.09
Glass food and beverage bottles	1.17	0.95	0.22				0.99	0.85	0.14	0.18	0.10	0.09
Steel food and beverage cans	0.59	0.47	0.11				0.50	0.43	0.07	0.09	0.05	0.04
PET (#1) plastic food and beverage bottles	0.59	0.47	0.11				0.50	0.43	0.07	0.09	0.05	0.04
HDPE (#2) plastic jugs, crates, totes and drums	0.59	0.47	0.11				0.50	0.43	0.07	0.09	0.05	0.04
LDPE (#4) plastic film	0.59	0.47	0.11				0.50	0.43	0.07	0.09	0.05	0.04
Polystyrene (#6)	0.59	0.47	0.11				0.50	0.43	0.07	0.09	0.05	0.04
Other Plastics	6.44	5.21	1.23				5.45	4.69	0.76	1.00	0.53	0.47
Cardboard	114.67	107.59	7.08				110.99	104.07	6.92	3.68	3.52	0.16
Paper Products Recycling Program: Fine paper, Newsprint, Boxboard shoe boxes, cereal boxes, etc., Glossy magazines, catalogues, flyers, Yellow pages books	40.19	44.31	-4.12				36.72	41.64	-4.92	3.47	2.67	0.80
Washroom Paper Hand Towels	69.06	73.05	-3.99				64.28	67.96	-3.68	4.78	5.09	-0.31
Confidential Shredding	0.00	0.00	0.00				0.00	0.00	0.00	0.00	0.00	0.00
Organics	0.83	1.93	-1.10				0.00	0.00	0.00	0.83	1.93	-1.10
Scrap Wood/Wood Skids	89.55	113.05	-23.50				89.55	113.05	-23.50	0.00	0.00	0.00
Toner Cartridges	0.13	0.11	0.02				0.13	0.11	0.02	0.00	0.00	0.00
Scrap Metal	475.13	459.99	15.14				475.13	459.99	15.14	0.00	0.00	0.00
Construction and Demolition	0.00	0.00	0.00				4.60	0.00	4.60	0.00	0.00	0.00
Batteries	0.25	0.15	0.10				0.25	0.15	0.10	0.00	0.00	0.00
Plastic Hose Reels	6.10	6.13	-0.03				6.10	6.13	-0.03	0.00	0.00	0.00
Furniture	0.00	0.00	0.00				0.00	0.00	0.00	0.00	0.00	0.00
E-waste	0.04	0.04	0.00				0.04	0.04	0.00	0.00	0.00	0.00
Wires, Motors, Contaminated Metals	9.50	9.56	-0.06				9.50	9.56	-0.06	0.00	0.00	0.00
Reusable Plastic Bins	3.00	2.73	0.27				3.00	2.73	0.27	0.00	0.00	0.00
Reusable Motor Packaging Trays	0.00	0.00	0.00				0.00	0.00	0.00	0.00	0.00	0.00
Office Furniture	0.00	0.00	0.00				0.00	0.00	0.00	0.00	0.00	0.00
Fluorescent tubes	0.15	0.15	0.00				0.15	0.15	0.00	0.00	0.00	0.00
Non-Recyclable Waste	45.17	49.44	-4.27				0.00	0.00	0.00	45.17	49.44	-4.27
Total	865.49	877.71	-12.22	0.00	0.00	0.00	810.34	814.10	-3.76	59.75	63.61	-3.86
Percent Change (total C ÷ total A x 100)			-1.41%			0.00%			-0.46%			-6.46%
Note: When completing this form, write "n/a" in the "Estimated Amount of Waste Produced" column where the entity will not produce any waste for a category of waste.												
* Fill out these columns each year following the initial waste audit or baseline year to determine the progress that is being made by your waste reduction program.												

VI. Extent to Which Materials or Products Used or Sold by the Entity Consist of Recycled or Reused Materials or Products

Please answer the following questions:

1. Do you have a management policy in place that promotes the purchasing and/or use of materials or products that consist of recycled and/or reused materials or products? If yes, please describe.

No, but Mobile Climate Control tries to purchase 'green' products including those that contain recycled and/or reused materials or products, if available and feasible.

2. Do you have plans to increase the extent to which materials or products used or sold* consist of recycled or reused materials or products? If yes, please describe.

Yes. The washroom paper hand towels and toilet paper are made of recycled materials.

* Information regarding materials or products "sold" that consist of recycled or reused materials or products is only required from owner(s) of retail shopping establishments and the owner(s) or operator(s) of large manufacturing establishments.

Please attach any additional page(s) as required to answer the above questions.

I hereby certify that the information provided in this Report of Waste Audit is complete and correct.

Signature of authorized official:

Title:

Date:

Ministry of the Environment & Climate Change Waste Form

Report of Waste Reduction Work Plan Industrial, Commercial and Institutional Establishments As required by O. Reg. 102/94

This report must be prepared 6 months after becoming subject to O. Reg. 102/94 and a copy retained on file for at least five years after it is prepared, and be made available to the ministry upon request.

I. General Information

Name of Owner and/or Operator of Entity(ies) and Company Name: Mobile Climate Control			
Name of Contact Person: Boris Sukovski Director of Quality, North America Mobile Climate Control		Telephone #: 905-482-2768	Email address: boris.sukovski@mcc-hvac.com
Street Address(es) of Entity(ies): 7540 Jane St.			
Municipality: Vaughan			
Date: December 2017			
Type of Entity (check one)			
Retail Shopping Establishments	<input type="checkbox"/>	Hotels and Motels	<input type="checkbox"/>
Retail Shopping Complexes	<input type="checkbox"/>	Hospitals	<input type="checkbox"/>
Office Buildings	<input type="checkbox"/>	Educational Institutions	<input type="checkbox"/>
Restaurants	<input type="checkbox"/>	Large Manufacturing Establishments	<input checked="" type="checkbox"/>

Note: O. Reg. 102/94 does not apply to multi-unit residential buildings.

II. Description of the Entity

Provide a brief overview of the entity(ties)

Mobile Climate Control is located at 7540 Jane St., Vaughan, ON. There are 310 employees that work over 3 shifts in one day. The plant is closed 72 days per year.

MCC develops heating, cooling, ventilation and air conditioning for buses, trucks, construction, compact, agricultural, forestry, mining, material handling, utility and military vehicles.

III. Plans to Reduce, Reuse and Recycle Waste

Waste Category (as stated in Part V of your "Report of a Waste Audit")	Source Separation and 3Rs Program
Aluminum food and beverage cans	Reduce: Occupants will be encouraged to use travel mugs and bottles, instead of take-out cups. Reuse: Occupants will be encouraged to use ceramic mugs provided instead of disposable plastics and paper cups. Recycle: Occupants will be provided with instructions via email. Receptacles will be provided. Occupants place material into centralized containers. Cleaners will empty centralized containers into bulk container for collection by recycling company.
Glass food and beverage bottles	(Same as Aluminum food and beverage cans)
Steel food and beverage cans	(Same as Aluminum food and beverage cans)
PET (#1) plastic food and beverage bottles	(Same as Aluminum food and beverage cans)
HDPE (#2) plastic jugs, crates, totes and drums	Reduce: Use/produce less of this material Reuse: Large containers, drums or similar items may be reused for same/additional material storage. May also return to supplier if applicable. Recycle: (Same as Aluminum food and beverage cans)
LDPE (#4) plastic film	Reduce: Use/produce less of this material Reuse: Material such as stretch/pallet wrap may be reused as a packaging material. May also return to supplier if applicable. Recycle: (Same as Aluminum food and beverage cans)
Polystyrene (#6)	Reduce: Use/produce less of this material Reuse: Material may be reused as a packaging material. May also return to supplier if applicable. Recycle: (Same as Aluminum food and beverage cans)
Other Plastics	(Same as Aluminum food and beverage cans)
Cardboard	Recycle: Cleaners and staff are to collect cardboard and stage for collection.
Paper Products Recycling Program: Fine paper, Newsprint, Boxboard shoe boxes, cereal boxes, etc., Glossy magazines, catalogues, flyers	Reduce: Occupants will be encouraged to print on both sides of each sheet. Reuse: Discarded paper with print only on one side will be used for note pads/scrap. Recycle: Occupants will be provided with instructions via email. Receptacles will be provided. Occupants place material into centralized containers. Cleaners will empty centralized containers into bulk container for collection by recycling company.
Washroom Paper Hand Towels	Recycle: Receptacles will be provided. Occupants place material into centralized containers. Cleaners will empty centralized containers into bulk container for collection by recycling company.
Confidential Shredding	Recycle: Occupants place material into shredding bin to be destroyed by a secure contractor.
Organics	Material to be placed in waste. Feasibility to start a program will be looked into.
Scrap Wood	Recycle: Occupants are to ensure that wood is collected in a separate bin and recycled responsibly.
Wood Skids	Reuse: Occupants and suppliers are encouraged to take a skid for reuse when they leave a skid. Recycle: All skids that are not in reusable condition are sent to a skid recycler.
Toner Cartridges	Recycle: All toners are taken back through the supplier and / or sent to recycling company to be <u>reused</u> and recycled.
Scrap Metal	Recycle: Occupants are to ensure that scrap metal is collected in a separate bin and recycled responsibly.
Plastic Strapping	Recycle: Occupants are to ensure that plastic strapping is collected in a separate bin and recycled responsibly.
Batteries	Reuse: Occupants are encouraged to use rechargeable batteries. Recycle: Batteries are recycled through an authorized collector.
Wires, Motors, Contaminated Metals	Recycle: Occupants are to ensure that Wires, Motors, Contaminated Metals are collected in a bin and recycled responsibly.
Plastic Hose Reels	Recycle: Occupants are to ensure that Plastic Hose Reels are collected in a bin and recycled responsibly.
Electronic Waste	Recycle: E-waste is recycled through an authorized collector.
Gloves	Material to be placed in waste. Feasibility to start a program will be looked into.
Reusable Plastic Bins	Reused: Bins are reused.
Fluorescent Tubes	Recycle: Fluorescent tubes are recycled through an authorized collector.
Reusable Motor Packaging Trays	Reused: Trays are reused.

IV. Responsibility for Implementing The Waste Reduction Work Plan

Identify who is responsible for implementing the Waste Reduction Work Plan at your entity(ies). If more than one person is responsible for implementation, identify each person who is responsible and indicate the part of the Waste Reduction Work Plan that each person is responsible for implementing.		
Name of Person	Responsibility	Telephone #
Boris Sukovski Director of Quality, North America Mobile Climate Control	Implement and monitor program	905-482-2768

V. Timetable for Implementing Waste Reduction Work Plan

Source Separation and 3Rs Program	Schedule for Completion
Aluminum food and beverage cans	An equipment survey will be conducted to ensure that all occupants have the proper cans, bottles and plastics receptacles along with the proper labeling and signs. This will be completed by March 2017 .
Glass food and beverage bottles	(Same as Aluminum food and beverage cans)
Steel food and beverage cans	(Same as Aluminum food and beverage cans)
PET (#1) plastic food and beverage bottles	(Same as Aluminum food and beverage cans)
HDPE (#2) plastic jugs, crates, totes and drums	(Same as Aluminum food and beverage cans)
LDPE (#4) plastic film	(Same as Aluminum food and beverage cans)
Polystyrene (#6)	(Same as Aluminum food and beverage cans)
Other Plastics	(Same as Aluminum food and beverage cans)
Cardboard	Memos will be sent out to ensure that all occupants know where cardboard is to be staged. This will be completed by March 2018 .
Paper Products Recycling Program: Fine paper, Newsprint, Boxboard shoe boxes, cereal boxes, etc., Glossy magazines, catalogues, flyers	An equipment survey will be conducted to ensure that all occupants have the proper paper receptacles along with the proper labeling and signs. This will be completed by March 2018 .
Washroom Paper Hand Towels	An equipment survey will be conducted to ensure that all occupants have the proper receptacles along with the proper labeling and signs. This will be completed by March 2018 .
Confidential Shredding	Complete. Shredding is removed from the facility by a secure contractor.
Organics	Feasibility of a program to be looked into by March 2018 .
Scrap Wood	Complete. Scrap wood is collected when generated and recycled responsibly.
Wood Skids	Complete. Skids are taken back by suppliers. Leave a skid take a skid policy.
Toner Cartridges	Complete. All toner cartridges are taken back by suppliers or recycled.
Scrap Metal	Complete. Scrap metal is collected when generated and recycled responsibly.
Plastic Strapping	Complete. Plastic strapping materials are collected by occupants when generated and recycled.
Batteries	Complete. All batteries are collected by an authorized collector for recycling.
Wires, Motors, Contaminated Metals	Complete. Wires, Motors, Contaminated Metals are collected by occupants when generated and recycled.
Plastic Hose Reels	Complete. Plastic Hose Reels are collected by occupants when generated and recycled.
Electronic Waste	Complete. All e-waste are collected by an authorized collector for recycling.
Gloves	Will look into reusing and donating. This will be completed by March 2018 .
Reusable Plastic Bins	Complete. All bins are reused.
Fluorescent Tubes	(Same as Aluminum food and beverage cans)
Reusable Motor Packaging Trays	Complete. All trays are reused.

VI. Communication to Staff, Customers, Guests and Visitors

Explain how the Waste Reduction Work Plan will be communicated to employees, customers, staff, guests/visitors and students:

A memo will be sent out to all staff and cleaners explaining the recycling programs. Attached to the memo will be signage that can post above containers and on notice boards explaining the program.

Holding "Green Team" Meetings are a good method to discuss, monitor and implement the Waste Reduction Work Plan.

All areas with a moderated amount of recycling found in their waste will be visited to work on improving program.

The Waste Reduction Work Plan will also be posted on a notice board in a public area on site.

VII. Estimated Waste Produced by Material Type and the Projected Amount (in Tonnes)

Material Categories (as stated in Part III)	Estimated Annual Waste Produced * (tonnes)	Name of Proposed 3Rs Program (as stated in Part III)	Projections to Reduce, Reuse or Recycle Waste (tonnes)			Estimated Annual Amount to be Diverted ** (%)
			Reduce	Reuse	Recycle	
Aluminum food and beverage cans	0.95	Aluminum food and beverage cans	0.09	0.05	0.66	85%
Glass food and beverage bottles	0.95	Glass food and beverage bottles	0.09	0.05	0.66	85%
Steel food and beverage cans	0.47	Steel food and beverage cans	0.05	0.02	0.33	85%
PET (#1) plastic food and beverage bottles	0.47	PET (#1) plastic food and beverage bottles	0.05	0.02	0.33	85%
HDPE (#2) plastic jugs, crates, totes and drums	0.47	HDPE (#2) plastic jugs, crates, totes and drums	0.05	0.02	0.33	85%
LDPE (#4) plastic film	0.47	LDPE (#4) plastic film	0.05	0.02	0.33	85%
Polystyrene (#6)	0.47	Polystyrene (#6)	0.05	0.02	0.33	85%
Other Plastics	5.21	Other Plastics	0.52	0.26	3.65	85%
Cardboard	107.59	Cardboard	10.76	5.38	91.45	100%
Paper	44.31	Paper	4.43	2.22	35.45	95%
Washroom Hand Paper Towels/Mixed paper	73.05	Washroom Hand Paper Towels/Mixed paper	7.30	3.65	62.09	100%
Confidential Shredding	0.00	Confidential Shredding	0.00	0.00	0.00	100%
Organics	1.93	Organics	0.19	0.10	0.10	20%
Wood/Wood Skids	113.05	Wood/Wood Skids	11.31	5.65	96.09	100%
Toner Cartridges	0.11	Toner Cartridges	0.01	0.01	0.09	100%
Scrap Metal	459.99	Scrap Metal	46.00	23.00	390.99	100%
Construction and Demolition	0.00	Construction and Demolition	0.00	0.00	0.00	100%
Batteries	0.15	Batteries	0.02	0.01	0.13	100%
Plastic Hose Reels	6.13	Plastic Hose Reels	0.61	0.31	5.21	100%
Furniture	0.00	Furniture	0.00	0.00	0.00	100%
E-waste	0.04	E-waste	0.00	0.00	0.03	100%
Wires, Motors, Contaminated Metals	9.56	Wires, Motors, Contaminated Metals	0.96	0.48	8.13	100%
Reusable Plastic Bins	2.73	Reusable Plastic Bins	0.27	0.14	2.32	100%
Reusable Motor Packaging Trays	0.00	Reusable Motor Packaging Trays	0.00	0.00	0.00	100%
Office Furniture	0.00	Office Furniture	0.00	0.00	0.00	100%
Fluorescent tubes	0.15	Fluorescent tubes	0.02	0.01	0.13	100%
Non-Recyclable Waste	49.44	Non-Recyclable Waste	n/a	n/a	n/a	

I hereby certify that the information provided in this Waste Reduction Work Plan is complete and correct.

Signature of authorized official:

Title:

Date:



Mobile Climate Control

On **November 29, 2017**, a Waste Audit was conducted at Mobile Climate Control located at 7540 Jane St. in Vaughan, ON in order to maintain compliance with Ontario Regulation 102/94 - Ministry of the Environment & Climate Change of the Environmental Protection Act.

The regulation requires that the Waste Reduction Work Plan, which is created based on the results of the Waste Audit, is posted in a public area and available for the public to view.

A Waste Reduction Work Plan provides management and staff with the ability to make continuous improvements to the facility's recycling programs, and to monitor their effectiveness. This plan reviews ways the facility can reduce, reuse and recycle all materials disposed. This includes cans/bottles/plastics, cardboard, organics, paper, washroom paper hand towels, scrap metal, scrap wood, and mixed plastics (polyethylene, polystyrene, etc...).

In order to reduce, reuse, and recycle at this building the following top 3 recommendations have been provided:

1. Conduct an equipment survey, by making sure all areas have the proper equipment and all areas and equipment have the proper signage and labeling,
2. Increase program accountability, and
3. Continue educating staff about the recycling program.

If you would like to review the full Waste Reduction Work Plan for Mobile Climate Control located at 7540 Jane St. in Vaughan, ON please contact management.

Thank you for your continued efforts to Reduce, Reuse, and Recycle.

Recycling Facts

Recycling 1 tonne of paper:

*Saves 4,100 kWh of energy
Saves 26,498 litres of water
Saves 1,438 litres of oil
Saves 17 trees
Saves 3.3 cubic metres of landfill space
Reduces greenhouse gas emissions by 1 tonne of carbon equivalent*

Recycling 1 tonne of plastic:

*Saves 5,774 kWh of energy
Saves 2,593 litres of oil
Saves 23 cubic metres of landfill space*

Recycling 1 tonne of Glass:

*Saves 42 kWh of energy
Saves 19 litres of oil
Saves 1.5 cubic metres of landfill space
Saves 3.4 kg of air pollutants from being released*

Recycling 1 tonne of aluminum:

*Saves 14,000 kWh of energy
Saves 5,882 litres of oil
Saves 7.64 cubic metres of landfill space*

Source: US EPA, 2008



URBAN RESOURCE GROUP INC.
Affiliated with Canada Fibers Ltd.