

2010 OPERATIONS PLAN









December 2, 2009

Supported by



Table of Contents

٦	3
ın	4
tion Strategy	5
ies and Focus	6
orities	
and Evaluation Process	12
	13
lget	14
	16
Fund Administration	20 26 26 27 35
	n



I – Introduction

The Continuous Improvement Fund (CIF) is a program developed through Waste Diversion Ontario (WDO), the Association of Municipalities of Ontario (AMO), the City of Toronto and Stewardship Ontario to fund municipal blue box programs to improve effectiveness and efficiency. The CIF's role is to also identify and assist in the implementation of best practices, emerging technologies and innovation that will lead to increased recovery of blue box material while promoting cost effectiveness.

The CIF comprises 20% of the annual financial obligations of the stewards to municipalities under the Blue Box Program Plan and is the successor to the Effectiveness and Efficiency Fund. The CIF program agreement among the partners is for three years starting in 2008 and could be extended should it demonstrate success in achieving its objectives and results. The stewards' obligation to the CIF commenced on January 1, 2008 with the operation of the fund starting on May 1, 2008.

The CIF Operation Plan is developed on an annual basis to meet the objectives established in the 3-year Strategic Plan as agreed to by the program partners and approved by the blue box Municipal Industry Program Committee (MIPC) and the WDO Board. This is the third annual operations plan for the Continuous Improvement Fund.

In general, the CIF will demonstrate a bias toward and seek to allocate its funding to projects that:

- Increase cost-effectiveness, improve performance and/or increase diversion of Blue Box materials in one or more of a predefined set of priority areas;
- Can be implemented across multiple municipalities and/or represent collaborative efforts on behalf
 of two or more municipalities to share facilities, resources and expertise; and
- · Generate quantifiable, measured positive results.

The CIF will also seek to equitably distribute its funding in such a way that a majority of Ontario municipalities derive tangible benefits from either their direct participation in funded projects or the application of knowledge and results generated and shared by the CIF through other funded initiatives.

The 2010 CIF Operations Plan presents the current CIF Committee priorities and highlights the successes of the first two years of operations.











2 – Strategic Plan

The Municipal Industry Program Committee (MIPC) developed the strategic plan (available on CIF's website www.wdo.ca/cif) for CIF in 2007. The emphasis of the strategic plan was to develop projects with municipalities according to the funding proportions outlined in Figure 1.

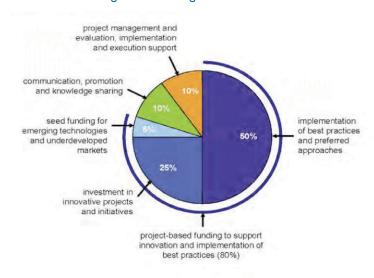


Figure I - Strategic Plan Priorities

For 2009 the CIF Committee expanded upon the strategic plan and established the following priorities:

- 70% of the funds were to be spent on efficiency projects (i.e. lowering/controlling costs).
- 30% of the funds were to be spent on effectiveness projects (i.e. increasing blue box material capture).
- Efficiency projects should focus on material recovery facility optimization and rationalization and new technology.
- 60% of the effectiveness funding should focus on ways to increase the collection and processing
 of packaging materials not currently collected in municipal blue box programs but are part of the
 packaging waste stream.
- Provide higher levels of project funding to early adopters to encourage municipalities to make program changes.

For 2010 the funding allocations will continue to be consistent with the Strategic Plan. Further, CIF will focus on a specific series of initiatives and projects as identified in Section 4.



3 – Communication Strategy

In the spring of 2009, CIF undertook a survey of its municipal clients and stakeholders. The results of the survey revealed that while both groups were satisfied with many aspects of the CIF's work, there was confusion about our mandate and approach to working with clients. There was also a perceived need for improved communications.

In response to these findings, CIF has developed a communication strategy. The strategy addresses four distinct sets of issues and sets out a plan to:

- Strengthen two-way communications between CIF and our clients, so that we can better communicate with and assist them in developing their projects;
- Develop clear and consistent messages to promote better understanding of CIF's goals, project opportunities and priorities;
- Establish CIF's image and reputation as a promoter of best practices and innovation, and a valued partner to municipalities who want to expand and enhance the efficiency of their blue box programs; and,
- Create a set of communication tools, including a monthly e-newsletter for clients, a twice-a-year newsletter targeted at industry stakeholders, a series of "product brochures" detailing CIF funding opportunities, and improvements to the website.

An important focus for our communications throughout 2010 will be the sharing of project success stories. There is no better way to encourage the adoption of best practices and innovative techniques in blue box collection and processing than to publicize the successful experiences of communities across the province that are improving the efficiency and effectiveness of their programs with the assistance of CIF funding. Project stories will be a highlighted in our newsletter, on our website and in our presentations at ORW workshops and industry conferences.

Enhancing two-way communications with our clients is also a priority. Opportunities for direct engagement include the twice-yearly Ontario Recycler Workshops, the monthly Plastics Projects teleconferences, the discussions and activities of the Multi-residential Recycling working group, and direct contacts and visits by CIF staff to communities across Ontario.

To assist us in gathering client feedback and evaluating the success of the communications strategy, we are putting in place a set of monitoring and measurement techniques to gauge client and stakeholder interest in the issues we raise in our communications. Specifically, we are conducting a series of mini-surveys and polls through the monthly *CIF Connections* e-newsletter. We are also measuring client and stakeholder response to different themes and topics that are discussed in the newsletter. Additional client feedback mechanisms and evaluation measures will be put in place as our communications plan is rolled out.



4 – Fund Priorities and Focus

The priorities and focus of the fund are developed by MIPC and the CIF Committee to meet the direction established in the CIF Strategic Plan. The priorities are reviewed on an annual basis and modified each year to meet the current needs of the program and the financial realities of the blue box program in Ontario.

The priorities and focus for 2010 are to direct funds to assist municipalities to implement the best practices established by WDO through the KPMG Best Practices research and those identified by CIF. Innovation projects will seek to address future changes to the blue box program that may result from changes to the Waste Diversion Act and Blue Box Program Plan and the changing composition of materials in the blue box.

4.1 - 2008/09 Summaries

The budget allocation for projects in 2009 was as follows:

Sorted by CIF Committee Priority Area	Number of Approved Projects	Approved Funding	Total Project Value	Total Funding (\$millions)	Remaining Funds (\$millions)	Budgetted Percentage	Actual Percentage
Increase Existing Materials	26	\$2,966,260	\$12,988,712	\$3.220	\$0.254	12%	21%
Increase New Materials	1	\$10,080	\$10,080	\$4.830	\$4.820	18%	0%
Geographic Optimization	22	\$5,535,215	\$24,047,989	\$11.271	\$5.736	42%	40%
Technology Improvements	20	\$4,759,100	\$9,707,601	\$5.636	\$0.877	21%	34%
Other	15	\$587,850	\$824,729	\$1.879	\$1.291	7%	4%
Total	84	\$13,858,505	\$47,579,111	\$26.836	\$12.977		

As of the writing of this report 84 projects have been approved for funding worth \$13.86 million. These projects were funded between 25% and 100% based on the levels noted in Table 1. When these projects are successfully implemented municipalities will have reduced annual operating costs by over \$4.1 million per year and will have increased processing capacity by over 100,000 tonnes per year. These annual savings represent an average 3.4 year payback on the invested funds.

An additional 21 projects are under review representing a funding request of \$5.3 million. There were 3 applications for funding that were rejected in 2009. A complete list of projects is in Appendix 7.6.

Staff directed initiatives also resulted in the development of 4 best practices and new plastics reprocessing capacity.

The best practices developed in 2009 were:

- Multi-residential evaluation and container requirements;
- Standard form of processing and collection contracts;
- Multi-residential promotion and education; and
- · Rural automated collection.

Table I – 2009 Funding Ranges

Project Type	Funding Range
Innovation	67-75%
Best Practices	25-50%
Communication	50%
Emerging Technologies	75-100%



4.2 - 2010 Priorities

The blue box program in Ontario is undergoing an "unknown" period as Waste Diversion Ontario, Stewardship Ontario, municipalities and the Minister of the Environment discuss full extended producer responsibility (EPR). Municipalities question whether or not to invest municipal tax dollars in the blue box program and stewards question the extent of operational control if a change to 100% EPR happens. Changes could also require material specific recovery rates that would dramatically change the composition of material collected and have significant operational and cost impacts on the system. The Minister of the Environment has stated that a review of the Waste Diversion Act will be completed by the spring of 2010.

CIF's role is to assist municipalities to invest in program changes and infrastructure improvements that will benefit the blue box program in both the short-term and long-term, regardless of whom is in ultimate control of the system. Implementation of better practices, best practices, innovation and regionalization of services will provide more efficient and effective programs.

Municipalities that want to improve their programs need to determine what role they may play if full EPR is implemented. Those that want to continue to be a service provider will want to access CIF funds. Stewardship Ontario and municipalities want to ensure that the CIF contributes to the long-term objectives of controlling costs and improving blue box infrastructure to meet the future program needs.

CIF can assist all stakeholders in meeting their objectives. CIF will consider the merits of a project proposal and evaluate it according to:

- Does it improve costs?
- · Does it increase tonnage?
- Are the results sustainable in a full EPR program where there is a consolidation of programs and facilities?
- Are capital costs recovered in the short-term through project savings?
- Is the project an incremental approach in the event of full EPR?
- Full EPR might not be implemented for 5-7 years. Are short-term problems solved in the meantime that improve effectiveness and efficiency?
- Are long-term solutions developed for plastics and paper packaging?

For 2010 the CIF will build upon its successes and focus on the following project initiatives to meet the requirements of the Strategic Plan:

- WDO best practices;
- Multi-residential collection capacity;
- · Innovation in energy efficiency, plastics processing and reprocessing, transportation technologies;
- Innovative MRF and transfer station upgrades;
- · Managing difficult materials;
- · Automated collection; and
- Promotion and education programs.

Each of these initiatives is discussed in the following sections of this report. The resulting budget breakdown is in Section 6.



4.3 – WDO Best Practices

In 2009 MIPC implemented payment of steward fees to municipalities for 2010 based, in part, on the best practices identified by KPMG in 2007¹. WDO is collecting information from municipalities through its data call to determine compliance with the following eight fundamental best practices:

- Development and implementation of an up-to-date plan for recycling as part of an Integrated Waste Management Plan;
- Multi-municipal planning approach to collection and processing of recyclables;
- Establishing defined performance measures including diversion targets and monitoring and a continuous improvement program;
- · Optimization of operations in collections and processing;
- Training of key program staff in core competencies;
- · Appropriately planned, designed, and funded promotion and education program;
- Established enforced policies that induce waste diversion; and
- · Following generally accepted principle (GAP) for effective procurement and contract management.

Some municipalities have implemented some or all of these best practices while others have not. For others, the expense of developing and implementing, for example, an Integrated Waste Management Plan or an enhanced promotion and education program is unattainable.

CIF will assist municipalities in addressing all of these best practices but recognizes that it has limited financial resources. Training support will continue to be addressed through the Effectiveness and Efficiency \$1.7 million training program. The 2010 Operations Plan will fund specific best practice initiatives to set budget limits as outlined in Section 6. The primary focus areas are:

- Development of integrated recycling plans for small municipalities;
- · Provision of larger blue boxes;
- · Co-operative marketing; and
- Promotion and education.

The development of an integrated recycling plan varies by municipality depending on the variety of services it provides and typically whether or not it owns a landfill site. Costs to develop a plan can range from a few thousand dollars for a small community to hundreds of thousands for a larger one. To assist municipalities to develop an integrated recycling plan CIF will:

- Develop a standard template that outlines the essential elements of an integrated recycling plan that would meet WDO's best practice definition;
- Fund 75% of the cost of an integrated recycling plan up to a maximum of \$15,000 each for municipality who has never developed a plan or if the plan is older than five years; or

KPMG; "Blue Box Program Enhancement and Best Practices Assessment Project", July 31, 2007



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• Fund 90% of the cost of a joint integrated recycling plan up to a maximum of \$45,000 if neighbouring municipalities develop a coordinated plan.

WDO has identified that providing free collection containers to residents is a best practice. Many municipalities charge residents and multi-residential property managers for blue boxes/carts and providing free boxes will increase municipal budgets. To assist municipalities to implement this best practice CIF will:

- Fund 50% of the cost of up to 200,000 new recycling containers. These containers are to have a capacity of at least 22 gallons with a preference for 24 or 25 gallons; and
- Work with municipalities to jointly tender for the purchase of these containers to ensure effective purchasing economies of scale.

Municipalities across the province have developed award winning promotion and education programs for the blue box program and have determined that this investment does increase waste diversion. The challenge for some municipalities is that there are insufficient budgets to develop municipal specific media and deliver the message. In other cases the \$I per household expenditure recommended by KPMG does not provide an adequate budget for smaller municipalities. To assist municipalities to implement the multitiered approach to promotion and education as required by WDO's best practice CIF will:

- Expand access to the web based application that CIF developed for standardized print promotion and education material for multi-residential programs;
- Develop a web based application for standardized print promotion and education for small curb side programs; and
- Fund up to 70 municipalities with less than 10,000 households up to \$5,000 each for print media production and mailing costs.

4.4 – Multi-residential Collection Capacity

In 2009 CIF developed a best practice policy (see Appendix 7.7) to implement adequate collection capacity in multi-residential buildings. The policy provides a framework for funding recycling bin containers to meet the capacity requirements determined through a thorough evaluation process. CIF staff estimate that the implementation of this best practice will cost up to \$3 million province wide. In 2010 CIF will:

- Fund up to \$35 per building to evaluate and implement the best practice policy in multi-residential recycling;
- Fund 50% of the cost for additional multi-residential collection bins or carts to achieve the best practice capacity of one blue box per unit. CIF has budgeted a total of \$1 million; and
- Work with municipalities to jointly tender for the purchase of these containers to ensure effective purchasing economies of scale.

The full implementation of this project has the potential to add over 100,000 tonnes of new material to the system over the next five years.



4.5 – Innovation

Innovation falls into a number of project types; MRF upgrades, plastics processing, energy efficiency, automated collection and new technologies. The 2010 budget establishes each of these as important areas of focus. In 2010 and 2011 CIF will implement the strategy by:

- · Work with the City of Toronto to develop its new, state of the art MRF;
- Investigate and support energy efficiency upgrades at MRFs;
- Develop blue box transfer stations;
- Investigate opportunities to introduce new fuel efficient collection vehicles using compressed natural gas or hybrid technologies;
- · Support MRF equipment and facility upgrades; and
- Work in conjunction with municipalities and Stewardship Ontario to develop a long-term solution to plastic packaging.

4.6 – Automated Collection

CIF identified automated collection as a best practice in 2009 through its review of Bluewater Recycling Association's conversion to a single stream program. Bluewater experienced a 30% increase in collection efficiency and a 10% overall reduction in program costs. Other municipalities are considering converting to automated curbside collection and can be assisted by CIF. In 2010 CIF will:

- Fund 50% of the cost of 200,000 carts for programs that are transitioning from a curbside blue box program to automated curbside cart collection;
- Work with municipalities to jointly tender for the purchase of these containers to ensure effective purchasing economies of scale; and
- Fund 50% or up to \$50,000 per vehicle towards the incremental cost of automated collection vehicles compared to manual side loader vehicles. It is estimated that 35 vehicles would be needed to serve 200,000 carts/households.

There will be limited interest in a change to automated collection as it is only an option for a municipality when renewing its existing collection contract. It is believed that up to five programs (out of 208 programs) will move to automated collection over the next five years.

4.7 – Changing Composition of Materials

Packaging changes in the marketplace are impacting the composition of material in the blue box program. Changes include the move from HDPE bottles to PET, more laminated plastics, coated cardboard and large size containers to name a few. The reduction in the amount of newsprint is also having an impact. These changes affect production capabilities in the MRFs as the burden depth, density and number of containers impact the ability and cost to effectively separate materials. In some cases these changes also increase MRF residues or decrease market revenues, as the packaging is not being separated correctly.

In 2010 CIF will allocate funds to study composition changes, impacts on MRF operations and designs, and work with municipalities to implement process changes in their MRFs.



4.8 – Project Support

The CIF Strategy allocates funds for project support to municipalities and to CIF staff for research and assistance. In 2008 and 2009 these funds have been used to retain consultants for small municipalities, CIF research on better and best practices, general assistance to municipalities to develop contracts and to undertake project evaluations.

In 2010 general assistance to municipalities will continue to be funded with a specific focus on contract development and best practice evaluation.

4.9 – General Funding Guidelines

The 2010 budget has provided a list of projects and budget allowances (see Table 4 in Section 6) that are the first priority for the CIF. Requests for expressions of interest for these projects will be issued by the end of January 2010. Unallocated funds, after considering all expressions of interest/formal applications, will be made available on a first come, first serve basis for municipalities to develop and implement projects other than those listed to achieve their own performance goals. CIF will support these projects using its current evaluation process (see Appendix 7.5) and funding ranges (see Table 2) to determine funding. CIF Committee may also consider funding projects at higher funding levels if it determines that a project can provide significant long-term improvements to the blue box program in Ontario.

Table 2 – 2010 Funding Ranges

Project Type	Funding Range
Innovation	67-75%
Best Practices	25-50%
Communication	50%
Emerging Technologies	75-100%



5 – Application and Evaluation Process

CIF updated its application process in 2009 to address suggestions and comments received from municipalities. The application changed from a Microsoft Excel spreadsheet to an online form. The focus of the new system is to get the main details of the proponent's projects in an expeditious format so that CIF staff is aware of potential projects. CIF staff is then able to work with the applicant to refine the project and application to ensure CIF's objectives are met.

The evaluation criteria is based on the elements outlined in the 2009 Operations Plan:

- Criterion I Increased Cost Effectiveness
- Criterion 2 Increased Blue Box Diversion
- Criterion 3 Other Program Performance Improvements
- Criterion 4 Regionalization Benefits
- Criterion 5 Payback Period and Return On Investment
- Criterion 6 Project Implementation Measures/Aspects

A copy of the evaluation form is in Appendix 7.5. The evaluation form is completed by staff and the CIF Project Committee depending on the approval authority level required in the CIF Operations Plan. In practise, applicable elements are evaluated on a scale of 1-5 based on the proponent's submission. Staff will seek clarification from the proponents if necessary to ensure that the project is fairly evaluated.

There are three mandatory criteria that must be passed for a project to receive funding:

- An appropriate payback period;
- A Consensus Criterion Score for Criteria 6 of at least 50; and
- Either a Consensus Criterion Score of at least 80 in Criterion 1,2,4 or 5, or an overall total score of at least 60 points.

Currently projects must have a payback period of less than eight years. There may be some project applications, such as for promotion and education or best practice development, where it is not possible to calculate a payback period and therefore only the latter two mandatory criteria apply. Projects that pass this hurdle will be recommended for minimum funding within the appropriate Priority Area(s) as outlined in Table 2. Funding at a level higher than the Base Funding in each range is based on the total points received in the evaluation process.

CIF also wants to incentivise early adopters of new ideas, technology and best practices. Additional points are awarded under Criterion 5 to recognise this issue.

Small, rural and northern communities may have difficulty raising funds for waste management projects due to their limited tax base. Operational costs and capital costs are also inherently more expensive due to geographical obstacles and economies of scale. CIF wants to encourage program improvements in these municipalities but the costs of doing a study or project that may cost \$20,000 to \$50,000 is significantly higher per capita compared to larger municipalities. CIF has the ability to assist small communities by funding projects directly from its project support budget.

The CIF Committee may also fund a project at higher levels than that noted in Table 2 if there are sufficient funds and the project provides a long-term strategic opportunity.



6 - Financial

6.1 – 2009 Budget Review

In 2009 the budget and expenditures were allocated as per the CIF Strategic Plan to the following areas:

- Project management 10%
- Best practices 50%
- Innovation 25%
- Emerging technologies 5%
- Communication 10%

As at October 30, 2009 79% of the best practices budget was committed to projects and project management for program improvements. The areas of significant under expenditure are communications, innovation and emerging technologies.

Municipal staff has identified the following comments explaining why the fund is undersubscribed for innovation, communications and emerging technologies:

- Confusion regarding the objectives of the fund;
- Lack of time to apply due to competing grant programs from other levels of government;
- · Lack of municipal staff time to apply;
- Municipal capital program initiatives timing not matching CIF's timeframe; and
- Uncertainty with respect to their responsibility to deliver the blue box program given the Minister of the Environment's potential changes to the Blue Box Program Plan and Waste Diversion Act.

CIF has been a success with the projects that it has invested in resulting in:

- Over 100,000 tonnes per year of new processing capacity
- Reduction in overall blue box program costs by \$4.1 million annually once the projects are implemented
- 20,000 tonnes per year of 3-7 plastics reprocessing capacity



6.2 - 2010 Budget

The steward and municipal funding for CIF for 2010 is \$16.4 million. A budget summary is presented in Table 3. All unallocated and unspent funds from 2009 plus an estimate for investment income in 2009 have been included in the 2010 budget.

The fund will be allocated as per the CIF Strategic Plan as noted in Section 2 of this report. Funds from the E&E Carry Forward and some investment income have been allocated to the Best Practices and Innovation budget line items to increase these budgets. The projects identified in Section 4 are distributed to these budget allocation areas as shown in Table 4. On November 27, 2009 MIPC approved the total CIF budget of \$28.122 million (see Table 3) but withheld \$3 million leaving \$19.15 million for projects identified in Table 4 and \$5.251 million for other projects. MIPC will provide guidance to CIF in 2010 with respect to specific project(s) for the \$3 million holdback.

The CIF Committee revised the project approval limits in Appendix 7.2 Table 3 so that the CIF Committee must approve all projects over \$250,000 in 2010.

The overall direct funding to project work will be affected in 2010 with the introduction of the Ontario Harmonized Sales Tax (HST). HST, if implemented by the Ontario Government, will be 13% for all goods and services. Currently municipalities receive a rebate for the 5% GST for projects and it is not known if they will receive a similar credit if the HST is implemented. Projects directly managed by CIF pay the 5% GST and this will increase to 13% if HST is implemented. This HST tax increase will represent a reduction of \$2.2 million in real project spending to offset the equivalent provincial sales tax rate of 8% across the board. An additional reduction of \$1.2 million in real project spending will result if the municipal GST rebate is not replaced when the HST is implemented.

Table 3 – 2010 Operating Budget

	Actual 2008 +					
	Committed(partial	Approved 2009	Expenses as at	Projected 2009		
Item	year operations)	Budget	August 31/09	Expenses	2010 Budget	2011 Budget
Project Management	,	Jungor	· luguet ou, ou		Total Danger	
Administration	\$272,443	\$674,080	\$423,254	\$634,825	\$646,060	\$558,483
Promotion	\$50,000	\$200,000	\$18,338	\$75,000	\$75,000	\$75,000
Project Support	\$109,500	\$1,718,000	\$277,477	\$590,500	\$1,961,000	\$200,000
Total Project Management	\$431,943	\$2,592,080	\$719,069	\$1,300,325	\$2,682,060	\$833,483
	Actual 2008 +	2 100000	Committed as			
	Committed(partial	Approved 2009	at August			
Muicipal Project Funding Commitments	year operations)	Budget	31/09	Projected 2009	2010 Budget	2011 Budget
Best Practices	\$196,900	\$12,961,000	\$10,044,868	\$11,553,100	\$10,647,000	
Innovation	\$2,032,250	\$6,480,000	\$2,052,250	\$217,750	\$9,314,000	
Emerging Technologies	\$308,700	\$1,296,000	\$308,700	\$91,300	\$1,820,000	
Communication	\$167,200	\$2,592,000			\$3,659,000	
Total Expenses plus New Commitments	\$3,136,993	\$25,921,080	\$13,681,837	\$13,775,275	\$28,122,060	\$833,483
Total Annual CIF Funding	\$12,939,000	\$15,045,000		\$15,045,000	\$16,410,098	\$0
Investment Income	\$180,340			\$460,000	\$200,000	
Previous Year Unallocated CIF	7-0-/	\$10,676,357		\$9,982,347	\$12,362,031	1 -
E&E Carry forward				\$649,959	\$0	\$0
Total Revenue	\$13,119,340	\$25,921,357		\$26,137,306	\$28,972,129	\$850,069
Balance at Year End	\$9,982,347	\$277		\$12,362,031	\$850,069	\$16,586



Table 4 - Project Priorities for 2010

	Project Initiative	Budget Allocation	Known Best Practices	Best Practice Development
Best Practic				
	Integrated Recycling Plans	\$1,750,000	\checkmark	
	Large Curbside Containers			
	200,000 HH @\$7	\$1,400,000	√	
	Multi-res capacity	+=/.00/000	•	
	Program 20,000 bldg @\$35 /bldg	\$700,000	√	
	Bins/Carts	\$1,000,000	· V	
	Co-operative marketing	\$200,000	V	
	ESCOs - energy efficiency	\$200,000		√
	Public space recycling	\$100,000		V
	MRF upgrades - 5@\$500k	\$2,500,000	√	√
	Transfer Stations - 4 each @ \$500K	\$2,000,000		√
Innovation				
	Automated Collection			
	50% funding Carts - 200,000 HH	\$6,500,000	√	
	\$50k Increase for Trucks - 35 ea	\$1,750,000	V	
	Polystyrene densification	\$150,000		√
Emerging Te	echnologies			
	3-7 Plastics (in addition to \$1.9M RFP)	\$250,000		√
	Plastics diversion	\$250,000		√
Communicat	tions			
	Multi-res	\$50,000	√	
	Small muni media buy/internet	423,000	•	
	70 muni @\$5,000 ea	\$350,000	√	
	Sub-total Project Initiatives	\$19,150,000		
	Approved 2010 Project Budget	\$27,401,000		
	MIPC holdback	\$3,000,000		
	Budget Remaining for Additional Projects	\$5,251,000		

6.3 - 2011 Budget

Funding for CIF currently ends at the end of 2010 unless MIPC extends the program when it considers the allocation of stewards' fees to municipalities in the summer of 2010. All funding for projects will be approved in 2010 although project expenditures may be in 2011 and beyond. Funds need to be set aside in 2010 for staff expenses in 2011 as there will be administration requirements for the projects that will continue into 2011. Employment contracts for staff extend until June 30, 2011. Staffing may be required beyond that date depending on the work required to complete all outstanding projects.

The 2010 budget has set aside administration expenses for 2.5 full time equivalent positions for 2011. This staffing resource will be reviewed in the fall of 2010, as the quantity of work outstanding will be known at time.



7 – Appendices

- 7.1 Governance
- 7.2 Fund Administration
- 7.3 Declaring a Conflict of Interest
- 7.4 Appeal Procedure
- 7.5 Evaluation Scorecard
- 7.6 Approved Project List
- 7.7 Multi-Residential Container Limit Policy



Appendix 7.1 – Governance

The WDO Board and MIPC developed the CIF under the Blue Box Program Plan setting the overall authorities and budget. The CIF Committee establishes the strategic priorities, approves large projects as well as provides direction to the CIF Project Committee and to the CIF Director who operates the program on a day-to-day basis (see Chart I).

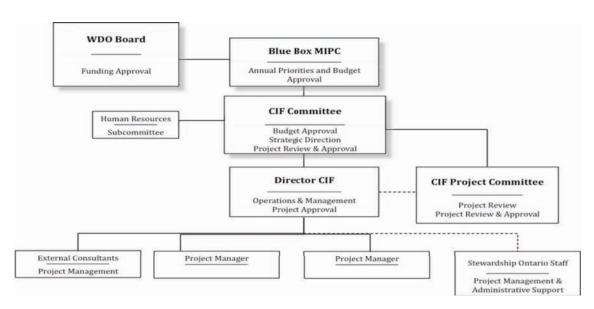


Chart I - CIF Organizational Structure

The CIF Committee is a subcommittee of MIPC and is therefore governed by the overall guidelines and rules established by WDO, subject to any policy the CIF Committee adopts within its delegated authority.

The CIF Committee membership is established as follows:

- One voting representative from the Associations of Municipalities of Ontario;
- One voting representative from the City of Toronto;
- Two voting representatives from Stewardship Ontario;
- One voting independent member-at-large selected by voting members;
- One non-voting independent Chair selected by the voting members;
- One alternate member from Stewardship Ontario (change from 2008 Plan);
- One alternate member representing Toronto and the Associations of Municipalities of Ontario (change from 2008 Plan);
- The Executive Director Waste Diversion Ontario as an observer; and
- The CIF Director as an observer.



The membership of the Committee for 2010 is shown in Table 1.

Table I - CIF Committee Membership

Representing	Member	End of Term
Chair	Doug Thomson	December 31, 2009
Association of Municipalities of Ontario	Michael Garrett	September 2010
	Milena Avramovic (alternate)	
City of Toronto	Geoff Rathbone	May 2010
Stewardship Ontario	Lyle Clarke	May 2010
	Guy Perry	May 2010
	Derek Stevenson (alternate)	
Member at Large	Jerry Powell	September 2010
Executive Director WDO	Glenda Gies	NA
Director CIFCIF Director	Andy Campbell	NA

The term of the municipal and steward members are two years with an option to extend their term. It is proposed that at least 50% of these members be replaced on an annual basis to ensure balance and infuse new ideas. The term of the Chair and member-at-large is one year with the option to extend the term.

The Committee will make its decisions based on a majority vote basis. The CIF Committee will vote on issues as required and the passing/adoption of an issue requires that:

- Four of five voting members vote in favour of the resolution if all members are present;
- A simple majority of members vote in favour if not all members are present but when a quorum is present; and
- A quorum of Committee members is present when at least four voting members are present.

The "Alternate member", as noted in Table I, will attend in the absence of a Committee member. The Committee member who cannot attend can assign his voting privilege (proxy) to the Alternate member or another member of the Committee with advance notice to the Committee Chair. The Committee will use the WDO By-law related to meeting attendance and therefore meeting attendance will be recorded.

The Human Resources Subcommittee is comprised of the CIF Committee Chairperson, Stewardship Ontario's Executive Director and the Association of Municipalities of Ontario's Executive Director.



A CIF Project Committee has been established to assist with the development of the CIF program and evaluate projects. The members of the CIF Project Committee are as follows:

- Two municipal members from AMO;
- One municipal member from the City of Toronto;
- Two Stewardship Ontario members (in addition to the SO staff working on CIF projects);
- · CIF staff; and
- Other experts as required (project specific).

The membership for the CIF Project Committee for 2010 is shown in Table 2.

Table 2 – CIF Project Committee Membership

Representing	Member	End of Term
Chair	Andy Campbell	NA
Association of Municipalities of Ontario	Rob Rennie	June 2010
	Jon Arsenault	June 2010
City of Toronto	John Baldry	June 2010
Stewardship Ontario	John Dixie	June 2010
	Vacant	June 2010
CIF Staff	Mike Birett	NA
	Clayton Sampson	NA

The term of the municipal and Stewardship Ontario members on the Project Committee would be two years with an option to extend. The committee makes its decisions on a consensus basis.



Appendix 7.2 – Fund Administration

WDO Board Approval

The stewards were obligated as of January 1, 2008 to fund the Continuous Improvement Fund and staff was retained starting May 2008 to develop an operations plan. On September 18, 2008 the WDO Board adopted the following resolution allowing the CIF to start full operations:

WHEREAS Waste Diversion Ontario has entered in an Agreement dated October 17, 2007 with the Association of Municipalities of Ontario, Stewardship Ontario and the City of Toronto (the "CIF Agreement") providing for the establishment of the Continuous Improvement Fund (the "CIF");

WHEREAS the CIF is to be used to fund projects that (i) will increase cost — effectiveness, improve performance and/or increase the diversion of blue box materials in one or more of a predefined set of priority areas; (ii) can be implemented across multiple municipalities and/or represent collaborative efforts on behalf of two or more municipalities to share facilities, resources and expertise; and (iii) will generate quantifiable, measured positive results;

WHEREAS overall responsibility for the administration of the CIF pursuant to the terms of the CIF Agreement resides with the Municipal Industry Program Committee for the Blue Box Program Plan ("MIPC-BB") of Waste Diversion Ontario;

WHEREAS Waste Diversion Ontario wishes to establish a framework of delegated authority for the administration of the CIF;

Upon motion duly made, seconded and carried, it was resolved that:

- I. Overall responsibility for the day to day administration of the CIF pursuant to the CIF Agreement is hereby delegated to MIPC-BB, subject to such directions and limitations as may be issued or imposed by the Board of Directors of Waste Diversion Ontario from time to time;
- The role of MIPC-BB in the administration of the CIF shall be as set out in the CIF Agreement and the Continuous Improvement Fund 2008 Operations Plan, a copy of which is appended hereto as Schedule "A" (the "Operations Plan");
- 3. MIPC-BB is authorized to delegate any or all of its powers and responsibilities with respect to the day to day administration of the CIF as it may see fit to the CIF Committee (as defined in the Operations Plan) which, in turn, may delegate such powers and responsibilities with respect to the day to day administration of the CIF as it may see fit to the CIF Project Committee (as defined in the Operations Plan);
- 4. MIPC-BB and any sub-committees of the Board to which the powers of MIPC-BB may have been delegated shall implement the CIF Strategic Plan, dated December 2007 and approved by the WDO Board on December 17, 2007, within the budget established annually by the Board of Directors of Waste Diversion Ontario;
- 5. Contracts with a value of more than \$50,000 will be executed by a signing officer of WDO.



MIPC Responsibilities

The Municipal Industry Program Committee (MIPC) developed the CIF program and is responsible to ensure that the CIF Committee effectively implements funding opportunities for municipalities to invest funds from blue box stewards to improve the effectiveness and efficiency of programs in Ontario. MIPC has stated that it wants the CIF Committee to act as independently as possible to fulfil the objectives outlined in the CIF Strategic Plan and this Operations Plan. As such MIPC is responsible for:

- · Approving, on an annual basis, the CIF budget and program objectives and priorities;
- Delegating operational control and financial expenditure control of the CIF fund to the CIF Committee;
- Review and revise as necessary the CIF Strategic Plan at least every 24 months; and
- Hearing and deliberating funding appeals from applicants as outlined in Section 2.4.

On September 17, 2008 MIPC adopted a resolution adopting the 2008 CIF Operations Plan and delegated authority to the CIF Committee to undertake the fiduciary responsibility and control required to fulfil the objectives of the Plan.

CIF Committee Responsibilities

The role of the CIF Committee is one of stewardship and to act as a governing board of directors. A board of directors supervises, directs and oversees the business and affairs of the CIF. The Toronto Stock Exchange Committee on Corporate Governance adopted the following as one of fourteen 'best practice guidelines' for a board of directors:

- "The Board of Directors of every corporation should explicitly assume responsibility for the stewardship of the corporation and, as part of the overall stewardship responsibility, should assume responsibility for the following matters:
 - · Development and adoption of a strategic plan;
 - The identification of the principal risks of the corporation's business and ensuring the implementation of appropriate systems to manage these risks;
 - · Succession planning, including appointing, training and managing senior management;
 - A communications policy for the corporation; and
 - The integrity of the corporation's internal control and management information systems."
- Effective Boards are involved in the broad strategic policy related activities of an organization rather than in micro-management of the day-to-day operations.



The CIF Committee is responsible to ensure that the CIF is in compliance with its obligations under the Blue Box Plan and CIF Agreement and to oversee the operations of the organization.

In particular, the CIF Committee is responsible to:

- Establish an annual budget and program priorities for approval by MIPC;
- Develop and implement blue box waste diversion program effectiveness and efficiency projects and funding opportunities and monitor the effectiveness and efficiency of those programs;
- Seek to enhance public awareness of and participation in blue box waste diversion programs;
- Seek to ensure that programs developed under CIF affect Ontario's marketplace in a fair manner;
- Establish a dispute resolution process for disputes between a funding applicant and the CIF Director or CIF Project Committee;
- Ensure the effectiveness of the approved projects is being monitored;
- Approve projects within the designated budget limits as per Table 3; and
- Access the accomplishments of the CIF and determine, on an annual basis, if the CIF should continue.

The CIF Committee is also responsible for managing its own affairs including:

- Appointing the Chair and Member-at-Large;
- Constituting the Human Resources Subcommittee;
- Developing the organization's strategic plan in conjunction with MIPC;
- · Approving the annual CIF Operations Plan and budget;
- · Monitoring the organization's performance against the strategic plan, Operations Plan and budget; and
- Maintaining the integrity of the organizations' internal financial, operating and administrative controls and management information systems.

The CIF Committee is also responsible to identify risks associated with the organizations' activities and to take all reasonable steps to ensure the implementation of appropriate systems to manage these risks.

Each Committee member has a fiduciary responsibility to act in the best interests of Waste Diversion Ontario while carrying out these obligations. Members are under a fiduciary duty to carry out the duties of their office honestly and in good faith, in the best interests of Waste Diversion Ontario and with the care, diligence and skill of a reasonably prudent person.



Each Committee member is responsible to:

- · Become generally knowledgeable about the business of recycling and waste diversion;
- Maintain an understanding of the regulatory, legislative, business, social and political environments within with Waste Diversion Ontario operates;
- · Prepare for and attend meetings;
- · Participate fully and in a meaningful way in the CIF Committee's deliberations and discussions;
- Establish an effective, independent and respected presence and a collegial relationship with other directors;
- Be vigilant to ensure that the organization is being properly managed and is in compliance with its obligations;
- · Act with integrity;
- · Use his or her ability, experience and influence constructively;
- Be available as a resource to the CIF Committee and staff;
- Respect confidentiality;
- Advise the Chair before introducing significant and previously unknown information at a CIF Committee meeting; and
- · As necessary and appropriate, communicate with the Chair and the CIF Director between meetings.

The CIF Committee Chairperson will participate in the Human Resources Subcommittee and approve the expenses of the CIF Director.

Committee members who are not employees of Stewardship Ontario, Waste Diversion Ontario, the Association of Municipalities of Ontario or any municipality in Ontario will be eligible for an honorarium and expenses for each meeting as per the current CIF Expense Policy.



CIF Director Responsibilities

The responsibilities of the CIF Director are:

- Develop and implement projects consistent with the strategic priorities identified by the CIF Committee;
- Evaluate and approve projects within the Committee's priorities and the established approval limits outlined in Table 3;
- Report to the CIF Committee, MIPC, WDO Board as required with appropriate notice;
- · Develop and administer an annual budget;
- · Hire, manage performance and supervise staff;
- Provide direction to Stewardship Ontario staff assigned to the CIF within the agreed to time commitments on CIF projects and administrative functions;
- Ensure project reporting and evaluation is completed;
- · Develop an annual operation plan and year end review;
- Prepare agendas and minutes for the CIF Committee and Project Committee;
- Facilitate CIF Project Committee meetings;
- · Manage stakeholder relationship development;
- Represent the CIF at conferences and public functions;
- Process appeals for rejected projects;
- · Develop benchmarks, milestones and evaluation criteria;
- Negotiate with project partners and stakeholders;
- · Manage and review consulting agreements;
- · Participate in the coordination of all project logistics; and
- Report quarterly to the CIF Committee on all expenditures authorized under the Director's authority as listed in Table 3.



Stewardship Ontario Responsibilities

The responsibilities of the Stewardship Ontario staff that are indirectly reporting to the CIF Director are:

- Ensure website material is up to date and posted;
- Prepare, monitor and evaluate all legal agreements for fund distributions to project partners;
- Supply all financial accounting services including management reports as required by the CIF Director;
- Project management on assigned projects;
- Provide the CIF Director with project summaries and status reports;
- Participate on the CIF Project Committee;
- Prepare promotion and education events such as the Ontario Recyclers Workshop;
- Invest CIF funds to maximize interest revenue according to the policies and procedures required by the Stewardship Ontario Board and financial auditors; and
- Issue RFPs, contracts and other legal documents as required on behalf of CIF.

Stewardship Ontario will provide legal services and be responsible for the funding agreements with project partners. Project specific legal issues such as the development of proposals or complex contacts will be funded by the project itself and will be managed by the assigned project manager (CIF or SO staff).

CIF Project Committee Responsibilities

The responsibilities of the CIF Project Committee are:

- Evaluate and approve projects within the CIF Committee's priorities and the established approval limits outlined in Table 3;
- Promote the CIF to stakeholders, municipalities and industry;
- Sign-off on final project evaluations before public posting to ensure lessons learned and results are clear and transferable to other municipalities;
- · Operate on a consensus basis for decision making; and
- Liaise with the CIF Committee and MIPC as requested.



Table 3 – Project Approval Limits

Project Type	CIF Director	Project Committee	CIF Committee
Best Practices			
MRF Rationalization	< \$50k per project	< \$250k per project	> \$250k per project
Best Practices Implementation	< \$50k per project	< \$250k per project	> \$250k per project
Multi-residential	< \$50k per project	< \$250k per project	> \$250k per project
Benchmarking & Audits	< \$50k per project	< \$250k per project	> \$250k per project
Communications & Education	< \$50k per project	< \$250k per project	> \$250k per project
Innovation	< \$50k per project	< \$250k per project	> \$250k per project
Emerging Technologies	< \$50k per project	< \$250k per project	> \$250k per project
Other	< \$50k per project	< \$250k per project	> \$250k per project

Appendix 7.3 – Declaring a Conflict of Interest

All staff, members of the CIF Committee and Project Committee are bound by the same set of confidentiality and conflict of interest rules as established by Waste Diversion Ontario and set out in it's By-Law Number 2008-I "A by-law relating to the Code of Conduct of Waste Diversion Ontario".

Appendix 7.4 – CIF Appeal Procedures

A proponent who wishes to appeal a rejection of a project must provide a written justification addressed to the CIF Director. The appeal must be dated within 30 days of the date of reception of a formal written notice of rejection. All notices of rejection must clearly spell out this appeal process. The appeal will be examined as follows:

- CIF Director decisions are appealed to the CIF Committee;
- CIF Project Committee decisions are appealed to the CIF Committee;
- CIF Committee decisions are appealed to MIPC; and
- MIPC decisions are appealed to binding arbitration as established under the arbitration rules of the Province of Ontario. Each party is responsible for their own costs of arbitration.

In all cases staff, the CIF Committee and MIPC will work with the appellant to clarify the decision and review any additional information to mitigate the issue.



Appendix 7.5 – Evaluation Scorecard



Continuous Improvement Fund Project Application Consensus Evaluation Summary

Applicant:	Review Date:			
Project Name:	CIF Project #:			
Criterion	Criterion Consensus Criterion Weighting			
1: Increased Cost Effectiveness	0	30	0.0	
2: Increased Blue Box Diversion	0	20	0.0	
3: Other Program Performance Improvements	0	10	0.0	
4: Regionalization Benefits	0	20	0.0	

Funding Recommendation

Total:

Project Payback

Did the project have a payback period less than 8 years(Yes/No)?

0

Projects Funded at the Minimum Level

5: Payback Period and Return On Investment

6: Project Implementation Measures/Aspects

Did the project have a Consensus Criterion Total score of at least 60, a Criterion 6 score of at least 50 and an acceptable payback?

0.0

0.0

30

130

Projects Funded above the Minimum Level

Did the project have a Consensus Criterion Score of at least 80 in Criterion 1,2,4,or No 5, a Criterion 6 score of at least 50 and an acceptable payback?

Project Budget	Project Budget
Innovation	\$0
Emerging Technologies	\$0
Best Practices	\$0
Promotion and Education	\$0
Total	\$0

Project Funding Range	Base Funding Level	Maximum Addition Funding	Base Funding	Additional Funding	Total Funding	Funding Percentage
Innovation (67-75%)	67%	8%	\$0	\$0	\$0	#DIV/0!
Emerging Technologies (75-100%)	75%	25%	\$0	\$0	\$0	#DIV/0!
Best Practices (25-50%)	25%	25%	\$0	\$0	\$0	#DIV/0!
Promotion and Education (50%)	50%	0%	\$0	\$0	\$0	#DIV/0!
Total			\$0	\$0	\$0	#DIV/0!

Reviewers	Comments / Recommendation
CIF Staff	
CIF Project Committee	
CIF Committee	

Evaluation Criterion 1: Improved Cost Effectiveness

Sub Criterion	Evaluation Considerations		Scoring Basis and Rationale (Evaluator to provide notes/rationale for score proposed)	Score	Weight	Weighted
	General	Refinements/Preferences Based on Project Specifics (Refine / add new evaluation considerations based on project specifics)	Scoring Basis: 0: sub-criterion not addressed; 1: minimal impact/improvement and Best Practices not applied; 5: significant impact/improvement, stated preferences are met and Best Practices fully applied	0 - 5		Score
a) Improvement in Cost Effectiveness Compared to Current Program	Use WDO Data Base	Consider next lease cost tonne if appropriate.			40	0
b) Improvement in Cost Effectiveness Compared to Other Municipalities	Use WDO Data Base	Consider next lease cost tonne if appropriate.			40	0
c) Improvement in Cost Effectiveness Compared to Theoretically Achievable	Evaluator judgement based on other programs and consideration of project specifics				20	0

Evaluation Criterion 2: Increased Blue Box Diversion

Sub Criterion	Evaluation Considerations		Scoring Basis and Rationale (Evaluator to provide notes/rationale for score proposed)	Score	Weight	Weighted
	General	Refinements/Preferences Based on Project Specifics (Refine / add new evaluation considerations based on project specifics)	Scoring Basis: 0: sub-criterion not addressed; 1: minimal impact/improvement and Best Practices not applied; 5: significant impact/improvement, stated preferences are met and Best Practices fully applied	0 - 5		Score
a) Improvement in residential Blue Box Diversion Compared to Current Generation Rate	Audit Data	Consider new capacity and/or improvements based on tonnage or volume, as applicable> Consider increase in quality and/ or value of materials.			40	0
b) Improvement in residential Blue Box Diversion Compared to Current Capture Rate	Audit Data	Consider improvements based on tonnage or volume, as applicable Consider increase in quality and/or value of materials.			40	0
a) Improvement in residential Blue Box Diversion Compared to Other Municipalities	Audit Data	Consider improvements based on tonnage or volume, as applicable Consider municipal grouping.			20	0

Evaluation Criterion 3: Other Program Performance Improvements

Sub Criterion	Evaluation Considerations		Scoring Basis and Rationale (Evaluator to provide notes/rationale for score proposed)	Score	Weight	Weighted
	General	Refinements/Preferences Based on Project Specifics (Refine / add new evaluation considerations based on project specifics)	Scoring Basis: 0: sub-criterion not addressed; 1: minimal impact/improvement and Best Practices not applied; 5: significant impact/improvement, stated preferences are met and Best Practices fully applied	0 - 5		Score
a) Ability to Adapt to Changes in Material Mix	Seasonal changes to mix; Future changes in mix				30	0
b) Ability to Process New Materials	Preference for #1-7 plastics (ex bottle grade #1-2); Preference for film plastic				30	0
c) Transferability of Funded Program Features to Other Municipalities					40	0

Total: 100

Project #:	Ü

Evaluation Criterion 4: Regionalization Benefits

Sub Criterion		Evaluation Considerations	Scoring Basis and Rationale (Evaluator to provide notes/rationale for score proposed)	Score	Weight	Weighted
	General	Refinements/Preferences Based on Project Specifics (Refine / add new evaluation considerations based on project specifics)	Scoring Basis: 0: sub-criterion not addressed; 1: minimal impact/improvement and Best Practices not applied; 5: significant impact/improvement, stated preferences are met and Best Practices fully applied	0 - 5		Score
a) Extent of Regionalization Proposed Relative to the Waste Shed					40	0
b) Extent of Proven Collaboration for Obtaining Regionalized Tonnes					30	0
c) Opportunity Cost Per Tonne for the Regional Tonnes	How do the savings compare?				30	0

Continuous Improvement Fund - Project Application Evaluation

Project #:	0	

Evaluator:

Evaluation Criterion 5: Payback Period and Return On Investment

Sub Criterion		Evaluation Considerations	Scoring Basis and Rationale (Evaluator to provide notes/rationale for score proposed)	Score	Weight	Weighted
	General	Refinements/Preferences Based on Project Specifics (Refine / add new evaluation considerations based on project specifics)	Scoring Basis:	0 - 5		Score
a) Payback Period (years) and/or Return on Investment	Preference for shorter payback periods	0: Eight years or greater 1: Five years 3: Three years 4: Two years 5: One year or less	If the project has a payback of eight years or more the project will be rejected and the total score for Criterion 5 will be zero.		30	0
b) Project Budget	Defined budget, reasonableness of costs	1: poorly defined budget 3: well defined budget 5: Costs seem appropriate, budget includes projected maintenance impacts			20	0
c) Risk of Achieving Proposed Payback	Defined project schedule, funding, contractor negotiations, inclusion of other partners	1: High Risk 3: Medium Risk 5: Low Risk			20	0
d) Early Adopter	Is the project novel?	More than seven similar projects Three to six similar projects Less than three similar projects			20	0
e) Timing of Payback	Preference for (in preferred order) immediate, then short-term, then longer- term				10	0

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Project #:	

Evaluation Criterion 6: Project Implementation Measures/Aspects

Evaluator:		

Sub Criterion		Evaluation Considerations	Scoring Basis and Rationale (Evaluator to provide notes/rationale for score proposed)	Score	Weight	Weighted
	General	Refinements/Preferences Based on Project Specifics (Refine / add new evaluation considerations based on project specifics)	Scoring Basis: 0: sub-criterion not addressed; 1: minimal impact/improvement and Best Practices not applied; 5: significant impact/improvement, stated preferences are met and Best Practices fully applied	0 - 5		Score
a) Extent of Project Readiness		No budget or Council approval Budget approved but project not started Budget approved and project underway			20	0
b) Management Team Experience		1: inexperienced team 3: Qualified team 5: Qualified staff, consultants and contractor involvement			20	0
c) Project Risks		1: High risk 5: Low risk			10	0
d) Monitoring and Reporting		Plan needs to be developed Complete plan identified with budget provision.			10	0
e) Quality of Application	Clarity, completeness and accuracy of presentation				20	0
f) Project Schedule	Clarity of presentation; Reasonableness of timeline assumptions; realistic project timing				20	0

Appendix 7.6 – Approved Project List



Continuous Improvement Fund Project Summary

List Compiled: 23-Nov-09

Summary of CIF Activity

	Number of Projects
Under Review	21
Rejected	3
Approved	84
Withdrawn	17
Total Applications	125

Summary of Project Applications Under Review

Sorted by MIPC Strategic Area	Number of Projects	Funding Request
Best Practices	14	\$2,490,000
Innovation	1	\$360,000
Emerging Technologies	2	\$2,296,000
Communication & Education	4	\$114,000
Total	21	\$5,260,000

Sorted by CIF Committee Priority Area	Number of Projects	Funding Request
Increase Existing Materials	10	\$1,706,000
Increase New Materials	1	\$8,000
Geographic Optimization	4	\$750,000
Technology Improvements	4	\$1,196,000
Other	2	\$1,600,000
Total	21	\$5,260,000

Summary of Project Approvals

Sorted by MIPC Strategic Area	Number of Approved Projects	Approved Funding	Total Project Value	Total Funding (\$millions)	Remaining Funds (\$millions)	Budgetted Percentage	Actual Percentage
Best Practices	33	\$11,026,718	\$34,946,718	\$13.992	\$2.965	50%	80%
Innovation	5	\$1,354,500	\$10,656,001	\$6.996	\$5.642	25%	10%
Emerging Technologies	4	\$403,700	\$876,000	\$1.399	\$0.995	5%	3%
Communication & Education	12	\$571,950	\$534,202	\$2.798	\$2.226	10%	4%
Project Support	30	\$501,637	\$566,190	\$1.651	\$1.149	10%	4%
Total	84	\$13,858,505	\$47,579,111	\$26.836	\$12.977		

Sorted by CIF Committee Priority Area	Number of Approved Projects	Approved Funding	Total Project Value	Total Funding (\$millions)	Remaining Funds (\$millions)	Budgetted Percentage	Actual Percentage
Increase Existing Materials	26	\$2,966,260	\$12,988,712	\$3.220	\$0.254	12%	21%
Increase New Materials	1	\$10,080	\$10,080	\$4.830	\$4.820	18%	0%
Geographic Optimization	22	\$5,535,215	\$24,047,989	\$11.271	\$5.736	42%	40%
Technology Improvements	20	\$4,759,100	\$9,707,601	\$5.636	\$0.877	21%	34%
Other	15	\$587,850	\$824,729	\$1.879	\$1.291	7%	4%
Total	84	\$13,858,505	\$47,579,111	\$26.836	\$12.977		

Note: the total funding includes 2008 and 2009 funding.

Approved Best Practices Projects

Total Funding Approved

\$11,026,718 \$34,946,718

Approved I	Projects								
App. #	Title	Description	Focus Area	Priority Area	Proponent	Funding Approved	Total Project Cost	Tonnes Increase	Project Savings
100	Creating and Maintaining a Greener Black River- Matheson	The main objectives are to Increase the number of recycling depots in BRM from 1 to 3 and incorporate recycling into all municipal operations - ie.facilites, parks and picnic areas. Includes a promotion and education.	Best Practices	Increase Existing Materials	Township of Black River - Matheson	\$41,900	\$58,900		
103	Materials Recycling Centre Viability Review	Study the potential impact of Haldimand County removing themselves and their material from the current co-ownership arrangement for the MRF with Norfolk.	Best Practices	Geographic Optimization	Norfolk and Haldimand Counties	\$19,000	\$36,000		
112	Change to weekly collection	Blue Box curbside collection expansion to unserviced condo development.	Best Practices	Increase Existing Materials	Elliot Lake	\$1,100		20	
113	Multi-res Recycling Coordinator	The Multi-Residential Working Group has recommended hiring a full or part-time coordinator to manage multi-res program improvements across Ontario.	Comm & Educ	Increase Existing Materials	CIF staff	\$120,000	\$120,000		
117	New Recycling System	Research, test and implement a new blue box recycling system as no collection system currently exists.	Best Practices	Increase Existing Materials	Township of Assiginack	\$46,500	\$46,500		
120	Integrated Waste Management Plan	Development of an integrated waste management plan as recommended in WDO's KPMG best practice report.	Best Practices	Increase Existing Materials	Township of Elizabethtown- Kitley	\$12,900	\$15,000		
121	Renfrew County MRF Plan	Preparation of a business plan to determine if the purchase of the Bauman MRF in Renfrew is appropriate.	Best Practices	Geographic Optimization	Township of McNab-Braeside	\$14,000	\$28,000		
124	Optimizing Stratfords Blue Box Program - Part 2	Goal is to ascertain and improve residential recycling performance at multi- residential facilities and landfill recycling depot. Obectives: Evaluate recycling at multi-residential facilities and identify and implement improvements.	Best Practices	Increase Existing Materials	City of Stratford	\$33,500	\$50,000		\$18,000
129	Recycling Transfer Evaluation and System Review	Evaluation of options for recycling collection and transfer for the City of Timmins.	Best Practices	Geographic Optimization	City of Timmins	\$20,000	\$35,000		
135	Automated Single Stream Processing	Goal is to convert dual stream MRF to an automated single stream processing facility. Objectives include: 1) Reduce labour costs for processing our own material by 50%; 2) Provide the ability to collect materials in a single stream so that collection costs may be reduced by 25%; 3) To be able to better able to accept material from municipalities from outside our membership; 4) Increase production capacity by 44% in order to be able to process material for municipalities outside our membership and reduce net costs per tonne due to economies of scale; 5) Provide a safer work environment for employees and reduce WSIB claims. Employees will be performing quality control vs actual manual sorting of materials.	Best Practices	Technology Improvements	Bluewater Recycling Association	\$2,000,000	\$4,000,000	20,000	\$1,000,000
137	Interim Aged MRF upgrades	Goal is to complete particular upgrades to sort lines to improve effectiveness and efficiency while new MRF is constructed. Objectives are to reduce wasted time on sort line, improve quality of sorted product, increase amount of material that can be sorted in a given time period, improve bale quality and quantity.	Best Practices	Technology Improvements	Quinte Waste Solutions	\$140,000	\$470,000		\$53,000
138	Eddy current installation	Install and Eddy current separator in MRF	Best Practices	Technology Improvements	Bruce Area Solid Waste Recycling	\$49,550	\$90,000	20,000	\$330,000
140	ONP /OCC Separation	Modify disk screens to inprove the quality of ONP #8	Innovation	Technology Improvements	Niagara Region	\$300,000	\$750,000		\$75,000
142	Baler & conveyor	Install new bottom feed conveyors and baler to improve the efficieny of the fiber handling. Currently a loader is used as it is not automated.	Best Practices	Technology Improvements	Niagara Region	\$275,000	\$500,000	35,000	\$1,000,000
146	Southwesten Ontario Regional MRF	City of London is requesting capital funding for \$15 million 75,000 tpy two-stream regional MRF. Preliminary estimates suggest that a regional facility will save \$10 to 15 per tonne (\$0.75 to \$1.1 million per year) in net system costs. Potential partners include Oxford County, Norfolk County, Brant County, Wellington County, City of Brantford, City of Stratford, City of Sarnia and some individual municipalities from Middlesex County, Elgin County and Lambton Counties. Preliminary discussions are underway with these municipalities.	Best Practices	Geographic Optimization	City of London	\$4,500,000	\$23,000,000		

Approved Best Practices Projects

pproved F	Projects								
App. #	Title	Description	Focus Area	Priority Area	Proponent	Funding Approved	Total Project Cost	Tonnes Increase	Project Savings
150	Integrated Waste Management Plans	Develop integrated waste management plans for Quinte member municipalities	Best Practices	Geographic Optimization	Quinte Waste Solutions	\$30,000	\$90,000		
153	Blue Box Program Review	Investigate all possible recycling options for its next joint municipal recycling contract	Best Practices	Geographic Optimization	Lanark County Municipal Waste Group	\$9,000	\$18,000		
155	Material Processing Option review	Review MRF operations including transportation alternatives	Best Practices	Technology Improvements	Simcoe County	\$49,000	\$180,000		
158	Program Blue Prints	Develop program blue prints for up to 5 municipalities to examine program improvements, upgrades, tenders etc inlight of better and best practices.	Best Practices	Other	CIF staff	\$100,000	\$100,000		
160	SawTooth bin Wall	Construction f a sawtooth wall to facilitate roll off bins for the collection of recyclable materials at the transfer station.	Best Practices	Other	Elizabeth Kitley	\$26,000	\$52,129		\$378,000
161	Optical Sorting	Improve container line in MRF with optical sorting and film recovery system	Best Practices	Technology Improvements	Niagara Region	\$595,000	\$1,000,000		
162	Recycling Transfer Station	Construct a transfer station for blue box material. Project is the recommendation of CIF #129	Best Practices	Geographic Optimization	Timmins	\$436,418	\$458,239		
173	Curbside Collection Recyclables	Convert to weekly automated collection.	Best Practices	Technology Improvements	Timmins	\$517,000	\$1,200,000		
179	Waste Shed Analysis	University of Waterloo to undertake a transporation study to develop waste shed opportunities	Best Practices	Geographic Optimization	CIF staff	\$40,000	\$40,000		\$75,000
183	Multi-res Performance Indicators	This project will benchmark recycling performance indicators (costs & blue box recovery) of multi-residential programs in the 8 municipalities that are partners in the project.	Best Practices	Increase Existing Materials	City of London	\$6,000	\$30,000		
186	Blue Box Transfer Station	Construction of a transfer facility for blue box materials for transportation to processing facility	Best Practices	Geographic Optimization	Halton Region	\$175,000	\$70,000		
187	BB Transfer Station upgrades	Upgrades to transfer facility to allow for loading into a compaction trailer	Best Practices	Technology Improvements	Kenora	\$165,000			
189	Distribution of a Large Containers Bin	Distribution of a larger blue box for the containers stream to increase capacity and capture of materials	Best Practices	Increase Existing Materials	Durham Region	\$971,800	\$2,000,000		
194	Transfer Facility Upgrades	Upgrade of loading ramp for transfer of recyclables and construct a public drop-off depot for residents on site	Best Practices	Other	Fort Frances	\$61,500	\$157,250		
196	Waste Management Plan	Development of a Waste Plan for the City of Temiskaming Shores	Best Practices	Other	Timiskaming Shores	\$6,100	\$36,000		
201	Multi-res Container Density Factors	Determine average density factors to be used in benchmarking recycling performance by visual inspections at multi-residential buildings.	Best Practices	Increase Existing Materials	CIF staff	\$5,700	\$5,700		
212	Niagara Region Multi- Residential Recycling Program Implementation	Implementation of a region-wide multi-residential recycling program	Best Practices	Increase Existing Materials	Niagara Region	\$249,750	\$300,000		
216	ESCO	Energy efficiency analysis of MRF	Best Practices	Other	Guelph	\$10,000	\$10,000		

Approved Innovation Projects

Total Funding Approved

\$1,354,500 \$10,656,001

Approv	ved Projects								
App. #	Title	Description	Focus Area	Priority Area	Proponent	Funding Approved	Total Project Cost	Tonnes Increase	Project Savings
118	TiTech Optical Sorting	Install a two-valve TiTech Polysort Optical sortation system in the MRF.	Innovation	Technology Improvements	Hamilton	\$132,250	\$529,000		\$150,000
127	Plastics RFP	Joint proposal call for new processing capacity for 1-7 plastics.	Innovation	Increase Existing Materials	CIF staff / Stewardship Ontario	\$1,118,750	\$10,000,000		
130	EPS densification	Engineering to develop a mobile expanded polystyrene densification program that can go from municipality to municipality to process EPS and send to market	Emerg Tech	Technology Improvements	CIF Staff	\$20,000	100%		
178	Tower Renewal	Tower Renewal is a project to initiate environmental measures (water & energy conservation and waste reduction) and community revitalization across 1,000 large concrete-frame high-rise tower buildings. Project 178 will focus on maximizing recycling and Phase 1 is to develop a plan for pilots at 10 buildings.	Best Practices	Increase Existing Materials	Toronto	\$38,500	\$82,000		
181	Route Optimization Software	Identify route optimization software	Emerg Tech	Technology Improvements	CIF Staff	\$45,000	\$45,000		

Approved Emerging Technology Projects

Total Funding Approved

\$403,700

\$876,000

Approv	ved Projects								
App. #	Title	Description	Focus Area	Priority Area	Proponent	Funding Approved	Total Project Cost	Tonnes Increase	Project Savings
119	Bollegraaf Film Grabber	Install a Bollegraaf mechanical film grabber in the MRF.	Emerg Tech	Technology Improvements	Hamilton	\$308,700	\$441,000		\$18,000
139	Plastic low pressure intrusion technology	Rivalries Corporation - subject to confidentiality agreement	Emerg Tech	Technology Improvements	Rivalries Corporation	\$60,000	\$250,000		
207	Thermoset PET	Work with NAPCOR and Stewardship Ontario to evaluate processing alternatives for thermoet PET	Emerg Tech	Technology Improvements	NAPCOR	\$30,000	\$180,000		
217	Natural gas vehicles	Analysis of use of compressed natural gas collection vehicles	Emerg Tech	Technology Improvements	CIF	\$5,000	\$5,000		

Approved Communication and Education Projects

Total Funding Approved

\$571,950

\$534,202

	oved Projects	T						1
App. #	Title	Description	Focus Area	Priority Area	Proponent	Funding Approved	Total Project Cost Tonnes Increase	Project Savings
101	Improved Rural Recycling Depots Through Signage	Goals are to: 1) install proper signage at out lying depots; 2) maximize rural recycling depot site efficiency, increase participation, capture and minimize contamination.	Comm & Educ	Increase Existing Materials	West Nipissing	\$15,000		- Curings
116	40% Diversion	Increase diversion from 22% to 40% using depots and two stream collection through promotion and education.	Comm & Educ	Increase Existing Materials	Seguin Township	\$32,200	\$54,200	
122	Municipal Contracts Database	The goal is to provide an on-line resource to municipalities that will increase the quality of recycling contracts, transfer better/best practices into tenders and agreements, reduce contract administration and associated costs, harmonize tender processes and documents for service providers, and potentially provide a training resource for anticipated contract management course (EE project 341). The project team will: 1) gather, catalogue, review and annotate a database of municipal blue box contracts; 2) Develop a searchable index on a website to match user profiles; 3) Identify preferred practices and remove municipal ID, note challenges and opportunities in the documents and 4) Periodically update against current events ie: CIF, revised practices, new requirements.		Other	CIF staff	\$120,000	\$120,000	
149	Multi-res containers	Design & produce custom bulk-style containers to increase capacity, and accommodate Quinte's five stream sort	Comm & Educ	Increase Existing Materials	Quinte Waste Solutions	\$61,700	46%	\$13,000
156	Increase Multi- res Compliance	Implement an outreach program to increase the number of multi-res buildings by 20-30%.	Comm & Educ	Increase Existing Materials	Essex Windsor	\$39,800	50%	
159	Open Space	Literature search on all existing open space recycling best practices	Comm & Educ	Increase Existing Materials	CIF Staff	\$5,000	100%	
166	Multi-residental P&E	Develop web-based templates for multi-res promotion and education materials that can be customized with municipal content. Trial material with 15 municipalities.	Comm & Educ	Increase Existing Materials	CIF	\$120,000	\$120,000	
174	Multi-res Best Practices	Complete site visits at buildings, measure performance, update database, add recycling containers, update P&E and out-reach activities	Comm & Educ	Increase Existing Materials	Peterborough	\$13,250	\$47,000	
192	Small Program P&E Plan	Development of a P&E plan template for small program usage as well as the development of communication material templates	Comm & Educ	Other	CIF	\$150,000	\$150,000	
198	Enhanced Web Site	Implement a revised recycling web site including waste exchange opportunities	Comm & Educ	Increase Existing Materials	South Frontenac	\$5,000	\$5,000	
200	Enhanced Web Site	Implement a revised recycling web site including waste exchange opportunities	Comm & Educ	Increase Existing Materials	Kenora	\$5,000	\$5,000	
214	Enhanced Web Site		Comm & Educ	Increase Existing Materials	Wellington County	\$5,000	\$5,000	

Approved Project Support Projects

Total Funding Approved

\$501,637 \$566,190

	ved Proiects	B 1.0		D: 11 A		F 11	T ID	-	<u> </u>
App. #	Title	Description	Focus Area	Priority Area	Applicant	Funding	Total Project Cost	Tonnes Increase	Project Savings
102	Cooperative Recycling Plan	Surrounding the City of Thunder Bay there are 6 rural municipalities (the Townships of Gilles, O'Connor, Oliver-Paipoonge, Neebing, Conmee and Shuniah) in very close proximity to each other and operate similar recycling programs. It has been recognized that given the similarity of programs and their proximity in location, it would be beneficial to cooperate on the development of a recycling plan that could be utilized by all the programs in the development of their recycling efforts.	Best Practices	Geographic Optimization	Township of Gilles	\$40,000	\$40,000		
108	Misc. Project support	Investigation of QinetiQ automated waste reclamation system, assistance with London regional MRF issue.	Best Practices	Geographic Optimization	CIF Staff	\$5,000	\$5,000		
110	Recycling Transfer Facility	Phase 1 - study the options for development of a blue box material transfer facility	Best Practices	Geographic Optimization	Fort Francis	\$15,000	\$15,000		
125	CIF Financial instruments	Determine effective means (such as loans, grants, debentures etc.) to leverage CIF funds	Best Practices	Other	CIF Committee	\$20,000	\$20,000		
126	MRF rationalization study revisit	Update the status of MRFs in Ontario and present options for optimization and waste sheds potential Beck, APS, et al	Best Practices	Geographic Optimization	CIF Committee	\$24,500	\$24,500		
128	Mobile Glass Processing	Investigate rural glass processing options	Best Practices	Geographic Optimization	CIF Staff	\$6,250	\$6,250		\$25,000
132	Misc. Project Support	General A-Team support. Assistance with the joint SO/CIF plastics RFP	Best Practices	Geographic Optimization	CIF Staff	\$10,000	\$10,000		
136	North Shore Lake Superior Recycling Study	To review the options to implement blue box recycling along the North Shore of Lake Superior from Dorion to Manitouwadge.	Best Practices	Geographic Optimization	CIF Staff	\$20,000	\$20,000		
141	Evaluation criteria	Development of CIF evaluation criteria	Best Practices	Other	CIF Staff	\$4,000	\$4,000		
145	Emerging Technologies Evaluation	OCETA to develop an evaluation criteria, prepare an environmental scan on research partners and evaluate Rivalries.	Emerg Tech	Technology Improvements	CIF Staff	\$45,000	\$45,000		
147	RFQ Development	Development for an RFQ for energy management consultants	Best Practices	Technology Improvements	CIF Staff	\$13,000	\$13,000		
148	Decision Treee Tool	Development of a decision tree for blue box transfer stations	Best Practices	Geographic Optimization	CIF Staff	\$21,700	\$21,700		
151	CIF Web development	Upkeep and website design	Comm & Educ	Other	CIF Staff	\$20,000	\$20,000		
152	Open Space	Implementation of PS recycling program and test methodology for bin placement and promotion/education utilized in Quebec. Extension of Nestle Waters and City of Sarnia pilot	Comm & Educ	Other	CIF Staff	\$25,000	\$125,000		
157	Partnership Programs	Research available federal and provincial partnership programs (previous project #146)	Best Practices	Other	CIF Staff	\$1,500	\$1,500		
163	SO plastics RFP	Due diligence on vendors selected through RFP. 50% paid by Stewardship Ontario	Best Practices	Increase New Materials	CIF Staff	\$10,080	\$10,080		

Approved Project Support Projects

App. #	Title	Description	Focus Area	Priority Area	Applicant	Funding	Total Project	Tonnes	Project
					,,	,	Cost	Increase	Savings
	Provincial Infrastructure Funding	Love Environemental to advocate potential partnerships for CIF and Province	Innovation	Technology Improvements	CIF Staff	\$3,000	\$3,000		
169	Stakeholder Review	Undertake a stakeholder review to determine their needs for future CIF projects and direction as part of developing the 2010 work plan.	Comm & Educ	Other	CIF Staff	\$9,700	\$9,700		
	Blue Box Governance Review	Cochrane is currently part of the Cochrane Temiskaming Waste Management Board. The review is to determine if diversion can be increased if its governance strucutre changes and undertakes recycling on its own.	Best Practices	Increase Existing Materials	Cochrane	\$6,000	\$6,000		
171	Program Review	Retain a consultant to to examine if there are ways to improve the program operated by Sault North Waste Management Council. The service area is 31 unorganized townships and 2400 square kilometers.	Best Practices	Increase Existing Materials	Sault North Waste Management Council	\$6,000	\$6,000		
	Eastern Ontario MRF opportunities	Review current status of municipal contracts and programs around and east of Ottawa - develop MRF Strategy as requested by CIF Committee	Best Practices	Geographic Optimization	CIF Staff	\$20,000			
175	Staff Support	Love Environtal will represent CIF in securing tonnage for the London Regional MRF and plastics recycling reprocessign work.	Best Practices	Geographic Optimization	CIF Staff	\$45,000	\$45,000		
	Bluewater Efficiency Study	AET and Jacques Whitford to review collection efficiency of Bluewater Recycling Associstion's change to automated single stream collection.	Best Practices	Geographic Optimization	CIF Staff	\$39,047	\$40,000		
179	GIS	GIS analysis of mrf infrastructure	Best Practices	Geographic Optimization	U. of Waterloo	\$37,800	\$37,800		
	Development support for cooperative RFP for collection and processing	The communities of Mattawa and Township of Papineauu- Cameron to undertake a joint evaluation of multi-municipal recycling an investigate the viability of developing a transfer station	Best Practices	Geographic Optimization	Mattawa/Paine au-Cameron	\$7,500	\$7,500		
	MRF Commissioning Protocol	Develop a MRF commissioning Protocol best practice document	Best Practices	Technology Improvements	CIF Staff	\$6,600	\$6,600		
	Expansion of Blue Box Collection	Provide funding to Town for containers and P&E materials to expand collection to additional residential units	Best Practices	Increase Existing Materials	Elliot Lake	\$1,500			
202	Open space	Development of a best practice for open space recycling	Best Practices	Increase Existing Materials	Stantec	\$4,410	\$4,410		
	Production of CIF Promotional Materials	Development of flyers outlining CIF services to municipalities and their contractos.	Best Practices	Other	CIF Staff	\$19,150	\$19,150		
215	Integrated Recycling Plans	Develop a template that meets WDO's best practices requirements for municipal integrated recycling plans as per the KPMG analysis	Best Practices	Other	CIF Staff	\$14,900			

Rejected Projects

Total Funding Rejected

\$417,000 \$537,001

Reject	ed Projects								
App. #	Title	Description	Focus Area	Priority Area	Proponent	Funding Requested	Total Project Cost	Date Rejected	Reason
104	Material study	Toronto is undertaking a study to review the future direction of its recycling program and the impact / need for additional MRF capacity. Will also investigate GTA wide processing solutions.	Best Practices	Increase New Materials	City of Toronto	\$125,000	50%		just a study, application at end of study so no input from CIF. Will allow this cost to be added to MRF project application
114	Waste Audits	Single family waste audits			Halton Region	\$47,000	\$47,000	13-Aug-08	CIF does not fund stand alone waste audits
131	Container Sorting Line	Install a contaier sorting line to process plastics, aseptic and glass.	Best Practices	Increase Existing Materials	North Bay	\$245,000	\$490,000	11-Aug-09	Too long of payback, no considerational for helping other communities

Withdrawn Project Applications

	rawn Proiects	Described.	F 1	D	F "	T	Data Wild 1	
App. #	Title	Description	Focus Area	Proponent	Funding Requested	Total Project Cost	Date Withdrawn	Reason
105	Clear Bag Pilot	Test collection of waste in clear bags to determine the increase in recycling with effictive promotion and enforcement of blue box diversion policy. Test in Pickering and Clarington.	Best Practices	Increase Existing Materials	Region of Durham	\$30,000	10-Mar-09	no application submitted
106	Clear Bag Pilot in Appartments	Test collection of waste in clear bags to determine the increase in recycling with effictive promotion and enforcement of blue box diversion policy in an appartment application.	Best Practices	Increase Existing Materials	Region of Durham	\$10,000	10-Mar-09	no application submitted
107	Durham 70% Diversion Study	Consultant study on what is being done elsewhere in North America to examine new blue box material options and increase current material recover to 70% by 2010. Cart collection of material also reviewed.	Best Practices	Increase Existing Materials	Region of Durham	\$70,000		no application submitted
115	Depot Optimization	Tenders for E&E 326 are over budget. Seeking additional funding under CIF	Best Practices	Peterborough County	\$90,000	50%	9/16/08	budget increase to be funded from E&E
123	MRF Improvement	Capital MRF upgrades to add a second container sorting line, by- pass conveyors and optical sorting.	Best Practices	Region of York	\$1,000,000	\$2,000,000	9/11/13	
133	Bunker Drum Feeder	Installation of a Bollegraaf bunker belt drum feeder to reduce loader operator time on tipping floor.	Innovation	Technology Improvements	Ottawa Valley	\$147,000		
134	Northern Ontario Transportation Study	Goal is to examine transportation issues/solutions for the North by researching existing transportation options and examining the feasibility/business case for utilizing other means of transportation (e.g. rail and shipping) that might provide efficiency to the program.	Best Practices	Geographic Optimization	CIF	\$75,000		Not a priority for 2009
199	Enhanced Web Site	Implement a revised recycling web site including waste exchange opportunities	Comm & Educ	Kingston	5000	\$5,000	15-Sep-09	Decided not to do the project
E&E 288	Applying "recycle bank" techniques to an Ontario situation	QWS will review incentive based programs similar to Recycle Bank history, methods, reports, tools and techniques and then develop a pilot program to test recycle bank tools and techniques	Innovation	Quinte Waste Solutions	\$18,500	73%	12-Sep-08	not in municipality's work plar anymore
E&E 293	Design and field-test social marketing and depot design techniques for multi residential buildings	improvement approaches in the same buildings to determine the usefulness	Best Practices	QWS	\$80,500	50%	12-Sep-08	not in the municipality's workplan anymore
E&E 319	Owen Sound Communication and Education Program	Support for new communications program (includes plan development, promotional materials and printing, advertising, web site, coordination)	Comm & Educ	City of Owen Sound with Lura Consulting	\$70,000			will reapply under CIF
E&E 327	Purchase & Installation of Landfill Weigh Scales	The main objective is to purchase and install weigh scales at the Township of Minden Hills main land site. Residents will be encouraged to recycle because they will not want to pay tipping fees.	Best Practices	Township of Minden Hills	tbd		tbd	will reapply under CIF
E&E 346	Fully Automated Collection Program	Goal is to establish a fully automated cart-based collection program. Objectives include: 1) Reduce collection costs by 25% by reducing the frequency of collections from weekly to bi-weekly and increasing the number of households collected per truck per day; 2) Increase diversion by 15% by Increasing capacity of the collection container, simplifying sorting for residents and using RFID software to identify households not recycling or recycling less; 3) Provide a safer work environment for our employees resulting in reduced WSIB claims and 4) Reduce litter.	Innovation	Bluewater Recycling Association	\$183,000		30%	Sept 08 to Aug 09

Withdrawn Project Applications

Withd	Irawn Proiects							
App. #	Title	Description	Focus Area	Proponent	Funding Requested	Total Project Cost	Date Withdrawn	Reason
E&E 351	P&E Seminar Series for Small (Northern and Remote) Recycling Programs	The goal of this program is to give small/remote (northern) recyclers an opportunity to learn more about developing effective and efficient P&E programs to support their recycling programs. Objectives of the program include: 1) examining the level and type of P&E training (learning) that might be most useful for small (northern) programs; 2) modifying and expanding on content delivered at the November 2007 P&E workshop to meet these needs and 3) developing a (primarily) web-based approach to delivering training for participants in remote settings and providing feedback on web-based training for this application.	Comm & Educ	City of Thunder Bay	\$50,000			CIF undertaking different project directed to BP
E&E 356	Newmarket Public Space Pilot	The goal of this project is to pilot a three-stream sort in a public space setting and develop a guide for other municipalities to use when implementing a three-stream system in a public park setting.	Innovation	Region of York	\$40,000		25-Aug-09	Not a priority for 2009
E&E309	Municipal Cooperation In	The objective of this project is to quantify current and future blue box recyclables processing requirements within the GTA municipalities (Cities of Hamilton and Toronto, Regional Municipalities of Halton, Peel, York and Durham) and identify and facilitate potential short and intermediate term opportunities for cooperation in the provision of processing capacity.	Innovation	City of Hamilton	\$100,000		50%	similar to a City of Toronto Project
	Expansion & Renovation Project	Waterloo is planning to do a \$5 million dollar MRF retrofit over the next 12 months. Includes a 1,200 square metre extension and redesign/replace existing container processing line. Fibre sorting onsite will be discontinued. The Region is requesting \$495 K from E&E for new container line processing equipment and optical sort technology for PET and HDPE. They anticipate that the throughput rate should increase from existing 2,600 kg/hr to a minimum of 3,500 kg/hr which will result in capacity for new tonnes while at the same time reducing overall labour requirements by 5 to 6 sorters (~\$100,000/year saving over the life of the equipment).	Best Practices	Region of Waterloo	\$495,000	N/A	11-Sep-08	will reapply under CIF

Appendix 7.7 – Multi-Residential Container Policy

Purpose

The purpose of this document is to provide guidelines to assist municipalities to implement multiresidential best practices. The Guidelines are developed under the Continuous Improvement Fund with the intent of being used to provide for consistency and standardization in multi-residential projects funded through the Continuous Improvement Fund (CIF).

Funds to assist with implementing Best Practices in multi-residential (MR) programs will be provided to municipalities on a pre-approved basis according to the CIF policy statement in this document. Municipalities that agree to implement the best practices as outlined in this document will not be required to complete the standard CIF Application Form.

The determination of what is a Best Practice is based on the Stewardship Ontario report: The Blue Box Program Enhancement and Best Practices Assessment Project Final Report (KPMG, July 2007).

CIF Support for Municipal Multi-Residential Programs

In many municipalities multi-residential recycling programs have not been provided sufficient resources to implement the recommended best practices for this sector. As a result these programs are less effective at capturing recyclables compared to households serviced by the curbside blue box program. CIF recognizes multi-residential recycling as a priority area and has allocated funds in the 2010 Operating Budget to support projects that implement best practices and build adequate collection capacity. The guidelines and CIF Policy provide a framework for funding MR projects.

Whether or not a municipality seeks financial support through CIF to implement best practices, the guidelines will be of use to any municipality wishing to improve the effectiveness and efficiency of their multi-residential recycling program.



Policy Statement

CIF Policy on Funding Municipal Projects to Implement Multi-Residential Best Practices

The Continuous Improvement Fund will support the implementation of Best Practices within municipal multi-residential recycling programs. Whereas this policy is supersede by the CIF Strategic Plan (2007), and whereas the CIF will endeavour to distribute funds equitable amongst municipalities, and subject to available funding, CIF will fund municipal projects to implement specified Best Practices, as follows:

- a. To develop a database of multi-residential properties, complete site visits, benchmark performance and distribute promotion & education materials, CIF has estimated the cost at \$70 per building and will fund this at the rate of 50% (\$35 per building), and
- b. To increase the number of recycling containers at buildings to an average capacity of 50 litres per unit, CIF will fund 50% of the costs to purchase, label and distribute containers (carts or bins). All containers must include RFID tags or capable of later modification to include these. Municipalities will be required to fund 50% of the costs, either directly or by administering a program where costs are recovered from building owners. CIF will develop a process or joint municipal tender document to ensure that containers are purchased in such a way to gain the economies of scale for large purchases:
- c. To provide promotion & education materials, CIF will fund 50% of promotion and education costs. Municipalities are directed to use P&E materials developed under CIF project 166 where applicable.
- d. To complete a final CIF project report, CIF has estimated the cost at \$4,000 and will fund this at the rate of 50% (\$2,000), and
- e. To be eligible for pre-approved funding, proponents must complete all aspects of the work summarized in parts a), b), c) and d) above; and
- f. The work will be completed in accordance with the Guidelines outlined in this document.

Other municipal multi-residential recycling CIF project proposals outside the scope of this policy will be evaluated following standard CIF protocol and procedures.

Best Practices in Multi-Residential Recycling

In September 2006, the Municipal Industry Programs Committee (MIPC) of Waste Diversion Ontario (WDO) directed KPMG to identify Best Practices in Ontario municipal Blue Box recycling. The KPMG Report is a valuable reference guide for best practices in multi-residential recycling. These practices are supported by E&E project findings and by the experience of members of the Municipal Multi-residential Working Group. The best practices identified by KPMG are a practical checklist for municipal programs that wish to make improvements to this sector. They are listed below.

- 1. Build and maintain a database of all multi-residential properties
- 2. Benchmark performance and monitor on a regular basis
- 3. Provide adequate recycling bin capacity
- 4. Provide promotion & education materials
- 5. Set a minimum threshold for recycling for buildings to be eligible for municipal garbage collection and disposal services
- 6. Identify buildings that are not recycling and determine the feasibility of extending municipal services
- 7. Engage in out-reach activities including training for stakeholders
- 8. Develop design requirements for new building developments that design for increased diversion. Municipal approval for new building developments should be subject to meeting these mandatory requirements.

The CIF Policy is applicable to practices I through 4. This document will describe how to implement these practices and will outline the required procedures for municipalities to follow in order to be eligible for CIF support.

For further discussion on practices 5 through 8, refer to <u>Stewardship Ontario's</u> website on completed and on-going multi-residential E&E project work and to the <u>Blue Box Program Enhancement and Best Practices Assessment Project Final Report (KPMG, July 2007).</u> Pages 96 to 106.

Requirement I – Develop & Maintain A Database of Buildings

Building and maintaining a database of all properties is an important first step towards implementing best practices. Once all the information has been collected and entered, resources must be allocated to update the database on an on-going basis.

To obtain the list of properties, municipal planning departments, property taxation, or technology services may be able to assist in identifying properties and providing basic information (addresses, owners, number of units). Local property management or rental associations can help provide listings of their buildings and contact information for owners, property managers and superintendents. While some preliminary data can be collected by these methods, in-person site visits to each building will be required to complete the Multi-Residential Recycling Information Collection Form (Appendix A). Template Excel and Access databases will be available for download from the CIF website.

To build an accurate database of the MR recycling program complete site visits at all buildings and make regular site visits an on-going part of program maintenance.

Requirement 2 – Benchmark Performance

A key step in implementing program enhancements is to benchmark performance so that targets can be set and program improvements measured as you move towards the targets.

Evaluating performance is a quantitative assessment of how much each building is recycling (kg/unit). Performance indicators such as container fullness and contamination will be monitored during site visits. The procedure for this is outlined in Appendix A. Performance data completed during site visits is an estimate only as it is not based on precise weights. However if done consistently it can be accurate to within 10-15% of actual weights. Obtaining this information from each building is instructive both for flagging low performing buildings and for highlighting top performers. Low performers should be flagged for follow-up strategies and top performers may prove useful as model buildings.

Visual inspections are
a reliable method of
quantifying how much is being
recycled at each building.

Programs that have designated multi-residential routes with weigh scale information can verify the estimates and have the added advantage of providing on-going accurate data on overall program performance. Programs that are not able to isolate multi-residential tonnes should complete follow-up site inspections on a routine basis.

Requirement 3 – Provide Adequate Recycling Bin Capacity

Having enough storage space for recyclables is one of the most critical factors in a successful recycling program, and it's important to address this first before other program improvements are put in place. Without enough storage space recyclables will end up in the garbage.

Recycling storage space is referred to as 'capacity' and is the shared recycling containers used by building residents to deposit their recyclables. Provision of containers varies across municipalities from those that provide to building owners at no charge to those that require building owners to purchase them. Containers have traditionally been 95 gallon roll-out carts. With the introduction of single-stream collection some municipalities have moved to bulk bins for co-mingled recyclables in sizes ranging from 2 to 6 cubic yards.

Based on a target of 70% it is recommended that each residential unit be provided with the equivalence of 50 litres of storage capacity, this is the size of a standard 14 gallon blue box. In terms of multi-residential containers, the following guidelines are recommended:

- One 95 litre cart for every 7 residential units
- One 4 yard bin for every 60 residential units

These guidelines represent average requirements and will vary depending on the building population demographics. Appendix B provides the analysis of how the guidelines were determined.

At 60% recovery buildings
will need enough
recycling containers to
provide the equivalent of one
blue box per unit.

Requirement 4 – Provide Promotion & Education Materials

CIF Project 166 has designed print materials (brochures, posters, container labels, etc) to promote municipal multi-residential recycling programs. This project will provide municipalities with 1) electronic files and 2) access to an interactive website to update with new program information. CIF 166 has a two year mandate ending May 2011.

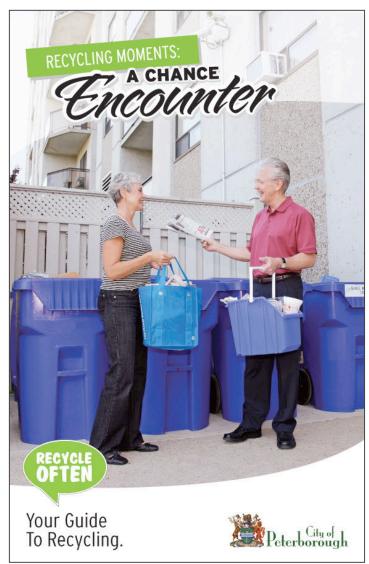
Municipalities are required to produce (e.g. print) and distribute the communication materials designed under CIF 166.

Municipalities will ensure that resident brochures are delivered directly to residents.

Communications strategies are included in Appendix C.

To assist with project evaluation municipalities will document how the communications materials were used and evidence of the impact on the recycling program. This will include providing information, where available to include:

- Description of communications implementation (e.g., number of posters, flyers, etc printed and costs, including staff time)
- Were available, tonnes collected (baseline, and postimplementation). In the absence of actual tonnes recycled, the municipalities will make reasonable efforts to assist with estimates of program effectiveness.



APPENDIX A: Site Visit Form (supported by excel & access files)

Address (full mailing) :								
Units:	Floors:Site	e Visit Date & Day of Week:						
	/ Student / Co-op / Public	Recycling Collection Day(s)						
Garbage: Municipal / Pi Recycling: Municipal / P		Garbage Collection Day(s):						
Contact Information								
Property Manager: Sar	me as owner □							
Company:		On-Site Contact: Super / Property Manager / Owner / Na						
Name:		Name:						
Phone #:		Phone #:						
Cell #:		Cell #:						
E-Mail:		E-Mail:						
Address:		Address:						
Performance Evalua	tion							
Recycling Containers:	# of 65 gal = # of 95	gal = # bins x size =						
Stream 1:	# Cont	# full or part full containers:						
Stream 2:	# Cont	# full or part full containers:						
OCC : approx quantity								
Barrier Evaluation: F	Rate on a scale of 1 to 3: 1 = B	ad and requires attention, reserve rate of 3 for Excellent						
OCC	Contamination	Stream mixing Accessibility						
Loose materials	Overflowing carts	Area clean Area well light						
Labels & Signage		_						
Recycling & Garbage	e Area Description – chec	ck all that apply						
Garbage: # bins x size	0	r curbside ☐ Garbage Chutes ☐ Weekly Pickup ☐ Twice/wk ☐						
Recycling Area: Outdoor	☐ Outdoor Under cover ☐ In:	side room Main FI Under ground Collect from each floor						
Number of Recycling Depo	ots Twinned with garba	ge \square Recycling containers shared with other buildings \square						
Addresses that share								
Room to add extra recyclin	ng containers Where							
Comments:								

APPENDIX A: Sample Completed Form

Address (full mailing): 35 Smith St., London, N5X 296							
Units: 120 Floors: 10 Site Vis Condo (Rental) Senior / Student / Co-op / Public Garbage: Municipal / Private	Recycling Collection Day(s)						
Recycling: Municipaly Private	Garbage Collection Day(s): <u>Monday</u> Wednesday						
Contact Information							
Owner's name: William Bell	Property Manager: Same as owner □						
Address: Global Property Management	PM Company: Global Property Management						
Phone: <u>519-455-0000</u> email: <u>wbell123@rogers.com</u>	PM Name: <i>John Smith</i>						
On-Site Contact: Super/Property Manager/Owner/ NA	PM Address: Suite 300, 75 High St. London, N5X 2K6						
Name: Cynthia & George Smith	PM Phone: 519-455-0000 PM email: jsmith@rogers.com						
Address: 103 - 35 Smith St., London, Cell: 519-455-00	<u>00 </u>						
Performance Evaluation							
Recycling Containers: # of 65 gal = # of 95 ga	II = <u>10</u> # bins x size =						
Stream 1: paper # Cont	# full or part full containers:6						
Stream 2: glass, metal, plastic # Cont4	# full or part full containers:						
OCC: approx quantity 2 meters stacked between carts							
Barrier Evaluation: Rate on a scale of 1 to 3: 1 = Requ	uires attention, reserve rate of 3 for Excellent						
OCC <u>2</u> Contamination <u>2</u>	Stream mixing Accessibility Z						
Loose materials Overflowing carts	Area clean <u>2</u> Area well light <u>2</u>						
Labels & Signage 1, labels are missing or out-dated, there a	re no signs						
Recycling & Garbage Area Description – check all that apply							
Garbage: # bins x size							
Recycling Area: Outdoor □ Outdoor Under cover □ Inside room □ Main FI ✓ Under ground □ Collect from each floor □							
Number of Recycling Depots $\underline{\hspace{1.5cm} 1\hspace{0.5cm}}$ Twinned with garbage \Box Recycling containers shared with other buildings \Box							
Addresses that share							
Room to add extra recycling containers ✓ Where: outside to	hy door to recycling room, empty containers can be swapped for full ones						
Comments:							

APPENDIX A - Guide to Completing the Form

Address (full ma	iling) :	
Units:	Floors: \$	Site Visit Date & Day of Week:11
Condo / Rental / Garbage: Munio	Senior / Student / Co-op / Public	2 Recycling Collection Day(s)
Recycling: Muni	•	Garbage Collection Day(s):
Instructions:		
a. b.		f the site visit of e same day as collection before the containers have been rate performance evaluations to show bin fullness,

- container fullness may be adjusted as 6/7 of total.

 2. <u>Circle applicable where information is available, and if the building can be categorized circle the appropriate descriptor condo/rental, etc</u>
- 3. Note if garbage and recycling services are provided by municipality (either municipal crews or contracted) or by private service providers

contamination, etc, at the end of the cycle. Where not practical for site visit on same day as collection, then complete the day before pickup. Depending on time of day, adjustments of

Contact Information	
Property Manager: Same as owner □ 1	On Oite Onestant Course / December Management (Occurs on NA
Company:	On-Site Contact: Super / Property Manager /Owner/NA 2
Name:	Name:
Phone #:	Phone #:
Cell #:	Cell #:
E-Mail:	E-Mail:
Address:	Address:

Instructions:

- 1. Check box if property owner is also the property manager
- 2. Circle appropriate descriptor of the on-site contact. As smaller buildings may not have a superintendent or building manager that lives in the building, the contact for 'on-site' issues may be the owner or property manager.

Perfor	mance Evaluation
Recycl	ing Containers: # of 65 gal = # of 95 gal = # bins x size = 1
Stream	1: 2 # Cont 3 containers: 4
Stream	2: # Cont containers:
OCC:	approx quantity 5
Instruc	tions:
1.	Note recycling container sizes and number of each size
2.	Describe each stream of materials, insert more rows for more streams
3.	Note the number of containers for each stream
	a. It is important to record <u>all</u> containers. If containers are stored inside the building, it is possible that you may not see all of them if they have not all been pulled out.
4.	Note the number of full and part full containers of each stream. For example: Building has 8 paper stream containers of which 5 were full, 1 was $\frac{3}{4}$ full, 1 was $\frac{1}{2}$ full and 1 was $\frac{1}{4}$ full, then $\frac{1}{4}$ of full and part full containers = 6.5
	a. In cases where there is more than one collection point, but less than number of the buildings (i.e. 2 depots used by 5 buildings), add the data collected for all collection points and enter it as one set of collection point data. In these cases it is difficult to determine which building uses what depot, and analyzing them separately would not be an accurate representation of building performance.
5.	If OCC is contained, note number of full and part full containers. If OCC is not contained, note approximate size of pile, e.g., approx = 1.5 meter thick
6.	Data from 4 and 5 will be multiplied by density factors to determine approximate kilograms
Barrie	r Evaluation: Rate on a scale of 1 to 3: 1 = Bad and requires attention, reserve at rate of 3 for Excellent
occ	Contamination Stream mixing Accessibility

OCC	 Contamination	 Stream mixing	 Accessibility	
Loose materials	 Overflowing carts	 Area clean	 Area well light	
Labels & Signage	 			

Instructions:

The goal of this section is to a) flag issues that require municipal attention and b) highlight exceptional examples of buildings that may offer a learning opportunity to provide 'how to' direction with lower performing buildings. It is expected that most buildings will fall between these two extremes. A low score of '1' should be seen as an 'action item' for municipal staff and a high score of '3' should be reserved for only the best examples. A rating of '2' = OK and requires no further action at this time.

The following descriptions are offered to provide consistency in rating across municipalities. However municipalities will set their own standards of what they consider 'actionable' scores results.

OCC - indicator of how OCC is managed

1. Requires attention. Little to none of the cardboard boxes have been broken down and lay in heaps beside and around the recycling bins. There is also big, unbroken down cardboard boxes in the bins making inefficient use of the bin space.

- 2. OK. Some of the cardboard boxes have been broken down, bound and laid flat beside the recycling bins. There are some unbroken down boxes laying around the bins, and flattened cardboard lying beside the bins unbound. Most importantly, there was an effort to ensure the cardboard is being handled as per municipal instructions.
- 3. Excellent. All cardboard boxes have been broken down, bound and laid flat beside the recycling bins. There is no visible cardboard, broken down or other, in the bins and if there is, it is only in very small amounts, or small in size. OR Cardboard is managed with a front end or other style bulk bin.

Contamination – an indicator of materials not accepted in program

- 1. Requires attention. The recycling bin is so contaminated that it can be considered garbage. There seems to be an equal mixture of both contaminants and recyclables.
- 2. OK. Some contaminants were found in the bins and are items commonly mistaken for recyclables, but not included in program (i.e. other plastics, scrap metals).
- 3. Excellent. There are no visible contaminants in the recycling bins.

Stream Mixing – indicator of mixing between streams (eg., paper in the container stream, etc.)

- 1. Requires attention. Hard to tell one recycling bin from another due to stream mixing. Or considerable amounts of stream mixing between recycling bins. Labels are missing.
- 2. OK. There are small amounts of stream mixing but both the container and paper bins are immediately distinguishable from one another. Recycling bins can be thoroughly separated with quick sort of one or two misplaced items. Containers are labeled.
- 3. Excellent. There is no apparent stream mixing in the recycling bins.

Accessibility - how accessible is the recycling area to building residents

- 1. Requires attention. The recycling depot is towards the back of the parking lot and it may be difficult for residents to even recognize the bins as their own. And the depot is difficult to access due to excess amounts of garbage and other obstacles. Snowed under in winter. Lids cannot be lifted due to snow and ice building up.
- 2. OK. The recycling depot is located in the parking garage or just outside at an exit. The recycling depot is inside the building, in a room and or designated area, immediately off the lobby or via the back door of the elevator.
- 3. Excellent. Recycling access is within the building and is as convenient as garbage disposal.

Loose Materials – are there loose recyclables or garbage in the recycling area

- 1. Requires attention. There are a lot of loose materials around the depot, and includes recyclables, garbage, furniture, mattresses etc.
- 2. OK. There is a small amount of loose materials around the depot.
- 3. Excellent. There are no loose materials seen at all anywhere around the depot.

Overflowing Carts - indicates that there are not enough carts

- 1. Requires attention. All the bins are overflowing with bags of recyclables lying on top of, and around the bins at the recycling depot. Or all bins are full and the cart: unit ratio suggests more are required.
- 2. OK. There is some spare capacity and the cart: unit ratio is good. A minimum of one cart per ten units
- 3. Excellent. There are no overflowing carts and extra capacity is available. Cart unit ratio is at best practices: one cart per 7 units.

Area Clean - how clean and tidy is the recycling area

- 1. Requires attention. The recycling depot is surrounded by recyclables and garbage, including bigger items (i.e. furniture, mattresses). The bins have been placed in a disorganized fashion, with not much thought put into convenience and accessibility.
- 2. OK. Area is clean but there may be a small amount of loose recyclables due to overflowing carts and excess cardboard around the bins. Otherwise, the recycling depot has been well organized and thought out.
- 3. Excellent. Area is very clean. There is no garbage or recyclables lying on the floor or anywhere within the vicinity of the recycling depot. The recycling depot has been well organized and thought out.

Area Well Lit - how well lit is the recycling area

- 1. Requires attention. Outdoor depots are far away from any source of lighting and will be completely in the dark in evenings. Indoor lighting is insufficient for residents to see and therefore, to efficiently use the recycling depot. Passage to depot is not lit.
- 2. OK. There is lighting within a close vicinity of the outside depots, but may not be directly overhead the depot. Indoor lighting is sufficient but is somewhat dim and not as bright as it could be.
- 3. Excellent. There is a lot of lighting at the depot, consisting of either a spotlight directly above outside depots or bright lights within the indoor depots. Passage to depot is lit.

Labels and signage - condition & accuracy of labels on recycling containers & signage in recycling area

- 1. Requires attention. Labels or signs are absence, worn beyond readability and out-of-date. The program may have changed to single stream but all signs and labels indicate a 2-stream program. Signs and labels are handmade by building staff, and may give incorrect information. Lack of labels is resulting in contamination and stream mixing.
- 2. OK. Information is correct.
- 3. Excellent. All containers are labeled properly. Clear signs in recycling area. Building staff may have a well-made sign board with samples of non-recyclables attached.

Recycling & Garbage Area Description -	check all that apply
Garbage: # bins x size	_ Or curbside □ Garbage Chutes □ Weekly Pickup □ Twice/wk [
Recycling Area: 1 Outdoor □ Outdoor Under cover	☐ Inside room ☐ Main FI ☐ Underground ☐Collect from each floor ☐
Number of Recycling Depots Twinned with ga	arbage \square Recycling containers shared with other buildings \square
Addresses that share	2
Room to add extra recycling containers Where	3
Comments:	
Instructions:	

- 1. Note the location of the recycling area. Recycling areas that are located outdoors without any cover will present winter challenges to residents. Municipalities may wish to develop winter communications materials targeted at these buildings. Buildings that provide convenient access of collection on each floor may be useful models for other buildings considering this.
- 2. If recycling containers are shared between 2 or more buildings this is a factor that will impact whether there is adequate capacity.
- 3. This is especially important to note for buildings with overflowing recycling containers. If buildings are under-capacity in terms of the number of recycling containers, determine if and where extra containers could be placed.

APPENDIX B: Calculating Adequate Capacity

How much capacity is required will depend on several factors, including:

- Recovery target
- 2. Density of recyclables in collection containers see Table BI
- 3. Quantity of recyclables in the waste stream- see Table B2

The quantity and density of recyclable in the waste stream will vary from building to building. For this analysis average numbers will be determined, with the understanding that municipal staff in discussion with building staff will determine the optimal capacity levels for individual buildings.

I. Recovery target

70% recovery is used. =This is based on the August 2009 request from the Ontario Minister of the Environment to Waste Diversion Ontario to revise the Blue Box Program Plan to establish a diversion target of 70% by December 31, 2011.

2. Density of recyclables in collection containers

A number of data sets have been used to determine average density of recyclables in single and two-stream programs collected in 95 gallon carts or in 4 yard bins. Density factors are based on weight and volume data from City of London, Peel Region and Stewardship Ontario waste audit data for multi-residential building from 70 buildings. Data from London is for a cart-based two-stream program. The data from Peel Region is based on a single stream program that uses front-end bins and 95 gallon carts.

	London Two-stream Carts	SO Waste Audits Two-stream carts	Peel Single-Stream Carts	Peel Single-Stream Front end bins
Tonnes per cart per year	1.0	1.1	1.0	-
Tonnes per cubic yard per year	-	-	-	2.0

Table B1: Density of Recyclables – tonnes per cart/cubic yard – annualized

The values in B1 represent average density factors and will serve as a useful guide for determining how much capacity is required. It is important to note that individual buildings will be able to optimize their capacity and achieve higher densities through measures such as flattening boxes and large plastic items and minimizing contamination levels.

3. Quantity of recyclables in the waste stream

This factor is the most variable and will vary by municipality and building. Municipal variability will depend on attributes such as size of daily paper or the recyclables accepted in program. Building variability will depend on resident demographics. Table B2 shows variation between two studies. The average of 215 kg per unit per year from the Stewardship Ontario waste audits is an average of data from 70 buildings across seven municipalities. Within these seven municipalities there is considerable variation ranging from 180 kg/unit/year to 300 kg/unit/year. Given the significant variability of this factor it is important that municipalities are sensitive to this when determining the capacity requirements of individual buildings.

Table B2: Average Quantity of Recyclables in the Waste Stream

Recyclables in the	Recovery at 70%	
waste stream	Diversion	Data Source
Kg/unit/year	Kg/unit/year	
215 ¹ (represents a range from 190 to 300)	150 (135 to 210)	Stewardship Ontario E&E Project 301, Multi-residential Waste Audit Analysis, 2009
265 ²	185	² KPMG Best Practices Assessment Project, 2007

4. Determining Capacity Requirements

Based on quantity of recyclables and density and a diversion of target of 70% the following capacity guidelines can be used:

Table B3: Capacity range for cart based programs

		Low	High
Α	Quantity of recyclables to be contained - kg/unit/year (at 70% recovery)	135	210
В	Density – 95 Gallon Cart capacity/year (kg)	1,000	kg/yr
С	Required number of Carts per 100 unit building $= A \times 100$ units $\div B$	13.5	21
D	Cart ratio – cart : units	I cart: 7 units	I cart : 5 units

Table B4: Capacity range for front end bin based programs

		Low	High
Α	Quantity of recyclables to be contained - kg/unit/year (at 70% recovery)	135	210
В	Density – 4 yard bin capacity/year (kg)	8,000	kg/yr
С	Required number of 4 yard bins per 100 unit building = $A \times 100$ units ÷ B	1.7	2.6
D	Bin ratio – bin : units	one 4-yard bin : 60 units	one 4-yard bin : 40 units

The recommended capacity is approximately 50 litres per unit. This is equivalent to supplying one 14 gallon (50 litres) blue box per unit.

A 95 gallon cart is 360 litres. At a ratio of I cart per 7 units this is the equivalent to 360 litres of capacity per 7 units. As the standard I4 gallon blue box is 50 litres, this works out to providing the equivalent of one blue box per unit. (The same calculation could be done for front end bins.) On the high end - I cart: 5 units is the equivalent of providing approximately I.5 blue boxes per unit.

The recommended capacity is 50 litres per unit. This is equivalent to one 14-gallon blue box for every unit.

This is a minimum level at 70% diversion.

APPENDIX C: Promotion & Education Strategies

CIF Project 166 has created promotion & education materials for municipal multi-residential recycling programs. These materials were developed in consultation with 18 municipalities. Municipal staff provided direction and feedback on the development of all materials. The campaign, entitled 'Recycling Moments' depicts people in multi-residential settings, captured in a daily 'recycling moment.' The campaign appeals to the 'norm' of recycling as an everyday activity. The images are of attractive people who make recycling look fun and appealing.

The following templates are being developed:

- I. Resident brochures
- 2. Posters
- 3. Cart labels
- 4. Signage for recycling areas
- 5. A recycling guide book for owners, property managers & superintendents

These templates can be customized with program specific information of the participating municipalities. The templates will be accessed through the CIF website up to May 2011. Municipalities are responsible for all production & distribution costs of developing the P&E materials (i.e., printing, distribution to buildings and residents). Continuous Improvement Fund covers the cost of design.

It is recommended that municipalities take responsibility for distribution of materials directly to residents, for displaying posters and applying labels. These materials should not be left with building staff for distribution. The following guidelines are offered:

Table CI: Distribution of Print Materials

Table C1: Distribution of Print Materials
 Method I: deliver to individual mailboxes, and if not accessible delivery door-to-door. Plan for 10-20 minutes on average for a 100 unit building for one person starting on the top floor and delivering door-to-door Method 2: send to all MR households via Canada Post using Unaddressed Ad Mail and the Electronic Shipping Tool. Targeting MR households and obtaining house counts can be obtain from the Householder Counts and Maps Tool. Municipalities can obtain preferred rates
 Posters should be used to raise awareness and will be most effective if they are updated on a regular basis. CIF project 166 has created a series of 4 posters which could be used with different strategies, including staggering their release over a period of time, using different posters for different buildings depending on demographics or placing all versions at the same time across all buildings.
 Use posters in common areas including laundry rooms, mail rooms, lobbies, and in chute room Signs are developed for instructional use and normally placed at the recycling area to provide information about what can and cannot be recycled.
 Place labels on new containers as they are delivered Clean the surface with a cleaning solution before affixing label Replace worn and out-dated labels on carts during site visits and on-going site inspections. For best visibility of labels on carts, two labels are recommended: one on the front top vertice surface identifying the stream (e.g., for a 2-stream program this would be: I) paper products of 2) glass, metal & plastics, and the second label on the top horizontal surface (the lid). The lid label viewed at eye level as residents are sorting recyclables will have detailed 'dos & don'ts' information Inside recycling rooms may require a different strategy for labels. In some case the recycling carts are left open with the cart lid placed behind the cart and so a label on the top of the lid would not be visible to residents. In these cases it is important that labels on the front of the carts are used and instructional signage placed on the wall behind the carts.
 For distribution to all building owners, property managers and superintendents, either by mail at site visits, or at stakeholder meetings The guidebook contains both general and municipal specific information
cling guidebook • For dis

To increase the uptake of distributed print materials by residents the following campaign strategy is designed to be phased-in and raise awareness and curiosity first before resident brochures are distributed:

Phase I: Distribute the Recycling Guidebook

· Distribute during site visits

Phase 2: Posters and signage

- Distribute and display signs, posters and labels in all buildings.
- Use all four versions of the poster in each building. The different versions will appeal to varied demographics, and using four versions creates more visual interest and impact. This strategy is typical of advertising campaigns that use a series of ads, each linked to a common theme but with a different look.

Phase 3: Distribute resident flyers

- Phase 3 should ideally follow Phase 2 by a week or two at the most
- Residents, whose interest has been raised during Phase 2, are now more likely to 'see' and retain the resident brochure as they are seeing it in the context of a larger campaign that has now come directly to them.

Draft Samples of the flyers developed under CIF 166 are shown below:



Recycling Guide.

Take a moment to sort and recycle. Here's what goes where.

Paper/Cardboard

- · Newspaper and flyers
- Magazines and catalogues
- Telephone books
 Cereal and cracker boxes
 (liners removed)
- · Shoe and laundry detergent boxes
- · Fine paper such as writing paper, computer paper, paper pads, advertising mail • Hard and soft cover books
- · Paper egg cartons, toilet paper and paper towel rolls
- · Paper gift wrap, greeting cards
- Clean paper shopping bags or paper packaging
 • Pizza boxes (no pizza please!!)

Containers

Glass bottles and jars for

- food and drink Metal cans
- · Soft drink cans
- · Aluminum containers (pie plates, roasting pans, etc.)
- · Empty, clean paint cans

- Jar lids
 Plastic bottles, jars and jugs
 Tubs, tub lids (yogurt, sour cream, margarine containers, etc.)
- · Milk, juice cartons
- Drink boxes
- Cardboard cans (Pringles, frozen juice, etc.)

Paper Products









Containers









Different front-end versions, for resident brochures and posters.





