

Solid Waste Operating

Services That We Provide

The Region's Waste Management Branch is responsible for the delivery of financially sound environmental waste diversion and disposal services to local residents. Our services include provision of:

- Waste transfer services through facilities located in Georgina and Markham. The Georgina transfer station, owned by the Region, operates six days per week under contract with Miller Waste Systems (Miller). The Markham facility is owned and operated by Miller and provides transfer services to the Region five days per week.
- Waste haulage and disposal services. The Region's waste is hauled to Onyx Arbor Hills Inc. and Carlton Farms Landfill in Michigan and Green Lane Environmental in St. Thomas, Ontario by Republic Services of Canada Inc., Wilson Logics and Verspeeten Cartage respectively.
- Blue box recyclable processing at facilities in Georgina and Markham. The Georgina recycling facility is owned by LaRue's Waste. The Markham facility is owned by Miller; both facilities operate five days per week providing contract processing and marketing services to the Region.
- Centralized blue box recyclable processing, waste and source separated organics transfer starting in July 2005 through the Region's new three stream waste processing facility on Bales Drive, East Gwillimbury.
- Yard waste and source separated organics (SSO) composting under contract with Halton Recycling Ltd, Newmarket. This facility is open six days per week to residents during yard waste collection season.
- Household hazardous waste disposal. The Branch operates three drop-off depots located in East Gwillimbury, Georgina and Markham respectively. These facilities are operated under contract with Hotz Environmental Services Inc. and are open on Saturday and one other day each week.
- Tires, scrap metals and electronic waste diversion services at selected sites throughout the Region.
- Public education and outreach services to promote waste diversion.

In 2004 the Region recycled some 50,000 tonnes of blue box recyclables. An additional 20,000 tonnes of yard waste was composted. Approximately 1,000 tonnes of hazardous waste were also diverted from landfill. The Region's electronics recycling pilot contributed an additional 500 tonnes of diversion to this total. Scrap metals and tires recycling totalled approximately 1,200 tonnes. Combined, this represented an overall diversion rate of approximately 24%.

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Implementation of the new 3-stream waste collection and processing system including diversion of SSO for part of 2005 is expected to increase the Region's diversion rate to approximately 28% in 2005 and to over 40% in 2006 once all the local municipalities are collecting SSO. The Minister of the Environment announced in December 2003 a new waste diversion target of 60% by 2008. The Region will have to introduce aggressive new programs to achieve the Ministry's target. These anticipated programs are expected to place significant pressures on the Branch's operating and capital budgets.

Population growth and economic conditions are also key factors affecting the Branch's business plan. The total amount of waste requiring management by the Region, and its associated cost, is largely a function of population rather than inflation. Periods of positive economic growth also tend to result in increased waste generation rates on a per capita basis. Economic conditions also influence the revenues generated from the sale of blue box recyclables by the Region which in 2004 offset the Region's gross operating budget by 20%.

Diversion

The new MRF on Garfield Wright Boulevard in East Gwillimbury is expected to be in operation in July 2005 and will enable more types of blue box material to be sorted and recovered. This will increase the annual operating costs by \$1.6 million compared to 2004. SSO processing will also increase as the local municipalities begin to roll out their SSO collection programs in 2005. A projected cost increase of \$1.5 million is expected in 2005 and will increase to over \$4.0 million per year when the program is fully implemented.

In 2004 the Region received its first payments towards the net operating costs of the blue box program under the Waste Diversion Ontario (WDO) plan. At Council's direction these funds, totalling over \$800,000 were directed to the local municipalities. Regional Council has directed that allocation of this annual funding source be 50% for 2005 to 2008.

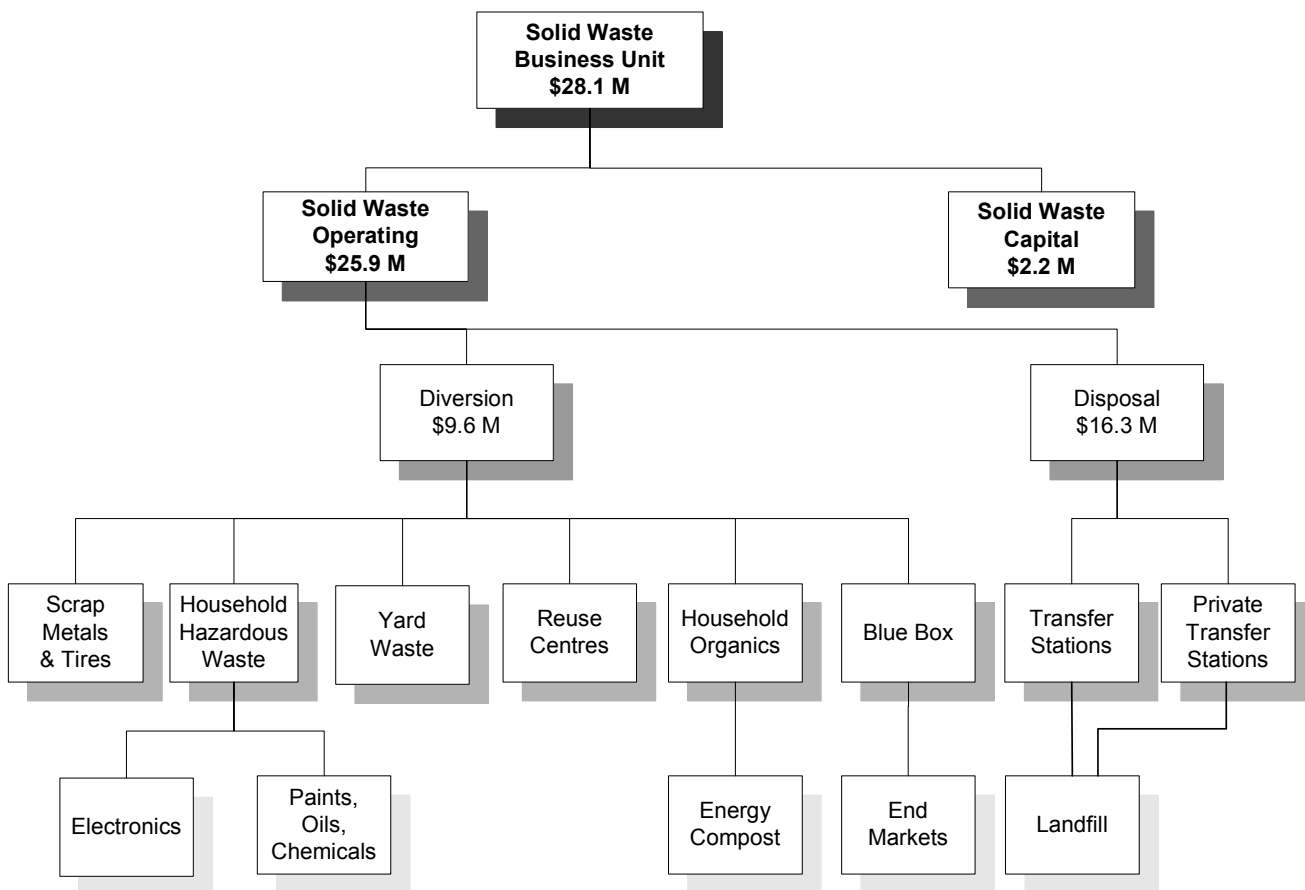


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Disposal

The Keele Valley Landfill Site closed as scheduled on December 31, 2002. Beginning in 2003, the Region began shipping waste to a landfill in St. Thomas Ontario, and to two sites in Michigan. The Region is fully responsible for waste transfer, shipping and disposal costs. Disposal costs in 2004 increased to \$15.2 million and are budgeted at \$16.3 million in 2005. Significant increases in fuel costs and changes to the regulatory environment in Michigan could result in uncontrollable increases of as much as \$0.5 million per year.

Solid Waste Management – 2005 Gross Expenditures



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2005 Objectives and Key Work Initiatives

Given the current political, financial and growth related pressures facing the Branch, four key areas of strategic focus have been established for 2005. These include:

- Commissioning of the Region's new three stream waste diversion processing infrastructure
- Promotion and education for the implementation of the SSO program
- Development of a long term strategy to manage the Region's SSO
- Development of a strategy to reduce the Region's reliance of landfilling of waste in Michigan
- Improved customer service through expansion of public waste management services

Completion of the Region's new three stream waste processing facility at Garfield Wright Boulevard in East Gwillimbury is expected in early July 2005. Halton Recycling Ltd's SSO facility in Newmarket was operational in the fall of 2004. Delivery of blue box recyclables, waste and SSO to these facilities by the local municipalities will begin in earnest in 2005.

A Request for Proposals for long term SSO processing capacity for the GTA municipalities only secured 130,000 tonnes per year of capacity when it is projected that 260,000 tonnes per year of capacity will be needed. This potential short fall in processing capacity will not impact York Region until the expiry of the Region's current 5 year contract with Halton Recycling Ltd. Operating costs are also expected to increase by over \$1.5 million based on current disposal options. Immediate exploration of alternatives to secure or construct SSO facilities is required in 2005 due to the time required to site, permit and construct new facilities.

The Region's contract with Onyx Landfill in Michigan will expire in 2007 with no opportunity for renewal. Work to explore new and emerging technologies (N&ET) to reduce the Region's reliance of "out of jurisdiction" disposal will continue in 2005 including the negotiation of a contract with a private sector proponent that resulted from an RFP completed in 2004. Development of the necessary background materials to undergo an Environmental Assessment, should one be required to site a new technology, is included in the proposed 2005 capital budget. Expansion of Regional diversion programs to reduce waste shipments to Michigan and achieve the Province's proposed target of 60% diversion is also planned for 2005.

The Region currently has only one site (Georgina) for waste, recycling and household hazardous waste drop off services for the public. Staff propose to develop additional facilities in the southern part of the Region over the next three

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years as part of the capital program to provide residents with waste management service in their municipality.



2006 Objectives

2006 is expected to be a year in which the necessary foundation (e.g., obtaining approvals and establishing project financing) is established to implement key waste management decisions made in the previous year. Objectives for 2006 include:

- Finalizing plans for long term SSO management
- Finalization of plans to secure a disposal outlet for waste currently going to Onyx Landfill, Michigan
- Expansion of public drop-off infrastructure
- Design of a waste diversion strategy for the local business community

The Region is projected to experience a short fall in SSO processing capacity in 2009. Based on options identified and evaluated in 2005, staff propose to seek Council approval and begin implementation of the preferred option in 2006. Plausible alternatives include construction of a municipally owned SSO processing facility, siting of a private sector facility on municipally owned land and contracting with a private sector supplier to provide long term processing capacity.

In 2005 a decision will be required on how the Region will manage the 70,000 tonnes of waste currently landfilling by Onyx Services in Michigan. Options include pursuing new and emerging technologies (N&ET) identified through the RFP completed in 2004 and/or releasing an RFP soliciting landfill capacity at an alternate location. Implementation of either option will have to begin in 2006 in order to have a viable alternative in place upon expiry of the Onyx contract in 2007. Initiation of a full Environmental Assessment will begin if required by the Province to site a N&ET based facility.

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As part of the Region's strategy to improve waste diversion services to the public, a new public drop-off center is proposed for the southern part of the Region in 2007. Both capital and operating budgets will be impacted by this service level increase.

The Region's current waste diversion efforts are focused on household waste. The local business community generates approximately 60% of all waste produced in the Region. Development of a strategy to divert this material from landfill will help to reduce shipments of waste to Michigan from the Region and will assist local businesses in complying with pending new Provincial legislation.



2007 Objectives

Key strategies developed in 2005 and initiated in 2006 are expected to be implemented in 2007.

- Implementation of long term SSO management plans
- Expansion of public drop-off infrastructure
- Implementation of waste diversion strategy for the local business community
- Expanded promotion of Regional waste diversion services

Pending a decision on the approach that will be taken to secure additional SSO processing capacity, effort will culminate in 2007 with either establishment of a contract with a service provider or initiation of the design and construction planning for a local facility to be completed prior to 2009.

Expansion of the Region's public drop-off system is expected to continue in 2007 with commissioning of an additional facility in the southern part of the Region. Provision of additional waste diversion options at this and existing facilities will also be planned for 2007. Options include materials that are not readily collectable at the curb (e.g., Styrofoam and plastic film) and collection of reusable goods (e.g., bicycles and textiles).

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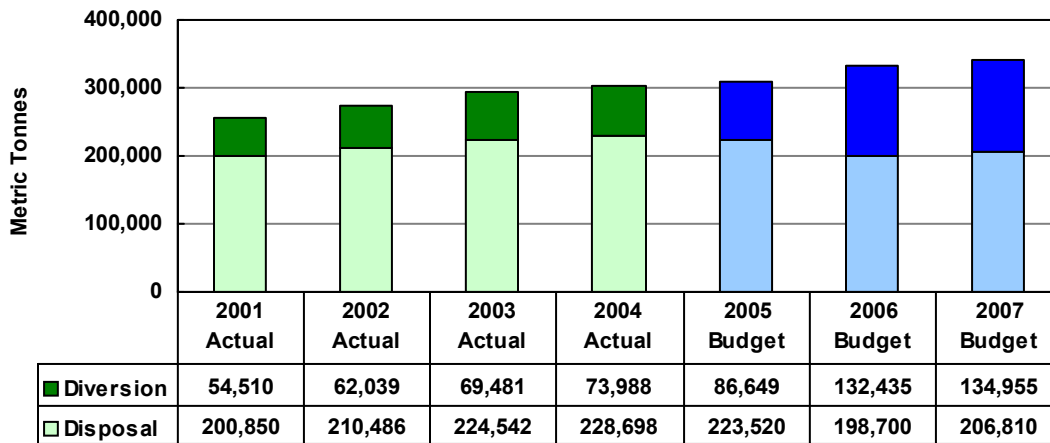
Staff propose to launch a primarily promotion and educationally based diversion program targeted at the business community. The program will provide local businesses with, amongst other things, guidance on establishing office waste reduction programs and information on local recycling outlets.

By 2007 the Region's waste management services will have undergone significant change including the switch to three stream collection, provision of SSO collection, and expansion of the blue box and public drop-off system. A renewed emphasis on promotion and education is planned to ensure the public is aware of available services and maximizing their use.

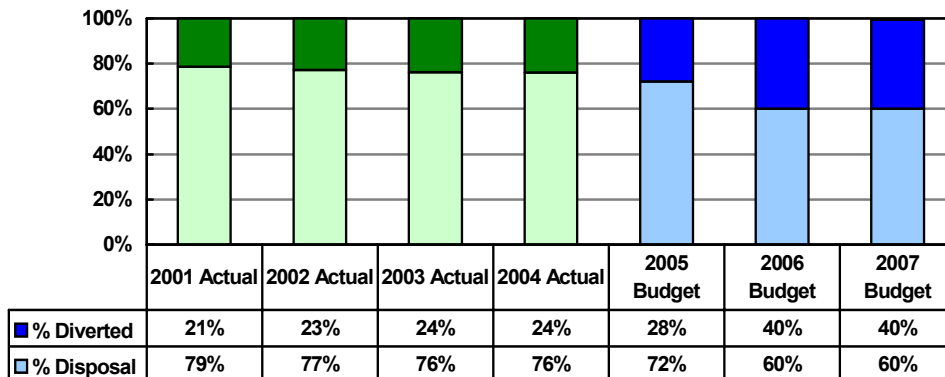
Performance Measures and Benchmarks

Service Level

Total Tonnes of Solid Waste Managed

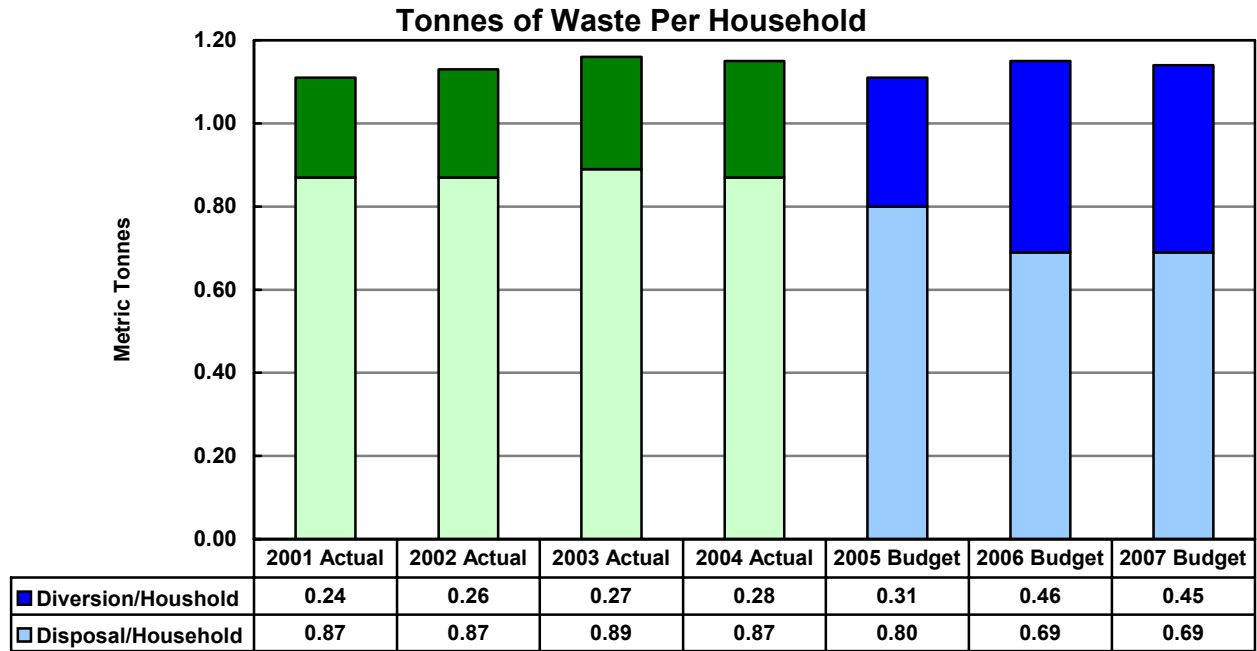


Ratio of Solid Waste Diversion to Disposal

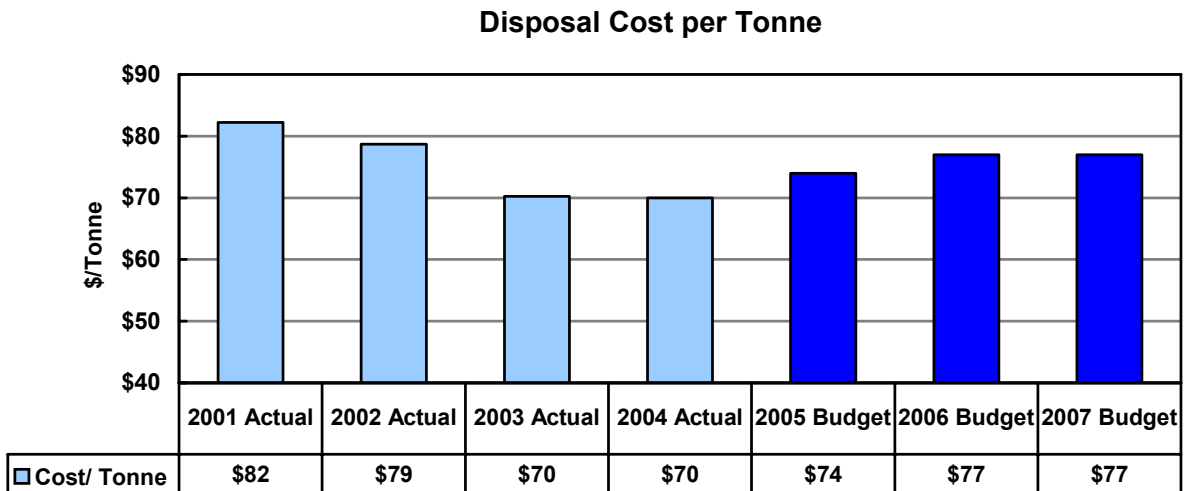


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Community Impact

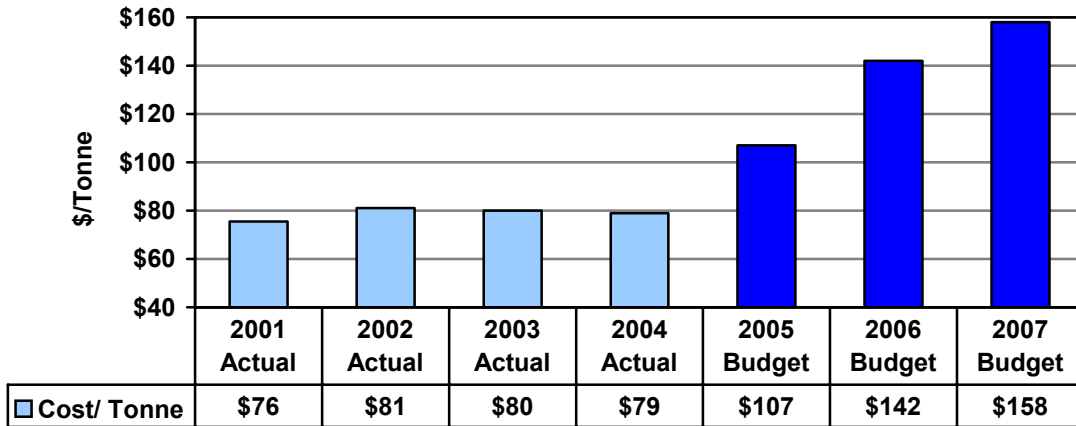


Efficiency



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Diversion Cost per Tonne



Operating Impact of 2005 Capital

The 2005 capital budget includes provisions to complete commissioning of the new Garfield Wright Boulevard waste management facility. The new waste management facility in East Gwillimbury will provide the Region with the opportunity to divert additional materials through the blue box and consolidate SSO and garbage transfer for the local municipalities. The operating cost will however, increase by \$2.1 million as a result.



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Staffing Resources

| Permanent FTE's | 2003 | 2004 | 2005 | 2006 | 2007 |
|------------------------|---------------|---------------|---------------|----------------|----------------|
| | Budget | Budget | Budget | Outlook | Outlook |
| Permanent FTE's | <u>10.0</u> | <u>10.0</u> | <u>10.0</u> | <u>11.0</u> | <u>12.0</u> |
| Net Change | 3.0 | 0.0 | 0.0 | 1.0 | 1.0 |

*10 FTE in 2005 includes 9 Solid Waste Management, and 1 Business Support Services Staff

2005 Permanent Staff Justifications

No additions to the Branch's existing staff complement are planned for 2005.

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Operating Financial Summary

| \$000's | 2003 Actual | 2004 Estimated | 2004 Budget | 2005 Budget | 2006 Outlook | 2007 Outlook |
|--------------------------------------|----------------|-------------------|----------------|----------------|-----------------|-----------------|
| Gross Expenditures | | | | | | |
| Staff Related Costs | 407 | 664 | 698 | 794 | 808 | 824 |
| Program Costs | 20,062 | 20,690 | 21,031 | 23,810 | 31,275 | 34,346 |
| Occupancy / R & M Costs | 57 | 46 | 46 | 46 | 81 | 121 |
| Minor Capital | 2 | 10 | 10 | 10 | 10 | 10 |
| Contributions to Reserves | (103) | 0 | 0 | 600 | 1,250 | 1,250 |
| Financial Items | 25 | (277) | (253) | 180 | 181 | 182 |
| Internal Charges / Recoveries | 454 | 385 | 360 | 141 | 144 | 146 |
| Sub Total | 20,904 | 21,519 | 21,893 | 25,582 | 33,748 | 36,879 |
| Revenues | | | | | | |
| Municipal Revenues | (214) | (121) | (19) | (19) | (19) | (19) |
| Provincial Funding | 0 | 0 | 0 | 0 | 0 | 0 |
| Federal Grants | 0 | 0 | 0 | 0 | 0 | 0 |
| Fees and Charges | (859) | (1,154) | (673) | (1,263) | (2,088) | (2,714) |
| Sale of Materials | (4,289) | (4,366) | (4,281) | (6,087) | (7,334) | (6,983) |
| Development Charges | 0 | 0 | 0 | 0 | 0 | 0 |
| Contribution from Reserves | (39) | (864) | (864) | (464) | (22) | (22) |
| Other Revenues | 0 | 0 | 0 | 0 | 0 | 0 |
| Sub Total | (5,401) | (6,505) | (5,837) | (7,832) | (9,463) | (9,738) |
| Tax Levy Impact | 15,504 | 15,014 | 16,055 | 17,749 | 24,285 | 27,141 |
| Interdepartmental Allocations | 296 | 384 | 384 | 322 | 328 | 335 |
| Business Plan Total | 15,800 | 15,399 | 16,440 | 18,071 | 24,613 | 27,476 |

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Financial Explanations

| Budget Change Explanations (2005/2004) | | Gross | | Net Tax Levy | | |
|-----------------------------------------------------------|---------------------------------------------------------------------|----------|---------------|---------------|---------------|---------------|
| | | Tonnes | (\$000's) | % | (\$000's) | % |
| 2004 Budget excluding Interdepartmental | | | 21,893 | | 16,055 | |
| 1. Base - Price Pressure | | | | | | |
| | Salary and benefits | | 40 | 0.2% | 40 | 0.2% |
| | Wage Increase Adjustment | | 18 | 0.1% | 18 | 0.1% |
| | Other Program Related | | 40 | 0.2% | 40 | 0.3% |
| | Contractor Cost: Miller & LaRues MRFs | 23,600 | 43 | 0.2% | (482) | (3.0%) |
| | Contractor Cost: Interim Transfer Station | 163,300 | 504 | 2.3% | 504 | 3.1% |
| | Contractor Cost: Georgina Transfer Station | 20,500 | 71 | 0.3% | 71 | 0.4% |
| | Reduced draw on solid waste reserve | | 0 | 0.0% | 400 | 2.5% |
| | | | 716 | 3.3% | 591 | 3.7% |
| Efficiencies/ Program Reductions | | | | | | |
| | Contractor Cost: Yard Waste | | (123) | (0.6%) | (123) | (0.8%) |
| | Contractor Cost: Household Hazardous Waste | | (782) | (3.6%) | (782) | (4.9%) |
| | | | (904) | (4.1%) | (904) | (5.6%) |
| Mandatory/Legislated | | | | | | |
| | | | 0 | 0.0% | 0 | 0.0% |
| | | | 0 | 0.0% | 0 | 0.0% |
| Annualization | | | | | | |
| | Contractor Cost : Yard Waste | 4,900 | 519 | 2.4% | 519 | 3.2% |
| | New WDO Funding - transfer to reserve | | 600 | 2.7% | 0 | 0.0% |
| | | | 1,119 | 5.1% | 519 | 3.2% |
| | | | | | | |
| | | | | | | |
| | Total Price Pressure, Efficiencies, Mandatory, Annualization | | 931 | 4.3% | 206 | 1.3% |
| 2. Growth | | | | | | |
| | Contractor Cost: MRF Operations | 4,770 | 281 | 1.3% | (148) | (0.9%) |
| | Contractor Cost: Interim Transfer Station | 4,850 | 303 | 1.4% | 303 | 1.9% |
| | Contractor Cost: Georgina Transfer Station | 4,970 | 348 | 1.6% | 181 | 1.1% |
| | Contractor Cost: Household Hazardous Waste | 600 | 34 | 0.2% | 34 | 0.2% |
| | Total Growth | | 966 | 4.4% | 370 | 2.3% |
| 3. Enhancements | | | | | | |
| 1. Pre-committed enhancement approved in 2003 and prior | | | | | | |
| <u>1.1 Source Separated Organics</u> | | | | | | |
| | Halton Recycling processing cost | 7,000 | 595 | 2.7% | 595 | 3.7% |
| | Interim Transfer Station, transfer and disposal cost | (7,000) | (444) | (2.0%) | (444) | (2.8%) |
| | Net Cost | | 151 | 0.7% | 151 | 0.9% |
| <u>1.2 Bales Drive Facility</u> | | | | | | |
| | MRF processing cost | 26,850 | 1,479 | 6.8% | 1,227 | 7.6% |
| | Solid Waste transfer and disposal cost | 19,030 | 1,618 | 7.4% | 1,618 | 10.1% |
| | Interim Transfer Station, transfer and disposal cost | (19,030) | (1,207) | (5.5%) | (1,207) | (7.5%) |
| | Net Cost | | 1,890 | 8.6% | 1,638 | 10.2% |
| <u>1.3 Georgina Facility</u> | | | | | | |
| | Miller Contractor Cost | 10,870 | 441 | 2.0% | 19 | 0.1% |
| | Interim Transfer Station, transfer and disposal cost | (10,870) | (690) | (3.2%) | (690) | (4.3%) |
| | Net Cost | | (249) | (1.1%) | (671) | (4.2%) |
| | Total Enhancements | | 1,792 | 8.2% | 1,118 | 7.0% |
| Total Base, Growth, Enhancements | | | 3,689 | 16.8% | 1,694 | 10.6% |
| 4. 2005 Business Plan excluding Interdepartmentals | | | 25,582 | | 17,749 | |
| | Interdepartmental Allocations | | 322 | | 322 | |
| 5. 2005 Total Business Plan | | | 25,903 | 16.3% | 18,071 | 9.9% |