



Development Charges Background Study

City of Hamilton

Watson & Associates Economists Ltd.

(In Association with GM BluePlan Engineering Ltd., Arcadis Canada Inc., WSP Inc., and Scheckenberger & Associates Ltd.)

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Refinements to Report

Subsequent to the release of the Background Study on December 21, 2023, it was identified that Schedule 10 in Appendix A was not included in error. The schedule has been added on Page A-18.

In addition, it is noted that the report was released on December 21, 2023, however, the background study indicated a December 20, 2023 release date. This has been corrected on the following pages:

- Title page;
- Page 1-2;
- Figure 1-1 on Page 1-2; and
- Page 7-12

The above revisions do not impact the calculations throughout the report.



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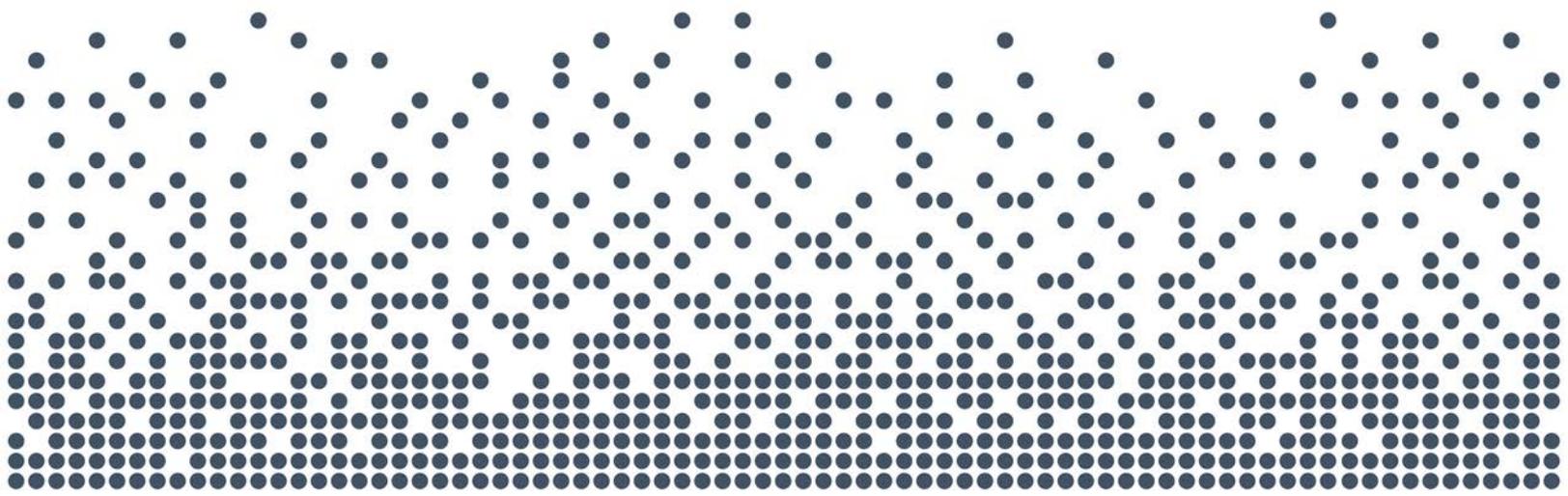
List of Acronyms and Abbreviations

Acronym	Full Description of Acronym
A.E.G.D.	Airport Employment Growth District
A.M.P.	Asset management plan
BIA	Business Improvement Area
C.B.C.	Community benefits charge
CIPA	Community Improvement Project Areas
D.C.	Development charge
D.C.A.	<i>Development Charges Act, 1997, as amended</i>
ERASE	Environmental, Remediation, and Site Enhancement
G.F.A.	Gross floor area
GI	Green infrastructure
H.T.M.P.	City of Hamilton Transportation Master Plan (2017)
LID	Low impact development
N.F.P.O.W.	No fixed place of work
N.H.S.	Natural Heritage System
OLT	Ontario Land Tribunal
O.P.A.	Official Plan Amendment
O. Reg.	Ontario Regulation



List of Acronyms and Abbreviations (Cont'd)

P.O.A.	<i>Provincial Offences Act</i>
P.P.U.	Persons per unit
R.O.W.	Right-of-way
S.C.U.B.E.	Stoney Creek Urban Boundary Expansion
S.D.E.	Single detached equivalent
S.W.M.	Stormwater management
sq.ft.	Square foot/feet



Executive Summary



Executive Summary

1. The report provided herein represents the Development Charges (D.C.) Background Study for the City of Hamilton required by the *Development Charges Act, 1997*, as amended (D.C.A.). This report has been prepared in accordance with the methodology required under the D.C.A. The contents include the following:
 - Chapter 1 – Overview of the legislative requirements of the Act;
 - Chapter 2 – Review of present D.C. policies of the City;
 - Chapter 3 – Summary of the residential and non-residential growth forecasts for the City;
 - Chapter 4 – Approach to calculating the D.C.;
 - Chapter 5 – Review of historical service standards and identification of future capital requirements to service growth and related deductions and allocations;
 - Chapter 6 – Calculation of the D.C.s;
 - Chapter 7 – D.C. policy recommendations and rules; and
 - Chapter 8 – By-law implementation.

2. D.C.s provide for the recovery of growth-related capital expenditures from new development. The D.C.A. is the statutory basis to recover these charges. The methodology is detailed in Chapter 4; a simplified summary is provided below.
 - 1) Identify amount, type and location of growth;
 - 2) Identify servicing needs to accommodate growth;
 - 3) Identify capital costs to provide services to meet the needs;
 - 4) Deduct:
 - Grants, subsidies and other contributions;
 - Benefit to existing development;
 - Amounts in excess of 15-year historical service calculation; and
 - D.C. reserve funds (where applicable).



- 5) Allocate net costs between residential and non-residential benefit; and
 - 6) Divide net costs by growth to provide the D.C.
3. A number of changes to the D.C.A. have occurred since the passage of the City's 2019 D.C. By-law. These changes were introduced through four bills passed in the Ontario legislature: Bill 108, Bill 138, Bill 197, and Bill 213, and were detailed in the City's 2021 D.C. Update Study, dated, March 5, 2021. These changes included the following:
- Instalment payments for rental housing, institutional developments, and non-profit housing;
 - Rate freeze on D.C.s for applications proceeding through Site Plan or Zoning By-law Amendment applications;
 - Removal of the 10% mandatory deduction on all D.C. eligible services;
 - Introduction of a new authority under the *Planning Act* to implement community benefits charges (C.B.C.s);
 - Expansion to the list of eligible services – as part of Bill 108, the list of eligible services for the D.C. was limited to “hard services”, with “soft services” being removed from the D.C.A. Through Bill 197, the list of D.C. eligible services was expanded to include most services eligible under the D.C.A. prior to Bill 108; and
 - New exemption for universities that receive operating funds from the government.
4. Since the completion of the D.C. Update Study in 2021, further legislative changes have been made to the D.C.A.
- 1) On November 28, 2022, Bill 23, the *More Homes Built Faster Act, 2022*, received Royal Assent. The Bill provides the following changes (further details are provided in section 1.4 of this report). It is noted that, as of the time of writing, the Province has announced (on December 13, 2023) potential changes to the phased-in requirements and the removal of studies as eligible capital costs. The details of these changes will be forthcoming in early 2024 and Watson will monitor and advise as to the nature of these changes:



- Additional residential unit exemption: exemptions for up to two additional units;
- Removal of housing as an eligible D.C. service;
- New statutory exemptions for affordable and attainable units (currently not in force);
- New statutory exemption: affordable inclusionary zoning units;
- New statutory exemption: non-profit housing;
- Historical level of service extended to previous 15-year period instead of the previous 10-year period;
- Capital cost definition revised to remove studies and prescribe services for which land or an interest in land will be restricted (nothing prescribed to date);
- Mandatory phase-in of a D.C. passed after January 1, 2022, as follows:
 - Year 1 – 80% of the maximum charge;
 - Year 2 – 85% of the maximum charge;
 - Year 3 – 90% of the maximum charge;
 - Year 4 – 95% of the maximum charge; and
 - Year 5 to expiry – 100% of the maximum charge;
- D.C. by-law expiry will be a maximum of 10 years after the date the by-law comes into force;
- D.C. for rental housing developments to receive a discount as follows:
 - Three or more bedrooms – 25% reduction;
 - Two bedrooms – 20% reduction; and
 - All other bedroom quantities – 15% reduction;
- Maximum interest rate for instalments and the determination of the charge for eligible Site Plan and Zoning By-law Amendment applications to be set at the average prime rate plus 1%; and
- Requirement to allocate funds received – municipalities are required to spend or allocate at least 60% of their reserve fund at the beginning of the year for water, wastewater, and services related to a highway.

2) On April 14, 2022, Bill 109, the *More Homes for Everyone Act, 2022*, received Royal Assent. The Bill provides for additional reporting



requirements as part of the Annual Treasurer’s statement. Further details are provided in section 1.5 of this report.

5. On December 4, 2023, Bill 134, the *Affordable Homes and Good Jobs Act, 2023*, received Royal Assent. This Bill provides for a change to the definition of affordable residential units. Further discussion is provided in section 1.5 of this report.
6. The growth forecast (Chapter 3), on which the City-wide D.C. is based, projects the following population, housing, and non-residential floor area for the 10-year (2023 to 2032) period. It is noted that for water service, wastewater service, stormwater service and services related to a highway, the forecast is based on the targeted population and employment numbers included in the prior D.C. study. The City is undertaking master plan studies for each of these services to assess the servicing needs of growth beyond these targets; however, as of the time of writing, these studies are not complete. As the servicing information is not available for growth identified beyond the 2019 D.C. targets, the former growth targets have been continued for this study.

Table ES-1
Summary of Growth Forecast by Planning Period

Measure	Urban Area: Water/Wastewater Servicing Target	Separate Sewer System Area: Servicing Target	Combined Sewer System Area: Servicing Target	Services Related to a Highway City-Wide Servicing Target	City-wide: 2023 to 2032
(Net) Population Increase	43,099	42,278	821	42,157	62,136
Residential Unit Increase	26,358	21,143	5,215	26,570	36,113
Non-Residential Gross Floor Area Increase (sq.ft.)	10,258,200	7,470,100	2,788,200	10,375,800	15,617,600

Source: Watson & Associates Economists Ltd. Forecast 2023



7. On June 13, 2019, the City of Hamilton passed By-law 19-142 under the D.C.A. The by-law imposes D.C.s on residential and non-residential uses. This by-law was amended on July 6, 2021, via By-law 21-102. This by-law was also amended by 19-142-OLT-01 Schedule A and 19-142-OLT-02 Schedule A. This amended by-law will expire on June 13, 2024. The City is undertaking a D.C. public process and anticipates passing a new by-law in advance of the expiry date. The mandatory public meeting has been set for February 22, 2024, with adoption of the by-laws anticipated for April/May 2024.
8. The City's D.C.s currently in effect (excluding GO Transit service charges) for single detached dwelling units are \$58,127 for the combined sewer system and \$66,964 for the separated sewer system. The non-residential charge (excluding GO Transit service charges) per sq.ft. of building area is \$25.08 for the combined sewer system and \$28.01 for the separated sewer system. This report has undertaken a recalculation of the charges based on future identified needs (presented in Table ES-3). It is noted that the costs and calculations undertaken herein are based on 2023 dollars. Charges have been provided on a City-wide basis for all services, excluding water and wastewater, (calculated on an urban service area basis) and stormwater services (calculated on a combined versus separated sewer system area basis). The corresponding single detached unit charge is \$76,645 within the combined sewer system area and \$90,633 in the separated sewer system area. The non-residential charge is \$36.73 per sq.ft. of building area within the combined sewer system area and \$41.48 per sq.ft. of building area within the separated sewer system area. These rates are submitted to Council for its consideration.
9. The D.C.A. requires a summary be provided of the gross capital costs and the net costs to be recovered over the life of the by-laws. This calculation is provided by service and is presented in Table 6-7. A summary of these costs is provided below:



Table ES-2
Summary of Expenditures Anticipated Over the Life of the By-laws

Summary of Expenditures Anticipated Over the Life of the By-laws	Expenditure Amount
Total gross expenditures planned over the next 10 years	\$4,851,139,639
Less: Benefit to existing development	\$1,203,092,703
Less: Post planning period benefit	\$386,756,627
Less: Other Deductions	\$104,427,500
Less: Grants, subsidies and other contributions	\$631,928,900
Net costs to be recovered from development charges	\$2,524,933,909

This suggests that for the non-D.C. cost over the life of the D.C. by-laws (benefit to existing development, and grants, subsidies and other contributions), approximately \$1.94 billion (or an annual amount of approximately \$193.94 million) will need to be contributed from taxes and rates, or other sources. With respect to the post period benefit amount of \$386.76 million, it will be included in subsequent D.C. study updates to reflect the portion of capital that benefits growth in the post period D.C. forecasts.

Based on the above table, the City plans to spend \$4.85 billion over the life of the by-laws, of which approximately \$2.52 billion (52%) is recoverable from D.C.s. Of this net amount, \$2.00 billion is recoverable from residential development and \$521.09 million from non-residential development. It is noted also that any exemptions or reductions in the charges would reduce this recovery further.

10. Considerations by Council – The Background Study represents the service needs arising from residential and non-residential growth over the forecast periods.

The following services are calculated based on an urban area servicing target forecast:

- Wastewater services; and
- Water services.

The following service is calculated based on a City-wide servicing target forecast:



- Services related to a highway.

The following service is based on an area-specific servicing target forecast for the separated sewer system and combined sewer system areas:

- Stormwater drainage and control services
 - Separated sewer system area; and
 - Combined sewer system area.

All other services are calculated based on a 10-year forecast. These include:

- Public works – facilities and fleet;
- Fire protection services;
- Policing services;
- Transit services;
- Parks and recreation services;
- Library services;
- Long-term care services;
- Child care and early years programs;
- Public health services;
- *Provincial Offences Act* (P.O.A.) services;
- Ambulance services; and
- Waste diversion.

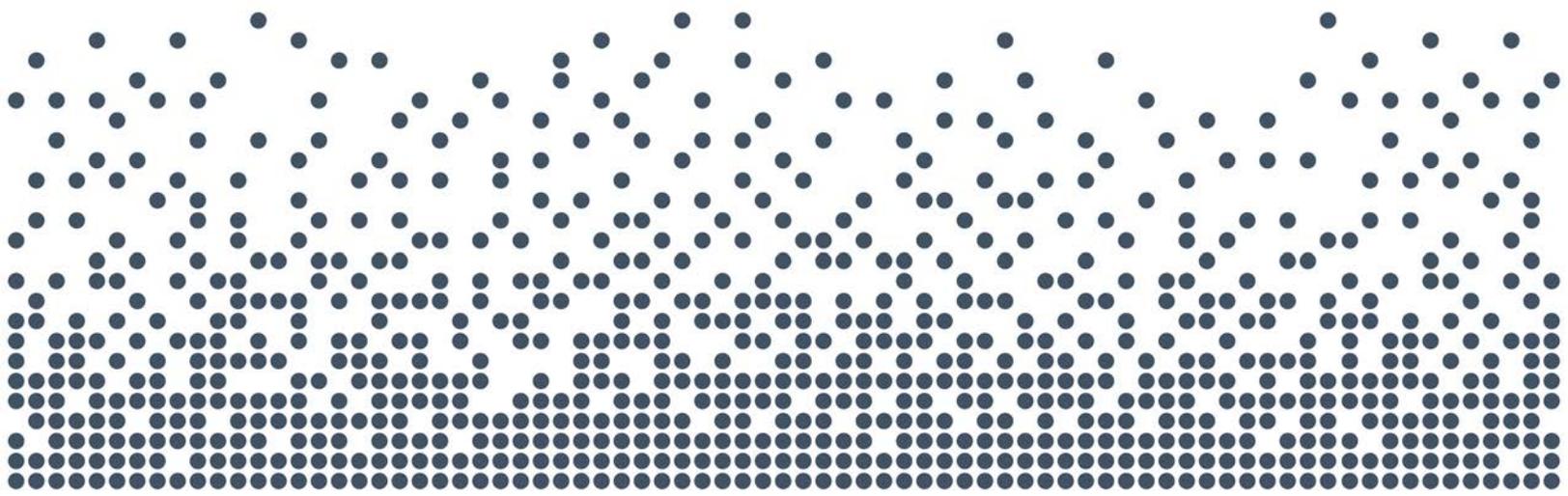
Council will consider the findings and recommendations provided in the report and, in conjunction with public input, approve such policies and rates it deems appropriate. The draft D.C. by-laws are appended in Appendix J (under separate cover). These decisions may include:

- Adopting the charges and policies recommended herein;
- Considering additional recommended exemptions to the by-laws; and
- Considering reductions in the charge by class of development (obtained by removing certain services on which the charge is based and/or by a general reduction in the charge).



**Table ES-3
Schedule of Development Charges**

Service/Class of Service	RESIDENTIAL					NON-RESIDENTIAL
	Single and Semi-Detached Dwelling	Other Multiples	Apartments - 2 Bedrooms+	Apartments - Bachelor and 1 Bedroom	Residential Facility	(per sq.ft. of Gross Floor Area)
City Wide Services/Class of Service:						
Services Related to a Highway	22,539	16,823	13,818	8,561	7,018	16.28
Public Works (Facilities and Fleet)	1,335	996	818	507	416	0.80
Transit Services	1,601	1,195	982	608	498	0.96
Fire Protection Services	1,151	859	706	437	358	0.69
Policing Services	1,018	760	624	387	317	0.61
Parks and Recreation	11,065	8,259	6,784	4,203	3,445	0.95
Library Services	2,061	1,538	1,264	783	642	0.18
Long-term Care Services	231	172	142	88	72	0.04
Child Care and Early Years Programs	-	-	-	-	-	0.00
Provincial Offences Act Services including By-Law Enforcement	52	39	32	20	16	0.03
Public Health Services	42	31	26	16	13	0.01
Ambulance	325	243	199	123	101	0.06
Waste Diversion	346	258	212	131	108	0.03
Total City Wide Services/Class of Services	41,766	31,173	25,607	15,864	13,004	20.64
Urban Services						
Wastewater Facilities	7,125	5,318	4,368	2,706	2,218	4.53
Wastewater Linear Services	10,878	8,119	6,669	4,132	3,387	6.91
Water Services	7,323	5,466	4,490	2,782	2,280	4.65
Combined Sewer System						
Stormwater Drainage and Control Services	9,553	7,130	5,857	3,629	2,974	0.00
Separated Sewer System						
Stormwater Drainage and Control Services	23,541	17,571	14,432	8,942	7,329	4.75
GRAND TOTAL RURAL AREA	41,766	31,173	25,607	15,864	13,004	20.64
GRAND TOTAL COMBINED SEWER SYSTEM	76,645	57,206	46,991	29,113	23,863	36.73
GRAND TOTAL SEPARATED SEWER SYSTEM	90,633	67,647	55,566	34,426	28,218	41.48



Report



Chapter 1

Introduction



1. Introduction

1.1 Purpose of this Document

This Background Study has been prepared pursuant to the requirements of the *Development Charges Act, 1997*, as amended, (D.C.A.) (section 10) and, accordingly, recommends new development charges (D.C.s) and policies for the City of Hamilton.

The City retained Watson & Associates Economists Ltd. (Watson), to undertake the D.C. study process beginning in late 2022 with anticipated completion prior to by-law expiry in mid-2024. Watson worked with City staff as well as engineering consultants GM BluePlan Engineering Consultants Limited (GM BluePlan), Arcadis Canada Inc. (Arcadis), and WSP Inc. (WSP) in association with Scheckenberger & Associates Ltd. in preparing the D.C. analysis and policy recommendations.

This D.C. Background Study, containing the proposed D.C. by-laws, will be distributed to members of the public in order to provide interested parties with sufficient background information on the legislation, the study's recommendations, and an outline of the basis for these recommendations.

This report has been prepared, in the first instance, to meet the statutory requirements applicable to the City's D.C. Background Study, as summarized in Chapter 4. It also addresses the requirement for "rules" (contained in Chapter 7) and the proposed by-laws to be made available as part of the approval process (included as Appendix J).

In addition, the report is designed to set out sufficient background on the legislation (Chapter 4), Hamilton's current D.C. policies (Chapter 2) and the policies underlying the proposed by-laws, to make the exercise understandable to those who are involved.

Finally, it addresses post-adoption implementation requirements (Chapter 8) which are critical to the successful application of the new policy.

The chapters in the report are supported by appendices containing the data required to explain and substantiate the calculation of the charge. A full discussion of the statutory requirements for the preparation of a background study and calculation of a D.C. is provided herein.



1.2 Summary of the Process

The public meeting required under section 12 of the D.C.A. has been scheduled for February 22, 2024. Its purpose is to present the study to the public and to solicit public input. The meeting is also being held to answer any questions regarding the study's purpose, methodology, and the proposed modifications to the City's D.C.s.

In accordance with the legislation, the Background Study and proposed D.C. by-laws will be available for public review on December 21, 2023.

The process to be followed in finalizing the report and recommendations includes:

- Consideration of responses received prior to, at, or immediately following the public meeting; and
- Finalization of the report and Council consideration of the by-laws subsequent to the public meeting.

Figure 1-1 outlines the proposed schedule to be followed with respect to the D.C. by-laws adoption process.

Figure 1-1
Schedule of Key D.C. Process Dates for the City of Hamilton

Schedule of Study Milestone	Dates
1. Data collection, staff review, D.C. calculations and policy work	September 2022 to November 2023
2. Development Charges Stakeholders Sub-Committee Meeting	1. April 13, 2023 2. September 18, 2023 3. November 9, 2023
3. Public meeting advertisement placed in Hamilton Spectator and Social Media Outlets	Last week of January 2024
4. Background study and proposed by-laws available to public	December 21, 2023
5. Public Engagement Session	January 23, 2024
6. Public meeting at Audit, Finance & Administration Committee	February 22, 2024
7. Audit, Finance & Administration Committee considers adoption of Background Study and passage of by-laws	April/May 2024



Schedule of Study Milestone	Dates
8. Newspaper notice given of by-law(s) passage	By 20 days after passage
9. Last day for by-law(s) appeal	40 days after passage
10. City makes pamphlet available (where by-law(s) not appealed)	By 60 days after in force date

1.3 Changes to the D.C.A. – Bills 108, 138, 197, and 213

1.3.1 *Bill 108: More Homes, More Choice Act – An Act to Amend Various Statutes with Respect to Housing, Other Development, and Various Matters*

On May 2, 2019, the Province introduced Bill 108, which proposed changes to the D.C.A. The Bill was introduced as part of the Province's "More Homes, More Choice: Ontario's Housing Supply Action Plan." The Bill received Royal Assent on June 6, 2019.

While having received Royal Assent, many of the amendments to the D.C.A. will not come into effect until they are proclaimed by the Lieutenant Governor (many of these changes were revised through Bill 197). At the time of writing, the following provisions have been proclaimed:

- Effective January 1, 2020, rental housing and institutional developments will pay D.C.s in six equal annual payments commencing at occupancy. Interest may be charged on the instalments, and any unpaid amounts may be added to the property and collected as taxes. As per Bill 23, non-profit housing developments are now exempt from paying D.C.s; however, prior to Bill 23, and as a result of Bill 108, non-profit housing developments paid D.C.s in 21 equal annual payments. Effective January 1, 2020, the D.C. amount for all developments occurring within two years of a Site Plan or Zoning By-law Amendment planning approval (for applications submitted after this section is proclaimed), shall be determined based on the D.C. in effect on the day of Site Plan or Zoning By-law Amendment application, subject to applicable interest. If the development is not proceeding via these planning approvals, then the amount is determined as of the date of issuance of a building permit.



On February 28, 2020, the Province released updated draft regulations related to the D.C.A. and the *Planning Act*. A summary of the changes that were to take effect upon proclamation by the Lieutenant Governor is provided below.

Changes to Eligible Services – Prior to Bill 108, the D.C.A. provided a list of ineligible services whereby municipalities could include growth-related costs for any service that was not listed. With Bill 108, the changes to the D.C.A. would now specifically list the services that are eligible for inclusion in the by-law. Furthermore, the initial list of eligible services under Bill 108 was limited to "hard services," with "soft services" being removed from the D.C.A. These services would be considered as part of a new community benefits charge (C.B.C.) (discussed below) imposed under the *Planning Act*. As noted in the next section, this list of services has been amended through Bill 197.

Mandatory 10% Deduction – The amending legislation would have removed the mandatory 10% deduction for all services that remain eligible under the D.C.A.

Remaining Services to be Included in a New C.B.C. Under the *Planning Act* – It was proposed that a municipality may, by by-law, impose a C.B.C. against land to pay for the capital costs of facilities, services and matters required because of development or redevelopment in the area to which the by-law applies. The C.B.C. was proposed to include formerly eligible D.C. services that are not included in the listing below, in addition to parkland dedication and bonus zoning contributions.

1.3.2 Bill 138: Plan to Build Ontario Together Act, 2019

On November 6, 2019, the Province released Bill 138 which provided further amendments to the D.C.A. and the *Planning Act*. This Bill received Royal Assent on December 10, 2019, and was proclaimed, which resulted in sections related to the D.C.A. (schedule 10) becoming effective on January 1, 2020. The amendments to the D.C.A. included removal of instalment payments for commercial and industrial developments that were originally included in Bill 108.

1.3.3 Bill 197: COVID-19 Economic Recovery Act, 2020

In response to the global pandemic that began affecting Ontario in early 2020, the Province released Bill 197 which provided amendments to a number of Acts, including the D.C.A. and the *Planning Act*. This Bill also revised some of the proposed changes identified in Bill 108. Bill 197 was tabled on July 8, 2020, received Royal Assent on July



21, 2020, and was proclaimed on September 18, 2020. The following provides a summary of the changes.

1.3.3.1 D.C.-Related Changes

List of D.C. Eligible Services

- As noted above, under Bill 108 some services were to be included under the D.C.A. and some would be included under the C.B.C. authority. Bill 197, however, revised this proposed change and has included all services (with some exceptions) under the D.C.A. These services are as follows:
 - Water supply services, including distribution and treatment services;
 - Wastewater services, including sewers and treatment services.
 - Storm water drainage and control services.
 - Services related to a highway.
 - Electrical power services.
 - Toronto-York subway extension.
 - Transit services.
 - Waste diversion services.
 - Policing services.
 - Fire protection services.
 - Ambulance services.
 - Library services.
 - Long-term care services.
 - Parks and recreation services, but not the acquisition of land for parks.
 - Public health services.
 - Child care and early years services.
 - Housing services (no longer eligible as per Bill 23).
 - *Provincial Offences Act* services.
 - Services related to emergency preparedness.
 - Services related to airports, but only in the Regional Municipality of Waterloo.
 - Additional services as prescribed.



Classes of Services – D.C.

Pre-Bill 108/197 legislation (i.e., the D.C.A., 1997) allowed for categories of services to be grouped together into a minimum of two categories (90% and 100% services).

The Act (as amended) repeals and replaces the above with the four following subsections:

- A D.C. by-law may provide for any eligible service or capital cost related to any eligible service to be included in a class, set out in the by-law.
- A class may be composed of any number or combination of services and may include parts or portions of the eligible services or parts or portions of the capital costs in respect of those services.
- A D.C. by-law may provide for a class consisting of studies in respect of any eligible service whose capital costs are described in paragraphs 5 and 6 of section 5 of the D.C.A.
- A class of service set out in the D.C. by-law is deemed to be a single service with respect to reserve funds, use of monies, and credits.

Note: An initial consideration of “class” appears to mean any group of services.

Mandatory 10% Deduction

As well, the removal of the 10% deduction for soft services under Bill 108 has been maintained.

As a result of the passage of Bill 197, and its subsequent proclamation on September 18, 2020, this report has provided the D.C. calculations without the 10% mandatory deduction.

1.3.3.2 C.B.C.-Related Changes

C.B.C. Eligibility

The C.B.C. is limited to lower-tier and single-tier municipalities; upper-tier municipalities will not be allowed to impose this charge.



1.3.3.3 Combined D.C. and C.B.C. Impacts

D.C. versus C.B.C. Capital Cost

- A C.B.C. may be imposed with respect to the services listed in section 2 (4) of the D.C.A. (eligible services) “provided that the capital costs that are intended to be funded by the community benefits charge are not capital costs that are intended to be funded under a development charge by-law.”

1.3.3.4 City of Hamilton’s C.B.C. By-law

It is noted that the City undertook a process to develop a C.B.C. strategy and by-law in 2022. The C.B.C. by-law (By-law 22-158) was passed on June 22, 2022, with an effective date of September 18, 2022.

1.3.4 Bill 213: Better for People, Smarter for Business Act, 2020

On December 8, 2020, Bill 213 received Royal Assent. One of the changes of the Bill that took effect upon Royal Assent included amending the *Ministry of Training, Colleges and Universities Act* by introducing a new section that would exempt the payment of D.C.s for developments of land intended for use by a university that receives operating funds from the government. As a result, this mandatory exemption will be included in the D.C. by-laws.

1.4 Changes to the D.C.A. – Bill 23: More Homes Built Faster Act, 2022

On November 28, 2022, Bill 23 received Royal Assent. This Bill amends a number of pieces of legislation including the *Planning Act* and the D.C.A. The following provides a summary of the changes to the D.C.A. It is noted that, as of the time of writing, the Province has announced (on December 13, 2023) potential changes to the phased-in requirements and the removal of studies as eligible capital costs. The details of these changes will be forthcoming in early 2024 and Watson will monitor and advise as to the nature of these changes.



1.4.1 Additional Residential Unit Exemption

The rules for these exemptions are now provided in the D.C.A., rather than the regulations and are summarized as follows:

- Exemption for residential units in existing rental residential buildings – For rental residential buildings with four or more residential units, the creation of the greater of one unit or 1% of the existing residential units will be exempt from a D.C.
- Exemption for additional residential units in existing and new residential buildings – The following developments will be exempt from a D.C.:
 - A second unit in a detached, semi-detached, or rowhouse if all buildings and ancillary structures cumulatively contain no more than one residential unit;
 - A third unit in a detached, semi-detached, or rowhouse if no buildings or ancillary structures contain any residential units; and
 - One residential unit in a building or structure ancillary to a detached, semi-detached, or rowhouse on a parcel of urban land, if the detached, semi-detached, or rowhouse contains no more than two residential units and no other buildings or ancillary structures contain any residential units.

1.4.2 Removal of Housing as an Eligible D.C. Service

Housing is removed as an eligible service as of November 28, 2022. Municipalities with by-laws that include a charge for housing services can no longer collect for this service. It is noted that the charge for housing services is still applicable where rates have been frozen for the purposes of instalment payments under the D.C.A.

1.4.3 New Statutory Exemption for Non-Profit Housing

Non-profit housing units are exempt from D.C.s and D.C. instalment payments due after November 28, 2022.

1.4.4 New Statutory Exemptions for Affordable Units, Attainable Units, and Affordable Inclusionary Zoning Units

Affordable units, attainable units, and inclusionary zoning units (affordable) are exempt from the payment of D.C.s, as follows:



- **Affordable Rental Units**: Where rent is no more than 80% of the average market rent, as defined by a new bulletin published by the Ministry of Municipal Affairs and Housing.
- **Affordable Owned Units**: Where the price of the unit is no more than 80% of the average purchase price, as defined by a new bulletin published by the Ministry of Municipal Affairs and Housing.

Note: As discussed in Section 1.6, the definitions above of an Affordable Rental Unit and Affordable Owned Unit have been modified through Bill 134.

- **Attainable Units**: Excludes affordable units and rental units; will be defined as prescribed development or class of development and sold to a person who is at “arm’s length” from the seller.
 - Note: for affordable and attainable units, the municipality shall enter into an agreement that ensures the unit remains affordable or attainable for 25 years.

Note: the above exemptions are not currently in force. These exemptions will be in force upon proclamation and revisions to the regulations. The bulletin has yet to be published as at the time of writing this report.

- **Inclusionary Zoning Units**: Affordable housing units required under inclusionary zoning by-laws are exempt from a D.C.

1.4.5 Historical Level of Service Extended to Previous 15-year Period

Prior to Bill 23, the increase in need for service was limited by the average historical level of service calculated over the 10-year period preceding the preparation of the D.C. background study. This average is now extended to the historical 15-year period.

1.4.6 Revised Definition of Capital Costs

The definition of capital costs has been revised to remove studies. Furthermore, the regulations to the Act may prescribe services for which land or an interest in land will be restricted. As at the time of writing, no services have been prescribed.



1.4.7 Mandatory Phase-in of a D.C.

For all D.C. by-laws passed after January 1, 2022, the charge must be phased-in annually over the first five years the by-law is in force, as follows:

- Year 1 – 80% of the maximum charge;
- Year 2 – 85% of the maximum charge;
- Year 3 – 90% of the maximum charge;
- Year 4 – 95% of the maximum charge; and
- Year 5 to expiry – 100% of the maximum charge.

1.4.8 D.C. By-law Expiry

A D.C. by-law now expires 10 years after the day it comes into force (unless the by-law provides for an earlier expiry date). This extends the by-law's life from five years, prior to Bill 23.

1.4.9 Instalment Payments

Non-profit housing development has been removed from the instalment payment section of the Act (section 26.1), as these units are now exempt from the payment of a D.C.

1.4.10 Rental Housing Discount

The D.C. payable for rental housing development will be reduced based on the number of bedrooms in each unit, as follows:

- Three or more bedrooms – 25% reduction;
- Two bedrooms – 20% reduction; and
- All other bedroom quantities – 15% reduction.

1.4.11 Maximum Interest Rate for Instalments and Determination of Charge for Eligible Site Plan and Zoning By-law Amendment Applications

No maximum interest rate was previously prescribed. As per Bill 23, the maximum interest rate is set at the average prime rate plus 1%. This maximum interest rate



provision would apply to all instalment plans and eligible Site Plan and Zoning By-law Amendment applications occurring after November 28, 2022.

1.4.12 Requirement to Allocate Funds Received

Annually, beginning in 2023, municipalities will be required to spend or allocate at least 60% of the monies in a reserve fund at the beginning of the year for water, wastewater, and services related to a highway. Other services may be prescribed by the regulation.

1.5 Changes to the D.C.A. – Bill 109: More Homes for Everyone Act, 2022

Bill 109, the *More Homes for Everyone Act, 2022*, provides that Council shall make the Annual Treasurer's Statement available to the public by posting the statement on the website or, if there is no such website, in the municipal office. In addition, Bill 109 introduced the following requirements that shall be included in the Treasurer's Statement:

- For each service for which a D.C. is collected during the year,
 - i. whether, as of the end of the year, the municipality expects to incur the amount of capital costs that were estimated, in the relevant D.C. background study, to be incurred during the term of the applicable D.C. by-law; and
 - ii. if the answer to subparagraph i (above) is no, the amount the municipality now expects to incur and a statement as to why this amount is expected;
- For any service for which a D.C. was collected during the year but in respect of which no money from a reserve fund was spent during the year, a statement as to why there was no spending during the year.

1.6 Changes to the D.C.A. – Bill 134: Affordable Homes and Good Jobs Act, 2023

The exemption for affordable residential units was included in the *More Homes Built Faster Act* (Bill 23), enacted by the Province on November 28, 2022. Under this legislation, affordable residential units were defined within subsection 4.1 of the D.C.A. and exemptions for D.C.s were provided in respect of this definition. While the



legislation was enacted in November 2022, the ability for municipalities to implement the exemptions required the Minister of Municipal Affairs and Housing to publish an “Affordable Residential Units for the Purposes of the Development Charges Act, 1997 Bulletin.” This bulletin would inform the average market rent and purchase price to be used in determining which developments qualify as affordable residential units. As of the time of writing, this bulletin had not been published by the Minister.

Bill 134 received Royal Assent on December 4, 2023 and provides for a modification to the affordable residential unit definition by:

- Introducing an income-based test for affordable rent and purchase price; and
- Increasing the threshold for the market test of affordable rent and purchase price.

This change provides the exemption based on the lesser of the two measures. Moreover, the rules in subsection 4.1 of the D.C.A. are unchanged with respect to:

- The tenant and purchaser transacting the affordable unit being at arm’s length;
- The intent of maintaining the affordable residential unit definition for a 25-year period, requiring an agreement with the municipality (which may be registered on title); and
- Exemptions for attainable residential units and associated rules (requiring further regulations).

The following table provides a comparison of the definitions provided through Bill 23 and those provided through Bill 134 (underlining added for emphasis).

Item	Bill 23 Definition	Bill 134 Definition (Current D.C.A. Definition)
Affordable residential unit rent (subsection 4.1 (2), para. 1)	The rent is no greater than <u>80 per cent of the average market rent</u> , as determined in accordance with subsection (5).	The rent is no greater than <u>the lesser of</u> , i. <u>the income-based affordable rent</u> for the residential unit set out in the Affordable Residential Units bulletin, as identified by the Minister of Municipal Affairs and Housing in



Item	Bill 23 Definition	Bill 134 Definition (Current D.C.A. Definition)
		<p>accordance with subsection (5), and</p> <p>ii. the <u>average market rent</u> identified for the residential unit set out in the Affordable Residential Units bulletin.</p>
<p>Average market rent/rent based on income (subsection 4.1 (5)) for the purposes of subsection 4.1 (2), para. 1</p>	<p>The <u>average market rent for the year in which the residential unit is occupied by a tenant</u>, as identified in the bulletin entitled the “Affordable Residential Units for the Purposes of the Development Charges Act, 1997 Bulletin.”</p>	<p>The Minister of Municipal Affairs and Housing shall,</p> <p>(a) determine the <u>income of a household</u> that, in the Minister’s opinion, is <u>at the 60th percentile of gross annual incomes for renter households in the applicable local municipality</u>; and</p> <p>(b) identify the <u>rent</u> that, in the Minister’s opinion, is <u>equal to 30 per cent of the income of the household</u> referred to in clause (a).</p>
<p>Affordable residential unit ownership (subsection 4.1 (3), para. 1)</p>	<p>The price of the residential unit is no greater than <u>80 per cent of the average purchase price</u>, as determined in accordance with subsection (6).</p>	<p>The price of the residential unit is no greater than <u>the lesser of</u>,</p> <p>i. the <u>income-based affordable purchase price</u> for the residential unit set out in the Affordable Residential Units bulletin, as identified by the Minister of Municipal Affairs and Housing in accordance with subsection (6), and</p> <p>ii. <u>90 per cent of the average purchase price</u> identified for the residential unit set out in the Affordable Residential Units bulletin.</p>



Item	Bill 23 Definition	Bill 134 Definition (Current D.C.A. Definition)
Average market purchase price/purchase price based on income (subsection 4.1 (6)) for the purposes of subsection 4.1 (3), para. 1	The <u>average purchase price for the year in which the residential unit is sold</u> , as identified in the bulletin entitled the “Affordable Residential Units for the Purposes of the Development Charges Act, 1997 Bulletin,” as it is amended from time to time, that is published by the Minister of Municipal Affairs and Housing on a website of the Government of Ontario.	The Minister of Municipal Affairs and Housing shall, (a) determine the <u>income of a household</u> that, in the Minister’s opinion, is at the <u>60th percentile of gross annual incomes for households in the applicable local municipality</u> ; and (b) identify the <u>purchase price</u> that, in the Minister’s opinion, <u>would result in annual accommodation costs equal to 30 per cent of the income of the household</u> referred to in clause (a)



Chapter 2

Current City of Hamilton Policy



2. Current City of Hamilton Policy

2.1 Schedule of Charges

On June 13, 2019, the City of Hamilton passed By-law 19-142 under the D.C.A. This by-law was amended on July 6, 2021, via By-law 21-102. The by-law was also amended by 19-142-OLT-01 Schedule A and 19-142-OLT-02 Schedule A.

By-law 11-174 was passed on June 15, 2011, and amended by By-laws 12-053, 18-228 and 19-141. This by-law sets out the GO Transit D.C.s (note: this Background Study does not include any updates to the GO Transit D.C.s).

These by-laws impose D.C.s for residential and non-residential uses. The table below provides the rates currently in effect, as at July 6, 2023.



**Table 2-1
City of Hamilton
Current D.C. Rates**

Service	Residential					Non-Residential
	Single-Detached Dwelling & Semi Detached Dwelling (per dwelling unit)	Townhouses & Other Multiple Unit Dwellings (per dwelling unit)	Apartments & Stacked Townhouses & Mobile Homes 2-bedrooms+ (per dwelling unit)	Apartments & Stacked Townhouses & Mobile Homes Bachelor & 1-bedroom (per dwelling unit)	Residential Facility Dwelling & Lodging House & Garden Suite (per bedroom)	per sq.ft. of Gross Floor Area
Parkland Development	3,518	2,517	2,059	1,409	1,137	0.16
Indoor Recreation Services	6,695	4,792	3,920	2,682	2,163	0.30
Library Services	1,554	1,111	910	622	501	1.36
Growth Studies	549	392	322	220	178	0.28
Long-term Care Services	246	177	145	99	80	0.02
Public Health Services	3	2	2	1.00	1.00	-
Child Care and Early Years Programs	21	15	13	8	6	-
Provincial Offences Act	55	40	31	22.00	17.00	0.02
Services Related to a Highway	14,608	10,456	8,555	5,853	4,720	10.92
Public Works	1,092	781	639	437	352	0.56
Policing Services	711	509	416	285	229	0.36
Fire Protection Services	626	450	367	251	202	0.31
Ambulance	201	144	119	80	65	0.02
Transit Services	2,600	1,862	1,524	1,042	840	1.32
Waste Diversion	990	708	579	396	321	0.17
Total Municipal Wide Services	33,469	23,956	19,601	13,407	10,812	15.80
Water and Wastewater Services						
Wastewater Facilities	5,491	3,930	3,216	2,200	1,775	2.65
Wastewater Linear Services	7,346	5,259	4,301	2,943	2,372	3.53
Water Services	6,466	4,629	3,787	2,592	2,090	3.10
Stormwater Services - Combined Sewer System						
Stormwater Drainage and Control	5,355	3,833	3,137	2,145	1,729	-
Stormwater Services - Separated Sewer System						
Stormwater Drainage and Control	14,192	10,158	8,312	5,685	4,586	2.93
Total Urban Services - Combined Sewer System	24,658	17,651	14,441	9,880	7,966	9.28
Total Urban Services - Separated Sewer System	33,495	23,976	19,616	13,420	10,823	12.21
CITY DC TOTAL - COMBINED SEWER SYSTEM	58,127	41,607	34,042	23,287	18,778	25.08
CITY DC TOTAL - SEPARATED SEWER SYSTEM	66,964	47,932	39,217	26,827	21,635	28.01

2.2 Services Covered

The following services are covered under By-law 19-142 (as amended):

- Services related to a highway;
- Public works services;
- Transit services;
- Fire protection services;



- Policing services;
- Parkland development services;
- Indoor recreation services;
- Library services;
- Growth studies;
- Ambulance services;
- Long-term care services;
- Public health services;
- Child care and early years Programs;
- Waste diversion services;
- *Provincial Offences Act (P.O.A.)* services;
- Water services;
- Wastewater services; and
- Stormwater services.

2.3 Timing of D.C. Calculation and Payment

D.C.s are calculated and payable at the time of building permit issuance, subject to Section 26.2 of the D.C.A.

2.4 Indexing

Rates shall be indexed on the anniversary date of the D.C. by-law (every July 6) in accordance with the Statistics Canada Quarterly, Non-Residential Building Construction Price Index (Table 18-10-0276-02).^[1]

2.5 Redevelopment Allowance

As a result of the redevelopment of land, a building or structure existing on the same land within five years prior to the date of payment of D.C.s in regard to such

^[1] O. Reg. 82/98 referenced “The Statistics Canada Quarterly, Construction Price Statistics, catalogue number 62-007” as the index source. Since implementation, Statistics Canada has modified this index twice and the above-noted index is the most current. The draft by-law provided herein refers to O. Reg. 82/98 to ensure traceability should this index continue to be modified over time.



redevelopment that was issued a demolition permit, or converted from one principal use to another principal use on the same land in order to facilitate the redevelopment, the D.C.s otherwise payable with respect to such redevelopment shall be reduced by the following amounts:

- (a) in the case of a residential building or structure, or in the case of a mixed-use building or structure, the residential uses in the mixed-use building or structure, an amount calculated by multiplying the applicable D.C. by the number, according to type, of dwelling units that have been or will be demolished or converted to another principal use; and
- (b) in the case of a non-residential building or structure or, in the case of mixed-use building or structure, the non-residential uses in the mixed-use building or structure, an amount calculated by multiplying the applicable D.C. by the gross floor area (G.F.A.) that has been or will be demolished or converted to another principal use;

provided that such amounts shall not exceed, in total, the amount of the D.C.s otherwise payable with respect to the redevelopment.

2.6 Exemptions and Discounts

The following non-statutory exemptions and discounts are provided under By-law 19-142 (as amended):

- Buildings used for parking, excluding a building or part thereof used for commercial parking;
- Agricultural use;
- Places of worship;
- Downtown public art – 10% of D.C.s can be repurposed to contribute to the Public Art Reserve;
- Temporary buildings or structures;
- Downtown Hamilton Community Improvement Project Area (CIPA) (40% discount except for office which is reduced by 70%);
- Reduced industrial rate: City-wide 37% discount of the current D.C. rate for industrial development;



- No D.C.s are imposed on new industrial buildings on the same lot as an existing building(s) up to 50% of the combined G.F.A. of the existing building(s);
- The rates for non-industrial development (excluding medical clinics) within a CIPA or Business Improvement Area (BIA) are phased as follows:
 - First 5,000 sq.ft.: 50% of charge,
 - For each sq.ft. in excess of 5,000 sq.ft. and under 10,000 sq.ft.: 75% of charge, and
 - 100% of charge for development exceeding 10,000 sq.ft.;
- City-wide 50% D.C. exemption for the redevelopment of an existing residential development for the purpose of creating residential facilities within the existing building envelope;
- Initial 5,000 sq.ft. of G.F.A. of an office development (medical clinics excluded) is D.C. exempt on a City-wide basis;
- Heritage buildings; and
- Transition policy: the previous D.C. rate prior to a rate increase is honoured if the building permit is issued within six months of the rate increase.



Chapter 3

Anticipated Development in the City of Hamilton



3. Anticipated Development in the City of Hamilton

3.1 Requirements of the Act

The growth forecast contained in this chapter (with supplemental tables in Appendix A) provides for the anticipated development for which the City will be required to provide services over a 10-year (2023 to 2033) time horizon and service target horizons.

Chapter 4 provides the methodology for calculating a D.C. as per the D.C.A. Figure 4-1 presents this methodology graphically. It is noted in the first box of the schematic that in order to determine the D.C. that may be imposed, it is a requirement of subsection 5 (1) of the D.C.A. that “the anticipated amount, type and location of development, for which development charges can be imposed, must be estimated.”

3.2 Basis of Population, Household and Non-Residential Gross Floor Area Forecast

The D.C. growth forecast has been derived by Watson. In preparing the growth forecast, the following information sources were consulted to assess the residential and non-residential development potential for the City over the forecast period:

- Urban Hamilton Official Plan, including O.P.A. No. 167;
- Growth Related Integrated Development Strategy (G.R.I.D.S.) 2 and Municipal Comprehensive Review – Final Land Needs Assessment and Addendum and Peer Review Results (PED17010(n)) (City Wide), November 9, 2021;
- City of Hamilton 2019 Development Charges Background Study, July 5, 2019, Watson & Associates Economists Ltd., in association with Dillon Consulting Limited, GM BluePlan Engineering Limited, and Wood Environment & Infrastructure Solutions;
- 2011, 2016 and 2021 population, household and employment Census data;
- Historical residential building permit data over the 2013 to 2022 period;
- Residential and non-residential supply opportunities as identified by City of Hamilton staff; and
- Discussions with City staff regarding anticipated residential and non-residential development in the City of Hamilton.



3.3 Summary of Growth Forecast

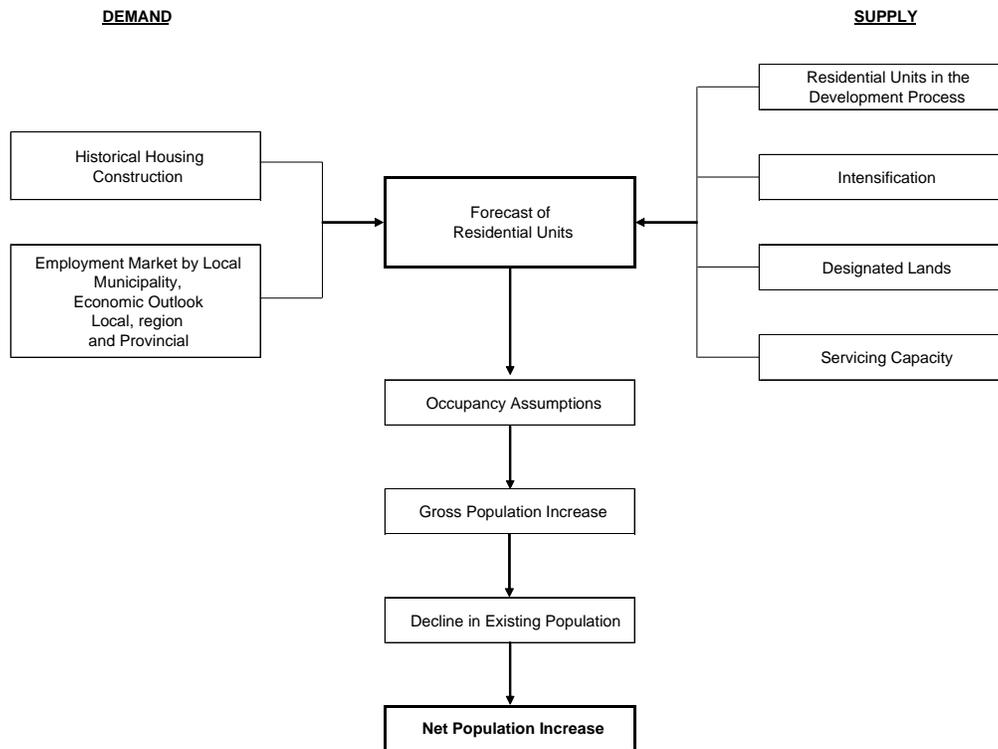
A detailed analysis of the residential and non-residential growth forecasts is provided in Appendix A and the methodology employed is illustrated in Figure 3-1. The discussion provided herein summarizes the anticipated growth for the City and describes the basis for the forecast. The results of the residential growth forecast analysis are summarized in Table 3-1 below, and Schedule 1 in Appendix A. It is noted that for water service, wastewater service, stormwater service and services related to a highway, the forecast is based on the targeted population and employment numbers included in the prior D.C. study. The City is undertaking master plan studies for each of these services to assess the servicing needs of growth beyond these targets, however, as of the time of writing, these studies are not complete. As servicing information is not available for the growth identified beyond the 2019 D.C. study forecast, the former growth targets have been continued for this study.

As identified in Table 3-1 and Appendix A – Schedule 1, population in the City of Hamilton (excluding the Census undercount) is anticipated to reach approximately 653,850 by late 2033, resulting in an increase of approximately 62,140 people.^[1]

[1] The population figures used in the calculation of the 2023 D.C. exclude the net Census undercount, which is estimated at approximately 2.9%. Population figures presented herein have been rounded.



Figure 3-1
Population and Household Forecast Model





**Table 3-1
City of Hamilton
Residential Growth Forecast Summary**

	Year	Population (Including Census Undercount) ^[1]	Excluding Census Undercount			Housing Units					Persons Per Unit (P.P.U.): Total Population/ Total Households	
			Population	Institutional Population	Population Excluding Institutional Population	Singles & Semi-Detached	Multiple Dwellings ^[2]	Apartments ^[3]	Other	Total Households		Equivalent Institutional Households
Historical	Mid 2011	534,820	519,949	10,309	509,640	124,433	27,760	50,800	813	203,806	9,372	2.551
	Mid 2016	552,270	536,917	8,982	527,935	127,705	31,405	51,680	810	211,600	8,165	2.537
	Mid 2021	585,640	569,353	8,438	560,915	131,900	34,835	55,510	560	222,805	7,671	2.555
Forecast	Late 2023	608,640	591,714	8,675	583,039	133,641	38,018	59,930	560	232,149	7,886	2.549
	Late 2033	672,550	653,850	9,651	644,199	143,468	49,172	74,175	560	267,375	8,774	2.445
Incremental	Mid 2011 - Mid 2016	17,450	16,968	-1,327	18,295	3,272	3,645	880	-3	7,794	-1,207	
	Mid 2016 - Mid 2021	33,370	32,436	-544	32,980	4,195	3,430	3,830	-250	11,205	-494	
	Mid 2021 - Late 2023	23,000	22,361	237	22,124	1,741	3,183	4,420	0	9,344	215	
	Late 2023 - Late 2033	63,910	62,136	976	61,160	9,827	11,154	14,245	0	35,226	888	

[1] Population includes the Census undercount estimated at approximately 2.9% and has been rounded.

[2] Includes townhouses and apartments in duplexes.

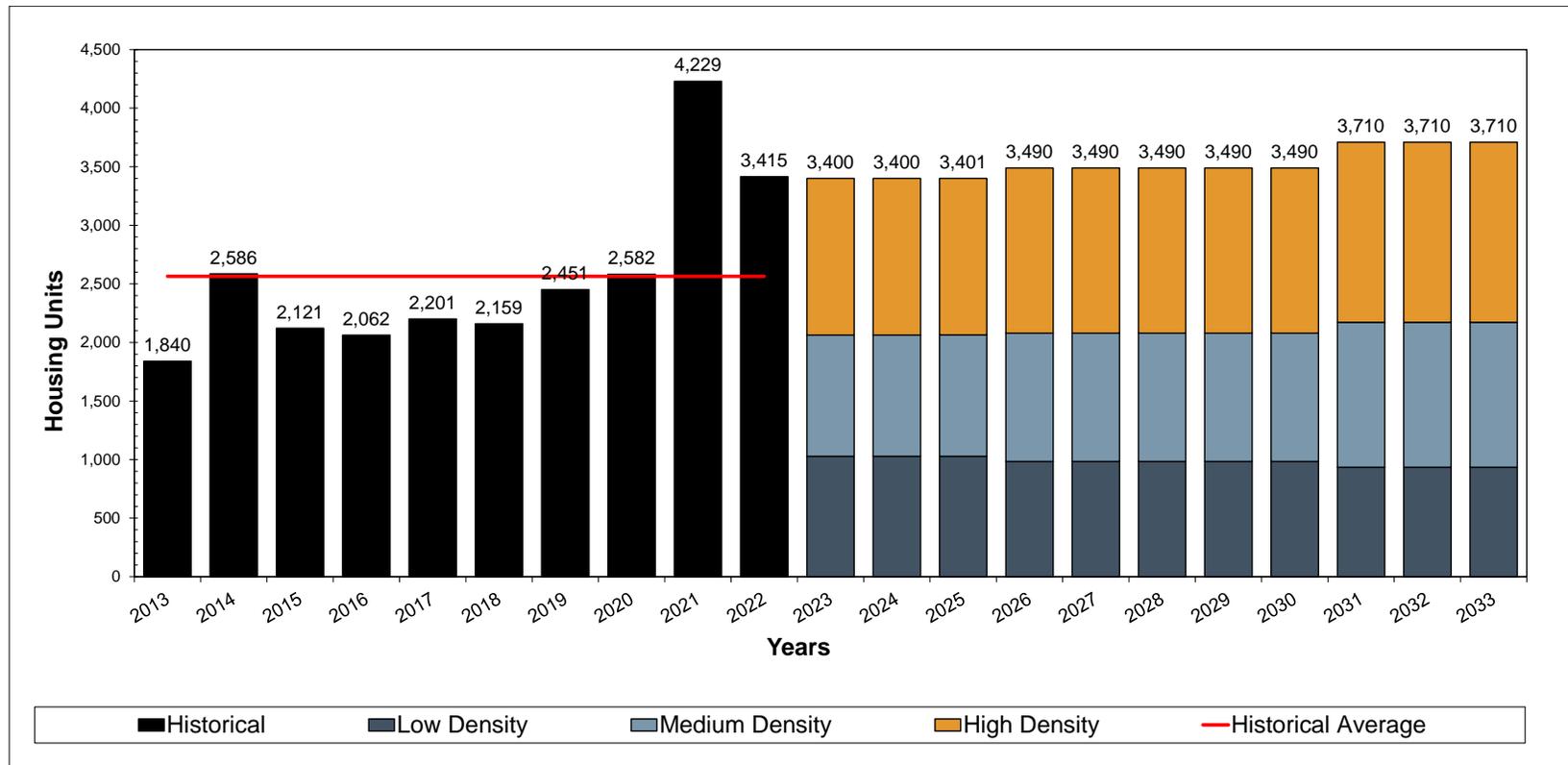
[3] Includes bachelor, 1-bedroom, and 2-bedroom+ apartment units.

Note: Numbers may not add due to rounding.

Source: Derived from City of Hamilton Official Plan Amendment No. 167 to the Urban Hamilton Official Plan Respecting Municipal Comprehensive Review – Phase 1 (City-Wide), by Watson & Associates Economists Ltd.



Figure 3-2
City of Hamilton
Annual Housing Forecast^[1]



^[1] Growth forecast represents calendar year.

Source: Historical housing activity derived from City of Hamilton building permit data, 2013 to 2022.



Provided below is a summary of the key assumptions and findings regarding the City of Hamilton D.C. growth forecast:

1. Unit Mix (Appendix A – Schedules 1 and 6)

- The housing unit mix for the City was derived from a detailed review of historical development activity (as per Schedule 6), as well as active residential development applications and discussions with City staff regarding anticipated development trends for the City of Hamilton.
- Based on the above indicators, the 2023 to 2033 household growth forecast for the City comprise a unit mix of 28% low-density units (single detached and semi-detached), 32% medium-density units (multiples except apartments) and 40% high-density units (bachelor, 1-bedroom and 2-bedroom+ apartments).

2. Geographic Location of Residential Development (Appendix A – Schedule 2)

- Schedule 2 summarizes the anticipated amount, type, and location of development by area for the City of Hamilton.
- In accordance with forecast demand and available land supply, the amount and percentage of forecast housing growth between 2023 and 2033 by development location is summarized below.

Table 3-2
City of Hamilton
Geographic Location of Residential Development

Development Location	Amount of Housing Growth, 2023 to 2033	Percentage of Housing Growth, 2023 to 2033
Combined Sewer System	7,130	20%
Separate Sewer System – Other Built Boundary	8,910	25%
Separate Sewer System – Greenfield	18,900	54%
Urban Total	34,940	99%
Rural Total	280	1%
City of Hamilton	35,230	100%

Note: Figures may not sum precisely due to rounding.



3. Planning Period

- The D.C.A. limits the planning horizon for transit services to a 10-year planning horizon. All other services can utilize any planning period if the municipality has identified the growth-related capital infrastructure needs associated with the planning period. A 10-year forecast has been utilized for all services except water, wastewater, stormwater, and transportation to align with the City's 10-year capital forecast.
- A “target” forecast period has been utilized for water, wastewater, transportation (excluding transit), and stormwater given that the capital needs for these services have not yet been identified over a longer-term forecast period. Master plans for these services are currently underway or will be undertaken to identify the infrastructure required to support the growth forecast to 2051. The capital needs and the associated growth will be incorporated in future D.C. updates.

4. Population in New Units (Appendix A – Schedules 3, 4 and 5)

- The number of housing units to be constructed by 2033 in the City of Hamilton over the forecast period is presented in Figure 3-2. Over the 2023 to 2033 forecast period, the City is anticipated to average approximately 3,520 new housing units per year.
- Institutional population^[1] is anticipated to increase by approximately 980 people between 2023 and 2033.
- Population in new units is derived from Schedules 3, 4 and 5, which incorporate historical development activity, anticipated units (see unit mix discussion) and average persons per unit (P.P.U.) by dwelling type for new units.
- Schedule 7 summarizes the average P.P.U. assumed for new housing units by age and type of dwelling based on Statistics Canada 2021 custom Census data for the City of Hamilton. The total calculated P.P.U. for all density types has been adjusted accordingly to account for the P.P.U.

^[1] Institutional population largely includes special care facilities such as nursing homes or residences for senior citizens. A P.P.U. of 1.100 depicts 1-bedroom and 2-or-more-bedroom units in collective households.



trends which have been recently experienced in both new and older units.

Forecast 15-year average P.P.U.s by dwelling type are as follows:

- Low density: 3.533
- Medium density: 2.637
- High density: 1.721

5. Existing Units and Population Change (Appendix A – Schedules 3, 4, and 5)

- Existing households for late 2023 are based on the 2021 Census households, plus estimated residential units constructed between mid-2021 to the beginning of the growth period, assuming a minimum six-month lag between construction and occupancy (see Schedule 3).
- The change in average occupancy levels for existing housing units is calculated in Schedules 3 through 5.^[1] The forecast population change in existing households from 2023 to 2033 is forecast to decline by approximately 27,490.

6. Employment (Appendix A – Schedules 9a, 9b and 9c)

- The employment projections provided herein are largely based on the activity rate method, which is defined as the number of jobs in the City divided by the number of residents. Key employment sectors include primary, industrial, commercial/population-related, institutional, and work at home, which are considered individually below.
- 2016 employment data^{[2],[3]} (place of work) for the City of Hamilton is outlined in Schedule 9a. The 2016 employment base comprised the following sectors:
 - 1,845 primary (1%);

^[1] Change in occupancy levels for existing households occurs due to aging of the population and family life cycle changes, lower fertility rates and changing economic conditions.

^[2] 2016 employment is based on Statistics Canada 2016 Place of Work Employment dataset by Watson & Associates Economists Ltd.

^[3] Statistics Canada 2021 Census place of work employment data has been reviewed. The 2021 Census employment results have not been utilized due to a significant increase in work at home employment captured due to Census enumeration occurring during the provincial COVID-19 lockdown from April 1, 2021 to June 14, 2021.



- 15,805 work at home employment (8%);
 - 47,760 industrial (23%);
 - 74,260 commercial/population-related (37%); and
 - 63,665 institutional (31%).
- The 2016 employment by usual place of work, including work at home, was 203,335. An additional 29,160 employees have been identified for the City of Hamilton in 2016 that have no fixed place of work (N.F.P.O.W.).^[1]
 - Total employment, including work at home and N.F.P.O.W. for the City of Hamilton is anticipated to reach approximately 280,760 by late 2033. This represents an employment increase of approximately 28,920 for the 10-year forecast period.
 - Schedule 9b, Appendix A, summarizes the employment forecast, excluding work at home employment and N.F.P.O.W. employment, which is the basis for the D.C. employment forecast. The impact on municipal services from work at home employees has already been included in the population forecast. The need for municipal services related to N.F.P.O.W. employees has largely been included in the employment forecast by usual place of work (i.e., employment and G.F.A. generated from N.F.P.O.W. construction employment). Furthermore, since these employees have no fixed work address, they cannot be captured in the non-residential G.F.A. calculation. Accordingly, work at home and N.F.P.O.W. employees have been removed from the D.C.A. employment forecast and calculation.
 - Total employment for the City of Hamilton (excluding work at home and N.F.P.O.W. employment) is anticipated to reach approximately 222,860 by late 2033. This represents an employment increase of approximately 23,960 for the 10-year forecast period.^[2]

^[2] N.F.P.O.W. is defined by Statistics Canada as "persons who do not go from home to the same workplace location at the beginning of each shift. Such persons include building and landscape contractors, travelling salespersons, independent truck drivers, etc."

^[2] G.F.A. and employment associated within special care institutional dwellings are treated as residential, resulting in an institutional employment difference between Schedules 9a and 9b. Total employment growth in Schedule 9b (excluding work at



7. Non-Residential Square Footage Estimates (G.F.A.) (Appendix A – Schedule 9b)

- Square footage estimates were calculated in Schedule 9b based on the following employee density assumptions:
 - 1,200 sq.ft. per employee for industrial;
 - 400 sq.ft. per employee for commercial/population-related; and
 - 680 sq.ft. per employee for institutional employment.
- The City-wide incremental G.F.A. is anticipated to increase by 15.6 million sq.ft. over the 10-year forecast period.
- In terms of percentage growth, the 2023 to 2033 incremental G.F.A. forecast by sector is broken down as follows:
 - industrial – 46%;
 - commercial/population-related – 32%; and
 - institutional – 22%.

8. Geographic Location of Non-Residential Development (Appendix A, Schedule 9c)

- Schedule 9c summarizes the anticipated amount, type and location of non-residential development by servicing area for the City of Hamilton by area.
- The amount and percentage of forecast total non-residential growth between 2023 and 2033 by development location is summarized below.

home and N.F.P.O.W. employment) has been downwardly adjusted to account for institutional employment associated with special care facilities. Total employment in Schedule 9b is anticipated to reach approximately 222,410 by late 2033.



Table 3-3
City of Hamilton
Geographic Location of Non-Residential Development

Development Location	Amount of Non-Residential G.F.A., 2023 to 2033 (sq.ft.)	Percentage of Non-Residential G.F.A., 2023 to 2033
Combined Sewer System	4.2 million	27%
Separate Sewer System – Other Built Boundary	3.5 million	22%
Separate Sewer System – Greenfield	7.8 million	50%
Urban Total	15.4 million	99%
Rural Total	0.2 million	1%
City of Hamilton	15.6 million	100%

Note: Figures may not sum precisely due to rounding.



Chapter 4

The Approach to the Calculation of the Charge



4. The Approach to the Calculation of the Charge

4.1 Introduction

This chapter addresses the requirements of subsection 5 (1) of the D.C.A. with respect to the establishment of the need for service which underpins the D.C. calculation. These requirements are illustrated schematically in Figure 4-1.

4.2 Services Potentially Involved

Table 4-1 lists the full range of municipal services that are provided within the City.

A number of these services are not included in the list of eligible services provided in subsection 2 (4) of the D.C.A. as being ineligible for inclusion in D.C.s. These are shown as “ineligible” on Table 4-1. Two ineligible costs defined in subsection 5 (3) of the D.C.A. are “computer equipment” and “rolling stock with an estimated useful life of (less than) seven years.” In addition, local roads are covered separately under subdivision agreements and related means (as are other local services). Services that are potentially eligible for inclusion in the City’s D.C. are indicated with a “Yes.”

4.3 Increase in the Need for Service

The D.C. calculation commences with an estimate of “the increase in the need for service attributable to the anticipated development” for each service to be covered by the by-laws. There must be some form of link or attribution between the anticipated development and the estimated increase in the need for service. While the need could conceivably be expressed generally in terms of units of capacity, subsection 5 (1) 3, which requires that City Council indicate that it intends to ensure that such an increase in need will be met, suggests that a project-specific expression of need would be most appropriate.



Figure 4-1
The Process of Calculating a Development Charge under the Act
that must be followed

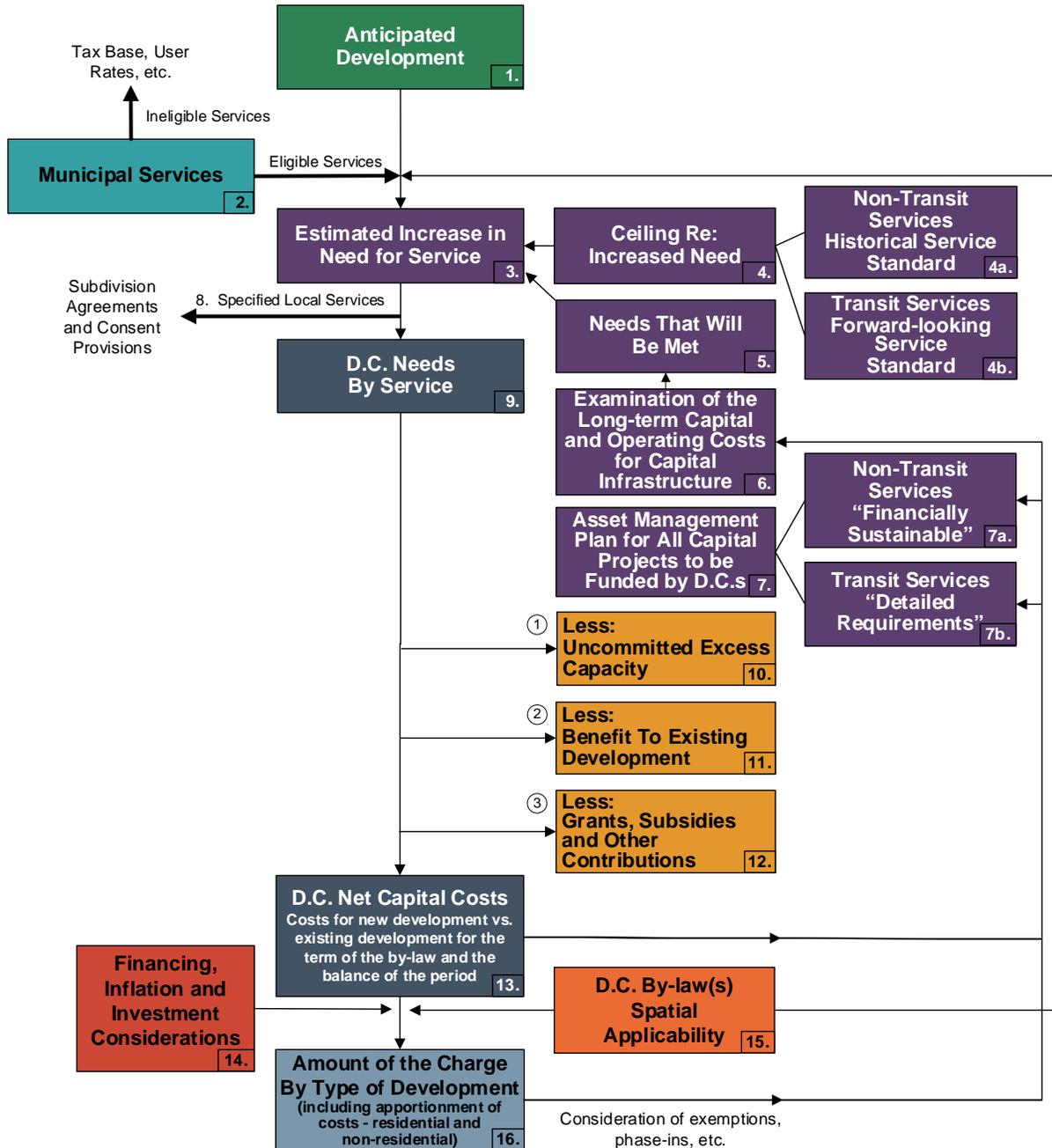




Table 4-1
Categories of Municipal Services to be Addressed as Part of the Calculation

Eligibility for Inclusion in the D.C. Calculation	Description
Yes	Municipality provides the service – service has been included in the D.C. calculation.
No	Municipality provides the service – service has not been included in the D.C. calculation.
n/a	Municipality does not provide the service.
Ineligible	Service is ineligible for inclusion in the D.C. calculation.

Categories of Municipal Services	Eligibility for Inclusion in the D.C. Calculation	Service Components	Maximum Potential D.C. Recovery %
1. Services Related to a Highway	Yes	1.1 Arterial roads	100
	Yes	1.2 Collector roads	100
	Yes	1.3 Bridges, culverts and roundabouts	100
	No	1.4 Local municipal roads	100
	Yes	1.5 Traffic signals	100
	Yes	1.6 Sidewalks and streetlights	100
	Yes	1.7 Active transportation	100
2. Other Transportation Services	Yes	2.1 Transit vehicles ^[1] and facilities	100
	Yes	2.2 Other transit infrastructure	100
	Ineligible	2.3 Municipal parking spaces – indoor	0
	Ineligible	2.4 Municipal parking spaces – outdoor	0
	Yes	2.5 Works yards	100
	Yes	2.6 Rolling stock ^[1]	100
	n/a	2.7 Ferries	0
	Ineligible	2.8 Airport (Waterloo Region only)	0
	Yes	3.1 Main channels and drainage trunks	100

^[1] with 7+ year life-time computer equipment excluded throughout



Categories of Municipal Services	Eligibility for Inclusion in the D.C. Calculation	Service Components	Maximum Potential D.C. Recovery %
3. Stormwater Drainage and Control Services	Yes	3.2 Channel connections	100
	Yes	3.3 Retention/detention ponds	100
4. Fire Protection Services	Yes	4.1 Fire stations	100
	Yes	4.2 Fire pumpers, aerials and rescue vehicles ^[1]	100
	Yes	4.3 Small equipment and gear	100
5. Parks Services (i.e., Parks and Open Space)	Ineligible	5.1 Acquisition of land for parks, woodlots and environmentally significant areas	0
	Yes	5.2 Development of area municipal parks	100
	Yes	5.3 Development of district parks	100
	Yes	5.4 Development of municipal-wide parks	100
	Yes	5.5 Development of special purpose parks	100
	Yes	5.6 Parks rolling stock ^[1] and yards	100
6. Recreation Services	Yes	6.1 Arenas, indoor pools, fitness facilities, community centres, etc. (including land)	100
	Yes	6.2 Recreation vehicles and equipment ^[1]	100
7. Library Services	Yes	7.1 Public library space (incl. furniture and equipment)	100
	Yes	7.2 Library vehicles ^[1]	100
	Yes	7.3 Library materials	100
8. Emergency Preparedness Services	No	8.1 Facility space (incl. furniture and equipment)	100
	No	8.2 Vehicles ^[1]	100
	No	8.3 Equipment	100
9. Electrical Power Services	Ineligible	9.1 Electrical substations	0
	Ineligible	9.2 Electrical distribution system	0
	Ineligible	9.3 Electrical system rolling stock	0

^[1] with 7+ year life-time



Categories of Municipal Services	Eligibility for Inclusion in the D.C. Calculation	Service Components	Maximum Potential D.C. Recovery %
10. Provision of Cultural, Entertainment and Tourism Facilities and Convention Centres	Ineligible	10.1 Cultural space (e.g., art galleries, museums and theatres)	0
	Ineligible	10.2 Tourism facilities and convention centres	0
11. Wastewater Services	Yes	11.1 Treatment plants	100
	Yes	11.2 Sewage trunks	100
	n/a	11.3 Local systems	0
	Yes	11.4 Vehicles and equipment ^[1]	100
12. Water Supply Services	Yes	12.1 Treatment plants	100
	Yes	12.2 Distribution systems	100
	n/a	12.3 Local systems	0
	Yes	12.4 Vehicles and equipment ^[1]	100
13. Waste Management Services	Ineligible	13.1 Landfill collection, transfer vehicles and equipment	0
	Ineligible	13.2 Landfills and other disposal facilities	0
	Yes	13.3 Waste diversion facilities	100
	Yes	13.4 Waste diversion vehicles and equipment ^[1]	100
14. Policing Services	Yes	14.1 Policing detachments	100
	Yes	14.2 Policing rolling stock ^[1]	100
	Yes	14.3 Small equipment and gear	100
15. Long-term Care	Yes	15.1 Homes for the aged space	100
	No	15.2 Vehicles ^[1]	100
16. Child Care and Early Years	Yes	16.1 Child care space	100
	No	16.2 Vehicles ^[1]	100
17. Public Health	Yes	17.1 Health department space	100
	Yes	17.2 Health department vehicles ^[1]	100
18. Housing Services	Ineligible	18.1 Housing services space	0
	Ineligible	18.2 Vehicles ^[1]	0

^[1] with 7+ year life-time



Categories of Municipal Services	Eligibility for Inclusion in the D.C. Calculation	Service Components	Maximum Potential D.C. Recovery %
19. Provincial Offences Act (P.O.A.) Services	Yes	19.1 P.O.A. services including by-law enforcement space	100
	Yes	19.2 P.O.A. services including by-law enforcement vehicles and equipment ^[1]	100
20. Social Services	Ineligible	20.1 Social service space	0
21. Ambulance Services	Yes	21.1 Ambulance station space	100
	Yes	21.2 Vehicles ^[1]	100
22. Hospital Provision	Ineligible	22.1 Hospital capital contributions	0
23. Provision of Headquarters for the General Administration of Municipalities and Area Municipal Boards	Ineligible	23.1 Office space	0
	Ineligible	23.2 Office furniture	0
	Ineligible	23.3 Computer equipment	0
24. Other Services	Ineligible	24.1 Studies in connection with acquiring buildings, rolling stock, materials and equipment, and improving land ^[2] and facilities, including the D.C. background study cost	0
	Yes	24.2 Interest on money borrowed to pay for growth-related capital	0-100

^[1] with a 7+ year life-time

^[2] same percentage as service component to which it pertains

4.4 Local Service Policy

Some of the need for services generated by additional development consists of local services related to a plan of subdivision. As such, they will be required as a condition of



subdivision agreements or consent conditions. The City's detailed Local Service Policy is provided in Appendix E.

4.5 Capital Forecast

Paragraph 7 of subsection 5 (1) of the D.C.A. requires that “the capital costs necessary to provide the increased services must be estimated.” The Act goes on to require two potential cost reductions and the regulation sets out the way in which such costs are to be presented. These requirements are outlined below.

These estimates involve capital costing of the increased services discussed above. This entails costing actual projects or the provision of service units, depending on how each service has been addressed.

The capital costs include:

- a) costs to acquire land or an interest therein (including a leasehold interest);
- b) costs to improve land;
- c) costs to acquire, lease, construct or improve buildings and structures;
- d) costs to acquire, lease or improve facilities, including rolling stock (with a useful life of seven or more years), furniture and equipment (other than computer equipment), materials acquired for library circulation, reference, or information purposes; and
- e) interest on money borrowed to pay for the above-referenced costs.

In order for an increase in need for service to be included in the D.C. calculation, City Council must indicate “that it intends to ensure that such an increase in need will be met” (subsection 5 (1) 3). This can be done if the increase in service forms part of a Council-approved Official Plan, capital forecast, or similar expression of the intention of Council (Ontario Regulation (O. Reg.) 82/98 section 3). The capital program contained herein reflects the City's approved and proposed capital budgets and master servicing/needs studies.

4.6 Treatment of Credits

Section 8, paragraph 5, of O. Reg. 82/98 indicates that a D.C. background study must set out “the estimated value of credits that are being carried forward relating to the



service.” Subsection 17, paragraph 4, of the same regulation indicates that “the value of the credit cannot be recovered from future development charges,” if the credit pertains to an ineligible service. This implies that a credit for eligible services can be recovered from future D.C.s. As a result, this provision should be made in the calculation, in order to avoid a funding shortfall with respect to future service needs. Outstanding credit obligations have been included in the D.C. calculations.

4.7 Classes of Services

Section 7 of the D.C.A. states that a D.C. by-law may provide for any D.C.-eligible service or the capital costs with respect to those services. Furthermore, a class may be composed of any number or combination of services and may include parts or portions of each D.C.-eligible service.

These provisions allow for services to be grouped together to create a class for the purposes of the D.C. by-law and D.C. reserve funds. The D.C. calculations and by-law provided herein include a class of service for public works. This class comprises the following services:

- Water services;
- Wastewater services;
- Stormwater services;
- Services related to a highway;
- Fire protection services;
- Policing services;
- Transit services;
- Parks and recreation services;
- Library services;
- Long-term care services;
- Child care and early years programs;
- Public health services;
- P.O.A. services including by-law enforcement;
- Ambulance services; and
- Waste diversion.



4.8 Existing Reserve Funds

Section 35 of the D.C.A. states that:

“The money in a reserve fund established for a service may be spent only for capital costs determined under paragraphs 2 to 7 of subsection 5 (1).”

There is no explicit requirement under the D.C.A. calculation method set out in subsection 5 (1) to net the outstanding reserve fund balance as part of making the D.C. calculation; however, section 35 does restrict the way in which the funds are used in future.

For services that are subject to a per capita based, service level “cap,” the reserve fund balance should be applied against the development-related costs for which the charge was imposed once the project is constructed (i.e., the needs of recent growth). This cost component is distinct from the development-related costs for the future forecast periods, which underlie the D.C. calculation herein.

The alternative would involve the City spending all reserve fund monies prior to renewing each by-law, which would not be a sound basis for capital budgeting. Thus, the City will use these reserve funds for the City’s cost share of applicable development-related projects, which are required but have not yet been undertaken, as a way of directing the funds to the benefit of the development that contributed them (rather than to future development, which will generate the need for additional facilities directly proportionate to future growth).

The City’s D.C. reserve fund balances by service at December 31, 2022, are shown below:



Table 4-2
Summary of Development Charges Reserve Fund Balances
As of December 31, 2022

Service	December 31, 2022 Balance	Add: Funding for projects in 2024 D.C. study that have already received D.C. reserve funding	Less: Funding for projects that are not in the 2024 D.C. study and have yet to be funded	Less: D.C. debt funding for projects in progress that are not in the 2024 D.C. study and have yet to be D.C. funded	Add: Funding of D.C. exemptions	Adjusted December 31, 2022 Balance
Services Related to a Highway	\$81,748,784	\$8,313,253	(\$21,567,770)	(\$50,532,996)	\$35,257,820	\$53,219,090
Transit	\$12,854,963	\$1,175,756	(\$4,736)	(\$37,998,000)	\$2,268,652	(\$21,703,366)
Public Works	\$8,468,954	\$708,861	\$0	\$0	\$1,411,656	\$10,589,471
Fire Protection Services	\$5,036,704	\$95,399	\$0	\$0	\$1,476,983	\$6,609,086
Policing Services	\$4,496,500	\$0	(\$585,485)	\$0	\$1,576,355	\$5,487,370
Parks Services	\$2,622,877	\$2,994,583	(\$2,513,562)	(\$5,988,000)	\$2,181,309	(\$702,793)
Indoor Recreation Services	\$30,443,173	\$330,647	(\$9,969,847)	\$0	\$3,279,728	\$24,083,701



Service	December 31, 2022 Balance	Add: Funding for projects in 2024 D.C. study that have already received D.C. reserve funding	Less: Funding for projects that are not in the 2024 D.C. study and have yet to be funded	Less: D.C. debt funding for projects in progress that are not in the 2024 D.C. study and have yet to be D.C. funded	Add: Funding of D.C. exemptions	Adjusted December 31, 2022 Balance
Library Services	\$7,096,161	\$1,570,000	\$0	\$0	\$926,516	\$9,592,677
Long-term Care Services	\$7,230,884	\$22,707	\$0	\$0	\$418,167	\$7,671,757
Child Care and Early Years Programs	\$987,787	\$0	\$0	\$0	\$42,215	\$1,030,002
Provincial Offences Act including By-law Enforcement	(\$191,091)	\$0	\$0	\$0	\$71,070	(\$120,021)
Public Health Services	\$886,660	\$0	\$0	\$0	\$37,844	\$924,504
Ambulance	(\$87,042)	\$570,000	\$0	\$0	\$131,567	\$614,525
Waste Diversion	\$5,102,391	\$527,435	(\$71,066)	\$0	\$52,447	\$5,611,207
Stormwater – Combined System	\$9,422,105	\$0	(\$11,457,409)	(\$11,230,000)	\$1,449,097	(\$11,816,207)



Service	December 31, 2022 Balance	Add: Funding for projects in 2024 D.C. study that have already received D.C. reserve funding	Less: Funding for projects that are not in the 2024 D.C. study and have yet to be funded	Less: D.C. debt funding for projects in progress that are not in the 2024 D.C. study and have yet to be D.C. funded	Add: Funding of D.C. exemptions	Adjusted December 31, 2022 Balance
Stormwater – Separated System	\$47,729,411	\$0	(\$20,515,877)	(\$26,110,000)	\$1,475,206	\$2,578,740
Wastewater Facilities	\$114,475,939	\$18,941,138	\$0	\$0	\$1,148,623	\$134,565,699
Wastewater Linear Services	\$49,727,665	\$463,298	(\$9,730,210)	(\$5,330,000)	\$1,019,485	\$36,150,238
Water Services	\$74,939,322	\$10,305,374	(\$5,178,567)	(\$150,090,000)	\$2,086,335	\$67,062,464
Subtotal	\$462,992,147	\$46,018,449	(\$81,594,528)	(\$152,278,996)	\$56,311,074	\$331,448,147
Area Specific: Dundas Waterdown Special Area Charge	(\$5,151,554)					(\$5,151,554)
Total	\$457,840,593	\$46,018,449	(\$81,594,528)	(\$152,278,996)	\$56,311,074	\$326,296,593

Note: Amounts in brackets are deficit balances.



4.9 Deductions

The D.C.A. potentially requires that four deductions be made to the increase in the need for service. These relate to:

- The level of service ceiling;
- Uncommitted excess capacity;
- Benefit to existing development; and
- Anticipated grants, subsidies, and other contributions.

The requirements behind each of these reductions are addressed below.

4.9.1 Reduction Required by Level of Service Ceiling

This is designed to ensure that the increase in need included in section 4.3 does “not include an increase that would result in the level of service [for the additional development increment] exceeding the average level of the service provided in the municipality over the 15-year period immediately preceding the preparation of the background study” (D.C.A., subsection 5 (1) 4). O. Reg. 82/98 (section 4) goes further to indicate that “both the quantity and quality of a service shall be taken into account in determining the level of service and the average level of service.”

In many cases, this can be done by establishing a quantity measure in terms of units as floor area, land area, or road length per capita and a quality measure, in terms of the average cost of providing such units based on replacement costs, engineering standards, or recognized performance measurement systems, depending on circumstances. When the quantity and quality factors are multiplied together, they produce a measure of the level of service, which meets the requirements of the Act, i.e., cost per unit.

With respect to transit services, the changes to the Act introduced in 2015 have provided for an alternative method for calculating the service standard ceiling. Transit services must now utilize a forward-looking service standard analysis, described later in this section.

The average service level calculation sheets for each service component in the D.C. calculation are set out in Appendix B.



4.9.2 Reduction for Uncommitted Excess Capacity

Paragraph 5 of subsection 5 (1) requires a deduction from the increase in the need for service attributable to the anticipated development that can be met using the City's "excess capacity," other than excess capacity which is "committed."

"Excess capacity" is undefined, but in this case must be able to meet some or all of the increase in need for service, in order to potentially represent a deduction. The deduction of uncommitted excess capacity from the future increase in the need for service would normally occur as part of the conceptual planning and feasibility work associated with justifying and sizing new facilities, e.g., if a road widening to accommodate increased traffic is not required because sufficient excess capacity is already available, then widening would not be included as an increase in need, in the first instance.

4.9.3 Reduction for Benefit to Existing Development

Section 5 (1) 6 of the D.C.A. provides that, "The increase in the need for service must be reduced by the extent to which an increase in service to meet the increased need would benefit existing development." The general guidelines used to consider benefit to existing development included:

- The repair or unexpanded replacement of existing assets that are in need of repair;
- An increase in average service level of quantity or quality (compare water as an example);
- The elimination of a chronic servicing problem not created by growth; and
- Providing services where none previously existed (generally considered for water or wastewater services).

This step involves a further reduction in the need, by the extent to which such an increase in service would benefit existing development. The level of service cap in section 4.9.1 is related but is not the identical requirement. Sanitary, storm, and water trunks are highly localized to growth areas and can be more readily allocated in this regard than other services such as services related to a highway, which do not have a fixed service area.



Where existing development has an adequate service level which will not be tangibly increased by an increase in service, no benefit would appear to be involved. For example, where expanding existing library facilities simply replicates what existing residents are receiving, they receive very limited (or no) benefit as a result. On the other hand, where a clear existing service problem is to be remedied, a deduction should be made accordingly.

In the case of services such as recreation facilities, community parks, libraries, etc., the service is typically provided on a City-wide system basis. For example, facilities of the same type may provide different services (i.e., leisure pool versus competitive pool), different programs (i.e., hockey versus figure skating), and different time availability for the same service (i.e., leisure skating available on Wednesdays in one arena and Thursdays in another). As a result, residents will travel to different facilities to access the services they want at the times they wish to use them, and facility location generally does not correlate directly with residence location. Even where it does, displacing users from an existing facility to a new facility frees up capacity for use by others and generally results in only a very limited benefit to existing development. Furthermore, where an increase in demand is not met for a number of years, a negative service impact to existing development is involved for a portion of the planning period.

4.9.4 Reduction for Anticipated Grants, Subsidies and Other Contributions

This step involves reducing the capital costs necessary to provide the increased services by capital grants, subsidies, and other contributions (including direct developer contributions required due to the local service policy) made or anticipated by Council and in accordance with various rules such as the attribution between the share related to new versus existing development. That is, some grants and contributions may not specifically be applicable to growth or where Council targets fundraising as a measure to offset impacts on taxes (O. Reg. 82/98, section 6).

4.10 Municipal-wide versus Area Rating

This step involves determining whether all of the subject costs are to be recovered on a uniform municipal-wide basis or whether some or all are to be recovered on an area-specific basis. Under the amended D.C.A., it is now mandatory to “consider” area rating



of services (providing charges for specific areas and services); however, it is not mandatory to implement area rating. Further discussion is provided in section 7.4.4.

4.11 Allocation of Development

This step involves relating the costs involved to anticipated development for each period under consideration and using allocations between residential and non-residential development and between one type of development and another, to arrive at a schedule of charges.

4.12 Asset Management

The new legislation now requires that a D.C. background study must include an asset management plan (A.M.P.) (subsection 10 (2) c. 2). The A.M.P. must deal with all assets that are proposed to be funded, in whole or in part, by D.C.s. The current regulations provide very extensive and specific requirements for the A.M.P. related to transit services (as noted in the subsequent subsection); however, they are silent with respect to how the A.M.P. is to be provided for all other services. As part of any A.M.P., the examination should be consistent with the municipality's existing assumptions, approaches, and policies on asset management planning. This examination has been included in Appendix I.

4.13 Transit

The Act prescribes the following related to the transit services calculations:

- A. Transit no longer requires the statutory 10% mandatory deduction from the net capital cost (subsection 5.2 (i) of the D.C.A.).
- B. The background study requires the following in regard to transit costs (as per subsection 8 (2) of the regulations):
 1. The calculations that were used to prepare the estimate for the planned level of service for transit services, as mentioned in subsection 5.2 (3) of the Act.
 2. An identification of the portion of the total estimated capital cost relating to the transit services that would benefit,



- i. the anticipated development over the 10-year period immediately following the preparation of the background study, or
 - ii. the anticipated development after the 10-year period immediately following the preparation of the background study.
 3. An identification of the anticipated excess capacity that would exist at the end of the 10-year period immediately following the preparation of the background study.
 4. An assessment of ridership forecasts for all modes of transit services proposed to be funded by the D.C. over the 10-year period immediately following the preparation of the background study, categorized by development types, and whether the forecast ridership will be from existing or planned development.
 5. An assessment of the ridership capacity for all modes of transit services proposed to be funded by the D.C. over the 10-year period immediately following the preparation of the background study.
- C. A new forward-looking service standard (as per subsection 6.1 (2) of the regulations) requires the following:
1. The service is a discrete service.
 2. No portion of the service that is intended to benefit anticipated development after the 10-year period immediately following the preparation of the background study may be included in the estimate.
 3. No portion of the service that is anticipated to exist as excess capacity at the end of the 10-year period immediately following the preparation of the background study may be included in the estimate.
- D. A very detailed asset management strategy and reporting requirements (subsection 6.1 (3) of the regulation) that includes lifecycle costs, action plans that will enable the assets to be sustainable, a summary of how to achieve the proposed level of service, discussion on procurement measures and risk are required.



To meet the requirements noted above, Arcadis Canada Inc. was retained to undertake the above calculations, which are provided in Appendix H of this study (note: the asset management requirements are addressed in Appendix I).

4.14 Mandatory Phase-in of a D.C.

For all D.C. by-laws passed after January 1, 2022, the charge must be phased-in relative to the maximum charge that could be imposed under the by-law. The phase-in for the first five years that the by-law is in force, is as follows:

- Year 1 – 80% of the maximum charge;
- Year 2 – 85% of the maximum charge;
- Year 3 – 90% of the maximum charge;
- Year 4 – 95% of the maximum charge; and
- Year 5 to expiry – 100% of the maximum charge.



Chapter 5

D.C.-Eligible Cost Analysis by Service



5. D.C.-Eligible Cost Analysis by Service

5.1 Introduction

This chapter outlines the basis for calculating eligible costs for the D.C.s to be applied on a uniform basis. In each case, the required calculation process set out in subsection 5 (1) paragraphs 2 to 7 in the D.C.A. and described in Chapter 4 was followed in determining D.C.-eligible costs.

The nature of the capital projects and the timing identified in the chapter reflects Council's current intention. Over time, however, City projects and Council priorities change; accordingly, Council's intentions may alter, and different capital projects (and timing) may be necessary to meet the need for services required by new growth.

It is noted that the costs and calculations undertaken herein are based on 2023 dollars.

5.2 Service Levels and 10-Year Capital Costs for D.C. Calculations

This section evaluates the development-related capital requirements for public works, fire protection services, policing services, transit services, parks and recreation services, library services, long-term care services, child care and early years programs, public health services, P.O.A. services including by-law enforcement, ambulance services, and waste diversion services over a 10-year planning period. Note: the growth forecast included in Chapter 3 refers to late 2023 to late 2033. This reflects 10 full calendar years of growth. As is noted in Section 3.3, item 5, the growth forecast assumes a minimum six month lag between building permit and occupancy. As such, the capital needs identified in this section reflect 10 full calendar years beginning in 2023.

The service component is evaluated on two format sheets: the average historical 15-year level of service calculation (see Appendix B), which "caps" the D.C. amounts; and, the infrastructure cost calculation, which determines the potential D.C. recoverable cost.



5.2.1 Policing Services

The Hamilton Police Service operates from several facilities, some of which are owned while others are leased. These facilities, combined, provide 379,845 sq.ft. of building area, providing for an average level of service of 0.61 sq.ft. per capita or an investment of \$695 per capita over the past 15 years. This level of service provides the City with a maximum D.C.-eligible amount for recovery over the forecast period of approximately \$43.16 million.

The police service has a fleet of 309 vehicles with an equivalent useful life of at least seven years. Over the historical 15-year period, the average level of service provided equates to 0.50 vehicles per 1,000 population, or an investment of \$42 per capita, providing for a D.C.-eligible amount over the forecast period of \$2.59 million.

In addition to the above, the police service currently provides equipment and gear for 1,037 members, including 855 equipped officers, 121 special constables, 43 auxiliary officers, and 18 cadets. Over the past 15 years, this level of investment provides for a calculated average level of service of \$29 per capita. This provides for a D.C.-eligible amount over the forecast period of approximately \$1.78 million.

In total, the City is eligible to collect approximately \$47.53 million in D.C.s related to growth-related policing services capital.

To service growth over the forecast period, a number of projects have been identified for inclusion in the D.C. With respect to facilities, the following has been identified as required for growth:

- Marine Unit facility expansion and replacement (\$7.18 million);
- Station 40 (Waterdown) (\$13.39 million); and
- Station 50 (\$13.39 million).

A deduction of \$3.59 million has been made to the Marine Unit facility to account for the portion of the costs related to replacing the existing facility. In addition, a deduction of \$8.83 million has been made to Station 50 to account for the benefit to growth beyond the forecast period.

The City has identified the need for debenture financing on the Marine Unit facility and Station 40 which has been estimated using a 15-year term and 4.5% interest rate,



resulting in the inclusion of \$7.11 million (discounted) of interest in the D.C. calculation. Existing debt for the Divisional 30 Headquarters including principal and interest (discounted) of \$1.15 million and anticipated debt for the Investigative Services Division facility of \$3.59 (including principal and discounted interest) have been included in the D.C. calculations for recovery.

In addition to the above costs, approximately \$7.80 million has been identified in capital related to additional vehicles and equipment. A deduction of \$293,700 has been made to this amount to account for the benefit to growth beyond the forecast period.

An adjustment of approximately \$5.49 million has been made to account for the balance in the D.C. reserve fund, resulting in a net growth-related amount of \$35.38 million for inclusion in the D.C. calculations.

The costs for the Hamilton Police Service are shared 73%/27% between residential and non-residential development, based on the ratio of growth in population to employment over the forecast period.



Table 5-1
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Policing Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
	2023-2032										
	Facilities										
1	Marine Facility Expansion & Replacement	2025-2026	7,175,000	-		7,175,000	3,587,500		3,587,500	2,618,875	968,625
2	Growth Related Component of Marine Facility Interest (Discounted)	2024-2038	1,209,308	-		1,209,308	-		1,209,308	882,795	326,513
3	Additional Police Facility Requirements - Station 40 (Waterdown)	2023-2025	13,385,000	-		13,385,000	-		13,385,000	9,771,050	3,613,950
4	Growth Related Component of Station 40 Debt Interest (Discounted)	2024-2038	5,896,735	-		5,896,735	-		5,896,735	4,304,616	1,592,118
5	Station 50 (New)	2029-2032	13,385,000	8,834,100		4,550,900	-		4,550,900	3,322,157	1,228,743
6	Investigative Services Division (I.S.D.) Forensics Headquarters - Debt Principal	2024-2038	3,000,000	-		3,000,000	-		3,000,000	2,190,000	810,000
7	Growth Related Component of I.S.D. Forensics Headquarters Debt Interest (Discounted)	2024-2038	589,332	-		589,332	-		589,332	430,212	159,120
	Vehicles & Equipment										
8	Station 40 Equipment	2025	445,000	-		445,000	-		445,000	324,850	120,150
9	Station 40 Vehicles	2025	1,450,000	-		1,450,000	-		1,450,000	1,058,500	391,500
10	Station 50 Equipment	2029-2032	445,000	293,700		151,300	-		151,300	110,449	40,851
11	Equipment for Officers (132)	2029-2032	2,415,600	-		2,415,600	-		2,415,600	1,763,388	652,212
12	Equipment for Auxiliary Officers (7)	2029-2032	22,400	-		22,400	-		22,400	16,352	6,048
13	Equipment for Special Constables (3)	2029-2032	8,700	-		8,700	-		8,700	6,351	2,349
14	Equipment for Cadets (1)	2029-2032	3,500	-		3,500	-		3,500	2,555	945
15	Front Line Vehicles (15)	2023-2032	1,695,000	-		1,695,000	-		1,695,000	1,237,350	457,650
16	Non-Front Line Vehicles (23)	2023-2032	966,000	-		966,000	-		966,000	705,180	260,820
17	Marine Vessel (new)	2025	346,100	-		346,100	-		346,100	252,653	93,447
	Other										
18	Debt Principal (Discounted) - Shared Training Facility	2023-2027	1,101,777	-		1,101,777	-		1,101,777	804,297	297,480
19	Debt Interest (Discounted) - Shared Training Facility	2023-2027	44,426	-		44,426	-		44,426	32,431	11,995
20	Reserve Fund Adjustment	Reserve					5,487,370		(5,487,370)	(4,005,780)	(1,481,590)
	Total		53,583,878	9,127,800	-	44,456,078	9,074,870	-	35,381,208	25,828,282	9,552,926



5.2.2 Fire Protection Services

Hamilton currently operates its fire services from 263,661 sq.ft. of facility space, providing for a 15-year historical average level of service of approximately 0.48 sq.ft. per capita, or an average level of investment of \$370 per capita. This level of service provides the City with a maximum D.C.-eligible amount of approximately \$23.00 million for recovery over the forecast period.

The fire department has a current inventory of 118 vehicles. The inventory provided over the previous 15-year period results in a calculated average level of service of 0.20 vehicles per 1,000 population, and an average level of investment of \$177 per capita. This level of service provides for a D.C.-eligible amount of approximately \$10.98 million over the forecast period.

In addition to the vehicles, the City also owns 5,318 items of small equipment and gear for use in fire services, with a total value of approximately \$27.66 million. This results in a calculated average level of service for the historical 15-year period of \$43 per capita, providing for a D.C.-eligible amount over the forecast period of approximately \$2.69 million.

Based on the above, the maximum D.C.-eligible amount for recovery over the forecast period for fire services is approximately \$36.66 million.

The City has identified future capital needs totalling approximately \$86.88 million. The following listing summarizes the gross capital costs included in the calculations:

- Facilities (total gross cost \$70.74 million):
 - New Waterdown Station: \$16.70 million
 - New Elfrida/Upper Stoney Creek Station: \$25.00 million
 - Mechanical/Stores Relocation/Expansion: \$14.50 million
 - Station 6 Expansion: \$6.50 million
 - Station 19 Expansion: \$6.50 million
 - Station 10 Enhancements: \$1.54 million
- New Vehicles (pumpers, engines, etc.): \$8.80 million
- New Equipment (air compressors, fire hoses, protective gear, defibrillators, etc.): \$1.93 million



- Future Financing Costs (assumed term of 15 years at a rate of 4.5%): \$3.28 million
- Outstanding Debt (discounted principal and interest): \$2.13 million.

Of this amount, deductions of approximately \$30.99 million and \$9.27 million have been made for the share of the projects that benefit growth outside of the forecast period and for the amount that benefits existing development, respectively. Additionally, the existing reserve fund balance of approximately \$6.61 million has been deducted from the calculations. In total, the net D.C.-recoverable amount included in the D.C. calculation is approximately \$40.01 million.

These costs are shared between residential and non-residential development based on the population to employment growth ratio over the forecast period, resulting in 73% being allocated to residential development and 27% being allocated to non-residential development.



Table 5-2
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Fire Protection Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development 2023-2032	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non- Residential Share 27%
	Fire Facilities										
1	New Station Waterdown Growth Area - Station 29	2023-2025	16,700,000	-		16,700,000	-		16,700,000	12,191,000	4,509,000
2	Waterdown Station - Growth Related Interest (Discounted)	2024-2038	3,106,524	-		3,106,524	-		3,106,524	2,267,762	838,761
3	New Station Elfrida/Upper Stoney Creek Growth Area	2025-2028	25,000,000	16,500,000		8,500,000	-		8,500,000	6,205,000	2,295,000
4	Mechanical/Stores Relocation/Expansion	2028-2032	14,500,000	5,229,500		9,270,500	9,270,500		-	-	-
5	Facility Expansion - Wentworth/Barton Station 6	2028-2031	6,500,000	1,170,000		5,330,000	-		5,330,000	3,890,900	1,439,100
6	Facility Expansion - Mount Hope Airport Lands and Residential Area - Station 19	2028-2033	6,500,000	6,500,000		-	-		-	-	-
7	West End Urban Intensification Station 10 - Facility Enhancements	2025-2027	1,540,800	-		1,540,800	-		1,540,800	1,124,784	416,016
8	Outstanding Debt - Principal	2023	104,680	-		104,680	-		104,680	76,417	28,264
9	Outstanding Debt - Interest (Discounted)	2023	2,475	-		2,475	-		2,475	1,806	668
10	Outstanding Debt- Shared Training Facility - Principal (Discounted)	2023-2027	1,934,382	-		1,934,382	-		1,934,382	1,412,099	522,283
11	Outstanding Debt- Shared Training Facility - Interest (Discounted)	2023-2027	77,998	-		77,998	-		77,998	56,939	21,060



Table 5-2 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Fire Protection Services Capital Sheet

Prj .No	Increased Service Needs Attributable to Anticipated Development 2023-2032	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non- Residential Share 27%
	Fire Vehicles										
12	New Vehicles for Waterdown Station	2023-2025	1,549,000	-		1,549,000	-		1,549,000	1,130,770	418,230
13	Rural Pumper for Upper Stoney Creek Growth Area (New Station)	2025-2028	1,450,000	-		1,450,000	-		1,450,000	1,058,500	391,500
14	Engine for Upper Stoney Creek Growth Area(New Station)	2025-2028	1,450,000	957,000		493,000	-		493,000	359,890	133,110
15	New Vehicle due to Urban Core Intensification	2028-2031	1,450,000			1,450,000	-		1,450,000	1,058,500	391,500
16	New Vehicle due to West End Intensification	2030-2033	1,450,000			1,450,000	-		1,450,000	1,058,500	391,500
17	New Engine for Station 19	2028-2033	1,450,000			1,450,000	-		1,450,000	1,058,500	391,500
18	Outstanding Debt on Stn 20 Vehicle - Principal	2023	9,900	-		9,900	-		9,900	7,227	2,673
19	Outstanding Debt on Stn 20 Vehicle - Interest (Discounted)	2023	234	-		234	-		234	171	63
	Fire Equipment										
	Station #31 Waterdown										
20	New Equipment for Waterdown	2023-2025	375,000	-		375,000	-		375,000	273,750	101,250
	New Station Elfrida/Stoney Creek Growth Area										
21	Air Compressor	2025-2028	3,900	2,600		1,300	-		1,300	949	351
22	Washer Extractor	2025-2028	15,000	9,900		5,100	-		5,100	3,723	1,377
23	Portable Radios, Chargers & Batteries	2025-2028	89,000	58,700		30,300	-		30,300	22,119	8,181



Table 5-2 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Fire Protection Services Capital Sheet

Prj .No	Increased Service Needs Attributable to Anticipated Development 2023-2032	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non- Residential Share 27%
24	S.C.B.A.'s	2025-2028	49,000	32,300		16,700	-		16,700	12,191	4,509
25	Portable Pumps	2025-2028	19,500	12,900		6,600	-		6,600	4,818	1,782
26	Multi Gas Detectors	2025-2028	8,800	5,800		3,000	-		3,000	2,190	810
27	Defibrillators	2025-2028	7,000	4,600		2,400	-		2,400	1,752	648
28	Thermal Imaging Camera	2025-2028	16,300	10,800		5,500	-		5,500	4,015	1,485
29	Auto Extrication Equipment	2025-2028	31,000	20,500		10,500	-		10,500	7,665	2,835
30	Air Bags	2025-2028	14,700	9,700		5,000	-		5,000	3,650	1,350
31	Fire Hose	2025-2028	16,700	11,000		5,700	-		5,700	4,161	1,539
32	Bunker Gear	2025-2028	150,000	99,000		51,000	-		51,000	37,230	13,770
33	Station Exhaust System	2025-2028	65,700	43,400		22,300	-		22,300	16,279	6,021
34	Protective Gear & Uniform Clothing	2025-2028	168,000	110,900		57,100	-		57,100	41,683	15,417
35	Washer/Dryer & R42 Kit	2025-2028	45,000	-		45,000	-		45,000	32,850	12,150
36	Cascade System	2025-2028	160,300	-		160,300	-		160,300	117,019	43,281
	West End Urban Intensification - Station 10										
38	Additional Firefighting Equipment at West End Station 10	2025-2027	200,000	-		200,000	-		200,000	146,000	54,000
	Wentworth/Barton Urban Core Intensification - Station 6										
39	Additional Firefighting Equipment at Urban Station 6	2028-2033	200,000	-		200,000	-		200,000	146,000	54,000
	Waterdown Volunteer Station										
40	Additional Firefighting Equipment at Waterdown Volunteer Station	2023-2025	100,000	-		100,000	-		100,000	73,000	27,000



Table 5-2 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Fire Protection Services Capital Sheet

Prj .No	Increased Service Needs Attributable to Anticipated Development 2023-2032	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non- Residential Share 27%
	Station 19										
41	Additional Firefighting Equipment at Station 19	2028-2033	200,000	200,000		-	-		-	-	-
	Other										
42	Future Financing Costs (Discounted)	2028-2041	169,791	-		169,791	-		169,791	123,947	45,843
43	Reserve Fund Adjustment	Reserve					6,609,086		(6,609,086)	(4,824,633)	(1,784,453)
	Total		86,880,684	30,988,600	-	55,892,084	15,879,586	-	40,012,498	29,209,123	10,803,374



5.2.3 Public Works Services

The D.C.A. permits the creation of a class of service, as discussed in section 4.7. The City's public works service is established as a class of service which applies to all D.C.-eligible services.

The City operates their public works services out of a number of facilities and shipping containers. The facilities provide over 742,000 sq.ft. of building space, as well as 4.06 acres of land for the Old Rheem Property Snow Dump, providing for an average level of service of approximately 1.57 sq.ft. of facility space per capita. The average level of investment provided over the historical 15-year period was \$841 which results in a D.C.-eligible amount of approximately \$52.23 million.

The Public Works Department has 1,307 vehicles and major equipment totalling approximately \$138.84 million in value. The inventory over the past 15 years provides for an average investment of \$242 per capita. Over the forecast period, the D.C.-eligible amount for vehicles and equipment is approximately \$15.05 million.

In total, the City is eligible to collect approximately \$67.28 million from D.C.s related to public works.

With respect to capital needs to accommodate growth over the forecast period, the City has identified the need for additional facility space and vehicles/equipment; however, specific projects have not been identified. As such, provisions have been estimated on the following bases:

- **Facility Space** – in reviewing the average level of service over the historical 15-year period, the lowest sq.ft. per capita standard was used to provide for a conservative estimate (i.e., 1.283 sq.ft. per capita). Applying this standard to the anticipated growth of 62,136 people equates to the need for approximately 79,710 additional sq.ft. of building space over the forecast period. Multiplying this by the average quality standard of \$536 per sq.ft. provides for a total estimated provision of \$42.70 million.
- **Vehicles and Equipment** – similar to the estimation of the facilities provision, the lowest vehicles and equipment per capita standard over the 15-year historical period was used (i.e., 0.0021 vehicles per capita). Applying this standard to the anticipated growth of 62,136 people equates to the need for approximately 130 new vehicles and equipment over the forecast period. Multiplying this by the



average quality standard of \$110,000 per vehicle provides for a total estimated provision of \$14.30 million.

As a result of the above, provisions totalling \$57.00 million for additional facility space and vehicles and equipment have been included in the calculations. Of this amount, approximately \$10.59 has been deducted to account for the balance in the D.C. reserve fund. The total amount included in the D.C. calculations is approximately \$46.41 million.

The residential/non-residential capital cost allocation for public works services is based on the ratio of the anticipated population and employment growth over the forecast period. This results in 73% being allocated to residential development and 27% to non-residential development.



Table 5-3
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Public Works Services Capital Sheet

Prj. No	Increased Service Needs Attributable to Anticipated Development 2023-2032	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
	Facilities										
1	Provision for Additional Facility Space	2023-2032	42,700,000	-		42,700,000	-		42,700,000	31,171,000	11,529,000
	Vehicles & Equipment										
2	Provision for Additional Vehicles & Equipment	2023-2032	14,300,000	-		14,300,000	-		14,300,000	10,439,000	3,861,000
	Reserve Fund Adjustment	Reserve	-	-		-	10,589,471		(10,589,471)	(7,730,314)	(2,859,157)
	Total		57,000,000	-	-	57,000,000	10,589,471	-	46,410,529	33,879,686	12,530,843



5.2.4 Transit Services

Arcadis Canada Inc. (Arcadis) have undertaken the detailed transit calculations that are required under the D.C.A. Based on the information provided in Arcadis's technical report in Appendix H, which explains the transit forecast in detail, 128 new buses, four specialized transit vehicles and nine operations vehicles have been included in the transit capital forecast. The gross cost of these buses and vehicles is \$100.73 million with a deduction of \$23.72 million to recognize the benefit to growth beyond the 10-year forecast period. A deduction of \$66.78 million has been made in order to recognize the benefit to existing development. This results in a D.C.-eligible cost of \$10.24 million for transit buses and vehicles in the 2023 to 2032 forecast period.

In addition to the vehicles, a new transit facility has been identified in the forecast, at a total gross cost of \$396.00 million. The City has identified the need for growth-related financing for this facility, which is anticipated to be approximately \$6.07 million (discounted), based on a debenture term of 15 years at an interest rate of 4.5%. In addition, a deduction of \$183.00 million has been applied against this facility as a result of an anticipated grant from Public Transit Infrastructure Fund (P.T.I.F.). An attribution to recognize the benefit to growth beyond the 10-year forecast period has been identified in the amount of \$30.02 million. Accounting for existing buses being moved to the new facility and the projected modal increase with respect to transit use, an attribution to reflect the benefit to existing development has been made in the amount of \$165.35 million, resulting in a D.C.-eligible cost of \$23.71 million for the facility and related financing costs.

The total gross cost for transit vehicles and the new transit facility (including financing) is \$502.80 million. In addition to the adjustments noted above, an adjustment of \$21.70 million has been made to reflect the existing reserve fund deficit. In total, the net growth-related cost of \$55.65 million that has been included in the D.C. calculations.

The growth costs have been allocated 73% to residential development and 27% to non-residential development, based on the incremental growth in population to employment for the forecast period.



Table 5-4
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Transit Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non- Residential Share 27%
1	New Peak Hour 30' Bus (2)	2033-2035	1,329,500	1,329,500		-	-		-	-	-
2	New Peak Hour 40' Bus (48)	2033-2032	45,852,100	1,031,700		44,820,400	38,928,400		5,892,000	4,301,160	1,590,840
3	New Peak Hour 40' Bus (16)	2033-2035	15,284,000	15,284,000		-	-		-	-	-
4	New Peak Hour 60' Bus (8)	2033-2032	9,863,600	221,900		9,641,700	8,374,200		1,267,500	925,275	342,225
5	New Peak Hour 60' Bus (2)	2033-2035	2,465,900	2,465,900		-	-		-	-	-
6	New Spare 40' Bus (12)	2033-2032	11,463,000	257,900		11,205,100	9,732,100		1,473,000	1,075,290	397,710
7	New Spare 40' Bus (3)	2033-2035	2,865,800	2,865,800		-	-		-	-	-
8	New 40' to 60' Upgrades (37)	2023-2032	10,274,900	231,200		10,043,700	8,723,400		1,320,300	963,819	356,481
9	Facility Related Vehicles: Service Truck	2023-2032	130,000	-		130,000	100,900		29,100	21,243	7,857
10	Facility Related Vehicles: Stock Room Vehicle	2023-2032	65,000	-		65,000	50,500		14,500	10,585	3,915
11	Facility Related Vehicles: Garage Equipment Repair Walk Behind Forklift	2023-2032	184,200	12,300		171,900	143,000		28,900	21,097	7,803
12	Facility Related Vehicles: Garage Forklift	2023-2032	106,700	7,100		99,600	82,800		16,800	12,264	4,536
13	Facility Related Vehicles: Garage Tow Mobile	2023-2032	62,100	4,200		57,900	48,200		9,700	7,081	2,619
14	Facility Related Vehicles: Garage Equipment Repair Express Van Vehicles	2023-2032	173,000	-		173,000	134,300		38,700	28,251	10,449
15	Accessible Supervisory Vehicles (Specialized Transit)	2023-2032	612,000	-		612,000	462,100		149,900	109,427	40,473
16	Transit & Maintenance Storage Facility	2023-2026	396,000,000	26,625,000		369,375,000	165,349,200	183,000,000	21,025,800	15,348,834	5,676,966
17	Transit & Maintenance Storage Facility Growth Related Debt Interest (Discounted)	2027-2042	6,072,416	3,392,980		2,679,436	-		2,679,436	1,955,988	723,448
18	Reserve Fund Adjustment	Reserve	21,703,366	-		21,703,366	-		21,703,366	15,843,457	5,859,909
	Total		524,507,582	53,729,480	-	470,778,102	232,129,100	183,000,000	55,649,002	40,623,771	15,025,231



5.2.5 Provincial Offences Act (P.O.A.) Services Including By-law Enforcement

The City currently provides facility space totalling 57,915 sq.ft. for P.O.A services. The space provided over the previous 15 years equates to an average level of service of 57.70 sq.ft. of space per 1,000 residents or \$43 per capita. This level of investment provides the City with approximately \$2.68 million for eligible future D.C. funding over the 10-year forecast period.

The capital costs include recovery of outstanding debt and discounted interest related to the P.O.A. services facility at 50 Main Street East, in the amount of \$1.68 million. A reserve fund adjustment of \$120,021 has been included based on previous projects related to growth, resulting in a D.C.-recoverable amount of approximately \$1.80 million.

The growth-related costs for P.O.A. services have been allocated based on the incremental growth in population to employment over the forecast period, resulting in 73% being allocated to residential development and 27% to non-residential development.



Table 5-5
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Provincial Offences Act Services Including By-law Enforcement – Facilities Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non-Residential Share
	2023-2032									73%	27%
1	Growth related Debt Principal (Discounted) - Initial Construction for New POA Facility	2023-2033	1,526,114	-		1,526,114	-		1,526,114	1,114,063	412,051
2	Growth related Debt Interest (Discounted) - Initial Construction for New POA Facility	2023-2033	156,054	-		156,054	-		156,054	113,919	42,135
	Reserve Fund Adjustment	Reserve	120,021	-		120,021	-		120,021	87,615	32,406
	Total		1,802,189	-	-	1,802,189	-	-	1,802,189	1,315,598	486,591



5.2.6 Parks and Recreation Services

Parks Level of Service

The City currently has 6,116 acres of parkland within its jurisdiction. This parkland consists of various sized parkettes, neighbourhood/community parks, natural open spaces, etc. Based on the inventory of parkland provided over the historical 15-year period (2008 to 2022), the average level of service is 11.3 acres of parkland per 1,000 population. This average level of service equates to an investment of \$568 per capita. When applied to growth anticipated over the forecast period, this provides for a D.C.-eligible amount of \$35.29 million.

In addition, the City provides various parkland amenities (e.g., ball diamonds, playground equipment, soccer fields, basketball and volleyball courts, running tracks, etc.), and buildings (e.g., sun shelters, pavilions, etc.). On average, over the past 15 years, the City has provided 33.5 parkland amenity items and 109.80 sq.ft. of parkland amenity building space per 1,000 population. This equates to an average level of investment of \$645 per capita for all parkland amenities. This level of service provides the City with a D.C.-eligible amount of \$40.06 million related to parkland amenities.

Furthermore, the City currently owns and maintains 67.37 linear kilometres of trails. Over the past 15 years, the City has provided an average of 0.10 linear kilometres of trails per 1,000 population. This equates to a D.C.-eligible amount of \$1.86 million related to trail infrastructure.

The City also owns and operates 21 park-related pieces of equipment, such as fertilizer spreaders, aerators, and rototillers. The City provides for 0.1 park-related vehicles and equipment per 1,000 population, or an average level of investment of \$0.33 per capita. The total D.C.-eligible amount over the 15-year period related to parks equipment is \$20,505.

Indoor Recreation Level of Service

With respect to indoor recreation facilities, there are numerous facilities provided throughout the City, located in Hamilton, Stoney Creek, Ancaster, Dundas, Glanbrook, and Flamborough, amounting to a total of approximately 2.51 million sq.ft. of space. The City also provides 242,469 sq.ft. of indoor recreation-related buildings within parks



(e.g., washrooms, concessions, storage, etc.). Based on the inventory of space over the historical 15-year period (2008 to 2022), the City has provided an average of 4.52 sq.ft. of space per capita or an investment of \$3,749 per capita. Based on this service standard, the City would be eligible to collect approximately \$232.96 million from D.C.s for facility space.

The City also owns and utilizes 68 pieces of equipment to service the above-mentioned recreation facilities (e.g., ice edgers, scrubbers, snow blowers, etc.). Over the historical 15-year period, the City has provided an average level of service of 0.10 vehicles per 1,000 population. This level of service translates to an average investment of \$0.69 per capita. Over the forecast period, the City would be eligible to collect \$42,874 from D.C.s for vehicles and equipment.

Total Eligible Amount for Parks and Recreation Services

In total, the D.C.-eligible amount for parks and recreation services is \$310.23 million.

Capital Needs Summary

Based on the projected growth over the forecast period, the City has identified future growth capital needs totalling \$468.26 million. These costs are categorized as follows:

- Recreation facility space: \$259.29 million
- Parkland development projects: \$102.44 million
- West harbour projects: \$38.43 million
- Confederation park projects: \$33.95 million
- Trails: \$16.99 million
- Future financing costs (based on a term of 15 years at 4.5%): \$17.68 million.

Deductions of approximately \$77.16 million have been made to recognize the benefit to growth beyond the forecast period. Further deductions have been made totalling \$72.78 million to account for the benefit to existing development. Additionally, \$23.38 million has been deducted from the calculations to reflect the existing balance in the D.C. reserve fund. This results in a net growth-related amount of \$295.47 million to be included in the D.C. calculations.



As the predominant users of parks and recreation tend to be residents of the City, the forecast growth-related costs have been allocated 95% to residential development and 5% to non-residential development.



Table 5-6
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Parks and Recreation Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non-Residential Share
	2023-2032									95%	5%
	Indoor Recreation:										
1	Norman Pinky Lewis Recreation Centre Gymnasium Expansion	2029-2032	15,000,000	-		15,000,000	7,500,000		7,500,000	7,125,000	375,000
2	Fruitland/Winona New Recreation Centre	2028-2031	36,930,000	-		36,930,000	-		36,930,000	35,083,500	1,846,500
3	Winona Recreation Centre Expansion	2024-2027	25,000,000	-		25,000,000	18,750,000		6,250,000	5,937,500	312,500
4	Elfrida Community Centre	2041	38,300,000	38,300,000		-	-		-	-	-
5	Binbrook Community Centre	2028-2031	38,326,200	-		38,326,200	-		38,326,200	36,409,890	1,916,310
6	Sackville Hill Senior Centre Expansion	2026-2028	14,300,000	-		14,300,000	6,166,000		8,134,000	7,727,300	406,700
7	Waterdown Community Centre & Pool	2025-2027	30,000,000	-		30,000,000	-		30,000,000	28,500,000	1,500,000
8	Riverdale Community Hub & Domenic Agostino Riverdale Community Centre Expansion	2026-2027	15,330,500	-		15,330,500	-		15,330,500	14,563,975	766,525
9	Riverdale Community Hub & Domenic Agostino Riverdale Community Centre Expansion - Growth Related Debt Interest (Discounted)	2024-2038	71,604	-		71,604	-		71,604	68,024	3,580
10	Mt. Hope new Rec Centre	2025-2028	4,500,000	-		4,500,000	-		4,500,000	4,275,000	225,000
11	William Connell Ward 8 Ice Loop - Facility Space	2028	4,875,000	-		4,875,000	-		4,875,000	4,631,250	243,750



Table 5-6 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Parks and Recreation Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non- Residential Share
2023-2032									95%	5%	
12	Stoney Creek Recreation Centre Gymnasium Expansion	2029-2031	15,000,000	-		15,000,000	-		15,000,000	14,250,000	750,000
13	Ancaster Senior Achievement Centre Expansion	2027-2029	8,650,000	-		8,650,000	2,162,500		6,487,500	6,163,125	324,375
14	Gage Park Ice Loop - Facility Space	2023-2027	4,875,000	-		4,875,000	-		4,875,000	4,631,250	243,750
12	Brightside Park Fieldhouses	2024-2027	8,200,000	-		8,200,000	-		8,200,000	7,790,000	410,000
13	Brightside Park Fieldhouses - Growth Related Debt Interest (Discounted)	2024-2038	1,198,308	-		1,198,308	-		1,198,308	1,138,392	59,915
Confederation Park Projects:											
14	Confederation Park - Ice skating rink/loop, field house & zamboni	2027-2036	5,000,000	-		5,000,000	-		5,000,000	4,750,000	250,000
15	Confederation Buildings - Growth Related Debt Interest (Discounted)	2024-2038	1,150,179	-		1,150,179	-		1,150,179	1,092,670	57,509
West Harbour Projects:											
16	West Harbour Washroom/Concession	2024-2032	1,393,700	-		1,393,700	696,900		696,800	661,960	34,840
Parks:											
17	John St. N. & Rebecca St. Park - Master Plan Implementation	2030	5,400,000	-		5,400,000	4,644,000		756,000	718,200	37,800



Table 5-6 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Parks and Recreation Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non- Residential Share
2023-2032									95%	5%	
18	Nash Orchard Park	2026	950,000	-		950,000	-		950,000	902,500	47,500
19	Highbury Meadows North Park	2023	800,300	-		800,300	-		800,300	760,285	40,015
20	Cherry Beach Lakefront Park	2024	1,280,000	-		1,280,000	-		1,280,000	1,216,000	64,000
21	The Crossings Park	2025	1,200,000	-		1,200,000	-		1,200,000	1,140,000	60,000
22	Brooks at Rymal Park	2024	1,230,000	-		1,230,000	-		1,230,000	1,168,500	61,500
23	Lancaster Heights Park	2027	1,000,000	-		1,000,000	-		1,000,000	950,000	50,000
24	Fletcher Road Parkette	2026	267,000	-		267,000	-		267,000	253,650	13,350
25	Parkside Hills Park	2024	820,000	-		820,000	-		820,000	779,000	41,000
26	Clear Skies proposed park	2024-2029	1,360,000	680,000		680,000	-		680,000	646,000	34,000
27	Alexander Park - Upgrade for new skate park	2023	2,600,000	-		2,600,000	-		2,600,000	2,470,000	130,000
28	Chedoke Falls - New Access to Upper and Lower Falls	2027	8,400,000	-		8,400,000	4,200,000		4,200,000	3,990,000	210,000
29	Skateboard Study Implementation at Various Locations Throughout the City	2030	7,800,000	2,574,000		5,226,000	-		5,226,000	4,964,700	261,300
30	Billy Sherring - Class C Field Replace & Upgrade to Class A Artificial	2027	4,100,000	1,947,500		2,152,500	205,000		1,947,500	1,850,125	97,375
31	William Connell Play Structure, Parking Lot, Landscaping, and Servicing	2024-2026	1,625,000	-		1,625,000	-		1,625,000	1,543,750	81,250
32	Provision for Future Parkland Developments (8 neighbourhood parks & 1 community park)	2023-2032	10,700,000	7,062,000		3,638,000	-		3,638,000	3,456,100	181,900



Table 5-6 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Parks and Recreation Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non-Residential Share
2023-2032									95%	5%	
33	Waterdown South Smoky Hollow Park (Asset ID 72)	2023-2024	940,000	-		940,000	-		940,000	893,000	47,000
34	Waterdown South Parkette 3 (Asset ID 71)	2023	114,300	-		114,300	-		114,300	108,585	5,715
35	Heritage Green Community Sports Park - Future Phases	2024-2026	5,320,000	-		5,320,000	-		5,320,000	5,054,000	266,000
36	Brian Timmis Field Redevelopment and Brightside Park Development	2023-2024	19,000,000	-		19,000,000	10,857,100		8,142,900	7,735,755	407,145
37	Fruitland/Winona Parkland Development - Community Park	2026-2027	1,700,000	-		1,700,000	-		1,700,000	1,615,000	85,000
38	Lewis Road Park (Winona)	2027	900,000	-		900,000	-		900,000	855,000	45,000
39	Miles Estates Park	2034	600,000	600,000		-	-		-	-	-
40	Rennie Street Park	2032-2033	1,000,000	600,000		400,000	-		400,000	380,000	20,000
41	Mountain Drive Park Spray Pad	2023	533,600	-		533,600	-		533,600	506,920	26,680
42	Sam Lawrence Park bridge over Jolley Cut	2026-2028	8,013,000	-		8,013,000	2,003,300		6,009,700	5,709,215	300,485
43	Gage Park Ice Loop	2023-2027	1,625,000	-		1,625,000	-		1,625,000	1,543,750	81,250
44	Meadowlands Community Park Sun Shelter and Drinking Fountain	2023	133,400	-		133,400	-		133,400	126,730	6,670
45	Lake Avenue School Redevelopment for Additional Parkland Space	2025-2026	565,600	-		565,600	141,400		424,200	402,990	21,210



Table 5-6 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Parks and Recreation Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non- Residential Share
2023-2032									95%	5%	
46	Turner Park Path Upgrades	2025-2030	426,800	-		426,800	81,100		345,700	328,415	17,285
47	Olympic Park Hockey Rink	2025-2026	4,802,000	-		4,802,000	-		4,802,000	4,561,900	240,100
48	Chedoke Browlands Improvement	2024-2026	640,300	-		640,300	53,400		586,900	557,555	29,345
49	Red Hill Park - Ward 5	2025-2026	896,400	-		896,400	448,200		448,200	425,790	22,410
50	Hunter Estates Sun Shelter	2026	107,800	-		107,800	-		107,800	102,410	5,390
51	Inch Park inclusive playground	2024-2025	1,067,100	-		1,067,100	106,700		960,400	912,380	48,020
52	Fruitland Winona Neighbourhood parkland development	2028-2031	4,001,700	-		4,001,700	-		4,001,700	3,801,615	200,085
53	Woodlands Park Spray Pad - Growth Component	2024	426,800	-		426,800	-		426,800	405,460	21,340
	Lake Vista Park Multi-Purpose Court	2025	95,000	-		95,000	-		95,000	90,250	4,750
	Confederation Park Projects:										
54	Confederation Park - Little Squirt Works & Area Redevelopment	2025-2026	2,132,300	-		2,132,300	1,066,200		1,066,100	1,012,795	53,305
55	Confederation Park - Central Village - Pkg. Lot & Roadways, Phase 1	2033-2036	3,521,500	3,521,500		-	-		-	-	-
56	Confederation Park - Central Village - Public Realm & Square	2033-2036	2,934,600	2,934,600		-	-		-	-	-



Table 5-6 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Parks and Recreation Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non- Residential Share
2023-2032									95%	5%	
57	Confederation Park - West Entrance and Naturalizing the Go Karts Site	2024-2026	1,050,000	-		1,050,000	-		1,050,000	997,500	52,500
58	Confederation Park - Internal Trail Between Central Village and Beaches Grill	2033-2036	213,400	213,400		-	-		-	-	-
59	Confederation Park - Boardwalk to Beach	2025-2026	960,400	-		960,400	-		960,400	912,380	48,020
60	Confederation Park - General Trail Upgrades	2025-2026	480,200	-		480,200	240,100		240,100	228,095	12,005
61	Confederation Park - Group Picnic Area	2029	586,900	-		586,900	293,500		293,400	278,730	14,670
62	Confederation Park - Central Parking Lot & Volleyball Centre Area	2029	373,500	-		373,500	-		373,500	354,825	18,675
63	Confederation Park Soccer Field Area	2032	71,100	-		71,100	7,100		64,000	60,800	3,200
64	Confederation Park - Wild Waterworks Property Upgrades	2023-2026	569,000	-		569,000	284,500		284,500	270,275	14,225
65	Confederation Park - Woodland Restoration - Phase 1	2025-2026	800,300	-		800,300	400,200		400,100	380,095	20,005



Table 5-6 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Parks and Recreation Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 95%	Non- Residential Share 5%
	2023-2032										
66	Confederation Park - Woodland Restoration - Phase 2	2025-2026	640,300	-		640,300	320,200		320,100	304,095	16,005
67	Confederation Park - Van Wagners Marsh Upgrades	2026-2036	1,227,200	-		1,227,200	613,600		613,600	582,920	30,680
68	Confederation Park - Signage - Phase 2	2026	426,800	-		426,800	-		426,800	405,460	21,340
69	Confederation Park - Park Corridor Upgrades along Van Wagners Beach Road	2027-2034	905,000	705,000		200,000	-		200,000	190,000	10,000
70	Confederation Park - Lighting along Strip	2033	930,500	930,500		-	-		-	-	-
71	Confederation Park - Pumping station, sanitary forcemain, and electrical servicing for Lakeland area	2033	1,432,100	1,432,100		-	-		-	-	-
72	Confederation Park - Public Art & Site Work - Centennial Pkwy Entrance	2033	640,300	640,300		-	-		-	-	-
73	Confederation Park - Centennial Intersection & Entrance	2023-2033	6,600,000	3,505,000		3,095,000	-		3,095,000	2,940,250	154,750
74	Confederation Park - Primary infrastructure for servicing the central village and ice skating facility	2033	2,294,300	2,294,300		-	-		-	-	-



Table 5-6 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Parks and Recreation Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non- Residential Share
	2023-2032									95%	5%
75	Confederation Park - Services for Adventure Village Expansion	2033	160,100	160,100		-	-		-	-	-
	West Harbour Projects:			-		-	-		-	-	-
76	West Harbour Pier 6 Artisan Village (HWT)	2023-2024	5,811,600	-		5,811,600	2,905,800		2,905,800	2,760,510	145,290
77	West Harbour Macassa Bay - Shoreline Improvements	2023-2025	7,393,500	-		7,393,500	1,848,400		5,545,100	5,267,845	277,255
78	West Harbour Macassa Bay Boardwalk and Trail	2023-2025	9,755,800	-		9,755,800	2,439,000		7,316,800	6,950,960	365,840
79	West Harbour Pier 8 Greenway	2023-2028	1,721,200	-		1,721,200	688,500		1,032,700	981,065	51,635
80	West Harbour Bayfront Park Upgrades Phase 3 (Entrance Fountain)	2023-2028	1,087,100	-		1,087,100	815,300		271,800	258,210	13,590
81	West Harbour - Bayview Park Remediation and Redevelopment	2023-2028	3,170,600	-		3,170,600	1,585,300		1,585,300	1,506,035	79,265
82	Growth-Related Debt Principal - Pier 8	2024-2038	8,100,000	-		8,100,000	-		8,100,000	7,695,000	405,000
83	Growth-Related Debt Interest (Discounted) - Pier 8	2024-2038	1,591,195	-		1,591,195	-		1,591,195	1,511,635	79,560
	Trails										
84	Ancaster Creek Trail	2023	1,282,900	-		1,282,900	-		1,282,900	1,218,755	64,145
85	Chedoke Rail Trail Extension	2029-2030	334,900	-		334,900	-		334,900	318,155	16,745



Table 5-6 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Parks and Recreation Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non- Residential Share
	2023-2032									95%	5%
86	Chedoke Rail Trail, Claremont Link	2029-2030	341,700	-		341,700	-		341,700	324,615	17,085
87	Glenburn Court - Battlefield Creek Trail	2024	330,000	-		330,000	-		330,000	313,500	16,500
88	Sam Manson Park Trail	2027	150,000	-		150,000	-		150,000	142,500	7,500
89	Park Trail Connections - Upper James St. to Limeridge Mall Hydro Corridor Trail	2027-2031	1,400,000	-		1,400,000	700,000		700,000	665,000	35,000
90	First Road West Link	2025	524,000	-		524,000	-		524,000	497,800	26,200
91	Summerlea West Park - Fletcher Road Parkette Link	2027	960,000	480,000		480,000	-		480,000	456,000	24,000
92	Filman Road Link - North Segment	2027	380,000	-		380,000	-		380,000	361,000	19,000
93	Filman Road Link - South Segment	2027	750,000	-		750,000	-		750,000	712,500	37,500
94	Tollgate Drive Link	2033	361,500	361,500		-	-		-	-	-
95	Spencer Creek, Main Street and Thorpe Street Link	2031	5,200,000	5,200,000		-	-		-	-	-
96	Spencer Creek, Mercer Street and Governor's Road Lin	2033	989,900	989,900		-	-		-	-	-
97	Cascade Trail Link	2033	436,900	436,900		-	-		-	-	-
98	Dundas Valley Link	2033	1,590,000	1,590,000		-	-		-	-	-



Table 5-6 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Parks and Recreation Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non- Residential Share
2023-2032									95%	5%	
99	Borer's Creek Trail Link	2027	1,100,000	-		1,100,000	-		1,100,000	1,045,000	55,000
100	Waterdown Pipeline Trail Link	2026	590,000	-		590,000	295,000		295,000	280,250	14,750
101	East Mountain Trail Loop	2024	273,000	-		273,000	259,400		13,600	12,920	680
	Debt Financing										
102	Confederation Park - Growth Related Debt Interest (Discounted)	2024-2038	39,289	-		39,289	-		39,289	37,324	1,964
103	Alexander Park Skate Park - Growth Related Debt Interest (Discounted)	2024-2038	414,300	-		414,300	-		414,300	393,585	20,715
104	Brian Timmis Field - Growth Related Debt Interest (Discounted)	2024-2038	946,031	-		946,031	-		946,031	898,730	47,302
105	Future Financing Costs (Discounted)	2024-2043	12,265,925	-		12,265,925	-		12,265,925	11,652,629	613,296
106	Reserve Fund Adjustment	Reserve		-		-	23,380,908		(23,380,908)	(22,211,863)	(1,169,045)
	Total		468,782,730	77,158,600	-	391,624,130	96,158,608	-	295,465,522	280,692,246	14,773,276



5.2.7 Library Services

The City currently provides library services from 23 facilities, totalling 405,424 sq.ft. of space. Over the past 15 years, the average level of service equates to approximately 0.71 sq.ft. of space per capita, or an investment of \$732 per capita. Over the forecast period, the D.C.-eligible amount for recovery related to library facilities is \$45.49 million.

The City has a current inventory of 1,074,889 library collection items. These collection items include various materials including books, CDs, DVDs, video games, e-resources etc., all of which have a total value of approximately \$53.62 million. Over the past 15 years, the average level of service was 2.02 collection items per capita, or an investment of \$88 per capita. Based on this service standard, the City would be eligible to collect approximately \$5.47 million from D.C.s for library collection items.

In addition, the City has eight vehicles which are utilized for library services. These include two bookmobiles, two half-tonne vans, two Ford E-450 trucks, one Genie Boom, and one skyjack. The City provides 0.01 vehicles/equipment per 1,000 population, or \$3 per capita. The total D.C.-eligible amount over the 15-year period is \$203,806.

In total, the City would be eligible to collect approximately \$51.16 million from D.C.s for library services.

With respect to capital needs to accommodate growth over the forecast period, the City has identified new library facilities, expansions to current facilities, new and expanded furnishings, and new vehicles for inclusion in the D.C. calculation. The gross capital cost identified is \$126.96 million, which is provided as follows:

- New facilities/expansions of existing facilities: \$113.02 million
- Vehicles: \$1.05 million
- Collection materials: \$3.52 million
- Existing/approved debt (principal and discounted interest): \$6.62 million
- Future financing costs (discounted interest): \$2.75 million.

Deductions in the amount of \$42.64 million have been made to account for the portion of the costs benefiting existing development. Furthermore, deductions totalling \$19.68 million have been made to account for the benefit to growth outside of the forecast period. A further adjustment of \$9.59 million has been made to account for the existing



balance in the D.C. reserve fund. As a result of the above deductions, the total net-recoverable amount included in the D.C. calculations is \$55.05 million.

While library usage is predominately residential based, there is some use of the facilities by non-residential users for the purpose of research. To acknowledge this use, the growth-related capital costs have been allocated 95% to residential development and 5% to non-residential development.



Table 5-7
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Library Services Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non-Residential Share
	2023-2032									95%	5%
	Facilities:										
1	South Mountain Complex - Turner Park - Debt Principal	2023	137,496	-		137,496	-		137,496	130,621	6,875
2	South Mountain Complex - Turner Park - Debt Interest (Discounted)	2023	3,250	-		3,250	-		3,250	3,088	163
3	Valley Park Library - Debt Principal	2023-2037	2,392,000	-		2,392,000	-		2,392,000	2,272,400	119,600
4	Valley Park Library - Debt Interest (Discounted)	2023-2037	527,132	-		527,132	-		527,132	500,775	26,357
5	Greensville Library - Debt Principal	2023-2037	902,000	-		902,000	-		902,000	856,900	45,100
6	Greensville - Debt Interest (Discounted)	2023-2037	198,776	-		198,776	-		198,776	188,837	9,939
7	Binbrook Library - Debt Principal	2023-2037	2,016,500	-		2,016,500	-		2,016,500	1,915,675	100,825
8	Binbrook Library - Debt Interest (Discounted)	2023-2037	444,382	-		444,382	-		444,382	422,163	22,219
9	Winona/Stoney Creek - New - Furnishings for New Facility	2030	250,000	-		250,000	-		250,000	237,500	12,500
10	Winona/Stoney Creek - New - Construction (Estimated 9,000 sq.ft.)	2030	11,000,000	-		11,000,000	-		11,000,000	10,450,000	550,000



Table 5-7 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Library Services Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non-Residential Share
2023-2032									95%	5%	
11	Mount Hope - Replacement & Expansion - Construction (Estimated 5,000 sq.ft.)	2024	5,314,000	-		5,314,000	3,618,000		1,696,000	1,611,200	84,800
12	Mount Hope - New - Furnishings for Expansion	2024	750,000	-		750,000	510,600		239,400	227,430	11,970
13	Ancaster - Expansion - Construction (estimated 20,000 sq.ft.)	2031	11,000,000	3,200,900		7,799,100	7,234,200		564,900	536,655	28,245
14	Ancaster Furnishings for Expansion	2031	500,000	145,500		354,500	328,800		25,700	24,415	1,285
15	Lower City New/Expanded Library (Estimated 8,000 sq.ft.)	2030	10,360,000	3,781,400		6,578,600	-		6,578,600	6,249,670	328,930
16	Elfrida - New Branch (Estimated 12,000 sq.ft.)	2032	11,940,000	11,940,000		-	-		-	-	-
17	Central Library - Phase IV - Local History & Archives - Renovations	2026	5,000,000	-		5,000,000	5,000,000		-	-	-
18	New Permanent Location For Red Hill (Estimated 15,000 sq.ft.)	2028	14,000,000	-		14,000,000	10,976,000		3,024,000	2,872,800	151,200
19	Saltfleet Move to Stoney Creek (Estimated 15,000 sq.ft.)	2028	19,400,000	-		19,400,000	14,967,700		4,432,300	4,210,685	221,615



Table 5-7 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Library Services Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non-Residential Share
	2023-2032									95%	5%
20	New West Mountain Branch	2028	8,500,000	-		8,500,000	-		8,500,000	8,075,000	425,000
21	New North End Branch - Discovery Centre (Estimated 19,000 sq.ft.)	2026	15,000,000	-		15,000,000	-		15,000,000	14,250,000	750,000
	Vehicles:										
22	Bookmobile - Electronic	2029	1,000,000	-		1,000,000	-		1,000,000	950,000	50,000
23	Maintenance Van	2025	48,900	-		48,900	-		48,900	46,455	2,445
	Collection Materials:										
24	Winona/Stoney Creek - New - Materials	2030	250,000	-		250,000	-		250,000	237,500	12,500
25	Mount Hope Materials	2024	250,000	-		250,000	-		250,000	237,500	12,500
26	Ancaster Materials	2031	500,000	425,000		75,000	-		75,000	71,250	3,750
27	Expanded Lower City Branch Materials	2030	520,000	189,800		330,200	-		330,200	313,690	16,510
28	Red Hill Permanent Location Materials	2028	500,000	-		500,000	-		500,000	475,000	25,000
29	Saltfleet - Expansion - Materials	2028	500,000	-		500,000	-		500,000	475,000	25,000
30	New North End Branch Materials	2026	1,000,000	-		1,000,000	-		1,000,000	950,000	50,000



Table 5-7 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Library Services Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non-Residential Share
	2023-2032									95%	5%
	Other										
31	Future Financing Costs (Discounted)	2026-2044	2,751,497	-		2,751,497	-		2,751,497	2,613,923	137,575
32	Reserve Fund Adjustment	Reserve	-	-		-	9,592,677		(9,592,677)	(9,113,043)	(479,634)
	Total		126,955,933	19,682,600	-	107,273,333	52,227,977	-	55,045,356	52,293,089	2,752,268



5.2.8 Long-Term Care Facilities

With respect to long-term care facilities, there are currently two facilities provided by the City, Wentworth Lodge and Macassa Lodge, which total 347,278 sq.ft. of building space. Over the previous 15-year period, the facilities provided residents with an average space equating to approximately 0.65 sq.ft. per capita or an investment of \$578 per capita. This level of investment provides the City with \$35.89 million for eligible future D.C. funding over the forecast period.

The City has a planned expansion to the B Wing at Macassa Lodge, as well as the renovation and replacement of A Wing and S Wing (note, these are not growth-related and are not included in the calculations (i.e., the total cost has been allocated to existing development)). The total cost of these projects is \$81.00 million; however, a deduction of \$62.09 million has been made for the renovation and replacement of A Wing and S Wing and the portion of costs related to the replacement of beds in B Wing. A further deduction of \$4.74 million has been made to account for a grant from the Ministry of Health and Long-Term Care. A deduction in the amount of \$7.67 million has also been made to account for the balance in the D.C. reserve fund. After these deductions, the total amount included in the D.C. calculation is approximately \$6.50 million.

An allocation of 90% to residential development and 10% to non-residential development has been attributed to services related to long-term care facilities to acknowledge there is some use of the service by non-residential users.



Table 5-8
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Long-term Care Facilities Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non-Residential Share
2023-2032									90%	10%	
1	Macassa-B Wing Expansion	2023-2025	50,100,000	-		50,100,000	31,190,000	4,740,000	14,170,000	12,753,000	1,417,000
2	Macassa-A Wing / S Wing Renovation/Replacement (69,136 sq.ft.)	2025-2030	30,900,000	-		30,900,000	30,900,000		-	-	-
	Reserve Fund Adjustment	Reserve					7,671,757		(7,671,757)	(6,904,582)	(767,176)
	Total		81,000,000	-	-	81,000,000	69,761,757	4,740,000	6,498,243	5,848,418	649,824



5.2.9 Public Health Services

Health services are currently provided from six facilities located throughout the City with a total of 97,411 sq.ft. of facility space. Over the past 15 years, the City has provided an average level of service of 0.19 sq.ft. per capita, or an investment of \$106 per capita. In addition to the facilities, the City also has two buses, one health bus and one dental bus, which are used in the provision of health services throughout the City. Based on the level of service provided over the past 15 years, the City would be eligible to collect approximately \$6.68 million from D.C.s for public health services.

The City has identified the need for additional space over the forecast period. A specific location has not yet been identified; therefore, the City has identified a provision in the amount of \$2.10 million. An adjustment of \$924,504 has been made to account for the existing balance in the D.C. reserve fund. As a result of the above, the total amount included in the D.C. calculations is approximately \$1.18 million.

While health services are predominately residential based, there is some use of the service by non-residential users. To acknowledge this use, the growth-related capital costs have been allocated 90% to residential development and 10% to non-residential development.



Table 5-9
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Public Health Facilities Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share	Non-Residential Share
2023-2032									90%	10%	
1	Provision for Additional Space	2023-2026	2,100,000	-		2,100,000	-		2,100,000	1,890,000	210,000
	Reserve Fund Adjustment	Reserve					924,504		(924,504)	(832,054)	(92,450)
	Total		2,100,000	-	-	2,100,000	924,504	-	1,175,496	1,057,946	117,550



5.2.10 Child Care and Early Years Programs

Child care and early years programs are currently provided within two facilities, totalling 38,465 sq.ft. of building space. These facilities provide for a 15-year average level of service of 0.06 sq.ft. per capita, or an investment of \$48 per capita. This level of service provides the City with approximately \$3 million for eligible future D.C. funding over the forecast period.

Growth-related capital needs for child care and early years programs have not been identified for the 10-year forecast period at this time.



5.2.11 Ambulance Services

The City currently provides ambulance services out of 18 facilities and one training facility (shared with fire and police services). These facilities provide a total of 62,602 sq.ft. of space. Over the previous 15 years, the average level of service has been approximately 0.11 sq.ft. of space per capita, which equates to an investment of \$90 per capita. Over the forecast period, the D.C.-eligible amount for recovery is approximately \$5.62 million.

In addition to facility space, the City owns ambulances, emergency response vehicles, vans, and various pieces of equipment and gear. The average level of service over the past 15 years equates to an investment of \$41 per capita. This level of service provides for a D.C.-eligible amount for recovery of \$2.53 million.

In total, the City would be eligible to collect \$8.15 million from D.C.s for ambulance services.

With respect to growth-related capital needs, a new facility in the amount of \$13.50 million has been identified. A deduction in the amount of \$9.00 million has been made to account for the benefit to existing development. In addition, the City has identified the need for additional facility space; however, specific projects are not yet identified. The City's will be undertaking an ambulance service facilities' review in 2024 to identify specific projects and locations of new facilities. A provision of \$12.00 million has been identified; however, \$11.88 million has been deducted to account for the benefit to growth beyond the forecast period. The City has also identified the need for new ambulances and additional gear at a capital cost of \$3.79 million. Outstanding principal and discounted interest in the amount of \$321,000 has been included in the D.C. calculation for the shared training facility (note, debt is related to ambulance share of the costs only). Future financing costs of \$1.05 million have also been included in the calculations, based on an assumed term of 15 years at a rate of 4.5%. Approximately \$614,000 has been deducted from the calculations to reflect the balance in the D.C. reserve fund, resulting in a net growth-related amount of approximately \$9.16 million. This amount has been included in the D.C. calculation for recovery from future growth.

The growth costs have been allocated 90% to residential development and 10% to non-residential development, to acknowledge that while paramedics services are



predominately residential based, there is some use of the service by non-residential users.



Table 5-10
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Ambulance Services Capital Sheet

Prj.No	Increased Service Needs Attributable to Anticipated Development	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 90%	Non- Residential Share 10%
	2023-2032										
	Facilities:										
1	Outstanding Debt on Shared Training Facility - Principal	2023-2027	309,948	-		309,948	-		309,948	278,953	30,995
2	Outstanding Debt on Shared Training Facility - Interest (discounted)	2023-2027	12,017	-		12,017	-		12,017	10,815	1,202
3	Additional Facility Space	2023-2032	12,000,000	11,880,000		120,000	-		120,000	108,000	12,000
4	New Facility (approximately 17,000 sq.ft.)	2024	13,500,000	-		13,500,000	9,000,000		4,500,000	4,050,000	450,000
5	Growth Related Interest (Discounted) - Facility Space	2023-2037	991,677	-		991,677			991,677	892,510	99,168
	Vehicles & Equipment:										
6	Ambulance (10)	2023-2032	3,580,000	-		3,580,000	-		3,580,000	3,222,000	358,000
7	Additional Gear (100)	2023-2032	210,000	-		210,000	-		210,000	189,000	21,000
8	Growth Related Interest (Discounted) - Additional Ambulances	2023-2037	53,551	-		53,551	-		53,551	48,196	5,355
9	Reserve Fund Adjustment	Reserve	-	-		-	614,525		(614,525)	(553,073)	(61,453)
	Total		30,657,193	11,880,000	-	18,777,193	9,614,525	-	9,162,668	8,246,401	916,267



5.2.12 Waste Diversion Services

The City provides a total of 457,639 sq.ft. of eligible waste diversion space, with the ineligible space related to landfill being excluded. Over the previous 15 years, the average level of service was approximately 0.78 sq.ft. of space per capita, or an investment of \$465 per capita. Over the forecast period, the D.C.-eligible amount for recovery is approximately \$28.90 million.

The City owns/leases/contracts approximately 237 vehicles/pieces of equipment related to waste diversion (note, this amount excludes any vehicles or shares of vehicles that are related to landfill). These items include forklifts, transfer trucks, freightliners, and other various equipment, all of which have a total value of \$57.96 million. Over the past 15 years, the average level of service was 0.4 items per 1,000 population or an investment of \$104 per capita. Based on this service standard, the City would be eligible to collect approximately \$6.44 million from D.C.s for waste diversion vehicles and equipment.

In addition to the facilities, vehicles, and equipment, the City has other eligible waste diversion items such as carts, boxes, barrels, etc., totalling 1,214,238 items. Over the past 15 years, the average level of service was 1.47 items per capita, or an investment of \$21 per capita. Based on this service standard, the City would be eligible to collect approximately \$1.30 million from D.C.s for other waste diversion equipment.

In total, the City is eligible to collect approximately \$36.64 million from D.C.s related to waste diversion services.

Based on the projected growth over the forecast period, the City has identified future growth capital needs totalling approximately \$39.87 million. These capital needs include expansions of existing facilities, relocation of the leaf and yard waste composting facility, new equipment and vehicles, etc. Of this amount, a deduction of \$14.01 million has been made to account for the portion of the works that are related to landfill (i.e., D.C. ineligible). A further deduction of \$11.01 million was made to recognize the benefit to existing development. An adjustment of \$5.61 million was made to account for the existing balance in the D.C. reserve fund. This results in a net growth-related amount of \$9.24 million being included in the D.C. calculations.



The growth costs have been allocated 95% to residential development and 5% to non-residential development to acknowledge that the predominant users of waste diversion services tend to be residents of the City; however, there is some use by non-residential as well.



Table 5-11
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Waste Diversion Services Capital Sheet

Prj .No	Increased Service Needs Attributable to Anticipated Development 2023-2032	Timing (year)	Gross Capital Cost Estimate (2023\$)	Other Deductions	Gross Capital Cost Estimate (2023\$) Waste Diversion Related	Post Period Benefit	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
								Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 95%	Non-Residential Share 5%
1	Diversion Container Replacement and Expansion Program	2023-2032	6,800,000	-	6,800,000	-	6,800,000	6,120,000		680,000	646,000	34,000
2	Growth-Related Interest (Discounted)	2023-2037	39,447		39,447	-	39,447	-		39,447	37,474	1,972
3	Public Space & Special Event Containers Replacement & Expansion	2023-2032	2,410,000	1,928,000	482,000	-	482,000	241,000		241,000	228,950	12,050
4	Glanbrook Landfill Capital Improvement Program	2023-2032	3,758,000	3,382,200	375,800	-	375,800	37,600		338,200	321,290	16,910
5	Maintenance & Capital Improvements to the Resource Recovery Centre (RRC) Program	2023-2027	3,249,000	-	3,249,000	-	3,249,000	2,111,900		1,137,100	1,080,245	56,855
6	Leaf & Yard Waste Composting Facility Relocation	2023-2027	5,000,000	-	5,000,000	-	5,000,000	2,500,000		2,500,000	2,375,000	125,000
7	Transfer Station/Community Recycling Centre Expansion & Capital Replacement	2024	14,500,000	8,700,000	5,800,000	-	5,800,000	-		5,800,000	5,510,000	290,000
8	Growth-Related Interest (Discounted) - Transfer Station/Community Recycling Centre Expansion	2023-2037	468,072		468,072	-	468,072	-		468,072	444,668	23,404
9	Provision for additional trucks (1 truck per 1,900 additional low and medium density units)	2023-2032	1,706,000	-	1,706,000	-	1,706,000	-		1,706,000	1,620,700	85,300
10	Waste Collection (Rear Packer) (3)	2028	1,605,000		1,605,000	-	1,605,000	-		1,605,000	1,524,750	80,250
11	Support Pick-up Trucks (4)	2024	332,000		332,000	-	332,000	-		332,000	315,400	16,600
12	Reserve Fund Adjustment	Reserve	-	-	-	-	-	5,611,207		(5,611,207)	(5,330,647)	(280,560)
	Total		39,867,518	14,010,200	25,857,318	-	25,857,318	16,621,707	-	9,235,611	8,773,831	461,781

*Other deductions are portions attributable to landfill



5.3 Service Levels and Capital Costs to Service Growth to Servicing Targets for Hamilton's D.C. Calculations

This section evaluates the development-related capital requirements for services related to a highway and water, wastewater, and stormwater services over the respective servicing target planning periods.

5.3.1 Services Related to a Highway

The City of Hamilton owns and maintains:

- 185 lane km of rural arterial roads;
- 1,197 lane km of rural collector roads;
- 830 lane km of urban collector roads;
- 395 lane km of urban arterial minor roads;
- 981 lane km of urban arterial major roads;
- 133 lane km of expressway;
- 498 lane km as a provision for sidewalks, boulevards, etc.;
- 231 lane km of bicycle lanes on roads;
- 30 lane km of cycle track (barrier);
- 22 lane km of multi-use trails (commuter); and
- 11 lane km of expanded paved shoulders on rural roads for cycling.

The level of service provided over the historical 15-year period translates to an average investment of \$41,962 per capita and a maximum D.C.-eligible amount of approximately \$1.77 billion for recovery over the forecast period.

The City also has 166 bridges, 117 culverts and four roundabouts throughout the City which equates to a level of investment of \$4,185 per capita and a D.C.-recoverable amount of approximately \$176.45 million over the forecast period. Furthermore, the City supplies 663 traffic signals, which provides an average level of investment of \$343 per capita, and a D.C.-recoverable amount of approximately \$14.48 million over the forecast period.

In total, the City is eligible to collect approximately \$1.96 billion for roads and related services.



With respect to future needs, the services related to a highway program was reviewed by Arcadis (see Appendix H). The total gross capital needs identified is \$1.74 billion. The capital projects include various works related to adding capacity to the highway system, including road improvements/expansions, intersection improvements, additional active transportation corridors and complete street additions and modifications. In addition to capital projects, existing principal and interest (discounted) has been included in the calculations at a total amount of \$20.48 million. Future financing costs have also been included at an assumed term of 15 years and a rate of 4.5%. The total interest costs included is \$22.39 million. Deductions of approximately \$629.72 million have been made for the share of the projects that benefit growth outside the forecast period. This includes a provisional post-period benefit deduction of \$160.00 million to account for the differences in population and employment that were utilized for the transportation review relative to the D.C. study. Additionally, approximately \$222.66 million has been deducted from the calculations to account for the portion of works that would be considered direct developer responsibility or costs that would be shared with the Ministry of Transportation. Furthermore, deductions totalling \$284.97 million have been made to account for the benefit to existing development. An adjustment in the amount of \$53.22 million has been made to account for the balance in the D.C. reserve fund, resulting in a net growth-related amount of \$591.87 million for inclusion in the D.C. calculations.

The residential/non-residential allocation for services related to a highway projects of 73%/27% is based on the growth in population to employment over the service target forecast period. A few projects are allocated between residential and non-residential growth in a different manner, including:

- 1) The existing debt for the Expressway was maintained from the past D.C. studies at 73.3% residential and 26.7% non-residential; and
- 2) Existing debt for previously completed growth-related road projects, as identified in the preceding D.C. study have been maintained at 14% residential and 86% non-residential in order to maintain consistency.



Table 5-12
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
	AEGD												
1	Airport Road - Terminal Access Road to East Cargo Road	2023-2031	0.32	2r-4u	3,789,000	-	-	3,789,000	1,516,000		2,273,000	1,659,290	613,710
2	Book Road - Southcote Road to Highway 6	2023-2031	1.05	2r-5u	10,581,000	-	-	10,581,000	1,587,000		8,994,000	6,565,620	2,428,380
3	Collector 1E - Collector 6N to Dickenson Road	2032-2041	0.67	3u	6,459,000	-	6,459,000	-	-		-	-	-
4	Arterial 1N - Collector 2N to Dickenson Road/Garth Street Extension	2023-2031	2.97	5u	34,249,000	-	-	34,249,000	-		34,249,000	25,001,770	9,247,230
5	Collector 2N - Collector 5W to Arterial 1N	2032-2041	0.42	3u	4,043,000	-	4,043,000	-	-		-	-	-
6	Collector 6N - Upper James Street to Collector 6E	2032-2041	0.95	4u	10,307,000	-	10,307,000	-	-		-	-	-
7	Collector 6N - Collector 6E to Garth Street	2032-2041	0.41	4u	4,524,000	-	4,524,000	-	-		-	-	-
8	Collector 6N - Garth Street to Glancaster Road	2032-2041	1.54	4u	16,775,000	-	16,775,000	-	-		-	-	-
9	Collector 6E - Collector 6N to Dickenson Road	2023-2031	0.64	3u	6,246,000	-	4,415,000	1,831,000	-		1,831,000	1,336,630	494,370
10	Collector 7N - Collector 5W to Collector 2W	2032-2041	1.19	3u	11,578,000	-	11,578,000	-	-		-	-	-
11	Collector 8W - Garner Road to Collector 5N	2032-2041	1.07	2u	8,302,000	-	8,302,000	-	-		-	-	-
12	Dickenson Road - Glancaster Road to Upper James Street	2023-2031	2.90	2r-5u	31,576,000	-	-	31,576,000	4,736,000		26,840,000	19,593,200	7,246,800
13	Dickenson Road Extension - Glancaster Road to Smith Road	2023-2031	0.83	5r	6,527,000	-	-	6,527,000	-		6,527,000	4,764,710	1,762,290
14	Book Road - Smith Road to Southcote Road	2023-2031	0.45	2r-5u	4,936,000	-	-	4,936,000	740,000		4,196,000	3,063,080	1,132,920
15	Garth Street Extension - Twenty Road to Collector 6N	2032-2041	0.81	5u	9,296,000	9,296,000	-	-	-		-	-	-
16	Garth Street Extension - Collector 6N to Dickenson Road	2032-2041	0.66	5u	7,562,000	7,562,000	-	-	-		-	-	-
17	Glancaster Road - Garner Road to Dickenson Road	2023-2031	2.67	2r-3u	23,144,000	-	-	23,144,000	3,472,000		19,672,000	14,360,560	5,311,440
18	Glancaster Road - Dickenson Road to Arterial 1N	2032-2041	0.39	3u-5u	4,606,000	4,606,000	-	-	-		-	-	-
19	Garner Road - Glancaster Road to Highway 6 South	2023-2031	3.12	2r-5u	31,492,000	-	-	31,492,000	4,724,000		26,768,000	19,540,640	7,227,360
20	Smith Road - Garner Road to Hydro Corridor	2023-2031	0.88	3u	8,504,000	-	-	8,504,000	-		8,504,000	6,207,920	2,296,080
21	Smith Road - Hydro Corridor to Book Road	2032-2041	1.01	3u	9,795,000	9,795,000	-	-	-		-	-	-



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
22	Smith Road - Book Road to Arterial 1N	2032-2041	0.63	3u	6,073,000	6,073,000	-	-	-	-	-	-	-
23	Southcote Road - Garner Road to Book Road	2023-2031	1.95	2r-5u	26,709,000	-	-	26,709,000	4,006,000	-	22,703,000	16,573,190	6,129,810
24	Upper James Street - Rymal Road to Highway 6 South	2032-2041	7.22	4r-6u	86,351,000	86,351,000	-	-	-	-	-	-	-
25	Glancaster Road - Arterial 1N to Airport Boundary	2032-2041	0.48	2u	3,513,000	3,513,000	-	-	-	-	-	-	-
26	Collector 9W - Garner Road to Collector 11N	2032-2041	0.33	2u	2,537,000	-	2,537,000	-	-	-	-	-	-
27	Smith Road - Arterial 1N to Airport Boundary	2023-2031	0.21	3u	2,047,000	-	1,447,000	600,000	-	-	600,000	438,000	162,000
28	Airport Road - East Cargo Road to Upper James Street	2023-2031	1.08	2r-3u	8,248,000	-	-	8,248,000	3,299,000	-	4,949,000	3,612,770	1,336,230
29	Book Road East - Collector 2W to Glancaster Road	2032-2041	0.85	2r-3u	6,510,000	-	6,510,000	-	-	-	-	-	-
30	Collector 10N - Garner Road to Smith Road	2023-2031	1.17	3u	11,313,000	-	7,996,000	3,317,000	-	-	3,317,000	2,421,410	895,590
31	Twenty Road - Glancaster Road to Upper James Street	2032-2041	2.90	2r-4u	32,145,000	-	32,145,000	-	-	-	-	-	-
32	Airport Road - Glancaster Road to Terminal Access Road	2023-2031	1.71	2r-2u	15,971,000	-	-	15,971,000	6,389,000	-	9,582,000	6,994,860	2,587,140
33	Collector 11N - Fiddler's Green Road to Collector 9W	2032-2041	0.35	2u	2,725,000	-	2,725,000	-	-	-	-	-	-
34	Collector 1W - Collector 10N to Garner Road	2032-2041	0.39	3u	3,762,000	-	3,762,000	-	-	-	-	-	-
Ancaster													
35	Garner Road - Highway 6 South to Wilson Street	2023-2031	4.86	2r-5u	49,311,000	-	-	49,311,000	7,397,000	-	41,914,000	30,597,220	11,316,780
36	Golf Links Road - McNiven Road to Kitty Murray Lane	2023-2031	0.84	2r-3u	9,148,000	-	-	9,148,000	1,372,000	-	7,776,000	5,676,480	2,099,520
37	Jerseyville Road - Wilson Street to Lloyminn Avenue	2032-2041	0.79	2r-3u	6,367,000	6,367,000	-	-	-	-	-	-	-
38	Shaver Road - Trustwood to Garner Road	2023-2031	0.74	2r-2i	6,304,000	-	-	6,304,000	946,000	-	5,358,000	3,911,340	1,446,660
39	McNiven Road - Rousseaux Street/Mohawk Road to Golf Links Road	2023-2031	0.62	2r-3u	4,895,000	-	-	4,895,000	3,916,000	-	979,000	714,670	264,330
40	Jerseyville Road - Lloyminn Avenue to Meadowbrook Drive	2032-2041	1.25	2r-2u	10,165,000	10,165,000	-	-	-	-	-	-	-
Fruitland-Winona													
41	Barton Street - Fruitland Road to Fifty Road	2023-2031	5.11	2r-5u	53,873,000	-	-	53,873,000	21,549,000	-	32,324,000	23,596,520	8,727,480
42	Fifty Road - Barton Street to South Service Road	2023-2031	0.55	2r-4u	5,178,000	-	-	5,178,000	777,000	-	4,401,000	3,212,730	1,188,270



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
43	Fifty Road - Barton Street to Highway 8	2032-2041	0.24	2r-3u	1,834,000	1,834,000	-	-	-	-	-	-	-
44	Gordon Dean Avenue - Barton Street to Highway 8	2023-2031	1.08	4u	11,552,000	-	-	11,552,000	-	-	11,552,000	8,432,960	3,119,040
45	Trinity Road/Highway 52 - Highway 403 Interchange to Cormorant Road	2023-2031	1.79	2r-4u	17,793,000	-	-	17,793,000	2,669,000	-	15,124,000	11,040,520	4,083,480
46	Highway 8 - Dewitt Road to Jones Road	2023-2031	1.73	2r-4u	16,332,000	-	-	16,332,000	6,533,000	-	9,799,000	7,153,270	2,645,730
47	Highway 8 - Jones Road to McNeilly Road	2032-2041	1.73	2r-4u	17,716,000	17,716,000	-	-	-	-	-	-	-
48	Highway 8 - McNeilly Road to Fifty Road	2032-2041	2.67	2r-3u	20,604,000	20,604,000	-	-	-	-	-	-	-
49	Collector B (Block 1) - Fruitland Road to Jones Road	2032-2041	0.89	2u	6,780,000	-	6,780,000	-	-	-	-	-	-
50	Collector C (Block 2) - Barton Street to Highway 8	2023-2031	0.74	2u	5,642,000	-	5,642,000	-	-	-	-	-	-
51	Collector D (Block 3) - McNeilly Road to Collector F	2032-2041	1.25	2u	9,537,000	-	9,537,000	-	-	-	-	-	-
52	Collector E (Block 3) - Barton Street to Highway 8	2023-2031	0.66	2u	5,060,000	-	5,060,000	-	-	-	-	-	-
53	Collector F (Block 3) - Barton Street to Collector D	2023-2031	0.22	2u	1,714,000	-	1,714,000	-	-	-	-	-	-
54	Fruitland Road - Highway 8 to Barton Street	2023-2031	1.05	2r-3u	8,937,000	-	-	8,937,000	1,341,000	-	7,596,000	5,545,080	2,050,920
55	Fruitland Road - Arvin Avenue to Barton Street	2023-2031	0.36	2u-5u	4,878,650	-	-	4,878,650	651,000	-	4,227,650	3,086,185	1,141,466
	MTO												
56	Highway 403 - Mohawk Road/Lincoln M. Alexander Parkway to Highway 6 south interchange	2023-2031	0.00	Truck Climbing Lane	4,879,000	-	2,439,000	2,440,000	366,000	-	2,074,000	1,514,020	559,980
	Red Hill Business Park												
57	Dartnall Road - Twenty Road to Dickenson Road	2023-2031	1.55	4u	17,002,000	-	-	17,002,000	-	-	17,002,000	12,411,460	4,590,540
58	Twenty Road East - Glover Road to Upper Redhill Valley Parkway	2023-2031	0.35	2i	3,186,000	-	-	3,186,000	-	-	3,186,000	2,325,780	860,220
59	Upper Red Hill Valley Parkway - Rymal Road to Twenty Road	2032-2041	1.22	4u	13,103,000	13,103,000	-	-	-	-	-	-	-
60	Dickenson Road - 350 meters west of Nebo to 330m west of Glover Road	2032-2041	1.20	2r-2i	11,285,000	11,285,000	-	-	-	-	-	-	-
61	Glover Road - Twenty Road to Rymal Road	2023-2031	1.31	2r-2i	11,485,000	-	-	11,485,000	1,723,000	-	9,762,000	7,126,260	2,635,740
62	Nebo Road - Twenty Road to Dickenson Road/Dartnall Road	2023-2031	0.74	2r-2i	6,302,000	-	-	6,302,000	945,000	-	5,357,000	3,910,610	1,446,390



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
63	Nebo Road - Rymal Road to Twenty Road East	2023-2031	1.30	2r-2i	11,086,000	-	-	11,086,000	1,663,000		9,423,000	6,878,790	2,544,210
South Mountain Area													
64	Rymal Road - Dartnall Road to Upper James Street	2023-2031	5.17	2r-5u	71,111,000	-	-	71,111,000	10,667,000		60,444,000	44,124,120	16,319,880
65	Upper Wellington Street - Limeridge Road to Stone Church Road	2023-2031	1.04	2r-3u	12,702,000	-	-	12,702,000	5,081,000		7,621,000	5,563,330	2,057,670
66	Garth Street - Rymal Road to Twenty Road West	2032-2041	1.41	2r-5u	15,963,000	15,963,000	-	-	-		-	-	-
67	Rymal Road - Glancaster Road to Upper Paradise Street	2023-2031	0.55	2r-5u	5,595,000	-	-	5,595,000	839,000		4,756,000	3,471,880	1,284,120
68	West 5th Street - Rymal Road to Stone Church Road	2023-2031	1.01	2r-3u	7,729,000	-	-	7,729,000	3,092,000		4,637,000	3,385,010	1,251,990
Stoney Creek													
69	Arvin Avenue - McNeilly Road to Lewis Road	2023-2031	0.85	2i	7,737,000	-	-	7,737,000	-		7,737,000	5,648,010	2,088,990
70	South Service Road - Lewis Road to Fifty Road	2023-2031	1.79	2r-4r	13,701,000	-	-	13,701,000	2,055,000		11,646,000	8,501,580	3,144,420
71	McNeilly Road - Highway 8 to Barton Street	2023-2031	0.90	2r-2u	7,157,000	-	2,000	7,155,000	1,073,000		6,082,000	4,439,860	1,642,140
72	Lewis Road - Highway 8 to Barton Street	2023-2031	0.49	2r-2u	3,908,000	-	1,000	3,907,000	586,000		3,321,000	2,424,330	896,670
73	Glover Road - Highway 8 to Barton Street	2032-2041	0.81	2r-2u	6,259,000	-	6,259,000	-	-		-	-	-
74	Jones Road - Highway 8 to Barton Street	2023-2031	0.92	2r-2u	7,293,000	-	2,000	7,291,000	1,094,000		6,197,000	4,523,810	1,673,190
75	Jones Road - Barton Street to South Service Road	2023-2031	0.92	2r-2i	8,036,000	-	-	8,036,000	4,018,000		4,018,000	2,933,140	1,084,860
76	Lewis Road - Barton Street to South Service Road	2023-2031	0.87	2r-2i	7,872,000	-	-	7,872,000	3,936,000		3,936,000	2,873,280	1,062,720
77	Millen Road - Barton Street to South Service Road	2023-2031	1.07	2r-2i	9,092,000	-	-	9,092,000	3,637,000		5,455,000	3,982,150	1,472,850
78	South Service Road - Millen Road to Gray Road	2032-2041	1.55	2r-2u	12,006,000	12,006,000	-	-	-		-	-	-
Twenty Road East													
79	Upper Ottawa Street - End to Twenty Road	2032-2041	0.95	4u	10,216,000	10,216,000	-	-	-		-	-	-
Waterdown													
80	North Waterdown Drive - Centre Road to Parkside Drive	2023-2031	1.28	3u	12,465,000	-	-	12,465,000	-		12,465,000	9,099,450	3,365,550
81	Parkside Drive - North Waterdown Drive to Avonsyde Boulevard	2023-2031	1.47	2r-3u	37,342,000	-	-	37,342,000	5,601,000		31,741,000	23,170,930	8,570,070



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
82	North Waterdown Drive - Clappison Avenue Extension to Mosaic Drive	2023-2031	0.59	3u	5,727,000	-	-	5,727,000	-	-	5,727,000	4,180,710	1,546,290
83	Clappison Avenue Extension - Parkside Drive to North Waterdown Drive	2023-2031	0.54	2u	4,133,000	-	-	4,133,000	-	-	4,133,000	3,017,090	1,115,910
84	Parkside Drive - Hollybush Drive to Highway 6	2023-2031	1.07	2r-4u	10,267,000	-	-	10,267,000	4,107,000	-	6,160,000	4,496,800	1,663,200
85	Parkside Drive - Main Street to North Waterdown Drive	2032-2041	0.59	2r-3u	4,533,000	4,533,000	-	-	-	-	-	-	-
	Other												
86	Binbrook Road - Fletcher Road to Binhaven Road	2023-2031	0.91	2r-2u	7,297,000	-	-	7,297,000	1,095,000	-	6,202,000	4,527,460	1,674,540
87	LRT corridor - Centennial Parkway/Main Street/King Street to McMaster University	2023-2031	13.77	Public Realm Improvements	9,990,000	-	-	9,990,000	1,499,000	-	8,491,000	6,198,430	2,292,570
88	Longwood Road - Aberdeen Avenue to Main Street	2023-2031	0.64	4u	8,193,000	-	-	8,193,000	4,096,000	-	4,097,000	2,990,810	1,106,190
89	Lincoln M. Alexander Parkway-Red Hill Valley Parkway - Highway 403 to Queen Elizabeth Way	2032-2041	17.30	4r-6u	135,000,000	135,000,000	-	-	-	-	-	-	-
	Local Share Deductions												
90	Provision for Local Share of Urbanization (Urbanization Rate)	2023-2031			(4,685,000)	-	-	(4,685,000)	-	-	(4,685,000)	(3,420,050)	(1,264,950)
	Major Structures												
91	Highway 5/6 Interchange	2023-2031	-	Structure	49,093,000	-	36,820,000	12,273,000	-	-	12,273,000	8,959,290	3,313,710
92	Mohawk Road - Highway 403 Interchange Ramp	2023-2031	-	Structure	4,042,000	-	-	4,042,000	2,021,000	-	2,021,000	1,475,330	545,670
93	Centennial Parkway at QEW	2023-2031	-	Interchange Reconfiguration	8,500,000	-	-	8,500,000	4,250,000	-	4,250,000	3,102,500	1,147,500
94	QEW Off-Ramps at Fifty Road	2023-2031	-	Signalization and Ramp Reconfiguration	4,000,000	-	-	4,000,000	600,000	-	3,400,000	2,482,000	918,000
95	Strathcona Pedestrian Bridge	2032-2041	-	Structure	31,500,000	31,500,000	-	-	-	-	-	-	-
96	Limeridge Mall Bridge	2023-2031	-	Structure	6,500,000	-	3,500,000	3,000,000	2,430,000	-	5,430,000	416,100	153,900
97	Henderson Lift Bridge	2023-2031	-	Structure	20,000,000	-	-	20,000,000	16,200,000	-	3,800,000	2,774,000	1,026,000
98	Hamilton Centre Bridge	2023-2031	-	Structure	9,500,000	-	-	9,500,000	7,695,000	-	1,805,000	1,317,650	487,350
99	Red Hill Bridge	2023-2031	-	Structure	19,000,000	-	-	19,000,000	15,390,000	-	3,610,000	2,635,300	974,700
100	Dundas Bridge	2023-2031	-	Structure	3,125,000	-	-	3,125,000	2,531,000	-	594,000	433,620	160,380
101	Grade Separation	2023-2031	-	Grade Separation	71,828,000	26,935,000	-	44,893,000	17,957,000	-	26,936,000	19,663,280	7,272,720



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
Programs													
102	New Signals (Pedestrian and/or Regular)	2024-2031	-	City-Wide Program	32,000,000	-	-	32,000,000	1,600,000		30,400,000	22,192,000	8,208,000
103	Development Road Urbanization	2024-2031	-	City-Wide Program	6,500,000	-	-	6,500,000	325,000		6,175,000	4,507,750	1,667,250
104	Street Lighting Enhancement Program	2024-2031	-	City-Wide Program	3,250,000	-	-	3,250,000	2,633,000		617,000	450,410	166,590
105	Pedestrian Crossovers	2024-2031	-	City-Wide Program	1,680,000	-	-	1,680,000	1,361,000		319,000	232,870	86,130
106	Advanced Traffic Management Systems	2024-2031	-	City-Wide Program	6,000,000	-	-	6,000,000	4,500,000		1,500,000	1,095,000	405,000
107	Transit Shelter Expansion Program	2024-2031	-	City-Wide Program	1,200,000	-	-	1,200,000	600,000		600,000	438,000	162,000
108	Bus Stop Shelter Rehabilitation Program	2024-2031	-	City-Wide Program	1,000,000	-	-	1,000,000	850,000		150,000	109,500	40,500
109	New Sidewalk Program	2024-2031	-	City-Wide Program	6,500,000	-	-	6,500,000	-		6,500,000	4,745,000	1,755,000
110	New Traffic Signals	2024-2031	-	City-Wide Program	12,000,000	-	-	12,000,000	600,000		11,400,000	8,322,000	3,078,000
111	New Traffic Signal - Drakes Drive at North Service Road	2024-2031	-	Traffic Signal	350,000	-	-	350,000	18,000		332,000	242,360	89,640
112	New Traffic Signal - Regional Road 20 at Westbrook Road	2024-2031	-	Traffic Signal	350,000	-	-	350,000	18,000		332,000	242,360	89,640
113	New Traffic Signal - Regional Road 56 at Kirk Road	2024-2031	-	Traffic Signal	350,000	-	-	350,000	18,000		332,000	242,360	89,640
114	New Traffic Signal - Fifty Road at North Service Road	2024-2031	-	Traffic Signal	350,000	-	-	350,000	18,000		332,000	242,360	89,640
115	New Traffic Signal - Fruitland Road at North Service Road	2024-2031	-	Traffic Signal	350,000	-	-	350,000	18,000		332,000	242,360	89,640
116	Unidentified intersection improvements (excluding Traffic Signals)	2024-2031	-	City-Wide Program	3,250,000	-	-	3,250,000	2,633,000		617,000	450,410	166,590
117	Annual Bike Parking at B/A Line Stops	2024-2031	-	City-Wide Program	46,000	-	-	46,000	37,000		9,000	6,570	2,430
118	Annual Enhanced Bike Parking at Express Bus/Rapid Transit Stops	2024-2031	-	City-Wide Program	275,000	-	-	275,000	223,000		52,000	37,960	14,040
119	Transportation Demand Management	2024-2031	-	City-Wide Program	4,400,000	-	-	4,400,000	3,564,000		836,000	610,280	225,720
120	Durable Pavement Markings – New Installations	2024-2031	-	City-Wide Program	1,600,000	-	-	1,600,000	240,000		1,360,000	992,800	367,200
121	Traffic Controller Cabinet Replacements (Capacity Related)	2024-2031	-	City-Wide Program	3,200,000	-	-	3,200,000	160,000		3,040,000	2,219,200	820,800
122	Traffic Signal Upgrades	2024-2031	-	City-Wide Program	2,400,000	-	-	2,400,000	120,000		2,280,000	1,664,400	615,600
123	Traffic Signal LED Replacement Program	2024-2031	-	City-Wide Program	1,760,000	-	-	1,760,000	1,760,000		-	-	-
124	Sidewalk Missing Link Program	2024-2031	-	City-Wide Program	2,000,000	-	-	2,000,000	1,620,000		380,000	277,400	102,600
125	Bike Parking	2024-2031	-	City-Wide Program	720,000	-	-	720,000	583,200		136,800	99,864	36,936
126	Micromobility	2024-2031	-	City-Wide Program	1,200,000	-	-	1,200,000	972,000		228,000	166,440	61,560
127	Miscellaneous Land Acquisitions	2024-2031	-	City-Wide Program	6,969,500	-	-	6,969,500	348,500		6,621,000	4,833,330	1,787,670
Active Transportation Projects													
128	Barton - Brockley to Fruitland	2023-2031	3.95	Multi-Use Trail	171,400	9,800	-	161,600	138,900		22,700	16,571	6,129



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
129	Barton - Red Hill Valley to Lake	2023-2031	1.61	Cycle track	326,200	18,600	-	307,600	264,200		43,400	31,682	11,718
130	Baseline/ Lockport - Winona Road to Niagara border	2023-2031	1.15	Bike Lane	32,100	1,800	-	30,300	26,000		4,300	3,139	1,161
131	Battlefield Park - Bruce Trail Link - Greenhill to Bruce Trail to Glover Mtn	2023-2031	0.75	Multi-Use Trail	742,900	42,300	-	700,600	601,800		98,800	72,124	26,676
132	Beach Bike Lane - under QEW	2023-2031	0.24	Bike Lane	9,800	600	-	9,200	7,900		1,300	949	351
133	Beach Boulevard - lift bridge to Woodward/Eastport	2023-2031	4.52	Bike Lane	131,000	7,500	-	123,500	106,100		17,400	12,702	4,698
134	Beddoe Drive Link	2023-2031	0.91	Multi-Use Trail	723,400	41,200	-	682,200	586,000		96,200	70,226	25,974
135	Binbrook Road - Regional Road 56 to Southbrook	2023-2031	0.28	Bike Lane	9,800	600	-	9,200	7,900		1,300	949	351
136	Binbrook Road - Trinity Church to Royal Winter/Binhaven	2023-2031	2.16	Multi-Use Trail	342,900	102,900	-	240,000	-		240,000	175,200	64,800
137	Birch/ Holton - Burlington St to Cannon/ King/ Delaware	2023-2031	1.40	Bike Lane	43,200	2,500	-	40,700	35,000		5,700	4,161	1,539
138	Burlington Street East Boulevard Trail - Ottawa to Parkdale to Glow	2023-2031	2.30	Multi-Use Trail	1,463,600	83,400	-	1,380,200	1,185,500		194,700	142,131	52,569
139	Burlington Street Link - Ferguson/ Dock Service Road to Sherman	2023-2031	1.88	Multi-Use Trail	145,000	8,300	-	136,700	117,400		19,300	14,089	5,211
140	Burlington/ Industrial - Sherman to Gage	2023-2031	0.86	Cycle track	138,000	7,900	-	130,100	111,800		18,300	13,359	4,941
141	Centennial Parkway - North Service to GO station/ Kenora	2023-2031	1.20	Multi-Use Trail	217,400	12,400	-	205,000	176,100		28,900	21,097	7,803
142	Centre - Concession 8 E to Concession 7 E	2023-2031	1.80	Paved Shoulder	489,300	124,800	-	364,500	73,400		291,100	212,503	78,597
143	Centre - Grindstone Creek to Concession 5 E	2023-2031	0.45	Paved Shoulder	122,700	31,300	-	91,400	18,400		73,000	53,290	19,710
144	Centre - Warren/ Carlisle Road to Progreston	2023-2031	0.78	Paved Shoulder	210,500	53,700	-	156,800	31,600		125,200	91,396	33,804
145	Charlton/ John - James to Ferguson & St Joseph's Dr	2023-2031	0.80	Bike Lane	117,100	6,700	-	110,400	94,800		15,600	11,388	4,212
146	Chedmac - Southridge to Rice	2023-2031	0.53	Bike Lane	32,100	1,800	-	30,300	26,000		4,300	3,139	1,161
147	Chedoke Rail Trail - Highway 403 to Dundurn	2023-2031	4.68	Multi-Use Trail	2,072,700	118,100	-	1,954,600	1,678,900		275,700	201,261	74,439
148	Cherry Beach Road Link - Millen to Dewitt	2023-2031	0.91	Multi-Use Trail	326,200	18,600	-	307,600	264,200		43,400	31,682	11,718
149	Christie-Tews - Christie C.A. to Harvest	2023-2031	2.75	Multi-Use Trail	1,566,700	399,500	-	1,167,200	235,000		932,200	680,506	251,694
150	Delawana - Kenora to Lake	2023-2031	1.02	Bike Lane	12,500	700	-	11,800	10,200		1,600	1,168	432
151	Devil's Punchbowl Link - Mountain Ave/ Lake Ave to Ridge Road/ Devil's	2023-2031	0.42	Multi-Use Trail	209,100	11,900	-	197,200	169,400		27,800	20,294	7,506
152	Dewitt - Barton to Dundee	2023-2031	0.90	Bike Lane	29,300	1,700	-	27,600	23,700		3,900	2,847	1,053
153	Dewitt - Dundee to Ridge	2023-2031	0.50	Bike Lane	1,045,400	59,600	-	985,800	846,800		139,000	101,470	37,530
154	Dundas St - Main to Cootes	2023-2031	0.68	Bike Lane	22,300	1,300	-	21,000	18,100		2,900	2,117	783
155	Dundas St in Waterdown - Highway 6 to Kearns (border)	2023-2031	6.03	Multi-Use Trail	179,800	10,200	-	169,600	145,600		24,000	17,520	6,480
156	East Townline - Mud to Highland	2023-2031	1.10	Bike Lane	18,100	4,600	-	13,500	2,700		10,800	7,884	2,916



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
157	Eastport Drive Lift Bridge Link	2023-2031	0.60	Multi-Use Trail	2,439,300	139,000	-	2,300,300	1,975,900		324,400	236,812	87,588
158	Edgewood - Safari to Highway 6	2023-2031	0.90	Bike Lane	15,300	4,600	-	10,700	-		10,700	7,811	2,889
159	Emperor - Brigade to Acadia	2023-2031	0.44	Bike Lane	22,300	1,300	-	21,000	18,100		2,900	2,117	783
160	Existing Pipeline Trail - Main to Strathearne	2023-2031	2.20	Multi-Use Trail	6,522,100	371,800	-	6,150,300	5,282,900		867,400	633,202	234,198
161	Fallsview - Sydenham to Rock Chapel Road	2023-2031	1.40	Multi-Use Trail	487,900	146,400	-	341,500	-		341,500	249,295	92,205
162	Fennell Avenue Boulevard Trail - Garth/ West 18th to West 5th	2023-2031	1.20	Multi-Use Trail	574,300	32,700	-	541,600	465,200		76,400	55,772	20,628
163	Ferguson - Young to Charlton	2023-2031	0.21	Bike Lane	2,790	160	-	2,630	2,260		370	270	100
164	Fiddler's Green - Amberly to Carluke	2023-2031	6.77	Bike Lane	29,300	6,200	9,000	14,100	-		14,100	10,293	3,807
165	Fiddler's Green - Jerseyville to Wilson	2023-2031	0.25	Bike Lane	8,400	500	-	7,900	6,800		1,100	803	297
166	First Rd W/Whitedeer/Terryberry & Picardy/ Highbury - Glover Mtn Road/ Ridgeview Dr to Rymal/ Bellagio	2023-2031	4.08	Bike Lane	66,900	3,800	-	63,100	54,200		8,900	6,497	2,403
167	Frances - Grays to Southshore	2023-2031	1.15	Bike Lane	217,400	12,400	-	205,000	176,100		28,900	21,097	7,803
168	Frid/Chatham - Longwood to Dundurn	2023-2031	1.00	Bike Lane	8,400	500	-	7,900	6,800		1,100	803	297
169	Golf Links/ Halson - Wilson to Southcote	2023-2031	1.19	Bike Lane	39,000	2,200	-	36,800	31,600		5,200	3,796	1,404
170	Governor's - Wainwright to Lynden	2023-2031	13.06	Paved Shoulder	908,800	272,600	-	636,200	-		636,200	464,426	171,774
171	Governor's - Ogilvie to Main	2023-2031	0.24	Bike Lane	59,900	3,400	-	56,500	48,500		8,000	5,840	2,160
172	Grays/ Gray - Confederation Park gate to King	2023-2031	3.00	Multi-Use Trail	163,100	-	163,100	-	-		-	-	-
173	Greenhill - Harrisford to Summercrest	2023-2031	1.94	Bike Lane	105,900	6,000	-	99,900	85,800		14,100	10,293	3,807
174	Greenhill - Summercrest to King	2023-2031	1.20	Bike Lane	65,500	3,700	-	61,800	53,100		8,700	6,351	2,349
175	Hamilton Drive Link	2023-2031	-	Multi-Use Trail	2,759,900	157,300	-	2,602,600	2,235,500		367,100	267,983	99,117
176	Hamilton in Waterdown - Centre/Main to Highway 5/Dundas	2023-2031	1.00	Multi-Use Trail	86,400	4,900	-	81,500	70,000		11,500	8,395	3,105
177	Hamilton-Brantford Rail Trail - Bridlewood Dr to Ewen	2023-2031	4.00	Multi-Use Trail	565,900	32,300	-	533,600	458,400		75,200	54,896	20,304
178	Hatt - Peel to John	2023-2031	0.65	Cycle track	40,400	2,300	-	38,100	32,700		5,400	3,942	1,458
179	Hollybush - Parkside to Dundas St	2023-2031	1.10	Bike Lane	22,300	1,300	-	21,000	18,100		2,900	2,117	783
180	Hydro Corridor - Barton to Lawrence	2023-2031	1.90	Multi-Use Trail	1,743,800	-	1,743,800	-	-		-	-	-
181	Hydro Corridor - Lawrence Avenue to Greenhill Avenue	2023-2031	1.15	Multi-Use Trail	599,400	34,200	-	565,200	485,500		79,700	58,181	21,519
182	Hydro Corridor - Wilson/Highway 52 to Regional Road 56	2023-2031	12.70	Multi-Use Trail	10,617,300	605,200	-	10,012,100	8,600,000		1,412,100	1,030,833	381,267
183	Iroquois Heights to Old Mohawk - Chedoke Rail Trail to Old Mohawk Road	2023-2031	0.85	Multi-Use Trail	443,300	25,300	-	418,000	359,000		59,000	43,070	15,930
184	Jones Road Link	2023-2031	2.67	Multi-Use Trail	309,400	25,600	224,000	59,800	-		59,800	43,654	16,146



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
185	Karst Escarpment Loop - Pritchard to Mount Albion/Winterberry	2023-2031	0.70	Multi-use Trail	543,600	31,000	-	512,600	440,300		72,300	52,779	19,521
186	Kenora/ Greenford/ Owen - Bancroft to King	2023-2031	2.60	Bike Lane	239,800	13,700	-	226,100	194,200		31,900	23,287	8,613
187	Kentley - Eugene to Kenora	2023-2031	0.40	Signed Bike Route	5,580	320	-	5,260	4,520		740	540	200
188	Kerns Road, Waterdown South Link	2023-2031	-	Multi-Use Trail	1,334,000	76,000	-	1,258,000	1,080,500		177,500	129,575	47,925
189	King in Dundas - Bond to Peel	2023-2031	0.80	Bike Lane	43,200	2,500	-	40,700	35,000		5,700	4,161	1,539
190	King over Red Hill Valley Parkway - Lawrence to Pottruff	2023-2031	0.60	Cycle track	37,600	2,100	-	35,500	30,500		5,000	3,650	1,350
191	Kitty Murray - Garner to Golf Links	2023-2031	2.26	Bike Lane	73,900	4,200	-	69,700	59,800		9,900	7,227	2,673
192	Limeridge - Birchview to Mtn Brow	2023-2031	1.98	Bike Lane	97,600	5,600	-	92,000	79,000		13,000	9,490	3,510
193	Limeridge - Garth/ Bonaventure to West 5th/ Hawkridge	2023-2031	1.37	Bike Lane	73,900	-	73,900	-	-		-	-	-
194	Limeridge Mall Hydro Corridor Trail - Mohawk Road to South of Rymal	2023-2031	3.80	Multi-Use Trail	1,957,000	111,600	-	1,845,400	1,585,200		260,200	189,946	70,254
195	Lovers Lane - Sulpher Springs to Jerseyville	2023-2031	0.90	Bike Lane	29,300	1,700	-	27,600	23,700		3,900	2,847	1,053
196	Marston - Paramount to Gordon Drummond	2023-2031	0.40	Bike Lane	19,500	1,100	-	18,400	15,800		2,600	1,898	702
197	Meadowbrook	2023-2031	1.00	Bike Lane	22,300	1,300	-	21,000	18,100		2,900	2,117	783
198	Meadowlands/ Raymond - Golf Links to Garner	2023-2031	2.10	Bike Lane	68,300	3,900	-	64,400	55,300		9,100	6,643	2,457
199	Millen - Shoreview to Millen/ Seaman	2023-2031	0.50	Bike Lane	43,200	1,300	21,000	20,900	18,400		2,500	1,825	675
200	Mohawk - Old Mohawk to Upper Paradise	2023-2031	1.83	Bike Lane	65,500	3,700	-	61,800	53,100		8,700	6,351	2,349
201	Montclair/ Central/ Graham/ Frederick	2023-2031	3.80	Signed Bike Route	26,500	1,500	-	25,000	21,500		3,500	2,555	945
202	Mountain Brow Boulevard Trail - Mohawk to Arbour	2023-2031	1.81	Multi-Use Trail	521,300	29,700	-	491,600	422,300		69,300	50,589	18,711
203	Mountain Brow East Path - Rendell to Oakcrest	2023-2031	0.81	Multi-Use Trail	2,174,500	123,900	-	2,050,600	1,761,300		289,300	211,189	78,111
204	Mountain Brow in Waterdown - Mill to Burke to King Road	2023-2031	1.20	Multi-Use Trail	920,000	52,400	-	867,600	745,200		122,400	89,352	33,048
205	Museum of Steam and Tech Link - Woodward to Red Hill Valley Trail	2023-2031	0.75	Multi-Use Trail	846,100	48,200	-	797,900	685,300		112,600	82,198	30,402
206	Nash - Bancroft to King	2023-2031	2.58	Cycle track	140,800	8,000	-	132,800	114,000		18,800	13,724	5,076
207	North Service Road - Bellavista to Baseline	2023-2031	0.98	Bike Lane	32,100	1,800	-	30,300	26,000		4,300	3,139	1,161
208	North Service Road - Dewitt to Lakeview	2023-2031	0.73	Bike Lane	22,300	1,300	-	21,000	18,100		2,900	2,117	783
209	Northlawn Avenue Link	2023-2031	1.10	Multi-Use Trail	557,600	142,900	81,000	333,700	-		333,700	243,601	90,099
210	Ogilvie/ Old Ancaster - Hat/ King to Hamilton-Brantford Rail Trail	2023-2031	0.80	Bike Lane	19,500	1,100	-	18,400	15,800		2,600	1,898	702
211	Old Guelph Road - Paterson to York Bike Lane	2023-2031	3.53	Paved Shoulder	1,264,300	322,400	-	941,900	189,600		752,300	549,179	203,121



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
212	Old Mud - Mt Albion to Winterberry	2023-2031	0.40	Bike Lane	12,500	700	-	11,800	10,200		1,600	1,168	432
213	Osler/ Main - Hatt/ King to Main + 125m of Main	2023-2031	2.00	Bike Lane	122,700	7,000	-	115,700	99,400		16,300	11,899	4,401
214	Ottawa Street South - Bruce Trail Link	2023-2031	0.39	Multi-Use Trail	956,200	54,500	-	901,700	774,500		127,200	92,856	34,344
215	Proposed Pipeline Trail - Museum of Steam and Technology to Mahoney	2023-2031	2.40	Multi-Use Trail	720,600	41,100	-	679,500	583,700		95,800	69,934	25,866
216	Queensdale - Upper Sherman to Upper Ottawa	2023-2031	1.56	Bike Lane	50,200	2,900	-	47,300	40,600		6,700	4,891	1,809
217	Queensdale - Upper Wellington to Skyland	2023-2031	0.39	Bike Lane	54,400	3,100	-	51,300	44,000		7,300	5,329	1,971
218	Queenston/ Highway 8 - King to Dewitt	2023-2031	1.37	Bike Lane	342,900	19,500	-	323,400	277,700		45,700	33,361	12,339
219	Red Hill Pedestrian Crossing - Eugene Street to Glengrove Avenue	2023-2031	-	Active Transportation Bridge	2,439,300	-	2,439,300	-	-		-	-	-
220	Regional Road 56 - Swayze Road to Cemetery	2023-2031	4.60	Multi-Use Trail	4,347,600	880,000	1,414,000	2,053,600	-		2,053,600	1,499,128	554,472
221	Regional Road 56 south of Kirk - Windwood to Kirk	2023-2031	1.14	Multi-Use Trail	1,087,200	277,200	-	810,000	163,100		646,900	472,237	174,663
222	Ridge Road - Devil Punch Bowl to Dewitt	2023-2031	2.91	Multi-Use Trail	1,087,200	62,000	-	1,025,200	880,700		144,500	105,485	39,015
223	Rousseaux/ Mohawk - Wilson to Filman	2023-2031	1.60	Bike Lane	313,600	17,900	-	295,700	254,000		41,700	30,441	11,259
224	Scenic - Chedoke Rail Trail to Upper Paradise	2023-2031	2.27	Bike Lane	37,600	2,100	-	35,500	30,500		5,000	3,650	1,350
225	Scenic/ Denlow - Upper Paradise to Garth	2023-2031	0.95	Bike Lane	15,300	900	-	14,400	12,400		2,000	1,460	540
226	Shaver - Wilson to Garner	2023-2031	0.52	Multi-Use Trail	16,700	1,000	-	15,700	13,500		2,200	1,606	594
227	Strachan Street Trail - James to Ferguson	2023-2031	0.66	Multi-Use Trail	469,700	26,800	-	442,900	380,500		62,400	45,552	16,848
228	Stuart Street Rail Link	2023-2031	0.94	Multi-Use Trail	354,100	20,200	-	333,900	286,800		47,100	34,383	12,717
229	Upper James - William Connell Park	2023-2031	0.38	Multi-Use Trail	313,600	17,900	-	295,700	254,000		41,700	30,441	11,259
230	Upper Sherman - Stone Church to Rymal to Miles	2023-2031	1.00	Bike Lane	249,500	14,200	-	235,300	202,100		33,200	24,236	8,964
231	Upper Wentworth - Concession to Fennell	2023-2031	1.03	Bike Lane	55,800	3,200	-	52,600	45,200		7,400	5,402	1,998
232	Upper Wentworth - Fennell to East 24th	2023-2031	1.03	Bike Lane	55,800	3,200	-	52,600	45,200		7,400	5,402	1,998
233	Valley Road - Rock Chapel to York Road	2023-2031	1.40	Paved Shoulder	434,900	110,900	-	324,000	65,200		258,800	188,924	69,876
234	Van Wagner's - Beach Bike Lane to Centennial Parkway	2023-2031	2.50	Bike Lane	108,700	6,200	-	102,500	88,100		14,400	10,512	3,888
235	Victoria - Young to Burlington	2023-2031	2.53	Bike Lane	55,800	3,200	-	52,600	45,200		7,400	5,402	1,998
236	Walnut Grove & Sanctuary Park - Walnut Grove/ Ogilvie to Highland Park Dr	2023-2031	0.40	Multi-Use Trail	510,200	29,100	-	481,100	413,200		67,900	49,567	18,333
237	Warrington/ South Service/ Lake - Centennial Parkway to Maple	2023-2031	3.86	Multi-Use Trail	108,700	6,200	-	102,500	88,100		14,400	10,512	3,888



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
238	White Church Road West Airport Link	2023-2031	-	Multi-Use Trail	938,100	-	938,100	-	-	-	-	-	-
239	White Church Road West Link	2023-2031	6.55	Multi-Use Trail	1,833,000	310,300	799,000	723,700	-	723,700	528,301	195,399	
240	Wilson in Ancaster - Rousseaux to Halson	2023-2031	0.85	Bike Lane	27,900	1,600	-	26,300	22,600	3,700	2,701	999	
241	Winona - Lido/ shore to Peachtree (Helena)	2023-2031	1.97	Multi-Use Trail	64,100	3,700	-	60,400	51,900	8,500	6,205	2,295	
242	York Road - Olympic to Valley Road	2023-2031	1.70	Paved Shoulder	609,100	155,300	-	453,800	91,400	362,400	264,552	97,848	
243	York Road & York Road at Old Guelph - Valley Road to Highway 6	2023-2031	2.50	Multi-Use Trail	1,997,500	599,200	-	1,398,300	-	1,398,300	1,020,759	377,541	
244	Acadia - Emperor to End	2023-2031	0.54	Signed Bike Route	21,700	1,200	-	20,500	17,600	2,900	2,117	783	
245	Airport Road - Butter to Miles	2023-2031	6.66	Bike Lane	933,000	-	933,000	-	-	-	-	-	
246	Alma - Sydenham to Queen	2023-2031	0.09	Bike Lane	12,300	700	-	11,600	10,000	1,600	1,168	432	
247	Aquasanta - Diczento to Ascoli	2023-2031	0.09	Signed Bike Route	3,600	200	-	3,400	2,900	500	365	135	
248	Baker - Breadalbane to Dundurn	2023-2031	0.14	Signed Bike Route	5,700	300	-	5,400	4,600	800	584	216	
249	Baseline - Lockport to North Service Road	2023-2031	2.66	Bike Lane	372,800	95,100	-	277,700	55,900	221,800	161,914	59,886	
250	Bedrock - First Rd W to 300m West of First Rd W	2023-2031	0.33	Bike Lane	45,800	2,600	-	43,200	37,100	6,100	4,453	1,647	
251	Bellagio - Fletcher to Terryberry	2023-2031	1.64	Bike Lane	229,400	13,100	-	216,300	185,800	30,500	22,265	8,235	
252	Binbrook Road - Fletcher to Binhaven	2023-2031	0.94	Multi-Use Trail	706,300	40,300	-	666,000	572,100	93,900	68,547	25,353	
253	Binbrook Road - Southbrook to Boundary	2023-2031	6.02	Paved Shoulder	1,805,400	460,400	-	1,345,000	270,800	1,074,200	784,166	290,034	
254	Book Road - Shaver to Fiddler's Green	2023-2031	2.50	Paved Shoulder	751,100	191,500	-	559,600	112,700	446,900	326,237	120,663	
255	Book Road - Fiddler's Green to Glancaster	2023-2031	3.42	Bike Lane	478,300	3,500	417,000	57,800	49,300	8,500	6,205	2,295	
256	Brantdale - West Fifth Street to Upper James	2023-2031	0.42	Signed Bike Route	16,900	1,000	-	15,900	13,700	2,200	1,606	594	
257	Bridlewood - Governor's to Highland Park Drive	2023-2031	0.59	Signed Bike Route	23,400	1,300	-	22,100	19,000	3,100	2,263	837	
258	Brigade - Upper Wellington to Emperor	2023-2031	0.82	Signed Bike Route	32,700	1,900	-	30,800	26,500	4,300	3,139	1,161	
259	Brock - Harvest Road to Highway 8	2023-2031	0.55	Paved Shoulder	164,400	41,900	-	122,500	24,700	97,800	71,394	26,406	
260	Brock - Safari to Freelon	2023-2031	4.50	Paved Shoulder	1,351,300	405,400	-	945,900	-	945,900	690,507	255,393	
261	Burke - Great Falls Blvd to McKnight Ave E	2023-2031	0.51	Bike Lane	71,700	4,100	-	67,600	58,100	9,500	6,935	2,565	
262	Butter - Glancaster to Fiddler's Green	2023-2031	2.21	Bike Lane	309,200	92,700	-	216,500	-	216,500	158,045	58,455	
263	Canada - Locke to Queen	2023-2031	0.41	Signed Bike Route	16,400	900	-	15,500	13,300	2,200	1,606	594	
264	Carlisle - Highway 6 to Wildberry Way	2023-2031	2.35	Paved Shoulder	704,800	211,400	-	493,400	-	493,400	360,182	133,218	
265	Carlisle Trail Loop - Centre Road to Border	2023-2031	3.35	Paved Shoulder	1,006,200	256,600	-	749,600	150,900	598,700	437,051	161,649	
266	Carlson Street - Highland Road to End	2023-2031	0.11	Signed Bike Route	4,400	300	-	4,100	3,600	500	365	135	
267	Carluke - Glancaster to Shaver	2023-2031	3.53	Paved Shoulder	1,058,200	269,800	-	788,400	158,700	629,700	459,681	170,019	
268	Central - Edgemont to Cochrane	2023-2031	1.54	Signed Bike Route	61,400	3,500	-	57,900	49,800	8,100	5,913	2,187	
269	Chatham Street - Dundurn to Frid	2023-2031	0.27	Bike Lane	37,400	2,100	-	35,300	30,300	5,000	3,650	1,350	
270	Concession 10 West - Foreman to Freelon	2023-2031	9.28	Signed Bike Route	371,300	111,400	-	259,900	-	259,900	189,727	70,173	
271	Concession 11 E - Centre Road to Freelon	2023-2031	2.65	Paved Shoulder	794,400	238,300	-	556,100	-	556,100	405,953	150,147	
272	Concession 4 West - Millgrove Sideroad to Highway 6	2023-2031	1.78	Paved Shoulder	532,600	135,800	-	396,800	79,900	316,900	231,337	85,563	



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
273	Concession 6 East - Highway 6 to Centre Road	2023-2031	2.79	Paved Shoulder	836,800	213,400	-	623,400	125,500		497,900	363,467	134,433
274	Concession 7 West - Boundary to Edgewood Road	2023-2031	18.80	Paved Shoulder	5,640,600	1,692,200	-	3,948,400	-		3,948,400	2,882,332	1,066,068
275	Concession 8 West - Middletown to Middletown	2023-2031	0.14	Signed Bike Route	5,800	1,500	-	4,300	900		3,400	2,482	918
276	Concession Street - Mountain Park Ave to Mountain Brow Boulevard	2023-2031	0.51	Bike Lane	71,100	4,100	-	67,000	57,600		9,400	6,862	2,538
277	Confederation Beach Park - Centennial Parkway to West of Gray	2023-2031	1.98	Signed Bike Route	79,300	4,500	-	74,800	64,200		10,600	7,738	2,862
278	Cormorant - Trinity to Shaver	2023-2031	2.46	Bike Lane	344,700	19,600	-	325,100	279,200		45,900	33,507	12,393
279	Culotta - Perrelli to Chudleigh	2023-2031	0.14	Signed Bike Route	5,600	300	-	5,300	4,500		800	584	216
280	Dicenzo Dr - Aquasanta Crescent to South Turn on Dicenzo Drive	2023-2031	0.36	Signed Bike Route	14,200	800	-	13,400	11,500		1,900	1,387	513
281	Dicenzo Dr - Upper Wellington to Trieste	2023-2031	0.20	Signed Bike Route	8,200	500	-	7,700	6,600		1,100	803	297
282	Dundas St E (Highway 5) - Highway 6 to Boundary	2023-2031	10.21	Bike Lane	1,428,800	81,400	-	1,347,400	1,157,400		190,000	138,700	51,300
283	Dundurn - Main to King	2023-2031	0.28	Bike Lane	39,100	2,200	-	36,900	31,700		5,200	3,796	1,404
284	Edgemont - Montclair to Central	2023-2031	0.18	Signed Bike Route	7,200	400	-	6,800	5,800		1,000	730	270
285	Eighth Road Link - Ridge to Boundary	2023-2031	5.51	Paved Shoulder	1,651,600	495,500	-	1,156,100	-		1,156,100	843,953	312,147
286	Eleventh - Mud to Green Mountain Road	2023-2031	1.11	Signed Bike Route	44,400	13,300	-	31,100	-		31,100	22,703	8,397
287	Emerson - Whitney to Main	2023-2031	0.65	Bike Lane	91,300	5,200	-	86,100	74,000		12,100	8,833	3,267
288	Empress - Upper James to East Sixth Street	2023-2031	0.71	Signed Bike Route	28,600	1,600	-	27,000	23,100		3,900	2,847	1,053
289	Eugene - Pottruff to Nugent	2023-2031	0.18	Signed Bike Route	7,000	400	-	6,600	5,700		900	657	243
290	Fallsview - Harvest Road to Sydenham	2023-2031	2.47	Signed Bike Route	98,800	29,600	-	69,200	-		69,200	50,516	18,684
291	Ferguson - Dock Service Road to Burlington	2023-2031	0.28	Signed Bike Route	11,100	600	-	10,500	9,000		1,500	1,095	405
292	Ferguson - Charlton to North of Young	2023-2031	0.26	Bike Lane	36,600	2,100	-	34,500	29,600		4,900	3,577	1,323
293	Field - Jerseyville Rd W to Governor's Rd	2023-2031	3.88	Paved Shoulder	1,162,700	348,800	-	813,900	-		813,900	594,147	219,753
294	Fifty - Ridge to Cokers	2023-2031	1.51	Paved Shoulder	452,400	115,400	-	337,000	67,900		269,100	196,443	72,657
295	Fifty - Coke to North Service Road	2023-2031	2.24	Bike Lane	314,000	11,600	111,000	191,400	164,600		26,800	19,564	7,236
296	Filman - Wilson St E to End	2023-2031	0.40	Signed Bike Route	16,000	4,800	-	11,200	-		11,200	8,176	3,024
297	First Road East - Highland Road to Ridge Road	2023-2031	3.83	Paved Shoulder	1,149,000	-	1,149,000	-	-		-	-	-
298	First Road West - North End to Highbury Drive	2023-2031	0.10	Bike Lane	14,200	800	-	13,400	11,500		1,900	1,387	513
299	Flamborough Puslinch Tlin - Maddaugh Road to Centre	2023-2031	1.81	Paved Shoulder	542,600	162,800	-	379,800	-		379,800	277,254	102,546
300	Fleming - North End to York	2023-2031	0.26	Signed Bike Route	10,300	3,100	-	7,200	-		7,200	5,256	1,944



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
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									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
301	Fletcher - Rymal to Pinehill	2023-2031	0.32	Paved Shoulder	96,800	5,500	-	91,300	78,400		12,900	9,417	3,483
302	Foreman - Boundary to Regional Road 97	2023-2031	3.08	Signed Bike Route	123,300	37,000	-	86,300	-		86,300	62,999	23,301
303	Franklin - Parkview to Longwood	2023-2031	0.20	Signed Bike Route	8,000	500	-	7,500	6,500		1,000	730	270
304	Frederick - Barton to Roxborough	2023-2031	0.62	Signed Bike Route	24,900	1,400	-	23,500	20,100		3,400	2,482	918
305	Freelton - Concession 11 E to South of Highway 6	2023-2031	0.38	Bike Lane	53,500	16,100	-	37,400	-		37,400	27,302	10,098
306	Fruitland - Highway 8 to North Service Road	2023-2031	2.42	Bike Lane	339,500	8,100	197,000	134,400	115,500		18,900	13,797	5,103
307	Galbraith - Lake Avenue to Galbraith Three-way Intersection	2023-2031	0.52	Signed Bike Route	20,800	1,200	-	19,600	16,900		2,700	1,971	729
308	Garth - Denlow to Fennell	2023-2031	0.14	Paved Multi-Use Recreational Trail	106,700	6,100	-	100,600	86,400		14,200	10,366	3,834
309	Garth St Extension - 20 Rd W to Dickenson Rd W	2023-2031	1.38	Bike Lane	192,800	9,100	33,000	150,700	129,800		20,900	15,257	5,643
310	Glancaster - Carluke to Airport	2023-2031	1.45	Bike Lane	202,900	51,700	-	151,200	30,400		120,800	88,184	32,616
311	Glenfern - Kent to Kent	2023-2031	0.04	Signed Bike Route	1,400	100	-	1,300	1,100		200	146	54
312	Glover - Watercrest to End	2023-2031	0.11	Bike Lane	14,800	800	-	14,000	12,000		2,000	1,460	540
313	Glow - Parkdale to East of Tate	2023-2031	0.63	Signed Bike Route	25,300	1,400	-	23,900	20,500		3,400	2,482	918
314	Golf Club - Woodburn to Westbrook	2023-2031	2.07	Signed Bike Route	82,700	24,800	-	57,900	-		57,900	42,267	15,633
315	Golf Links - Stone Church to Kitty Murray	2023-2031	1.30	Bike Lane	182,300	10,400	-	171,900	147,700		24,200	17,666	6,534
316	Gordon Drummond - Marston to Nordale	2023-2031	0.04	Signed Bike Route	1,700	100	-	1,600	1,400		200	146	54
317	Governors - Binkley to Lynden	2023-2031	10.00	Paved Shoulder	3,001,100	765,300	-	2,235,800	450,200		1,785,600	1,303,488	482,112
318	Graham Ave North - Central to Roxborough	2023-2031	0.78	Signed Bike Route	31,200	1,800	-	29,400	25,200		4,200	3,066	1,134
319	Greenford - Owen Pl to Cromwell	2023-2031	0.21	Signed Bike Route	8,200	500	-	7,700	6,600		1,100	803	297
320	Greenford - Cromwell to Kenora	2023-2031	0.36	Bike Lane	49,900	2,800	-	47,100	40,400		6,700	4,891	1,809
321	Guise - Leander to Catharine	2023-2031	0.54	Bike Lane	76,100	4,300	-	71,800	61,700		10,100	7,373	2,727
322	Gunby - Sadielou to Painter	2023-2031	0.50	Bike Lane	69,500	4,000	-	65,500	56,300		9,200	6,716	2,484
323	Hamilton - Nisbet to Dundas St E	2023-2031	1.21	Bike Lane	169,200	9,600	-	159,600	137,100		22,500	16,425	6,075
324	Harrison - Kirk to Binbrook Conservation Area Road	2023-2031	1.30	Paved Multi-Use Recreational Trail	975,100	248,700	-	726,400	146,300		580,100	423,473	156,627
325	Harvest - Sydenham to Brock	2023-2031	3.40	Paved Shoulder	1,020,100	260,100	-	760,000	153,000		607,000	443,110	163,890
326	Highbury Drive - Highland Road W to Whitedeer	2023-2031	1.04	Bike Lane	145,400	8,300	-	137,100	117,800		19,300	14,089	5,211
327	Highland Rd E - Upper Red Hill Valley Pkwy to Winterberry	2023-2031	0.94	Bike Lane	131,500	7,500	-	124,000	106,500		17,500	12,775	4,725
328	Highland Rd E - Upper Centennial Pkwy to E Town Line	2023-2031	10.17	Paved Shoulder	3,051,100	-	3,051,100	-	-		-	-	-
329	Highway 5 West - Dundas St E to Sydenham	2023-2031	3.02	Paved Shoulder	905,700	271,700	-	634,000	-		634,000	462,820	171,180
330	Highway 8 (Flam) - Boundary to Brock	2023-2031	22.30	Paved Shoulder	6,691,300	2,007,400	-	4,683,900	-		4,683,900	3,419,247	1,264,653



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
331	Highway 8 (Sc) - King St E to Dewitt	2023-2031	1.38	Bike Lane	193,400	11,000	-	182,400	156,700		25,700	18,761	6,939
332	Highway 8 (Sc) - Fifty to Boundary	2023-2031	0.81	Bike Lane	113,400	34,000	-	79,400	-		79,400	57,962	21,438
333	Holton - King to Delaware	2023-2031	0.57	Signed Bike Route	22,800	1,300	-	21,500	18,500		3,000	2,190	810
334	Holton - King to Wilson	2023-2031	0.18	Bike Lane	25,700	1,500	-	24,200	20,800		3,400	2,482	918
335	Homestead Dr Path - Upper James to 1200m East of Upper James	2023-2031	1.24	Bike Lane	173,400	9,900	-	163,500	140,400		23,100	16,863	6,237
336	Hughson - Cannon to Hunter	2023-2031	0.81	Bike Lane	113,900	6,500	-	107,400	92,300		15,100	11,023	4,077
337	Hunt - Christ the King Elementary School Road to Breadalbane	2023-2031	0.57	Signed Bike Route	22,800	1,300	-	21,500	18,500		3,000	2,190	810
338	Hunter - Locke to Queen	2023-2031	0.41	Signed Bike Route	16,400	900	-	15,500	13,300		2,200	1,606	594
339	Inverness - Tanner to East 8th	2023-2031	0.77	Bike Lane	107,800	6,100	-	101,700	87,300		14,400	10,512	3,888
340	Jackson St W - End to Locke St S	2023-2031	0.38	Signed Bike Route	15,200	900	-	14,300	12,300		2,000	1,460	540
341	Jerseyville Rd W - Boundary to East of Paddy Greens	2023-2031	18.45	Paved Shoulder	5,534,000	1,411,200	-	4,122,800	830,100		3,292,700	2,403,671	889,029
342	Jerseyville Rd W - West of Shaver to Wilson	2023-2031	3.49	Paved Shoulder	1,046,200	23,300	637,000	385,900	331,300		54,600	39,858	14,742
343	John - Guise to Burlington	2023-2031	0.29	Bike Lane	41,200	2,400	-	38,800	33,400		5,400	3,942	1,458
344	John - Charlton Ave E to St Joseph's	2023-2031	0.16	Bike Lane	21,800	1,200	-	20,600	17,700		2,900	2,117	783
345	Kay Drage Park Link - Hunt to End	2023-2031	0.55	Signed Bike Route	21,900	1,200	-	20,700	17,700		3,000	2,190	810
346	Kay Drage Park Link - Macklin to End	2023-2031	0.14	Signed Bike Route	5,700	300	-	5,400	4,600		800	584	216
347	King William - James St N to Catharine St N	2023-2031	0.34	Signed Bike Route	13,500	800	-	12,700	10,900		1,800	1,314	486
348	Kirk - Harrison to Highway 56	2023-2031	0.98	Paved Multi-Use Recreational Trail	731,500	186,500	-	545,000	109,700		435,300	317,769	117,531
349	Kirkwall - Regional Road 97 to South of Concession 8 W	2023-2031	2.51	Signed Bike Route	100,300	30,100	-	70,200	-		70,200	51,246	18,954
350	Kirkwall - South of Concession 8 W to Woodhill Rd	2023-2031	5.78	Paved Shoulder	1,735,200	520,600	-	1,214,600	-		1,214,600	886,658	327,942
351	Lafarge 2000 (Middletown Rd) - Concession 6 W to Highway 8	2023-2031	7.91	Signed Bike Route	316,600	80,700	-	235,900	47,500		188,400	137,532	50,868
352	Lafarge 2000 (Middletown Rd/Binkley Rd) - Highway 8 to Mineral Springs Rd	2023-2031	3.57	Paved Shoulder	1,071,000	321,300	-	749,700	-		749,700	547,281	202,419
353	Lamoreaux - Dundurn t N to Strathcona Ave N	2023-2031	0.23	Signed Bike Route	9,100	500	-	8,600	7,400		1,200	876	324
354	Leland - Main to North of Ward	2023-2031	0.29	Signed Bike Route	11,800	700	-	11,100	9,600		1,500	1,095	405
355	Lido - Riviera to Winona	2023-2031	0.39	Signed Bike Route	15,600	900	-	14,700	12,600		2,100	1,533	567
356	Livingstone - Sydenham to Queen	2023-2031	0.11	Bike Lane	15,800	900	-	14,900	12,800		2,100	1,533	567
357	Locke - York Blvd to Barton	2023-2031	0.26	Bike Lane	35,800	2,000	-	33,800	29,000		4,800	3,504	1,296
358	Longwood - Main St W to Frid St	2023-2031	0.40	Bike Lane	55,700	3,200	-	52,500	45,100		7,400	5,402	1,998
359	Lormont - First Rd W to Picardy	2023-2031	0.54	Bike Lane	75,500	4,300	-	71,200	61,200		10,000	7,300	2,700
360	Macklin St S - King St W to Main St W	2023-2031	0.24	Signed Bike Route	9,500	500	-	9,000	7,700		1,300	949	351



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
361	Maddaugh Road - Gore to Highway 6	2023-2031	0.95	Signed Bike Route	37,800	11,400	-	26,400	-		26,400	19,272	7,128
362	Maddaugh Road - Highway 6 to Flamborough Puslinch Tln	2023-2031	1.11	Paved Shoulder	334,400	100,300	-	234,100	-		234,100	170,893	63,207
363	Maggie Johnson - Tanglewood to Highway 56	2023-2031	0.23	Bike Lane	32,100	1,800	-	30,300	26,000		4,300	3,139	1,161
364	Main - Osler to South of Osler	2023-2031	1.52	Bike Lane	212,300	12,100	-	200,200	172,000		28,200	20,586	7,614
365	Main - Osler to York	2023-2031	0.25	Bike Lane	34,400	2,000	-	32,400	27,900		4,500	3,285	1,215
366	Main St W - Frid to Dundurn St S	2023-2031	0.27	Bike Lane	37,200	2,100	-	35,100	30,100		5,000	3,650	1,350
367	Malton - Christine to Upper James	2023-2031	0.34	Signed Bike Route	13,700	800	-	12,900	11,100		1,800	1,314	486
368	Maple/Mountain Ave Extension - Lake Ave S to End	2023-2031	0.40	Signed Bike Route	15,800	900	-	14,900	12,800		2,100	1,533	567
369	Marion - Dromore to King St W	2023-2031	0.34	Signed Bike Route	13,600	800	-	12,800	11,000		1,800	1,314	486
370	Market - Hatt to MacNab	2023-2031	0.09	Bike Lane	13,000	700	-	12,300	10,500		1,800	1,314	486
371	Market - MacNab to Creighton	2023-2031	0.09	Signed Bike Route	3,600	200	-	3,400	2,900		500	365	135
372	Mayfair - Creighton to Tally Ho	2023-2031	0.31	Signed Bike Route	12,400	700	-	11,700	10,000		1,700	1,241	459
373	McNeilly/8th Road E - Highway 8 to Ridge Road	2023-2031	1.55	Signed Bike Route	62,100	18,600	-	43,500	-		43,500	31,755	11,745
374	Middleton Rd - North of Regional Road 97 to Regional Road 97	2023-2031	0.44	Signed Bike Route	17,700	4,500	-	13,200	2,700		10,500	7,665	2,835
375	Middleton Rd - North of Concession 8 W to Safari	2023-2031	2.32	Signed Bike Route	92,600	23,600	-	69,000	13,900		55,100	40,223	14,877
376	Miles - Rymal Rd E to Boundary	2023-2031	10.88	Paved Shoulder	3,265,300	-	3,265,300	-	-		-	-	-
377	Mill - Dundas St E to Boundary	2023-2031	2.80	Bike Lane	392,700	22,400	-	370,300	318,100		52,200	38,106	14,094
378	Millgrove Sr - Highway 6 N to Highway 5 W	2023-2031	0.71	Paved Shoulder	214,000	54,600	-	159,400	32,100		127,300	92,929	34,371
379	Mineral Springs - Binkley to Sulphur Springs	2023-2031	1.27	Paved Shoulder	381,800	97,400	-	284,400	57,300		227,100	165,783	61,317
380	Mount Albion - Lawrence to South of Glen Castle	2023-2031	1.39	Bike Lane	194,300	11,100	-	183,200	157,400		25,800	18,834	6,966
381	Mountain Brow - Concession Street to Rendell	2023-2031	0.27	Bike Lane	37,700	2,100	-	35,600	30,500		5,100	3,723	1,377
382	Mountain Brow Blvd - Mohawk Rd E to Mud	2023-2031	2.14	Signed Bike Route	85,500	4,900	-	80,600	69,300		11,300	8,249	3,051
383	Mud - Eleventh Road E to Boundary	2023-2031	0.89	Paved Shoulder	266,600	80,000	-	186,600	-		186,600	136,218	50,382
384	Napier - Queen St N to Bay St N	2023-2031	0.55	Signed Bike Route	22,100	1,300	-	20,800	17,900		2,900	2,117	783
385	Nisbet - Centre Road to Wimberly	2023-2031	0.97	Bike Lane	136,400	7,800	-	128,600	110,500		18,100	13,213	4,887
386	Nordale - Gordon Drummond to	2023-2031	0.39	Signed Bike Route	15,400	900	-	14,500	12,500		2,000	1,460	540
387	North Service Road Link (Millen) - North Service Road to Shoreview	2023-2031	0.19	Bike Lane	26,900	1,500	-	25,400	21,800		3,600	2,628	972
388	Nugent - Kentley to Eugene	2023-2031	0.13	Signed Bike Route	5,200	300	-	4,900	4,200		700	511	189
389	Old Mud - Paramount to Cedarville	2023-2031	0.39	Bike Lane	54,500	3,100	-	51,400	44,100		7,300	5,329	1,971
390	Ottawa - Main to Montclair	2023-2031	0.49	Bike Lane	68,000	3,900	-	64,100	55,100		9,000	6,570	2,430
391	Owen Pl - King St E to Greenford	2023-2031	0.55	Signed Bike Route	22,000	1,300	-	20,700	17,900		2,800	2,044	756



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
392	Parkdale Ave - Nikola Tesla Blvd to Glow	2023-2031	0.18	Paved Multi-Use Recreational Trail	138,300	7,900	-	130,400	112,100		18,300	13,359	4,941
393	Pearl - Hunter to Tuckett	2023-2031	0.23	Signed Bike Route	9,400	500	-	8,900	7,600		1,300	949	351
394	Peel St S - King St W to Hatt	2023-2031	0.14	Signed Bike Route	5,800	300	-	5,500	4,700		800	584	216
395	Perrelli - Culotta to Dundas St E	2023-2031	0.11	Signed Bike Route	4,300	200	-	4,100	3,500		600	438	162
396	Picardy - Highland Rd W to Lormont	2023-2031	0.50	Bike Lane	70,700	4,000	-	66,700	57,300		9,400	6,862	2,538
397	Picton - Bay St n to Hughson St N	2023-2031	0.39	Signed Bike Route	15,600	900	-	14,700	12,600		2,100	1,533	567
398	Picton - John St N to Ferguson Ave N	2023-2031	0.42	Signed Bike Route	16,800	1,000	-	15,800	13,600		2,200	1,606	594
399	Queen - Alma to Livingstone	2023-2031	0.16	Bike Lane	21,900	1,200	-	20,700	17,700		3,000	2,190	810
400	Queen St S - Hunter to Canada	2023-2031	0.08	Signed Bike Route	3,100	200	-	2,900	2,500		400	292	108
401	Queensdale - Skyland to Upper Wellington	2023-2031	0.40	Signed Bike Route	15,900	900	-	15,000	12,800		2,200	1,606	594
402	Raymond - Stonehenge to Garner	2023-2031	1.31	Bike Lane	184,000	10,500	-	173,500	149,000		24,500	17,885	6,615
403	Redmond - Rushdale to Stone Church Rd E	2023-2031	0.20	Signed Bike Route	8,000	500	-	7,500	6,500		1,000	730	270
404	Regional Road 20 (Highway 20) - Tapleystown to Woodburn	2023-2031	0.28	Signed Bike Route	11,400	2,900	-	8,500	1,700		6,800	4,964	1,836
405	Regional Road 97 - Kirkwall to Foreman	2023-2031	0.16	Paved Shoulder	47,100	14,100	-	33,000	-		33,000	24,090	8,910
406	Ridge - Dewitt to Boundary	2023-2031	7.05	Paved Shoulder	2,116,200	539,600	-	1,576,600	317,400		1,259,200	919,216	339,984
407	Riley - West of Chudleigh to Braeheid	2023-2031	0.21	Signed Bike Route	8,200	500	-	7,700	6,700		1,000	730	270
408	Riviera Ridge - Bellavista to Lido	2023-2031	0.12	Undefined	58,400	3,300	-	55,100	47,300		7,800	5,694	2,106
409	Rock Chapel - Highway 5 W to Service Road East of Sydenham	2023-2031	1.91	Signed Bike Route	76,400	19,500	-	56,900	11,500		45,400	33,142	12,258
410	Roxborough - Frederick to Graham Ave N	2023-2031	0.05	Signed Bike Route	2,000	100	-	1,900	1,600		300	219	81
411	Rushdale - Southpark to Redmond	2023-2031	0.08	Signed Bike Route	3,100	200	-	2,900	2,600		300	219	81
412	Rymal - Upper Paradise to Spadara	2023-2031	0.44	Bike Lane	61,800	3,500	-	58,300	50,000		8,300	6,059	2,241
413	Rymal - Hazelton to West Fifth St	2023-2031	0.77	Bike Lane	108,500	6,200	-	102,300	87,800		14,500	10,585	3,915
414	Sadielou - Hollybush to End	2023-2031	0.42	Bike Lane	59,400	3,400	-	56,000	48,100		7,900	5,767	2,133
415	Santorium - Scenic to Redfern	2023-2031	0.11	Bike Lane	15,400	900	-	14,500	12,400		2,100	1,533	567
416	Scenic - Angela to West of Chateau	2023-2031	1.84	Bike Lane	257,000	14,600	-	242,400	208,200		34,200	24,966	9,234
417	Scenic - Colquhoun to Garth (via Scenic and Denlow)	2023-2031	0.44	Bike Lane	61,300	3,500	-	57,800	49,600		8,200	5,986	2,214
418	Second St N - King St W to North of Brandow	2023-2031	0.14	Signed Bike Route	5,700	300	-	5,400	4,600		800	584	216
419	Shaver - Wilson to Jerseyville Rd W	2023-2031	1.47	Bike Lane	205,200	11,700	-	193,500	166,200		27,300	19,929	7,371
420	Shaver - Garner to Carluke	2023-2031	6.11	Paved Shoulder	1,832,600	410,800	222,000	1,199,800	241,600		958,200	699,486	258,714
421	Sheppard - Sovereign to Fleming	2023-2031	0.10	Signed Bike Route	4,000	1,200	-	2,800	-		2,800	2,044	756
422	Sherman - Delaware to CP Rail Line	2023-2031	0.33	Signed Bike Route	13,200	800	-	12,400	10,700		1,700	1,241	459
423	Skinner - Dundas St E to East of McKnight Ave E	2023-2031	1.39	Bike Lane	195,100	11,100	-	184,000	158,000		26,000	18,980	7,020



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
424	South Bend - W Second St to Terrace	2023-2031	0.42	Signed Bike Route	16,600	900	-	15,700	13,500		2,200	1,606	594
425	South St W - Oglivie to Osler	2023-2031	0.70	Signed Bike Route	28,100	1,600	-	26,500	22,800		3,700	2,701	999
426	Southcote - Garner to Airport	2023-2031	2.80	Bike Lane	392,400	20,600	30,000	341,800	293,300		48,500	35,405	13,095
427	Southpark - Rushdale Park Trail to Rushdale Dr	2023-2031	0.25	Signed Bike Route	10,000	600	-	9,400	8,100		1,300	949	351
428	St Joseph's - John St S to End	2023-2031	0.29	Signed Bike Route	11,500	700	-	10,800	9,300		1,500	1,095	405
429	Sulphur Springs - Lover's to Mineral Springs Rd	2023-2031	1.47	Paved Shoulder	439,800	112,200	-	327,600	66,000		261,600	190,968	70,632
430	Sulphur Springs - Lover's to Wilson St E	2023-2031	1.05	Signed Bike Route	42,100	2,400	-	39,700	34,100		5,600	4,088	1,512
431	Sunnyridge - Wilson St W to Jerseyville Rd W	2023-2031	2.83	Paved Shoulder	850,200	255,100	-	595,100	-		595,100	434,423	160,677
432	Sydenham/Queen/Livingstone/Alma - Hatt to Romar Dr	2023-2031	1.86	Bike Lane	261,000	66,600	-	194,400	39,200		155,200	113,296	41,904
433	Talbot - Melvin to Barton St E	2023-2031	0.19	Signed Bike Route	7,600	400	-	7,200	6,200		1,000	730	270
434	Tally Ho - Mayfair to Overfield	2023-2031	0.22	Signed Bike Route	8,600	500	-	8,100	7,000		1,100	803	297
435	Tanner - Iverness to End	2023-2031	0.05	Signed Bike Route	1,900	100	-	1,800	1,600		200	146	54
436	Tapleytown Rd - Highway 20 E to Highland Rd E	2023-2031	0.83	Signed Bike Route	33,300	8,500	-	24,800	5,000		19,800	14,454	5,346
437	Terryberry - Private Rd to Rymal Rd	2023-2031	0.20	Bike Lane	28,000	1,600	-	26,400	22,700		3,700	2,701	999
438	Tradewind - Wilson St W to Cormorant	2023-2031	0.70	Bike Lane	98,600	5,600	-	93,000	79,900		13,100	9,563	3,537
439	Twenty Rd - Southcote to West of Nebo	2023-2031	9.36	Bike Lane	1,310,600	-	1,310,600	-	-		-	-	-
440	Upper Ottawa - Killbride to Mountain Brow Boulevard	2023-2031	5.22	Bike Lane	731,400	41,700	-	689,700	592,500		97,200	70,956	26,244
441	Upper Sherman - Macassa to Limeridge Rd E	2023-2031	1.65	Bike Lane	231,600	13,200	-	218,400	187,600		30,800	22,484	8,316
442	Upper Wellington - S Bend Rd E to Stone Church Rd E	2023-2031	2.40	Bike Lane	336,200	10,900	145,000	180,300	154,700		25,600	18,688	6,912
443	W 18th St - Bendamere to End	2023-2031	0.17	Signed Bike Route	6,700	400	-	6,300	5,500		800	584	216
444	W 5th St - Brantdale to Governors Blvd	2023-2031	0.62	Multi-Use Trail	466,000	26,600	-	439,400	377,400		62,000	45,260	16,740
445	W 5th St - Governors Blvd to Marlowe	2023-2031	1.13	Bike Lane	158,200	9,000	-	149,200	128,100		21,100	15,403	5,697
446	Westbrook - End to Golf Club Rd	2023-2031	0.86	Signed Bike Route	34,400	10,300	-	24,100	-		24,100	17,593	6,507
447	White Church Rd E - Trinity Church Rd to Upper James	2023-2031	6.57	Paved Shoulder	1,972,100	-	1,972,100	-	-		-	-	-
448	Whitedeer - Highbury to Rymal Rd E	2023-2031	0.35	Bike Lane	48,600	2,800	-	45,800	39,300		6,500	4,745	1,755
449	Wilson in Ancaster - Fiddler's Green to Boundary	2023-2031	10.77	Cycle Track	5,385,100	1,615,500	-	3,769,600	-		3,769,600	2,751,808	1,017,792
450	Wimberly - Parkside to Nisbet	2023-2031	0.33	Bike Lane	46,000	2,600	-	43,400	37,200		6,200	4,526	1,674
451	Windwood Dr - Bradley to Southbrook Dr	2023-2031	0.70	Bike Lane	97,500	5,600	-	91,900	79,000		12,900	9,417	3,483



Table 5-12 (Cont'd)
Infrastructure Cost Included in the Development Charges Calculation
Services Related to a Highway – Roads and Related Capital Sheet

Prj. No.	Increased Service Needs Attributable to Anticipated Development City-Wide Service Target for Services Related to a Highway	Timing (year)	Length (km)	Capital Improvement	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
									Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
452	Woodbine Crescent - Jones to Dundurn St N	2023-2031	0.22	Signed Bike Route	8,900	500	-	8,400	7,200		1,200	876	324
453	Woodburn - Binbrook Rd E to Highway 20 E	2023-2031	7.56	Signed Bike Route	302,200	77,100	-	225,100	45,300		179,800	131,254	48,546
454	Woodhill Rd - Governor's to 800m south of Highway 8	2023-2031	7.05	Signed Bike Route	282,100	84,600	-	197,500	-		197,500	144,175	53,325
455	Woodhill Rd - Highway 8 to 800m south of Highway 8	2023-2031	1.04	Paved Shoulder	313,000	93,900	-	219,100	-		219,100	159,943	59,157
456	Woodward Ave - Beach Blvd to 100m south of Beach Blvd	2023-2031	0.10	Bike Lane	14,100	800	-	13,300	11,400		1,900	1,387	513
457	York - Olympic to Baldwin	2023-2031	2.33	Bike Lane	326,200	18,600	-	307,600	264,200		43,400	31,682	11,718
458	York Road Valley Community Centre Park Hydro Corridor Trail - York to Highway 6	2023-2031	4.15	Paved Multi-Use Recreational Trail	3,109,500	792,900	-	2,316,600	466,400		1,850,200	1,350,646	499,554
459	Highway 6 - Concession 10 W to Frelton	2023-2031	0.39	Paved Multi-Use Recreational Trail	293,100	87,900	-	205,200	-		205,200	149,796	55,404
460	Highway 6 N - Carlisle to Edgewood Road	2023-2031	0.55	Paved Multi-Use Recreational Trail	414,100	124,200	-	289,900	-		289,900	211,627	78,273
461	White Church Rd W Loop - White Church Rd W East of Carlisle to White Church Road W West of Highway 6	2023-2031	2.24	Paved Multi-Use Recreational Trail	1,683,700	505,100	-	1,178,600	-		1,178,600	860,378	318,222
462	Carlisle Road - Highway 6 to Milborough Townline	2023-2031	5.85	Paved Shoulder	1,756,300	447,800	-	1,308,500	263,400		1,045,100	762,923	282,177
463	Concession 5 West - Highway 6N to Moffatt Road	2023-2031	3.01	Paved Shoulder	904,300	230,600	-	673,700	135,600		538,100	392,813	145,287
464	Mosaic Dr - Parkside Dr to Highway 6	2023-2031	1.90	Multi-Use Trail	1,425,000	81,200	-	1,343,800	1,154,300		189,500	138,335	51,165
	Existing Debt												
425	Debt on Expressway - Principal (discounted) ¹	2023-2025			4,884,212	-		4,884,212	-		4,884,212	3,580,128	1,304,085
426	Debt on Expressway - Interest (discounted) ¹	2023-2025			254,771	-		254,771	-		254,771	186,747	68,024
427	Debt on Various Growth-Related Road Projects - Principal (discounted) ²	2023-2033			14,204,269	-		14,204,269	-		14,204,269	1,945,985	12,258,285
428	Debt on Various Growth-Related Road Projects - Interest (discounted) ²	2023-2033			1,141,489	-		1,141,489	-		1,141,489	156,384	985,105
	Other												
429	Provisional Post Period Benefit Deduction					160,000,000		(160,000,000)	-		(160,000,000)	(116,800,000)	(43,200,000)
430	Future Financing Costs - Growth-Related Interest (discounted)	2023-2046			22,388,624	-		22,388,624	-		22,388,624	16,343,696	6,044,929
431	Reserve Fund Adjustment	Reserve			-	-		-	53,219,090		(53,219,090)	(38,849,936)	(14,369,154)
	Total				1,782,442,386	629,723,980	222,660,300	930,058,106	338,189,070	-	591,869,035	422,979,778	168,889,257

¹ Debt on Expressway Issued for 73% Residential portion and 27% Non-Residential portion

² Debt on Various Growth-Related Road Projects Issued for 13.7% Residential portion and 86.3% Non-Residential portion



5.3.2 Water and Wastewater Services

GM BluePlan undertook a detailed review of the water and wastewater services required to service growth over the service target forecast period. Details of their work are provided in Appendix F. Table 5-13 provides a high-level summary of GM BluePlan's assessment by area throughout the City. In addition to the capital costs provided, debt obligations and the balance in the City's D.C. reserve funds for water and wastewater services have been included in the summary.

For water services, a total gross cost of \$398.81 million has been identified. Deductions to this amount include \$52.27 million, which has been identified as benefiting existing development, and \$9.54 million, which has been identified as costs that are the direct responsibility of developers as per the City's local service policy. A deduction of \$86.33 million has been made to account for the benefit of these works to growth beyond the forecast period. The surplus in the water D.C. reserve fund of \$67.06 million has also been deducted from the D.C. calculations. The result of these deductions is a net growth-related cost of \$183.61 million, which has been included in the D.C. calculations.

A total program for linear wastewater services, including debt obligations, provides for a gross total of \$376.61 million. From this amount, deductions have been made to recognize works that will benefit growth in the post-service target period of \$33.68 million, works that provide a benefit to existing of \$23.87 million, and direct developer contributions totalling \$10.16 million. A further deduction of \$36.15 million has been made to account for the balance in the D.C. reserve fund. The net growth-related cost for inclusion in the D.C. calculation is \$272.76 million.

For wastewater facilities, as summarized in Table 5-14, the upgrades and expansion to the Woodward Wastewater Treatment Plant include works related to water quality, a plant expansion and a biosolids management facility. The cost of these works totals \$1.06 billion. The City has been successful in receiving \$274.33 million in grant funding from the provincial and federal governments. The capital works will also benefit existing development and, therefore, a deduction of \$367.76 million has been made. The City's wastewater treatment D.C. reserve fund of \$134.57 million has also been deducted from the gross cost of the projects. The net growth-related costs for inclusion in the D.C. calculation is therefore \$178.64 million.



The growth-related costs have been allocated between residential and non-residential development based on the ratio of growth in population to employment in the urban area over the forecast period, which results in a 74% allocation to residential development and a 26% allocation to non-residential development.



Table 5-13
City of Hamilton
Summary of Linear Water and Wastewater Programs

Linear Water and Wastewater Programs	Gross Estimated Cost	Post Period Benefit	Existing Benefit	Direct Developer Contribution	Reserve Fund Balance	Net Growth Related Cost
Water:						
Ancaster Water Distribution System	43,983,000	2,027,000	11,158,000	-		30,798,000
Waterdown Water Distribution System	46,859,000	2,972,000	9,031,000	592,000		34,264,000
Binbrook Water Distribution System	21,400,000	-	3,480,000	718,000		17,202,000
A.E.G.D./Mount Hope Water Distribution System	26,207,000	-	-	5,501,000		20,706,000
Hamilton Mountain Water Distribution System	73,311,000	17,568,000	-	2,010,000		53,733,000
Stoney Creek Upper Water Distribution System	92,629,000	30,759,000	7,273,000	723,000		53,874,000
Stoney Creek Lower Water Distribution System	14,801,000	-	-	-		14,801,000
City Wide Water Distribution System	66,847,500	-	21,325,250	-		45,522,250
Existing Debt (Discounted)	304,338	-	-	-		304,338
New Growth Related Financing (Discounted)	12,465,337	-	-	-		12,465,337
Provisional Post Period Benefit Deduction		33,000,000				(33,000,000)
Reserve Fund Balance					67,062,464	(67,062,464)
Total Water	398,807,174	86,326,000	52,267,250	9,544,000	67,062,464	183,607,460
Wastewater:						-
Ancaster Sanitary Sewage System	1,351,000	-	-	-		1,351,000
Waterdown Sanitary Sewage System	485,000	-	-	359,000		126,000
Binbrook Sanitary Sewage System	2,217,000	-	-	898,000		1,319,000
A.E.G.D./Mount Hope Sanitary Sewage System	48,816,000	-	-	7,598,000		41,218,000
Hamilton Mountain Sanitary Sewage System	119,952,000	11,680,000	-	771,000		107,501,000
Stoney Creek Lower Sanitary Sewage System	86,313,000	8,000,000	235,700	532,000		77,545,300
City Wide Sanitary Sewage System	76,628,000	-	23,632,000	-		52,996,000
Existing Debt (Discounted)	1,401,961	-	-	-		1,401,961
New Growth Related Financing (Discounted)	39,448,636	-	-	-		39,448,636
Provisional Post Period Benefit Deduction		14,000,000				(14,000,000)
Reserve Fund Balance					36,150,238	(36,150,238)
Total Wastewater	376,612,598	33,680,000	23,867,700	10,158,000	36,150,238	272,756,660
Total Water & Wastewater	775,419,772	120,006,000	76,134,950	19,702,000	103,212,702	456,364,120



Table 5-14
City of Hamilton
Summary of Wastewater Facilities Capital Costs

Wastewater Facilities	Gross Capital Cost	Grants	Post Period Benefit	Existing Benefit	Reserve Fund Balance	Net Growth Related Cost
Water Quality	577,342,000	260,026,000	14,997,000	257,329,700		44,989,300
Plant Expansion	321,524,000	-	76,225,000	16,626,800		228,672,200
Biosolids Management Facility	157,838,000	14,300,000	10,187,000	93,807,600		39,543,400
Reserve Fund Balance					134,565,699	(134,565,699)
Total Capital Costs	1,056,704,000	274,326,000	101,409,000	367,764,100	134,565,699	178,639,201



Table 5-15
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Water Services

Prj.No	Increased Service Needs Attributable to Anticipated Development Urban Service Area Forecast Target	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 74%	Non-Residential Share 26%
1	Waterdown Water Distribution System	2023-2027	46,859,000	2,972,000		43,887,000	9,031,000	592,000	34,264,000	25,355,360	8,908,640
2	Ancaster Water Distribution System	2023-2027	43,983,000	2,027,000		41,956,000	11,158,000	-	30,798,000	22,790,520	8,007,480
3	AEGD/Mt. Hope Water Distribution System	2023-2027	551,000			551,000	-	-	551,000	407,740	143,260
4	AEGD/Mt. Hope Water Distribution System	2023-2027	25,656,000	-		25,656,000	-	5,501,000	20,155,000	14,914,700	5,240,300
5	Binbrook Water Distribution System	2023-2027	21,400,000	-		21,400,000	3,480,000	718,000	17,202,000	12,729,480	4,472,520
6	Hamilton Mountain Water Distribution System	2023-2027	69,505,000	17,568,000		51,937,000	-	1,698,000	50,239,000	37,176,860	13,062,140
7	Hamilton Mountain Water Distribution System	2028-2031	3,806,000	-		3,806,000	-	312,000	3,494,000	2,585,560	908,440
8	Stoney Creek Upper Water Distribution System	2023-2027	38,379,000	2,909,000		35,470,000	7,273,000	723,000	27,474,000	20,330,760	7,143,240
9	Stoney Creek Upper Water Distribution System	2028-2031	54,250,000	27,850,000		26,400,000	-	-	26,400,000	19,536,000	6,864,000
10	Stoney Creek Lower Water Distribution System	2023-2027	2,041,000	-		2,041,000	-	-	2,041,000	1,510,340	530,660
11	Stoney Creek Lower Water Distribution System	2028-2031	12,760,000	-		12,760,000	-	-	12,760,000	9,442,400	3,317,600
12	City Wide Water Distribution System	2023-2027	39,954,000	-		39,954,000	10,870,950	-	29,083,050	21,521,457	7,561,593
13	City Wide Water Distribution System	2028-2031	26,893,500	-		26,893,500	10,454,300	-	16,439,200	12,165,008	4,274,192
14	Existing Debt Principal (Discounted)	2023-2033	276,961	-		276,961	-	-	276,961	204,951	72,010
15	Existing Debt Interest (Discounted)	2023-2033	27,377	-		27,377	-	-	27,377	20,259	7,118
16	Growth Related Financing Costs (Discounted)	2024-2051	12,465,337	-		12,465,337	-	-	12,465,337	9,224,349	3,240,988
17	Provisional Post Period Benefit Deduction		-	33,000,000		(33,000,000)	-	-	(33,000,000)	(24,420,000)	(8,580,000)
18	Reserve Fund Adjustment	Reserve	-	-		-	67,062,464	-	(67,062,464)	(49,626,223)	(17,436,241)
	Total		398,807,174	86,326,000	-	312,481,174	119,329,714	9,544,000	183,607,460	135,869,521	47,737,940



Table 5-16
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Wastewater Linear Services

Prj.No	Increased Service Needs Attributable to Anticipated Development Urban Service Area Forecast Target	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 74%	Non-Residential Share 26%
1	Waterdown Sanitary Sewage System	2023-2027	485,000	-		485,000	-	359,000	126,000	93,240	32,760
2	Ancaster Sanitary Sewage System	2023-2027	1,351,000	-		1,351,000	-	-	1,351,000	999,740	351,260
3	AECD/Mt. Hope Sanitary Sewage System	2023-2027	25,070,000	-		25,070,000	-	-	25,070,000	18,551,800	6,518,200
4	AECD/Mt. Hope Sanitary Sewage System	2028-2031	23,746,000	-		23,746,000	-	7,598,000	16,148,000	11,949,520	4,198,480
5	Binbrook Sanitary Sewage System	2023-2027	2,217,000	-		2,217,000	-	898,000	1,319,000	976,060	342,940
6	Hamilton Mountain Sanitary Sewage System	2023-2027	119,848,000	11,680,000		108,168,000	-	771,000	107,397,000	79,473,780	27,923,220
7	Hamilton Mountain Sanitary Sewage System	2028-2031	104,000	-		104,000	-	-	104,000	76,960	27,040
8	Stoney Creek Lower Sanitary Sewage System	2023-2027	86,313,000	8,000,000		78,313,000	235,700	532,000	77,545,300	57,383,522	20,161,778
9	City Wide Sanitary System	2023-2027	45,047,000	-		45,047,000	13,177,000	-	31,870,000	23,583,800	8,286,200
10	City Wide Sanitary System	2028-2031	31,581,000	-		31,581,000	10,455,000	-	21,126,000	15,633,240	5,492,760
11	Existing Debt Principal	2023	1,283,545	-		1,283,545	-	-	1,283,545	949,823	333,722
12	Existing Debt Interest (Discounted)	2023	118,416	-		118,416	-	-	118,416	87,628	30,788
13	Financing (Linear) (Interest Discounted)	2023-2051	39,448,636	-		39,448,636	-	-	39,448,636	29,191,991	10,256,645
14	Provisional Post Period Benefit Deduction		-	14,000,000		(14,000,000)	-	-	(14,000,000)	(10,360,000)	(3,640,000)
15	Reserve Fund Adjustment	Reserve	-	-		-	36,150,238	-	(36,150,238)	(26,751,176)	(9,399,062)
	Total		376,612,598	33,680,000	-	342,932,598	60,017,938	10,158,000	272,756,660	201,839,928	70,916,732



Table 5-17
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Wastewater Facilities

Prj.No	Increased Service Needs Attributable to Anticipated Development Urban Service Area Forecast Target	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 74%	Non- Residential Share 26%
	Water Quality:										
1	Wastewater Pumping Station	2023-2031	93,179,000	1,461,000		91,718,000	25,175,700	62,159,000	4,383,300	3,243,642	1,139,658
2a	Primary Clarifier - Primary Treatment (Phase 1) - Engineering Included	2023-2031	16,256,000	521,000		15,735,000	8,977,000	5,195,000	1,563,000	1,156,620	406,380
2b	Primary Clarifier - Primary Treatment (Phase 2 - Tanks) - Engineering Included	2023-2031	52,247,000	820,000		51,427,000	14,134,700	34,831,000	2,461,300	1,821,362	639,938
2c	Primary Clarifier - Other Costs (includes New/Expanded Laboratory/Admin Building)	2023-2031	11,858,000	1,569,000		10,289,000	5,582,700	-	4,706,300	3,482,662	1,223,638
4a	Tertiary Upgrades - New Secondary/Tertiary Treatment Plant (Phase 1)	2023-2031	159,170,000	2,257,000		156,913,000	85,410,300	64,732,000	6,770,700	5,010,318	1,760,382
5a	Chlorine Contact Tank and Outfall - Railway Re-Alignment	2023-2031	11,620,000	2,905,000		8,715,000	-	-	8,715,000	6,449,100	2,265,900
5b	Chlorine Contact Tank and Outfall - Secondary/Tertiary Chlorine contact Tank, Outfall and Red Hill Creek Upgrades	2023-2031	51,110,000	1,262,000		49,848,000	20,335,400	25,728,000	3,784,600	2,800,604	983,996
8a	Clean Harbour Project - Actual Costs of Engineering (Projects 1, 4a, 4b, 5, 13) Phase 1	2023-2031	47,542,000	1,751,000		45,791,000	40,539,100	-	5,251,900	3,886,406	1,365,494
8b	Clean Harbour Project - O/S Commitments of Engineering (Projects 1, 4a, 4b, 5, 13) Phase 1	2023-2031	6,789,000	250,000		6,539,000	5,789,000	-	750,000	555,000	195,000
8d	Plant Expansion - Engineering - Other Costs (includes Modular Office Building)	2023-2031	10,701,000	394,000		10,307,000	9,124,700	-	1,182,300	874,902	307,398



Table 5-17 (Cont'd)
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Wastewater Facilities

Prj.No	Increased Service Needs Attributable to Anticipated Development Urban Service Area Forecast Target	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 74%	Non- Residential Share 26%
11a	Biogas Digester - Biogas Upgrades	2023-2031	45,006,000	806,000		44,200,000	21,783,000	20,000,000	2,417,000	1,788,580	628,420
13a	Electrical System Upgrades - New Electrical and power systems - Phase 1	2023-2031	61,448,000	1,001,000		60,447,000	16,846,100	40,597,000	3,003,900	2,222,886	781,014
14	Collection System Upgrades	2023-2031	10,416,000	-		10,416,000	3,632,000	6,784,000	-	-	-
	Plant Expansion:										
4b-1	Tertiary Upgrades - Tertiary Treatment Plant & 3rd Plant (Phase 2)	2023-2031	230,877,000	57,719,000		173,158,000	-	-	173,158,000	128,136,920	45,021,080
4b-2	Tertiary Upgrades - Primary Effluent PS (Phase 2)	2023-2031	13,742,000	3,436,000		10,306,000	-	-	10,306,000	7,626,440	2,679,560
4b-3	Tertiary Upgrades - WUP Office Relocation (Phase 2)	2023-2031	5,193,000	1,298,000		3,895,000	-	-	3,895,000	2,882,300	1,012,700
4b-4	Tertiary Upgrades - Gas Sphere Relocation / Biogas (Phase 2)	2023-2031	3,939,000	985,000		2,954,000	-	-	2,954,000	2,185,960	768,040
8c	Plant Expansion - Future Engineering (Projects 4b, 5a, 6, 11b, 13b) Phase 2	2023-2031	62,478,000	11,463,000		51,015,000	16,626,800	-	34,388,200	25,447,268	8,940,932
13b	Electrical System Upgrades - New Electrical and power systems - Phase 2	2023-2031	5,295,000	1,324,000		3,971,000	-	-	3,971,000	2,938,540	1,032,460
	Biosolids Management Facility:										
6	Biogas Digester - New Waste Activated Sludge Thickening Facility (forms part of the Digester Upgrades)	2023-2031	8,981,000	-		8,981,000	-	-	8,981,000	6,645,940	2,335,060
11b	Biogas Digester - Digesters Upgrades	2023-2031	49,417,000	6,177,000		43,240,000	24,708,500	-	18,531,500	13,713,310	4,818,190



Table 5-17 (Cont'd)
 City of Hamilton
 Infrastructure Cost Included in the Development Charges Calculation
 Wastewater Facilities

Prj.No	Increased Service Needs Attributable to Anticipated Development Urban Service Area Forecast Target	Timing (year)	Gross Capital Cost Estimate (2023\$)	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
							Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 74%	Non- Residential Share 26%
12	Biosolids Management Facility - Biosolids Thermal Reduction Disposal Facility	2023-2031	99,440,000	4,010,000		95,430,000	69,099,100	14,300,000	12,030,900	8,902,866	3,128,034
15	Reserve Fund Adjustment	Reserve	-	-		-	134,565,699		(134,565,699)	(99,578,617)	(34,987,082)
	Total		1,056,704,000	101,409,000	-	955,295,000	502,329,799	274,326,000	178,639,201	132,193,009	46,446,192



5.4 Stormwater Capital Costs to Service Growth to the Servicing Target in the Combined and Separated Sewer System Areas

5.4.1 Stormwater Drainage and Control Services

WSP Inc. (WSP) and Scheckenberger & Associates Ltd. (S&A) undertook an assessment of the needs for stormwater management within the serviced areas of the City. Appendix G provides the detailed assessment and allocation of works between existing benefit and growth.

The stormwater D.C. calculation is undertaken on an area-specific basis for the combined sewer system versus the separated sewer system. Certain stormwater works, such as on-site controls are only required in the combined sewer system, given that development of stormwater management ponds is not possible in these areas. This is in contrast to stormwater works in the separated sewer system area where stormwater management ponds are required for development to proceed. As such, the associated stormwater D.C. calculations for these two areas is undertaken on an area-specific basis.

Within the separated sewer system, WSP and S&A have identified \$578.62 million in works required. In addition, outstanding credits in the amount of \$36.58 million have been included in the calculation. Outstanding debt owed to the Ontario Land Corporation is included in the D.C. at an amount of \$1.68 million related to the separated sewer system. Existing debt in the amount of \$1.83 million, in addition to future financing costs of \$19.11 million have also been included in the calculations. The resulting gross cost within the separated sewer system area is \$637.82 million. Of this amount \$38.34 million has been identified as benefiting existing development and \$39.19 million is a benefit to growth beyond the service target forecast period. Furthermore, a deduction of \$3.16 million has been made related to works that are direct developer responsibility. In addition, an adjustment of \$2.58 million has been made to account for the existing reserve fund balance. These deductions result in a net amount of \$407.55 million attributable to growth over the forecast period.

Within the combined sewer system area, WSP and S&A have identified \$13.07 million in future capital works. In addition, \$820,000 of debt owed to the Ontario Land



Corporation has also been identified in the D.C. recoverable costs. Furthermore, future financing costs in the amount of \$560,000 have been included in the D.C. calculations. In addition, \$11.82 million has been included in the D.C. calculations in order to reflect the reserve fund deficit, resulting in a net D.C. recoverable cost of \$26.26 million.

The following is a summary of the gross and net recoverable costs for the separated versus combined system based on WSP and S&A's assessment and all other adjustments.

Table 5-18
City of Hamilton
Summary of Capital Costs for the Separated Sewer System Area

Separated Sewer System	Gross Cost (\$)	Net D.C. Recoverable Cost (\$)
Future Capital Works	578,622,590	350,933,090
Reserve Fund Adjustment	-	(2,578,740)
Provision for Stormwater Credits	36,575,454	36,575,454
Outstanding Debt to Ontario Land Corp.	1,676,719	1,676,719
Existing Debt	1,834,711	1,834,711
Future Financing Costs	19,113,145	19,113,145
Total	637,822,619	407,554,379

Table 5-19
City of Hamilton
Summary of Capital Costs for the Combined Sewer System Area

Combined Sewer System	Gross Cost (\$)	Net D.C. Recoverable Cost (\$)
Future Capital Works	13,067,900	13,067,900
Reserve Fund Adjustment	11,816,207	11,816,207
Outstanding Debt to Ontario Land Corp.	819,860	819,860
Future Financing Costs	555,277	555,277
Total	26,259,244	26,259,244

The costs for all stormwater services except facilities in the separated sewer system area are shared 73%/27% between residential and non-residential development, based



on the benefiting lands associated with the stormwater management works over the service target forecast period.

For stormwater facilities within the separated system, the costs identified are attributable 100% to residential development. Non-residential development is required to provide facilities as part of the local service policy.

The costs for stormwater in the combined system are 100% attributed to residential development.



Table 5-20
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Stormwater Facilities – Separated Sewer System Area

Prj.No	Increased Service Needs Attributable to Anticipated Development Separate Sewer System Service Area Forecast Target	Timing (year)	Gross Capital Cost Estimate (2023\$) - Without Allowance	Gross Capital Cost Estimate (2023\$) - With 15% Allowance	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
								Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 100%	Non-Residential Share 0%
1	Stormwater Management Quality/Quantity Facilities - Residential	2023-2031	197,107,000	226,673,100	-		226,673,100	7,342,000	-	219,331,100	219,331,100	-
2	Provision for Non-Residential Portion of Residential Ponds	2023-2031	(1,476,000)	(1,697,400)	-		(1,697,400)	-		(1,697,400)	(1,697,400)	-
3	Stormwater Management Quality/Quantity Facilities - Non-Residential	2023-2031	150,578,000	173,164,700	-		173,164,700	3,579,600	146,998,400	22,586,700	22,586,700	-
4	Provision for Residential Portion of Non-Residential Ponds	2023-2031	940,100	1,081,100	-		1,081,100	-		1,081,100	1,081,100	-
5	Provision for Stormwater Credits	2023-2031		36,575,454	-		36,575,454	-		36,575,454	36,575,454	-
6	Reserve Fund Adjustment	Reserve					-	1,701,767		(1,701,767)	(1,701,767)	-
	Total		347,149,100	435,796,954	-	-	435,796,954	12,623,367	146,998,400	276,175,187	276,175,187	-



Table 5-21
City of Hamilton
Infrastructure Cost Included in the Development Charges Calculation
Stormwater Works (Excluding Facilities) – Separated Sewer System Area

Prj. No.	Increased Service Needs Attributable to Anticipated Development Separate Sewer System Service Area Forecast Target	Timing (year)	Gross Capital Cost Estimate (2023\$) - Without Allowance	Gross Capital Cost Estimate (2023\$) - With 15% Allowance	Post Period Benefit	Other Deductions	Net Capital Cost	Less:		Potential D.C. Recoverable Cost		
								Benefit to Existing Development	Grants, Subsidies and Other Contributions Attributable to New Development	Total	Residential Share 73%	Non-Residential Share 27%
1	Open Watercourses - Channel System Improvements - Residential (Category A)	2023-2031	27,831,290	32,005,990	7,594,600		24,411,390	-		24,411,390	17,820,315	6,591,075
2	Open Watercourses - Channel System Improvements - Non-Residential (Category A)	2023-2031	31,069,000	35,729,400	-		35,729,400	4,908,400		30,821,000	22,499,330	8,321,670
3	Off-Site Erosion Works (Category B)	2023-2031	36,516,000	41,993,400	-		41,993,400	20,106,600		21,886,800	15,977,364	5,909,436
4	Oversizing of Trunk Sewers and Culverts (Category D)	2023-2031	21,356,800	24,560,300	-		24,560,300	-	3,162,500	21,397,800	15,620,394	5,777,406
5	Culverts and Bridges not Previously Identified (Category E)	2023-2031	11,750,600	13,513,200	-		13,513,200	2,398,600		11,114,600	8,113,658	3,000,942
6	GRIDS-Related Open Watercourses	2023-2031	27,477,200	31,598,800	31,598,800		-	-		-	-	-
7	Existing Debt on Growth-Related Projects - Principal (Discounted)	2023-2033		1,417,604	-		1,417,604	-		1,417,604	1,034,851	382,753
8	Existing Debt on Growth-Related Projects - Interest (Discounted)	2023-2033		417,106	-		417,106	-		417,106	304,488	112,619
9	Outstanding Debt to Ontario Land Corporation	2023-2031		1,676,719	-		1,676,719	-		1,676,719	1,224,005	452,714
10	Future Financing Costs (Discounted)	2024-2044		19,113,145	-		19,113,145	-		19,113,145	13,952,596	5,160,549
11	Reserve Fund Adjustment	Reserve		-	-		-	876,973		(876,973)	(640,190)	(236,783)
	Total		156,000,890	202,025,665	39,193,400	-	162,832,265	28,290,573	3,162,500	131,379,192	95,906,810	35,472,382



5.5 Special Area Charge – Dundas/Waterdown

There is currently one special area charge in effect for the Dundas/Waterdown area which provides for the specific recovery of works that were built by landowners and require recovery from development within the area. The agreement between the landowners and the City provides for interest to be calculated and recovered in conjunction with the original principal amount. The provisions of this agreement, along with the recalculation of the charge, is provided herein.

A financial agreement was entered into with landowners for the construction of wastewater services (Equalization Tank, diversion forcemain and sanitary sewers) which would benefit both Waterdown and Dundas (map of area is provided in Map 5-1). The total recoverable cost of the work was \$8,150,147. The interest rate calculation as provided for in the agreement was based on the prime commercial rate plus one percent (7.65% at the time of signing). The calculation was based on a 15-year term. In 2018, the City paid off the outstanding balance and has been cash-flowing this amount internally at a rate of 4%. It is anticipated the developments related to this charge will not be fully complete until 2031. As such, the calculations have been updated to include the outstanding balance and interest anticipated.



The original calculation was based on 6,100 single detached equivalent (S.D.E.) units, of which collections have occurred for 4,755 S.D.E.s. Therefore, the remaining balance will be recovered from the remaining 1,345 S.D.E. units. Furthermore, the non-residential portion will be allocated on the same basis as the original charge, based on the projected non-residential growth remaining of 2.96 million sq.ft.

Based on information and calculations provided by City staff, the recalculated outstanding balance and interest owing is \$5.77 million. Utilizing these current figures, the special area charge is \$1,931 per S.D.E. and \$1.07 per sq.ft. of non-residential development, as presented in the following table:

Table 5-23
City of Hamilton
Dundas/Waterdown Special Area Charge Calculation

Description	Total	Residential	Non-Residential
Current Outstanding Balance	\$5,151,554	\$2,320,406	\$2,831,148
Interest to 2031	\$616,738	\$277,796	\$338,942
Total	\$5,768,292	\$2,598,202	\$3,170,090
Remaining SDE/sq.ft.		1,345	2,963,981
Special Area Charge (as of 2023)		\$1,931	\$1.07

As the residential charge is based on a single detached unit, the following charges for all unit types are provided based upon the P.P.U. relationship discussed in Appendix A.

Table 5-24
City of Hamilton
Summary of Special Area Charge for Dundas/Waterdown

Type of Development	Single Detached Equivalent based on P.P.U.	D.C. per Unit
Single/Semi-detached units	1.00	\$1,931
Other Multiples	0.75	\$1,441
Apartments - 2 bedrooms or more	0.61	\$1,184
Apartments - less than 2 bedrooms	0.38	\$734
Residential Facility Dwelling Units	0.31	\$601



Chapter 6

D.C. Calculations



6. D.C. Calculations

Table 6-1 calculates the proposed area-specific D.C.s to be imposed for stormwater within the combined sewer system area, and Table 6-2 calculates the area-specific stormwater charge within the separated sewer system area, both based on an urban service target horizon. Table 6-3 calculates the proposed D.C.s to be imposed for water and wastewater services, based on an urban service target forecast period. Table 6-4 calculates the proposed uniform D.C. to be imposed on anticipated development in the City for city-wide services over a service target planning horizon. Table 6-5 calculates the proposed uniform D.C.s to be imposed on anticipated development in the City for city-wide services over a 10-year planning horizon.

The calculation for residential development is generated on a per capita basis and is based upon five forms of housing types (singles and semi-detached, apartments – 2 bedrooms+, apartments – bachelor and 1 bedroom, all other multiples, and residential facilities). The non-residential D.C. has been calculated on a per sq.ft. of G.F.A. basis for all types of non-residential development (i.e., industrial, commercial, and institutional).

The D.C.-eligible costs for each service component were developed in Chapter 5 for all City services, based on their proposed capital programs.

For the residential calculations, the total cost is divided by the “gross” (new resident) population to determine the per capita amount. The D.C.-eligible cost calculations set out in Chapter 5 are based on the net anticipated population increase (i.e., the forecast new unit population less the anticipated decline in existing units). The cost per capita is then multiplied by the average occupancy of the new units (see Appendix A, Schedule 7) to calculate the charge in Tables 6-1 to 6-5.

With respect to non-residential development, the total costs in the uniform charge allocated to non-residential development, based on need for service, have been divided by the anticipated development over the planning period to calculate a cost per sq.ft. of G.F.A.

Table 6-6 summarizes the total D.C. that is applicable for all municipal services and Table 6-7 summarizes the gross capital expenditures and sources of revenue for works to be undertaken during the life of the by-laws.



The area-specific D.C. calculations for Dundas/Waterdown have been provided in Chapter 5, section 5.5.



Table 6-1
 City of Hamilton
 Development Charge Calculation
 Area-Specific Services – Stormwater Services (Combined Sewer System Area)
 Service Target Forecast (Combined Sewer System Area)

SERVICE/CLASS	2023\$ D.C.-Eligible Cost		2023\$ D.C.-Eligible Cost	
	Residential	Non-Residential	S.D.U.	per sq.ft.
	\$	\$	\$	\$
1. <u>Stormwater Drainage and Control Services</u>				
1.1 Stormwater Facilities	26,259,244	-	9,553	-
TOTAL	\$26,259,244	\$0	\$9,553	-
D.C.-Eligible Capital Cost	\$26,259,244	\$0		
Service Target Forecast (Combined Sewer Area) Gross Population/G.F.A. Growth (sq.ft.)	9,711	2,788,200		
Cost Per Capita/Non-Residential GFA (sq.ft.)	\$2,704.07	\$0.00		
<u>By Residential Unit Type</u>	<u>P.P.U.</u>			
Single and Semi-Detached Dwelling	3.533	\$9,553		
Other Multiples	2.637	\$7,131		
Apartments - 2 Bedrooms+	2.166	\$5,857		
Apartments - Bachelor and 1 Bedroom	1.342	\$3,629		
Residential Facility	1.100	\$2,974		



Table 6-2
City of Hamilton
Area-Specific Services – Stormwater Services (Separated Sewer System Area)
Service Target Forecast (Separated Sewer System Area)

SERVICE/CLASS	2023\$ D.C.-Eligible Cost		2023\$ D.C.-Eligible Cost	
	Residential	Non-Residential	S.D.U.	per sq.ft.
	\$	\$	\$	\$
2. <u>Stormwater Drainage and Control Services</u>				
2.1 Channels and drainage	95,906,810	35,472,382	6,068	4.75
2.2 Residential ponds	276,175,187	-	17,473	-
	372,081,997	35,472,382	23,541	4.75
TOTAL	\$372,081,997	35,472,382	\$23,541	4.75
D.C.-Eligible Capital Cost	\$372,081,997	\$35,472,382		
Service Target Forecast (Separated Sewer Area) Gross Population/G.F.A. Growth (sq.ft.)	55,841	7,470,100		
Cost Per Capita/Non-Residential GFA (sq.ft.)	\$6,663.24	\$4.75		
<u>By Residential Unit Type</u>				
	<u>P.P.U.</u>			
Single and Semi-Detached Dwelling	3.533	\$23,541		
Other Multiples	2.637	\$17,571		
Apartments - 2 Bedrooms+	2.166	\$14,433		
Apartments - Bachelor and 1 Bedroom	1.342	\$8,942		
Residential Facility	1.100	\$7,330		



Table 6-3
City of Hamilton
Development Charge Calculation
Area-Specific Services – Water and Wastewater Services (Urban Areas)
Service Target Forecast (Urban Areas)

SERVICE/CLASS	2023\$ D.C.-Eligible Cost		2023\$ D.C.-Eligible Cost	
	Residential	Non-Residential	S.D.U.	per sq.ft.
3. <u>Wastewater Services</u>				
3.1 Wastewater facilities	132,193,009	46,446,192	7,125	4.53
3.2 Wastewater linear services	201,839,928	70,916,732	10,878	6.91
	334,032,937	117,362,924	18,003	11.44
4. <u>Water Services</u>				
4.1 Facilities, storage, and distribution systems	135,869,521	47,737,940	7,323	4.65
	135,869,521	47,737,940	7,323	4.65
TOTAL	\$469,902,458	\$165,100,864	\$25,326	\$16.09
D.C.-Eligible Capital Cost	\$469,902,458	\$165,100,864		
Service Target Forecast (Urban) Gross Population/G.F.A. Growth (sq.ft.)	65,552	10,258,200		
Cost Per Capita/Non-Residential GFA (sq.ft.)	\$7,168.39	\$16.09		
<u>By Residential Unit Type</u>	<u>P.P.U.</u>			
Single and Semi-Detached Dwelling	3.533	\$25,326		
Other Multiples	2.637	\$18,903		
Apartments - 2 Bedrooms+	2.166	\$15,527		
Apartments - Bachelor and 1 Bedroom	1.342	\$9,620		
Residential Facility	1.100	\$7,885		



Table 6-4
City of Hamilton
Development Charge Calculation
City-Wide Services
Service Target Forecast

SERVICE/CLASS	2023\$ D.C.-Eligible Cost		2023\$ D.C.-Eligible Cost	
	Residential	Non-Residential	S.D.U.	per sq.ft.
5. <u>Services Related to a Highway</u>	\$	\$	\$	\$
5.1 Roads and Related	422,979,778	168,889,257	22,539	16.28
	422,979,778	168,889,257	22,539	16.28
TOTAL	\$422,979,778	\$168,889,257	\$22,539	\$16.28
D.C.-Eligible Capital Cost	\$422,979,778	\$168,889,257		
Service Target Forecast Gross Population/G.F.A. Growth (sq.ft.)	66,301	10,375,800		
Cost Per Capita/Non-Residential G.F.A. (sq.ft.)	\$6,379.69	\$16.28		
<u>By Residential Unit Type</u>	<u>P.P.U.</u>			
Single and Semi-Detached Dwelling	3.533	\$22,539		
Other Multiples	2.637	\$16,823		
Apartments - 2 Bedrooms+	2.166	\$13,818		
Apartments - Bachelor and 1 Bedroom	1.342	\$8,562		
Residential Facility	1.100	\$7,018		



Table 6-5
City of Hamilton
Development Charge Calculation
City-Wide Services
2023 to 2032

SERVICE/CLASS	2023\$ D.C.-Eligible Cost		2023\$ D.C.-Eligible Cost	
	Residential	Non-Residential	S.D.U.	per sq.ft.
	\$	\$	\$	\$
6. <u>Public Works (Facilities and Fleet)</u>				
6.1 Facilities, vehicles and equipment	33,879,686	12,530,843	1,335	0.80
7. <u>Fire Protection Services</u>				
7.1 Fire facilities, vehicles and equipment	29,209,123	10,803,374	1,151	0.69
8. <u>Policing Services</u>				
8.1 Facilities, vehicles and equipment, small equipment and gear	25,828,282	9,552,926	1,018	0.61
9. <u>Transit Services</u>				
9.1 Transit facilities, vehicles and other infrastructure	40,623,771	15,025,231	1,601	0.96
10. <u>Parks and Recreation</u>				
10.1 Park development, amenities, trails, equipment and recreation facilities	280,692,246	14,773,276	11,065	0.95
11. <u>Library Services</u>				
11.1 Library facilities, materials and vehicles	52,293,089	2,752,268	2,061	0.18
12. <u>Long-term Care Services</u>				
12.1 Facilities	5,848,418	649,824	231	0.04



Table 6-5 (Cont'd)
City of Hamilton
Development Charge Calculation
City-Wide Services
2023 to 2032

SERVICE/CLASS	2023\$ D.C.-Eligible Cost		2023\$ D.C.-Eligible Cost	
	Residential	Non-Residential	S.D.U.	per sq.ft.
13. <u>Child Care and Early Years Programs</u>				
13.1 Facilities	-	-	-	-
14. <u>Public Health Services</u>				
14.1 Facilities, vehicles and equipment	1,057,946	117,550	42	0.01
15. <u>Provincial Offences Act Services including By-Law Enforcement</u>				
15.1 Facilities	1,315,598	486,591	52	0.03
16. <u>Ambulance</u>				
16.1 Ambulance facilities, vehicles and equipment	8,246,401	916,267	325	0.06
17. <u>Waste Diversion</u>				
17.1 Waste diversion facilities, vehicles, equipment and other	8,773,831	461,781	346	0.03
TOTAL	\$487,768,391	\$68,069,930	\$19,227	\$4.36
D.C.-Eligible Capital Cost	\$487,768,391	\$68,069,930		
10-Year Gross Population/G.F.A. Growth (sq.ft.)	89,627	15,617,600		
Cost Per Capita/Non-Residential G.F.A. (sq.ft.)	\$5,442.20	\$4.36		
By Residential Unit Type				
	P.P.U.			
Single and Semi-Detached Dwelling	3.533	\$19,227		
Other Multiples	2.637	\$14,351		
Apartments - 2 Bedrooms+	2.166	\$11,788		
Apartments - Bachelor and 1 Bedroom	1.342	\$7,303		
Residential Facility	1.100	\$5,986		



Table 6-6
City of Hamilton
Development Charge Calculation
Total All Services

	2023\$ D.C.-Eligible Cost		2023\$ D.C.-Eligible Cost	
	Residential	Non-Residential	S.D.U.	per sq.ft.
	\$	\$	\$	\$
Combined Sewer System Area Services/Classes - Service Target Forecast	26,259,244	-	9,553	-
Separated Sewer System Area Services/Classes - Service Target Forecast	372,081,997	35,472,382	23,541	4.75
Urban-wide Services/Classes - Service Target Forecast	469,902,458	165,100,864	25,326	16.09
City-wide Services/Classes - Service Target Forecast	422,979,778	168,889,257	22,539	\$16.28
City-wide Services/Classes 10 Year	487,768,391	68,069,930	19,227	\$4.36
TOTAL COMBINED SEWER SYSTEM AREA	\$1,406,909,871	\$402,060,051	\$76,645	\$36.73
TOTAL SEPARATED SEWER SYSTEM AREA	\$1,752,732,624	\$437,532,433	\$90,633	\$41.48



Table 6-7
City of Hamilton
Gross Expenditures and Sources of Revenue Summary for Costs to be Incurred over the Life of the By-laws

Service/Class	Total Gross Cost	Sources of Financing					
		Tax Base or Other Non-D.C. Source			Post D.C. Period Benefit	D.C. Reserve Fund	
		Other Deductions	Benefit to Existing	Other Funding		Residential	Non-Residential
	\$	\$	\$	\$	\$	\$	
1. Stormwater Drainage and Control Services (Combined Sewer System)							
1.1 Stormwater Facilities	13,067,900	0	0	0	0	13,067,900	0
2. Stormwater Drainage and Control Services (Separated Sewer System)							
2.1 Channels and drainage	179,401,090	0	27,413,600	3,162,500	39,193,400	80,031,061	29,600,529
2.2 Residential ponds	399,221,500	0	10,921,600	146,998,400	0	241,301,500	0
3. Wastewater Services							
3.1 Wastewater facilities	1,056,704,000	0	367,764,100	274,326,000	101,409,000	231,771,626	81,433,274
3.2 Wastewater linear services	335,762,000	0	23,867,700	10,158,000	19,680,000	208,721,662	73,334,638
4. Water Services							
4.1 Facilities, storage, and distribution systems	386,037,500	0	52,267,250	9,544,000	53,326,000	200,466,185	70,434,065
5. Services Related to a Highway							
5.1 Roads and Related	1,173,867,020	90,417,300	278,580,980	0	52,235,980	549,421,915	203,210,845
6. Public Works (Facilities and Fleet)							
6.1 Facilities, vehicles and equipment	57,000,000	0	0	0	0	41,610,000	15,390,000
7. Fire Protection Services							
7.1 Fire facilities, vehicles and equipment	79,720,533	0	9,270,500	0	29,871,933	29,622,013	10,956,087
8. Policing Services							
8.1 Facilities, vehicles and equipment, small equipment and gear	41,742,300	0	3,587,500	0	9,127,800	21,189,710	7,837,290
9. Transit Services							
9.1 Transit facilities, vehicles and other infrastructure	474,786,600	0	232,129,100	183,000,000	28,391,300	22,824,326	8,441,874



Table 6-7 (Cont'd)
City of Hamilton

Gross Expenditure and Sources of Revenue Summary for Costs to be Incurred over the Life of the By-laws

Service/Class	Total Gross Cost	Sources of Financing					
		Tax Base or Other Non-D.C. Source			Post D.C. Period Benefit	D.C. Reserve Fund	
		Other Deductions	Benefit to Existing	Other Funding		Residential	Non-Residential
10. Parks and Recreation 10.1 Park development, amenities, trails, equipment and recreation facilities	384,828,295	0	72,554,573	0	21,958,614	275,799,354	14,515,755
11. Library Services 11.1 Library facilities, materials and vehicles	117,582,900	0	42,635,300	0	19,682,600	52,501,750	2,763,250
12. Long-term Care Services 12.1 Facilities	81,000,000	0	62,090,000	4,740,000	0	12,753,000	1,417,000
13. Child Care and Early Years Programs 13.1 Facilities	0	0	0	0	0	0	0
14. Public Health Services 14.1 Facilities, vehicles and equipment	2,100,000	0	0	0	0	1,890,000	210,000
15. Provincial Offences Act Services including By-Law Enforcement 15.1 Facilities	0	0	0	0	0	0	0
16. Ambulance 16.1 Ambulance facilities, vehicles and equipment	29,290,000	0	9,000,000	0	11,880,000	7,569,000	841,000
17. Waste Diversion 17.1 Waste diversion facilities, vehicles, equipment and other	39,028,000	14,010,200	11,010,500	0	0	13,306,935	700,365
Total Expenditures & Revenues	\$4,851,139,639	\$104,427,500	\$1,203,092,703	\$631,928,900	\$386,756,627	\$2,003,847,936	\$521,085,973



Chapter 7

D.C. Policy Recommendations and D.C. By-law Rules



7. D.C. Policy Recommendations and D.C. By-law Rules

7.1 Introduction

Subsection 5 (1) 9 of the D.C.A. states that rules must be developed:

“to determine if a development charge is payable in any particular case and to determine the amount of the charge, subject to the limitations set out in subsection (6).”

Paragraph 10 of the section goes on to state that the rules may provide for exemptions, phasing in and/or indexing of D.C.s.

Subsection 5 (6) of the D.C.A. establishes the following restrictions on the rules:

- the total of all D.C.s that would be imposed on anticipated development must not exceed the capital costs determined under subsection 5 (1) 2-7 for all services involved;
- if the rules expressly identify a type of development, they must not provide for it to pay D.C.s that exceed the capital costs that arise from the increase in the need for service for that type of development; however, this requirement does not relate to any particular development; and
- if the rules provide for a type of development to have a lower D.C. than is allowed, the rules for determining D.C.s may not provide for any resulting shortfall to be made up via other development.

With respect to “the rules,” section 6 states that a D.C. by-law must expressly address the matters referred to above re subsection 5 (1) paragraphs 9 and 10, as well as how the rules apply to the redevelopment of land.

The rules provided are based on the City’s existing policies; with some modifications and consideration for the changes to the D.C.A. resulting from Bills 108, 197, 213 and 23.



7.2 D.C. By-law Structure

It is recommended that:

- The City use a uniform City-wide D.C. calculation for all municipal-wide services, except water, wastewater, and stormwater services and the works included in the Dundas/Waterdown special area charge;
- D.C.s for water and wastewater services be imposed on the urban service areas of the City;
- D.C.s for stormwater services be imposed on an area-specific basis for the combined sewer system area versus the separated sewer system area;
- D.C.s for wastewater facilities be imposed on developments outside the urban service areas connecting to the municipal wastewater system;
- The Dundas/Waterdown area-specific D.C.s continue; and
- Separate D.C. by-laws be used for each service.

7.3 D.C. By-law Rules

The following subsections set out the recommended rules governing the calculation, payment and collection of D.C.s in accordance with section 6 of the D.C.A.

It is recommended that the following sections provide the basis for the D.C.s.:

7.3.1 Payment in any Particular Case

In accordance with the D.C.A., subsection 2 (2), a D.C. be calculated, payable, and collected where the development requires one or more of the following:

- “(a) the passing of a zoning by-law (or of an amendment to a zoning by-law under section 34 of the *Planning Act*,
- (b) the approval of a minor variance under section 45 of the *Planning Act*,
- (c) a conveyance of land to which a by-law passed under subsection 50 (7) of the *Planning Act* applies;
- (d) the approval of a plan of subdivision under section 51 of the *Planning Act*



- (e) a consent under section 53 of the *Planning Act*;
- (f) the approval of a description under section 9 of the *Condominium Act, 1998*; or
- (g) the issuing of a permit under the *Building Code Act, 1992* in relation to a building or structure.”

7.3.2 Determination of the Amount of the Charge

The following conventions be adopted:

- 1) Costs allocated to residential uses will be assigned to different types of residential units based on the average occupancy for each housing type constructed during the previous decade. Costs allocated to non-residential uses will be assigned based on the amount of square feet of G.F.A. constructed for eligible uses (i.e., industrial, commercial, and institutional).
- 2) Costs allocated to residential and non-residential uses are based upon a number of conventions, as may be suited to each municipal circumstance, e.g.
 - For parks and recreation, library, and waste diversion services a 5% non-residential attribution has been made to recognize use by the non-residential sector;
 - For public works, policing, fire protection, transit, and P.O.A. services including by-law enforcement, a 73% residential/27% non-residential attribution has been made based on a population versus employment growth ratio over the 10-year forecast period;
 - For long-term care, public health, and ambulance services, a 90% residential/10% non-residential allocation has been made to recognize use by the non-residential sector;
 - For services related to a highway, a 73% residential/27% non-residential attribution has been made based on the population versus employment growth ratio over the service target forecast period;
 - For stormwater (excluding facilities) within the separated sewer system, a 73% residential/27% non-residential allocation has been made based on benefiting lands associated with the stormwater management works over the service target forecast period;



- For stormwater facilities within the separated and combined sewer system areas, the costs identified are 100% attributable to residential development since non-residential development is required to provide facilities as part of the local service policy; and
- For water and wastewater services, a 74% residential/26% non-residential allocation has been made based on population versus employment growth over the service target forecast period in the urban area.

7.3.3 Application to Redevelopment of Land (Demolition and Conversion)

If a development involves the demolition and replacement of a building or structure on the same site (within five years prior to the date of payment of D.C.s in regard to such redevelopment was, or is to be demolished, in whole or in part) or the conversion from one principal use to another, the developer shall be allowed a credit equivalent to:

- 1) the number of dwelling units demolished/converted multiplied by the applicable residential D.C. in place at the time the D.C. is payable; and/or
- 2) the G.F.A. of the building demolished/converted multiplied by the current non-residential D.C. in place at the time the D.C. is payable;

provided that such amounts shall not exceed, in total, the amount of the D.C.s otherwise payable with respect to the redevelopment.

7.3.4 Exemptions (full or partial)

1. Statutory exemptions:
 - Industrial building additions of up to and including 50% of the existing G.F.A. (defined in O. Reg. 82/98, section 1) of the building; for industrial building additions that exceed 50% of the existing G.F.A., only the portion of the addition in excess of 50% is subject to D.C.s (subsection 4 (3) of the D.C.A.);
 - Buildings or structures owned by and used for the purposes of any municipality, local board, or Board of Education (section 3);
 - The addition of up to 2 apartments in an existing or new detached, semi-detached, or rowhouse (including in an ancillary structure);



- One additional unit or 1% of existing units in an existing rental residential building;
- A university in Ontario that receives direct, regular, and ongoing operating funding from the Government of Ontario;
- Affordable units and attainable units (to be in force at a later date);
- Affordable inclusionary zoning units;
- Non-profit housing; and
- Discount for rental housing units based on bedroom size (i.e., three or more bedrooms – 25% reduction, two bedrooms – 20% reduction, and all others – 15% reduction).

The following non-statutory exemption recommendations were developed through Exemptions and Policies – 2024 Development Charges Background Study and By-law Update (FCS23103). These exemption policies are based on the recommendations approved by the Development Charges Stakeholders Sub-Committee on November 9, 2023:

2. Recommended Non-statutory exemptions:

- Adaptive reuse of a protected heritage property;
- Agricultural uses;
- Places of worship;
- A building, or part thereof, used for parking but excluding a building or part thereof used for commercial parking; and
- Temporary buildings or structures.

3. Recommended Partial non-statutory exemptions

- A 40% CIPA exemption for all non-residential development (standalone and mixed-use) and 70% CIPA exemption for standalone major office developments (Class A) greater than 20,000 sq.ft. G.F.A. This exemption is limited to building height restrictions set by Council. Note, this partial exemption shall only apply if the amount of the exemption is greater than the exemption/reduction provided through any other non-statutory exemptions;
- A 37% discount for Production Studios and Artist Studios;



- Non-industrial developments within a CIPA or BIA and for office development (excluding medical clinics) is to be phased as follows:
 - First 5,000 sq.ft.: 50% of charge
 - Second 5,000 sq.ft.: 75% of charge
 - 10,000+ sq.ft.: 100% of charge
- The initial 5,000 sq.ft. of G.F.A. of an office development expansion (medical clinics excluded) are D.C. exempt;
- Redevelopment of an existing residential development for the purposes of creating residential facilities within the existing building envelope is exempt from 50% of the D.C.

7.3.5 Phasing in

As required by Bill 23, the calculated D.C. will be phased-in over a five-year period as follows:

- Year 1 – 80% of the maximum charge;
- Year 2 – 85% of the maximum charge;
- Year 3 – 90% of the maximum charge;
- Year 4 – 95% of the maximum charge; and
- Year 5 to expiry – 100% of the maximum charge.

7.3.6 Transition Policy

Where Section 26.2 of the D.C.A. does not apply, the D.C. rates payable are the rates in effect on the date a complete building permit application is received and accepted by the City's Chief Building Official, provided that the permit is issued within six months of the effective date of the first D.C. rate increase following said building permit application.

7.3.7 Deferral Policies

The following deferral policies are proposed to continue:

- Environmental, Remediation, and Site Enhancement (ERASE) Deferral Agreement Policy: if a development has been approved for an ERASE Redevelopment Grant, the General Manager of Finance and Corporate Services



may authorize a D.C. deferral agreement, without interest up to the date on which the final payment of the grant will be made;

- Public Hospitals Deferral Policy: Council may enter into an agreement with a hospital to allow the payment of D.C.s over a term of up to 10 years, including the payment of interest;
- Post-Secondary Deferral Policy: Council may enter into an agreement with a university or post-secondary school for the payment of D.C.s over a term of up to 30 years, including the payment of interest; and
- Non-Residential Development, Mixed Use Development, Residential Facility, Lodging House or Apartment Dwelling Deferral Policy: an agreement may be entered into for the payment of D.C.s for an initial term of up to five years, including the payment of interest. This initial term may be extended by up to two years.

7.3.8 Timing of Collection

The D.C.s for all services and classes are payable upon issuance of a building permit for each dwelling unit, building, or structure, subject to early or late payment agreements entered into by the City and an owner under section 27 of the D.C.A.

Rental housing and institutional developments pay D.C.s in six equal annual payments commencing at occupancy. Moreover, the D.C. amount for all developments occurring within two years of a Site Plan or Zoning By-law Amendment planning approval (for applications submitted after January 1, 2020), shall be determined based on the D.C. in effect on the day of the applicable Site Plan or Zoning By-law Amendment application.

Instalment payments and payments determined at the time of Site Plan or Zoning By-law Amendment application are subject to annual interest charges. The maximum interest rate the City can impose is the average prime rate plus 1%.

7.3.9 Indexing

Indexing of the D.C.s shall be implemented on a mandatory basis annually commencing on June 1, 2024, and each June 1st thereafter, in accordance with the Statistics Canada



Quarterly, Non-Residential Building Construction Price Index (Table 18-10-0276-02)^[1] for the most recent year-over-year period.

7.3.10 The Applicable Areas

The charges developed herein provide for varying charges within the City, as follows:

- All municipal-wide services – the full residential and non-residential charge will be imposed on all lands within the City;
- Wastewater treatment – the full residential and non-residential charge will be imposed anywhere municipal services are provided or have been required to be provided through the local service policy;
- Water distribution and wastewater linear – the full residential and non-residential charge will be imposed based on lands within the Urban area and includes any lands added to the Urban Area as a result of any amendment to the Urban Hamilton Official Plan expanding the Urban Area;
- Stormwater – urban area-specific charges will be imposed based on the combined sewer system and the separated sewer system areas; and
- Dundas/Waterdown – area-specific charges are applicable in addition to City-wide and urban services.

7.4 Other D.C. By-law Provisions

It is recommended that:

7.4.1 Categories of Services for Reserve Fund and Credit Purposes

The City's D.C. collections are reserved in 20 separate reserve funds:

- Services related to a highway;
- Transit services;
- Public works services;

^[1] O. Reg. 82/98 referenced “The Statistics Canada Quarterly, Construction Price Statistics, catalogue number 62-007” as the index source. Since implementation, Statistics Canada has modified this index twice and the above-noted index is the most current. The draft by-law provided herein refers to O. Reg. 82/98 to ensure traceability should this index continue to be modified over time.



- Fire protection services;
- Policing services;
- Outdoor recreation services;
- Indoor recreation services;
- Library services;
- Long-term care services;
- Child care and early years programs;
- P.O.A. services including by-law enforcement;
- Public health services;
- Ambulance services;
- Waste diversion services;
- Water services;
- Wastewater facilities;
- Wastewater linear services;
- Stormwater combined system;
- Stormwater separated system; and
- Dundas/Waterdown special area charge.

It is recommended that the City combine the reserve funds for indoor and outdoor recreation into one reserve fund for parks and recreation.

Appendix D outlines the reserve fund policies that the City is required to follow as per the D.C.A.

7.4.2 By-law In-force Date

A by-law under the D.C.A. comes into force on the day after which the by-law is passed by Council or the day specified in the by-law, whichever is later. The recommended in-force date of the by-laws is June 1, 2024.

7.4.3 Minimum Interest Rate Paid on Refunds and Charged for Inter-Reserve Fund Borrowing

The minimum interest rate is the Bank of Canada rate on the day on which the by-law comes into force (as per section 11 of O. Reg. 82/98).



7.4.4 Area Rating

The D.C.A. required that Council must consider the use of area-specific charges:

1. Section 2 (9) of the D.C.A. now requires a municipality to implement area-specific D.C.s for either specific services which are prescribed and/or for specific municipalities which are to be regulated (note that at this time, no municipalities or services are prescribed by the regulations).
2. Section 10 (2) c.1 of the D.C.A. requires that “the development charges background study shall include consideration of the use of more than one development charge by-law to reflect different needs for services in different areas.”

In regard to the first item, there are no services or specific municipalities identified in the regulations which must be area rated. The second item requires Council to consider the use of area rating.

At present, the City’s by-law provides for water and wastewater services on an urban area basis and stormwater services on a combined versus separated sewer system area basis. All other City services are recovered based on a uniform, City-wide basis. There have been several reasons why area rating has not been imposed on these services, including:

1. All City services, with the exception of water, wastewater, stormwater, and transit, require that the average historical 15-year service standard be calculated. This average service standard, multiplied by growth in the City, establishes an upper ceiling on the amount of funds that can be collected from all developing landowners. Section 4 (4) of O. Reg. 82/98 provides that “if a development charge by-law applies to a part of the municipality, the level of service and average level of service cannot exceed that which would be determined if the by-law applied to the whole municipality.” Put in layperson’s terms, the average service standard multiplied by the growth within the specific area would establish an area-specific ceiling that would significantly reduce the total revenue recoverable for the City, hence potentially resulting in D.C. revenue shortfalls and impacts on property taxes.



2. Extending on item 1, attempting to impose an area charge potentially causes equity issues in transitioning from a City-wide approach to an area-specific approach. For example, if all services were now built (and funded) within Area A (which is 75% built out) and this was funded with some revenues from Areas B and C, moving to an area-rating approach would see Area A contribute no funds to the costs of services in Areas B and C. The D.C.s would be lower in Area A (as all services are now funded) and higher in Areas B and C. As well, funding shortfalls may then potentially encourage the municipality to provide less services to Areas B and C due to reduced revenue.
3. Many services provided (roads, parks, recreation facilities, library, etc.) are not restricted to one specific area and are often used by all residents. For example, arenas located in different parts of the City will be used by residents from all areas depending on the programming of the facility (i.e., a public skate is available each night, but at a different arena; hence usage of any one facility at any given time is based on programming availability).

For the reasons noted above, it is recommended that Council calculate the charges on a uniform City-wide basis for all services/classes of services other than water, wastewater and stormwater. It is recommended that the charges for water and wastewater services be imposed on an urban area basis, whereas the stormwater charge be imposed on an area-specific basis for the combined versus separated sewer system areas.

It is recommended that the City continue the special area charge for the Dundas/Waterdown area that has been in effect since amalgamation.

7.5 Other Recommendations

It is recommended that Council:

“Whenever appropriate, request that grants, subsidies and other contributions be clearly designated by the donor as being to the benefit of existing development or new development, as applicable;”

“Adopt the assumptions contained herein as an ‘anticipation’ with respect to capital grants, subsidies and other contributions;”



“Continue the D.C. approach to calculate the charges on a uniform City-wide basis for all services, except water, wastewater and stormwater and on an urban-area basis for water and wastewater and on an area-specific basis for the combined versus separated sewer system areas for stormwater services;”

“Impose the D.C. for wastewater treatment services on developments outside the urban service areas which connect to the municipal wastewater system;”

“Continue the area-specific D.C. for Dundas/Waterdown;”

“Approve the capital project listing set out in Chapter 5 of the D.C. Background Study dated December 21, 2023, subject to further annual review during the capital budget process;”

“Approve the D.C. Background Study dated December 21, 2023, as amended (if applicable);”

“Determine that no further public meeting is required;” and

“Approve the D.C. By-laws as set out in Appendix J.”



Chapter 8

By-law Implementation



8. By-law Implementation

8.1 Public Consultation Process

8.1.1 Introduction

This chapter addresses the mandatory, formal public consultation process (section 8.1.2), as well as the optional, informal consultation process (section 8.1.3). The latter is designed to seek the co-operation and participation of those involved, in order to produce the most suitable policy. Section 8.1.4 addresses the anticipated impact of the D.C. on development from a generic viewpoint.

8.1.2 Public Meeting of Council

Section 12 of the D.C.A. indicates that before passing a D.C. by-law, Council must hold at least one public meeting, giving at least 20 clear days' notice thereof, in accordance with the regulation. Council must also ensure that the proposed by-law(s) and background report are made available to the public at least two weeks prior to the (first) meeting.

Any person who attends such a meeting may make representations related to the proposed by-law(s).

If a proposed by-law(s) is changed following such a meeting, Council must determine whether a further meeting (under this section) is necessary (i.e., if the proposed by-law(s) which is proposed for adoption has been changed in any respect, Council should formally consider whether an additional public meeting is required, incorporating this determination as part of the final by-law(s) or associated resolution. It is noted that Council's decision, once made, is final and not subject to review by a Court or the Ontario Land Tribunal (OLT) (formerly the Local Planning Appeal Tribunal).

8.1.3 Other Consultation Activity

There are three broad groupings of the public who are generally the most concerned with City D.C. policy:

1. The first grouping is the residential development community, consisting of land developers and builders, who are typically responsible for generating most of the



D.C. revenues. Others, such as realtors, are directly impacted by D.C. policy. They are, therefore, potentially interested in all aspects of the charge, particularly the quantum by unit type, projects to be funded by the D.C. and the timing thereof, and City policy with respect to development agreements, D.C. credits, and front-ending requirements.

2. The second public grouping embraces the public at large and includes taxpayer coalition groups and others interested in public policy.
3. The third grouping is the industrial/commercial/institutional development sector, consisting of land developers and major owners or organizations with significant construction plans, such as hotels, entertainment complexes, shopping centres, offices, industrial buildings, and institutions. Also involved are organizations such as Industry Associations, the Chamber of Commerce, the Board of Trade, and the Economic Development Agencies, who are all potentially interested in City D.C. policy. Their primary concern is frequently with the quantum of the charge, G.F.A. exclusions such as basements, mechanical or indoor parking areas, or exemptions and phase-in or capping provisions in order to moderate the impact.

8.2 Anticipated Impact of the Charge on Development

The establishment of sound D.C. policy often requires the achievement of an acceptable balance between two competing realities. The first is that high non-residential D.C.s can, to some degree, represent a barrier to increased economic activity and sustained industrial/commercial growth, particularly for capital intensive uses.

On the other hand, D.C.s or other City capital funding sources need to be obtained in order to help ensure that the necessary infrastructure and amenities are installed. The timely installation of such works is a key initiative in providing adequate service levels and in facilitating strong economic growth and investment.



8.3 Implementation Requirements

8.3.1 Introduction

Once the City has calculated the charge, prepared the complete background study, carried out the public process, and passed new by-laws, the emphasis shifts to implementation matters. These include notices, potential appeals and complaints, credits, front-ending agreements, subdivision agreement conditions, and finally the collection of revenues and funding of projects.

The sections that follow provide an overview of the requirements in each case.

8.3.2 Notice of Passage

In accordance with section 13 of the D.C.A., when a D.C. by-law(s) is passed, the City clerk shall give written notice of the passing and of the last day for appealing the by-law(s) (the day that is 40 days after the day it was passed). Such notice must be given no later than 20 days after the day the by-law(s) are passed (i.e., as of the day of newspaper publication or the mailing of the notice).

Section 10 of O. Reg. 82/98 further defines the notice requirements which are summarized as follows:

- Notice may be given by publication in a newspaper which is (in the clerk's opinion) of sufficient circulation to give the public reasonable notice, or by personal service, fax or mail to every owner of land in the area to which the by-law relates;
- Subsection 10 (4) lists the persons/organizations who must be given notice; and
- Subsection 10 (5) lists the eight items that the notice must cover.

8.3.3 By-law Pamphlet

In addition to the “notice” information, the City must prepare a “pamphlet” explaining each D.C. by-law in force, setting out:

- A description of the general purpose of the D.C.s;
- The “rules” for determining if a charge is payable in a particular case and for determining the amount of the charge;



- The services to which the D.C.s relate; and
- A description of the general purpose of the Treasurer's statement and where it may be received by the public.

Where a by-law is not appealed to the OLT, the pamphlet must be readied within 60 days after the by-laws come into force. Later dates apply to appealed by-laws.

The City must give one copy of the most recent pamphlet, without charge, to any person who requests one.

8.3.4 Appeals

Sections 13 to 19 of the D.C.A. set out the requirements relative to making and processing a D.C. by-law appeal and OLT hearing in response to an appeal. Any person or organization may appeal a D.C. by-law to the OLT by filing a notice of appeal with the City clerk, setting out the objection to the by-law and the reasons supporting the objection. This must be done by the last day for appealing the by-law, which is 40 days after the by-law is passed.

The City is carrying out a public consultation process, in order to address the issues that come forward as part of that process, thereby avoiding or reducing the need for an appeal to be made.

8.3.5 Complaints

A person required to pay a D.C., or their agent, may complain to the City Council imposing the charge that:

- The amount of the charge was incorrectly determined;
- The credit to be used against the D.C. was incorrectly determined; or
- There was an error in the application of the D.C. by-law(s).

Sections 20 to 25 of the D.C.A. set out the requirements that exist, including the fact that a complaint may not be made later than 90 days after a D.C. (or any part of it) is payable. A complainant may appeal the decision of City Council to the OLT.



8.3.6 Credits

Sections 38 to 41 of the D.C.A. set out a number of credit requirements, which apply where a City agrees to allow a person to perform work in the future that relates to a service in the D.C. by-law.

These credits would be used to reduce the amount of D.C.s to be paid. The value of the credit is limited to the reasonable cost of the work which does not exceed the average level of service. The credit applies only to the service to which the work relates unless the City agrees to expand the credit to other services for which a D.C. is payable.

8.3.7 Front-Ending Agreements

The City and one or more landowners may enter into a front-ending agreement that provides for the costs of a project which will benefit an area in the City to which the D.C. by-law applies. Such an agreement can provide for the costs to be borne by one or more parties to the agreement who are, in turn, reimbursed in future by persons who develop land defined in the agreement.

Part III of the D.C.A. (sections 44 to 58) addresses front-ending agreements and removes some of the obstacles to their use which were contained in the D.C.A., 1989. Accordingly, the City assesses whether this mechanism is appropriate for its use, as part of funding projects prior to City funds being available.

8.3.8 Severance and Subdivision Agreement Conditions

Section 59 of the D.C.A. prevents a municipality from imposing, directly or indirectly, a charge related to development or a requirement to construct a service related to development, by way of a condition or agreement under section 51 or section 53 of the *Planning Act*, except for:

- (a) “local services, related to a plan of subdivision or within the area to which the plan relates, to be installed or paid for by the owner as a condition of approval under section 51 of the *Planning Act*,” and
- (b) “local services to be installed or paid for by the owner as a condition of approval under section 53 of the *Planning Act*.”

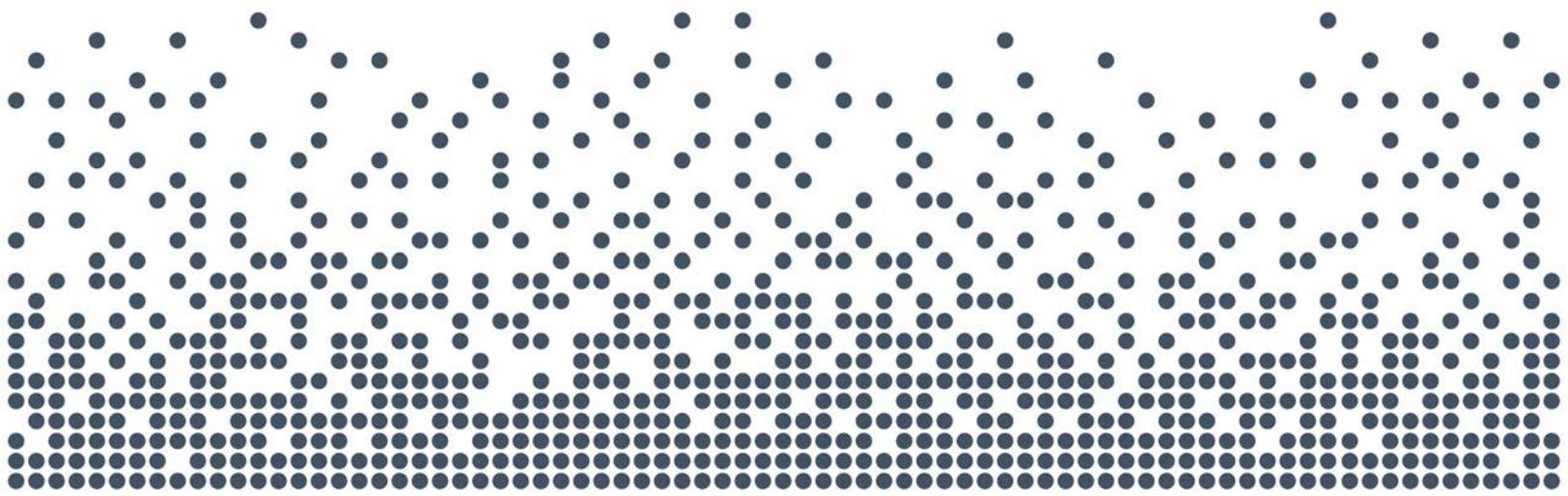


It is also noted that subsection 59 (4) of the D.C.A. requires that the municipal approval authority for a draft plan of subdivision under subsection 51 (31) of the *Planning Act*, use its power to impose conditions to ensure that the first purchaser of newly subdivided land is informed of all the D.C.s related to the development, at the time the land is transferred.

In this regard, if the City in question is a commenting agency, in order to comply with subsection 59 (4) of the D.C.A. it would need to provide to the approval authority, information regarding the applicable City D.C.s related to the site.

If the City is an approval authority for the purposes of section 51 of the *Planning Act*, it would be responsible to ensure that it collects information from all entities that can impose a D.C.

The most effective way to ensure that purchasers are aware of this condition would be to require it as a provision in a registered subdivision agreement, so that any purchaser of the property would be aware of the charges at the time the title was searched prior to closing a transaction conveying the lands.



Appendices



Appendix A

Background Information on Residential and Non- Residential Growth Forecast



Schedule 1 City of Hamilton Residential Growth Forecast Summary

Year	Population (Including Census Undercount) ^[1]	Excluding Census Undercount			Housing Units						Persons Per Unit (P.P.U.): Total Population/ Total Households	
		Population	Institutional Population	Population Excluding Institutional Population	Singles & Semi-Detached	Multiple Dwellings ^[2]	Apartments ^[3]	Other	Total Households	Equivalent Institutional Households		
Historical	Mid 2011	534,820	519,949	10,309	509,640	124,433	27,760	50,800	813	203,806	9,372	2.551
	Mid 2016	552,270	536,917	8,982	527,935	127,705	31,405	51,680	810	211,600	8,165	2.537
	Mid 2021	585,640	569,353	8,438	560,915	131,900	34,835	55,510	560	222,805	7,671	2.555
Forecast	Late 2023	608,640	591,714	8,675	583,039	133,641	38,018	59,930	560	232,149	7,886	2.549
	Late 2033	672,550	653,850	9,651	644,199	143,468	49,172	74,175	560	267,375	8,774	2.445
Incremental	Mid 2011 - Mid 2016	17,450	16,968	-1,327	18,295	3,272	3,645	880	-3	7,794	-1,207	
	Mid 2016 - Mid 2021	33,370	32,436	-544	32,980	4,195	3,430	3,830	-250	11,205	-494	
	Mid 2021 - Late 2023	23,000	22,361	237	22,124	1,741	3,183	4,420	0	9,344	215	
	Late 2023 - Late 2033	63,910	62,136	976	61,160	9,827	11,154	14,245	0	35,226	888	

^[1] Population includes the Census undercount estimated at approximately 2.9% and has been rounded.

^[2] Includes townhouses and apartments in duplexes.

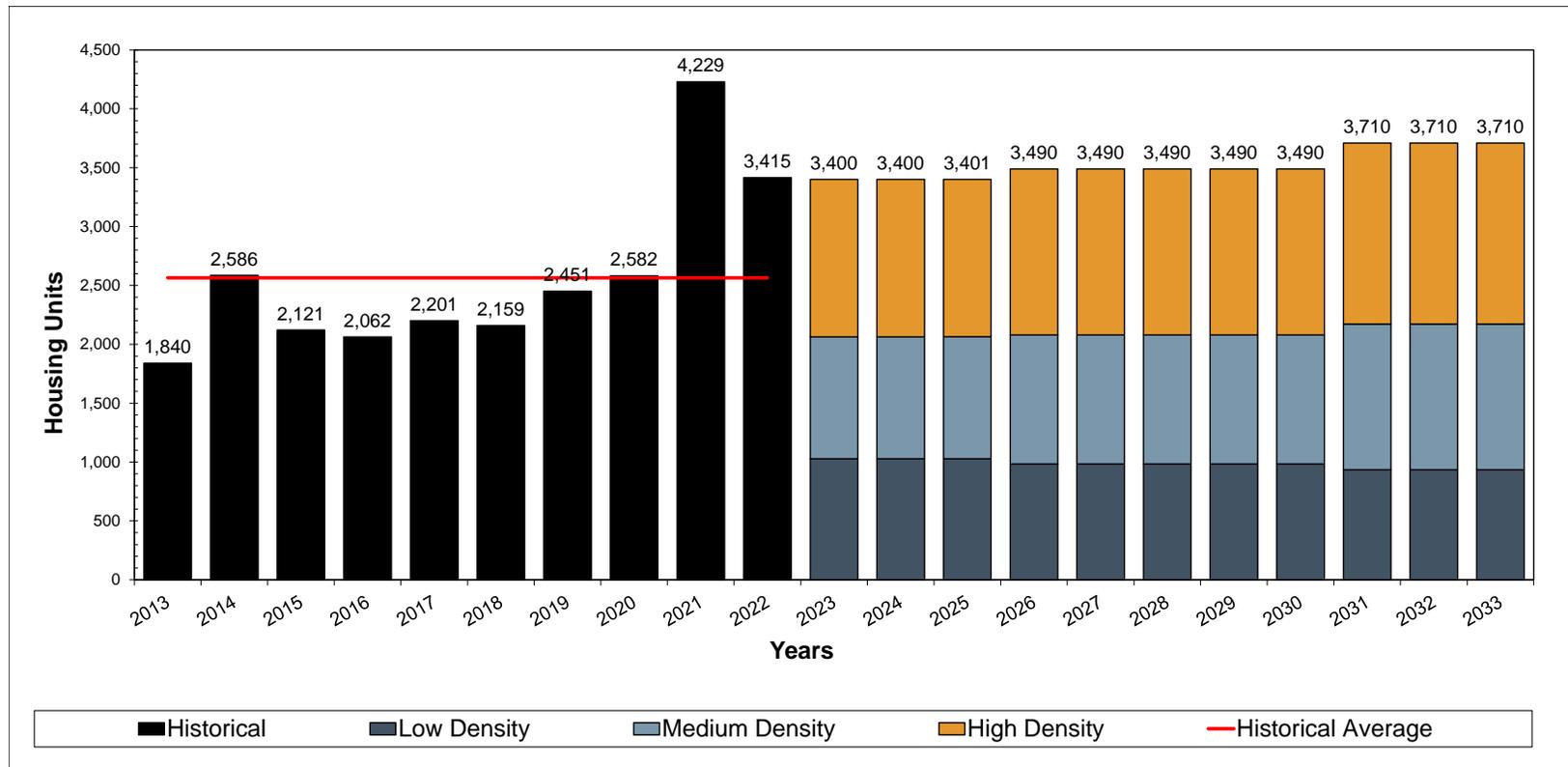
^[3] Includes bachelor, 1-bedroom, and 2-bedroom+ apartment units.

Note: Numbers may not add due to rounding.

Source: Derived from City of Hamilton Official Plan Amendment No. 167 to the Urban Hamilton Official Plan Respecting Municipal Comprehensive Review – Phase 1 (City-Wide), by Watson & Associates Economists Ltd.



Figure 1
City of Hamilton
Annual Housing Forecast^[1]



^[1] Growth forecast represents calendar year.

Source: Historical housing activity derived from City of Hamilton building permit data, 2013 to 2022.



Schedule 2
City of Hamilton
Estimate of the Anticipated Amount, Type and Location of
Residential Development for Which Development Charges can be Imposed

Development Location	Timing	Single & Semi-Detached	Multiples ^[1]	Apartments ^[2]	Total Residential Units	Gross Population In New Units	Existing Unit Population Change	Net Population Increase, Excluding Institutional	Institutional Population	Net Population Including Institutional
Combined Sewer System	2023 - 2033	92	932	6,109	7,133	13,297	-10,123	3,174	50	3,224
Separate Sewer System - Other Built Boundary	2023 - 2033	949	1,909	6,052	8,910	18,803	-13,067	5,736	90	5,827
Separate Sewer System - Greenfield	2023 - 2033	8,503	8,313	2,084	18,900	55,551	-2,375	53,176	836	54,011
Urban Total	2023 - 2033	9,544	11,154	14,245	34,943	87,651	-25,565	62,086	976	63,062
Rural Total	2023 - 2033	283	0	0	283	1,000.0	-1,926	(926)	0	(926)
City of Hamilton	2023 - 2033	9,827	11,154	14,245	35,226	88,651	-27,491	61,160	976	62,136

^[1] Includes townhouses and apartments in duplexes.

^[2] Includes bachelor, 1-bedroom, and 2-bedroom+ apartment units.

Source: Watson & Associates Economists Ltd.



Schedule 3
City of Hamilton
Current Year Growth Forecast
Mid-2021 to Late 2023

		Population
Mid 2021 Population		569,353
Occupants of New Housing Units, Mid 2021 to Late 2023	<i>Units (2)</i>	9,344
	<i>multiplied by P.P.U. (3)</i>	2,316
	<i>gross population increase</i>	21,639
Occupants of New Equivalent Institutional Units, Mid 2021 to Late 2023	<i>Units</i>	215
	<i>multiplied by P.P.U. (3)</i>	1,100
	<i>gross population increase</i>	236
Decline in Housing Unit Occupancy, Mid 2021 to Late 2023	<i>Units (4)</i>	222,805
	<i>multiplied by P.P.U. decline rate (5)</i>	0.002
	<i>total decline in population</i>	486
Population Estimate to Late 2023		591,714
<i>Net Population Increase, Mid 2021 to Late 2023</i>		22,361

- (1) 2021 population based on Statistics Canada Census unadjusted for Census undercount.
- (2) Estimated residential units constructed, Mid-2021 to the beginning of the growth period assuming a six-month lag between construction and occupancy.
- (3) Average number of persons per unit (P.P.U.) is assumed to be:

Structural Type	Persons Per Unit ¹ (P.P.U.)	% Distribution of Estimated Units ²	Weighted Persons Per Unit Average
<i>Singles & Semi Detached</i>	3.403	19%	0.634
<i>Multiples (6)</i>	2.625	34%	0.894
<i>Apartments (7)</i>	1.665	47%	0.788
Total		100%	2.316

¹ Based on 2021 Census custom database

² Based on Building permit/completion activity

- (4) 2021 households taken from Statistics Canada Census.
- (5) Decline occurs due to aging of the population and family life cycle changes, lower fertility rates and changing economic conditions.
- (6) Includes townhouses and apartments in duplexes.
- (7) Includes bachelor, 1-bedroom and 2-bedroom+ apartments.

Note: Numbers may not add to totals due to rounding.



Schedule 4a
City of Hamilton
Short-Term Growth Forecast
Service Target Forecast (Services Related to a Highway)

			Population
Late 2023 Population			591,714
Occupants of New Housing Units, Service Target Forecast (Services Related to a Highway)	<i>Units (2)</i>	25,951	
	<i>multiplied by P.P.U. (3)</i>	2.529	
	<i>gross population increase</i>	65,620	65,620
Occupants of New Equivalent Institutional Units, Service Target Forecast (Services Related to a Highway)	<i>Units</i>	620	
	<i>multiplied by P.P.U. (3)</i>	1.100	
	<i>gross population increase</i>	682	682
Decline in Housing Unit Occupancy, Service Target Forecast (Services Related to a Highway)	<i>Units (4)</i>	232,149	
	<i>multiplied by P.P.U. decline rate (5)</i>	-0.104	
	<i>total decline in population</i>	-24,145	-24,145
Population Estimate, Service Target Forecast (Services Related to a Highway)			633,871
Net Population Increase, Service Target Forecast (Services Related to a Highway)			42,157

(1) Late 2023 Population based on:

2021 Population (569,353) + Mid 2016 to Late 2023 estimated housing units to beginning of forecast period (9,344 x 2.316 = 21,639) + (215 x 1.1 = 236) + (222,805 x 0.002 = 486) = 591,714

(2) Based upon forecast building permits/completions assuming a lag between construction and occupancy.

(3) Average number of persons per unit (P.P.U.) is assumed to be:

Structural Type	Persons Per Unit ¹ (P.P.U.)	% Distribution of Estimated Units ²	Weighted Persons Per Unit Average
<i>Singles & Semi Detached</i>	3.533	29%	1.020
<i>Multiples (6)</i>	2.637	31%	0.819
<i>Apartments (7)</i>	1.721	40%	0.690
<i>one bedroom or less</i>	1.342		
<i>two bedrooms or more</i>	2.166		
Total		100%	2.529

¹ Persons per unit based on adjusted Statistics Canada Custom 2021 Census database.

² Forecast unit mix based upon historical trends and housing units in the development process.

(4) Late 2023 households based upon 2016 Census (222,805 units) + Mid 2016 to Late 2023 unit estimate (9,344 units) = 232,149 units.

(5) Decline occurs due to aging of the population and family life cycle changes, lower fertility rates and changing economic conditions.

(6) Includes townhouses and apartments in duplexes.

(7) Includes bachelor, 1-bedroom and 2-bedroom+ apartments.

Note: Numbers may not add to totals due to rounding.



Schedule 4b
City of Hamilton
Short-Term Growth Forecast
Service Target Forecast (Stormwater – Combined Sewer System Area)

		Population
Occupants of New Housing Units, Service Target Forecast (Stormwater: Combined Sewer System)	<i>Units (1)</i>	5,203
	<i>multiplied by P.P.U. (2)</i>	1.864
	<i>gross population increase</i>	9,698
		9,698
Occupants of New Equivalent Institutional Units, Service Target Forecast (Stormwater: Combined Sewer System)	<i>Units</i>	12
	<i>multiplied by P.P.U. (2)</i>	1.100
	<i>gross population increase</i>	13
		13
Decline in Housing Unit Occupancy, Service Target Forecast (Stormwater: Combined Sewer System)		
	<i>total decline in population (3)</i>	-8,891
		-8,891
<i>Net Population Increase, Service Target Forecast (Stormwater: Combined Sewer System)</i>		<i>821</i>

(1) Based upon forecast building permits/completions assuming a lag between construction and occupancy.

(2) Average number of persons per unit (P.P.U.) is assumed to be:

Structural Type	Persons Per Unit ¹ (P.P.U.)	% Distribution of Estimated Units ²	Weighted Persons Per Unit Average
<i>Singles & Semi Detached</i>	3.533	1%	0.048
<i>Multiples (4)</i>	2.637	13%	0.341
<i>Apartments (5)</i>	1.721	86%	1.475
<i>one bedroom or less</i>	1.342		
<i>two bedrooms or more</i>	2.166		
Total		100%	1.864

¹ Persons per unit based on Statistics Canada Custom 2016 Census database.

² Forecast unit mix based upon historical trends and housing units in the development process.

(3) Decline occurs due to aging of the population and family life cycle changes, lower fertility rates and changing economic conditions.

(4) Includes townhouses and apartments in duplexes.

(5) Includes bachelor, 1-bedroom and 2-bedroom+ apartments.

Note: Numbers may not add to totals due to rounding.



Schedule 4c
City of Hamilton
Short-Term Growth Forecast
Service Target Forecast (Stormwater – Separated Sewer System Area)

		Population
Occupants of New Housing Units, Service Target Forecast (Stormwater: Separated Sewer System)	<i>Units (1)</i>	20,536
	<i>multiplied by P.P.U. (2)</i>	2.687
	<i>gross population increase</i>	55,173
Occupants of New Equivalent Institutional Units, Service Target Forecast (Stormwater: Separated Sewer System)	<i>Units</i>	607
	<i>multiplied by P.P.U. (2)</i>	1.100
	<i>gross population increase</i>	668
Decline in Housing Unit Occupancy, Service Target Forecast (Stormwater: Separated Sewer System)	<i>total decline in population (3)</i>	-13,562
		-13,562
<i>Net Population Increase, Service Target Forecast (Stormwater: Separated Sewer System)</i>		<i>42,279</i>

(1) Based upon forecast building permits/completions assuming a lag between construction and occupancy.

(2) Average number of persons per unit (P.P.U.) is assumed to be:

Structural Type	Persons Per Unit ¹ (P.P.U.)	% Distribution of Estimated Units ²	Weighted Persons Per Unit Average
<i>Singles & Semi Detached</i>	3.533	35%	1.240
<i>Multiples (4)</i>	2.637	36%	0.949
<i>Apartments (5)</i>	1.721	29%	0.498
<i>one bedroom or less</i>	1.342		
<i>two bedrooms or more</i>	2.166		
Total		100%	2.687

¹ Persons per unit based on Statistics Canada Custom 2016 Census database.

² Forecast unit mix based upon historical trends and housing units in the development process.

(3) Decline occurs due to aging of the population and family life cycle changes, lower fertility rates and changing economic conditions.

(4) Includes townhouses and apartments in duplexes.

(5) Includes bachelor, 1-bedroom and 2-bedroom+ apartments.

Note: Numbers may not add to totals due to rounding.



Schedule 4d
City of Hamilton
Short-Term Growth Forecast
Service Target Forecast (Water and Wastewater)

		Population
Occupants of New Housing Units, Service Target Forecast (Water and Wastewater)	<i>Units (1)</i>	25,739
	<i>multiplied by P.P.U. (2)</i>	2,520
	<i>gross population increase</i>	64,871
Occupants of New Equivalent Institutional Units, Service Target Forecast (Water and Wastewater)	<i>Units</i>	619
	<i>multiplied by P.P.U. (2)</i>	1,100
	<i>gross population increase</i>	681
Decline in Housing Unit Occupancy, Service Target Forecast (Water and Wastewater)		
	<i>total decline in population (3)</i>	-22,453
<i>Net Population Increase, Service Target Forecast (Water and Wastewater)</i>		43,099

(1) Based upon forecast building permits/completions assuming a lag between construction and occupancy.

(2) Average number of persons per unit (P.P.U.) is assumed to be:

Structural Type	Persons Per Unit ¹ (P.P.U.)	% Distribution of Estimated Units ²	Weighted Persons Per Unit Average
<i>Singles & Semi Detached</i>	3.533	28%	0.999
<i>Multiples (4)</i>	2.637	31%	0.826
<i>Apartments (5)</i>	1.721	40%	0.695
<i>one bedroom or less</i>	1.342		
<i>two bedrooms or more</i>	2.166		
Total		100%	2.520

¹ Persons per unit based on Statistics Canada Custom 2016 Census database.

² Forecast unit mix based upon historical trends and housing units in the development process.

(3) Decline occurs due to aging of the population and family life cycle changes, lower fertility rates and changing economic conditions.

(4) Includes townhouses and apartments in duplexes.

(5) Includes bachelor, 1-bedroom and 2-bedroom+ apartments.

Note: Numbers may not add to totals due to rounding.



Schedule 5
City of Hamilton
10-Year Growth Forecast
Late 2023 to Late 2033

		Population	
Late 2023 Population		591,714	
Occupants of New Housing Units, Late 2023 to Late 2033	<i>Units (2)</i>	35,226	
	<i>multiplied by P.P.U. (3)</i>	2,517	
	<i>gross population increase</i>	88,651	88,651
Occupants of New Equivalent Institutional Units, Late 2023 to Late 2033	<i>Units</i>	888	
	<i>multiplied by P.P.U. (3)</i>	1,100	
	<i>gross population increase</i>	976	976
Decline in Housing Unit Occupancy, Late 2023 to Late 2033	<i>Units (4)</i>	232,149	
	<i>multiplied by P.P.U. decline rate (5)</i>	-0.118	
	<i>total decline in population</i>	-27,491	-27,491
Population Estimate to Late 2033		653,850	
<i>Net Population Increase, Late 2023 to Late 2033</i>		62,136	

(1) Late 2023 Population based on:

2021 Population (569,353) + Mid 2016 to Late 2023 estimated housing units to beginning of forecast period (9,344 x 2.316 = 21,639) + (215 x 1.1 = 236) + (222,805 x 0.002 = 486) = 591,714

(2) Based upon forecast building permits/completions assuming a lag between construction and occupancy.

(3) Average number of persons per unit (P.P.U.) is assumed to be:

Structural Type	Persons Per Unit ¹ (P.P.U.)	% Distribution of Estimated Units ²	Weighted Persons Per Unit Average
<i>Singles & Semi Detached</i>	3.533	28%	0.986
<i>Multiples (6)</i>	2.637	32%	0.835
<i>Apartments (7)</i>	1.721	40%	0.696
<i>one bedroom or less</i>	1.342		
<i>two bedrooms or more</i>	2.166		
Total		100%	2.517

¹ Persons per unit based on adjusted Statistics Canada Custom 2021 Census database.

² Forecast unit mix based upon historical trends and housing units in the development process.

(4) Late 2023 households based upon 2016 Census (222,805 units) + Mid 2016 to Late 2023 unit estimate (9,344 units) = 232,149 units.

(5) Decline occurs due to aging of the population and family life cycle changes, lower fertility rates and changing economic conditions.

(6) Includes townhouses and apartments in duplexes.

(7) Includes bachelor, 1-bedroom and 2-bedroom+ apartments.

Note: Numbers may not add to totals due to rounding.



Schedule 6
City of Hamilton
Historical Residential Building Permits
Years 2013 to 2022

Year	Residential Building Permits			
	Singles & Semi Detached	Multiples ^[1]	Apartments ^[2]	Total
2013	1,102	532	206	1,840
2014	933	767	886	2,586
2015	1,037	548	536	2,121
2016	1,113	681	268	2,062
2017	773	724	704	2,201
Sub-total	4,958	3,252	2,600	10,810
Average (2013 - 2017)	992	650	520	2,162
% Breakdown	45.9%	30.1%	24.1%	100.0%
2018	641	644	874	2,159
2019	899	703	849	2,451
2020	769	678	1,135	2,582
2021	533	1,403	2,293	4,229
2022	694	1,262	1,459	3,415
Sub-total	3,536	4,690	6,610	14,836
Average (2018 - 2022)	707	938	1,322	2,967
% Breakdown	23.8%	31.6%	44.6%	100.0%
2013 - 2022				
Total	8,494	7,942	9,210	25,646
Average	849	794	921	2,565
% Breakdown	33.1%	31.0%	35.9%	100.0%

^[1] Includes townhouses and apartments in duplexes.

^[2] Includes bachelor, 1-bedroom, and 2-bedroom+ apartment units.

Source: Historical housing activity derived from City of Hamilton data, by Watson & Associates Economists Ltd.



Schedule 7
City of Hamilton
Persons Per Unit by Age and Type of Dwelling
(2021 Census)

Age of Dwelling	Singles and Semi-Detached						15 Year Average	15 Year Average Adjusted ^[3]
	< 1 BR	1 BR	2 BR	3/4 BR	5+ BR	Total		
1-5	-	2.550	2.435	3.367	4.857	3.403		
6-10	-	-	2.236	3.557	4.973	3.625		
11-15	-	-	2.014	3.474	4.681	3.518	3.515	3.533
16-20	-	2.158	2.012	3.312	4.294	3.329		
20-25	-	1.917	1.825	3.191	4.373	3.215		
25-30	-	2.077	1.917	3.084	4.278	3.147		
30+	2.692	1.641	1.917	2.705	3.831	2.654		
Total	2.729	1.749	1.936	2.882	4.068	2.845		

Age of Dwelling	Multiples ^[1]						15 Year Average	15 Year Average Adjusted ^[3]
	< 1 BR	1 BR	2 BR	3/4 BR	5+ BR	Total		
1-5	1.571	1.434	2.055	2.942	-	2.625		
6-10	-	1.324	2.008	2.850	3.727	2.619		
11-15	-	1.438	1.950	2.708	3.273	2.563	2.602	2.637
16-20	-	1.682	1.748	2.673	-	2.413		
20-25	-	1.571	1.752	2.687	-	2.409		
25-30	-	1.694	2.051	2.938	-	2.642		
30+	-	1.407	1.970	2.872	3.629	2.550		
Total	2.156	1.442	1.948	2.837	3.588	2.551		

Age of Dwelling	Apartments ^[2]						15 Year Average	15 Year Average Adjusted ^[3]
	< 1 BR	1 BR	2 BR	3/4 BR	5+ BR	Total		
1-5	-	1.314	2.026	2.615	-	1.665		
6-10	-	1.337	2.112	3.714	-	1.811		
11-15	-	1.443	1.785	3.250	-	1.723	1.733	1.721
16-20	-	1.490	1.810	3.400	-	1.808		
20-25	-	1.417	2.240	3.760	-	1.944		
25-30	1.909	1.405	2.194	3.793	-	1.902		
30+	1.186	1.295	2.000	2.765	2.906	1.701		
Total	1.229	1.311	2.011	2.861	3.031	1.720		

Age of Dwelling	All Density Types					
	< 1 BR	1 BR	2 BR	3/4 BR	5+ BR	Total
1-5	1.875	1.401	2.117	3.203	4.780	2.751
6-10	2.250	1.424	2.077	3.333	4.792	3.122
11-15	1.600	1.569	1.925	3.222	4.577	3.057
16-20	2.800	1.592	1.845	3.158	4.290	2.922
20-25	-	1.478	1.982	3.070	4.245	2.814
25-30	2.400	1.466	2.104	3.064	4.140	2.758
30+	1.371	1.330	1.965	2.730	3.803	2.370
Total	1.534	1.356	1.975	2.873	4.011	2.517

[1] Includes townhouses and apartments in duplexes.

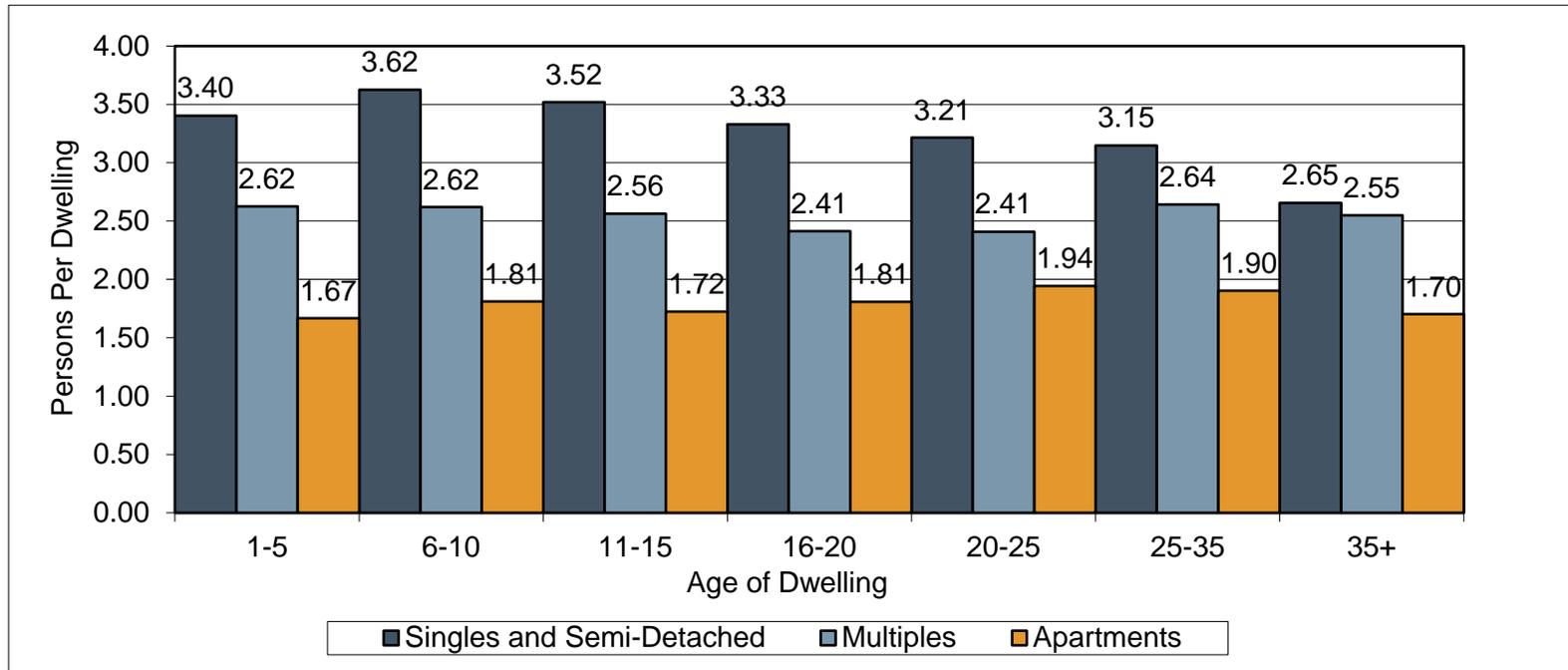
[2] Includes bachelor, 1-bedroom and 2-bedroom+ apartments.

[3] Adjusted based on historical trends.

Notes: Does not include Statistics Canada data classified as "Other." P.P.U. not calculated for samples less than or equal to 50 dwelling units and does not include institutional population.



Schedule 8
City of Hamilton
Persons Per Unit Structural Type and Age of Dwelling
(2021 Census)





Schedule 9a City of Hamilton Employment Forecast, 2023 to 2033

Period	Population	Activity Rate								Employment								
		Primary	Work at Home	Industrial	Commercial/Population Related	Institutional	Total	N.F.P.O.W. ^[1]	Total Including N.F.P.O.W.	Primary	Work at Home	Industrial	Commercial/Population Related	Institutional	Total	N.F.P.O.W. ^[1]	Total Employment (Including N.F.P.O.W.)	Total (Excluding Work at Home and N.F.P.O.W.)
Mid 2011	519,949	0.3%	2.7%	8.5%	13.5%	12.0%	37.1%	5.1%	42.2%	1,780	14,010	44,408	70,258	62,395	192,850	26,345	219,195	178,840
Mid 2016	536,917	0.3%	2.9%	8.9%	13.8%	11.9%	37.9%	5.4%	43.3%	1,845	15,805	47,760	74,260	63,665	203,335	29,160	232,495	187,530
Late 2023	591,714	0.3%	3.5%	8.6%	12.9%	11.7%	37.1%	5.4%	42.6%	1,850	20,875	51,169	76,450	69,440	219,784	32,056	251,840	198,909
Late 2033	653,850	0.3%	3.4%	8.7%	13.6%	11.5%	37.1%	5.4%	42.8%	1,873	22,476	57,158	88,814	75,019	245,340	35,422	280,762	222,864
Incremental Change																		
Mid 2011 - Mid 2016	16,968	0.000	0.002	0.004	0.003	-0.001	0.008	0.004	0.011	65	1,795	3,353	4,003	1,270	10,485	2,815	13,300	8,690
Mid 2016 - Mid 2021	32,436	0.000	0.000	-0.004	-0.007	-0.006	-0.018	0.003	-0.015	0	985	473	426	384	2,268	3,237	5,505	1,283
Mid 2016 - Late 2023	54,797	0.0%	0.6%	-0.2%	-0.9%	-0.1%	-0.7%	0.0%	-0.7%	5	5,070	3,409	2,190	5,775	16,449	2,896	19,345	11,379
Late 2023 - Late 2033	62,136	0.0%	-0.1%	0.1%	0.7%	-0.3%	-0.1%	0.0%	0.2%	23	1,601	5,989	12,364	5,579	25,556	3,366	28,922	23,955
Annual Average																		
Mid 2011 - Mid 2016	3,394	0.000	0.000	0.001	0.001	0.000	0.002	0.001	0.002	13	359	671	801	254	2,097	563	2,660	1,738
Mid 2016 - Late 2023	7,306	0.0%	0.1%	0.0%	-0.1%	0.0%	-0.1%	0.0%	-0.1%	1	676	455	292	770	2,193	386	2,579	1,517
Late 2023 - Late 2033	6,214	0.0%	0.0%	0.0%	0.1%	0.0%	0.0%	0.0%	0.0%	2	160	599	1,236	558	2,556	337	2,892	2,396

^[1] Statistics Canada defines no fixed place of work (N.F.P.O.W.) employees as "persons who do not go from home to the same workplace location at the beginning of each shift. Such persons include building and landscape contractors, travelling salespersons, independent truck drivers, etc."

Note: Statistics Canada 2021 Census place of work employment data has been reviewed. The 2021 Census employment results have not been utilized due to a significant increase in work at home employment captured due to Census enumeration occurring during the provincial COVID-19 lockdown from April 1, 2021, to June 14, 2021.

Source: Derived from City of Hamilton Official Plan Amendment No. 167 to the Urban Hamilton Official Plan Respecting Municipal Comprehensive Review – Phase 1 (City-Wide), by Watson & Associates Economists Ltd.



Schedule 9b
City of Hamilton
Employment and Gross Floor Area (G.F.A.) Forecast, 2023 to 2033

Period	Population	Employment					Gross Floor Area in Square Feet (Estimated) ^[1]			
		Primary	Industrial	Commercial/ Population Related	Institutional ^[2]	Total	Industrial	Commercial/ Population Related	Institutional	Total
Mid 2011	519,949	1,780	44,408	70,258	62,395	178,840				
Mid 2016	536,917	1,845	47,760	74,260	63,665	187,530				
Late 2023	591,714	1,850	51,169	76,450	69,440	198,909				
Late 2033	653,850	1,873	57,158	88,814	74,564	222,409				
Incremental Change										
Mid 2011 - Mid 2016	16,968	65	3,353	4,003	1,270	8,690				
Mid 2016 - Late 2023	54,797	5	3,409	2,190	5,775	11,379				
Late 2023 - Late 2033	62,136	23	5,989	12,364	5,124	23,500	7,186,800	4,945,600	3,485,200	15,617,600
Annual Average										
Mid 2011 - Mid 2016	3,394	13	671	801	254	1,738				
Mid 2016 - Late 2023	7,306	1	455	292	770	1,517				
Late 2023 - Late 2033	6,214	2	599	1,236	512	2,350	718,680	494,560	348,520	1,561,760

^[1] Square Foot Per Employee Assumptions:

Industrial	1,200
Commercial/Population-Related	400
Institutional	680

^[2] Forecast institutional employment and gross floor area has been adjusted downward to account for employment associated with special care units.

Note: Reflects Late 2023 to Late 2033 forecast period.

Note: Numbers may not add up precisely due to rounding.

Source: Watson & Associates Economists Ltd.



Schedule 9c
City of Hamilton
Estimate of the Anticipated Amount, Type and Location of
Non-Residential Development for Which Development Charges Can Be Imposed

Development Location	Timing	Industrial G.F.A. S.F. ^[1]	Commercial G.F.A. S.F. ^[1]	Institutional G.F.A. S.F. ^{[1],[2]}	Total Non-Residential G.F.A. S.F.	Employment Increase ^[3]
Combined Sewer System	2023 - 2033	92,500	2,929,900	1,166,700	4,189,100	9,117
Separate Sewer System - Other Built Boundary	2023 - 2033	2,589,400	363,800	502,900	3,456,100	3,807
Separate Sewer System - Greenfield	2023 - 2033	4,395,900	1,612,300	1,787,400	7,795,600	10,322
Urban Total	2023 - 2033	7,077,800	4,905,900	3,457,000	15,440,700	23,246
Rural Total	2023 - 2033	109,000	39,600	28,200	176,800	254
City of Hamilton	2023 - 2033	7,186,800	4,945,600	3,485,200	15,617,600	23,500

^[1] Square Foot Per Employee Assumptions:

Industrial	1,200
Commercial/Population-Related	400
Institutional	680

^[2] Forecast institutional employment and gross floor area has been adjusted downward to account for employment associated with special care units.

^[3] Employment increase does not include no fixed place of work.

Note: Reflects Late 2023 to Late 2033 forecast period.

Note: Numbers may not add precisely due to rounding.

Source: Watson & Associates Economists Ltd.



Schedule 9d
 City of Hamilton
 Service Target Forecast
 Estimate of the Anticipated Amount, Type and Location of
 Non-Residential Development for Which Development Charges Can Be Imposed

Development Location	Timing	Industrial	Commercial	Institutional	Total Non-Residential	Employment Increase ^[3]
		G.F.A. S.F. ^[1]	G.F.A. S.F. ^[1]	G.F.A. S.F. ^{[1],[2]}		
Services Related to a Highway	Service Target Forecast	4,782,000	3,315,200	2,278,600	10,375,800	15,641
Stormwater: Combined Sewer System	Service Target Forecast	61,500	5,892,000	1,345,700	7,299,300	6,083
Stormwater: Separated Sewer System	Service Target Forecast	4,648,000	1,324,600	1,497,500	7,470,100	9,386
Water and Wastewater	Service Target Forecast	4,709,500	3,288,600	2,260,100	10,258,200	15,469

^[1] Square Foot Per Employee Assumptions:

Industrial	1,200
Commercial/Population-Related	400
Institutional	680

^[2] Forecast institutional employment and gross floor area has been adjusted downward to account for employment associated with special care units.

^[3] Employment increase does not include no fixed place of work.

Note: Reflects service target forecast period.

Note: Numbers may not add precisely due to rounding.

Source: Watson & Associates Economists Ltd.



Schedule 10
City of Hamilton
Employment Categories by Major Employment Sector

NAICS		Comments
Employment Category by Industry		
	<u>Primary Industry Employment</u>	Categories which relate to local land-based resources
11	<i>Agriculture, forestry, fishing and hunting</i>	
21	<i>Mining and oil and gas extraction</i>	
	<u>Industrial and Other Employment</u>	Categories which relate primarily to industrial land supply and demand
22	<i>Utilities</i>	
23	<i>Construction</i>	
31-33	<i>Manufacturing</i>	
41	<i>Wholesale trade</i>	
48-49	<i>Transportation and warehousing</i>	
56	<i>Administrative and support</i>	
	<u>Population Related Employment</u>	Categories which relate primarily to population growth within the municipality
44-45	<i>Retail trade</i>	
51	<i>Information and cultural industries</i>	
52	<i>Finance and insurance</i>	
53	<i>Real estate and rental and leasing</i>	
54	<i>Professional, scientific and technical services</i>	
55	<i>Management of companies and enterprises</i>	
56	<i>Administrative and support</i>	
71	<i>Arts, entertainment and recreation</i>	
72	<i>Accommodation and food services</i>	
81	<i>Other services (except public administration)</i>	
	<u>Institutional</u>	
61	<i>Educational services</i>	
62	<i>Health care and social assistance</i>	
91	<i>Public administration</i>	

Note: Employment is classified by North American Industry Classification System (NAICS) Code.
Source: Watson & Associates Economists Ltd.



Appendix B

Level of Service



Appendix B: Level of Service

SUMMARY OF SERVICE STANDARDS AS PER DEVELOPMENT CHARGES ACT, 1997, AS AMENDED							
Service Category	Sub-Component	15 Year Average Service Standard					Maximum Ceiling LOS
		Cost (per capita)	Quantity (per capita)		Quality (per capita)		
Service Related to a Highway	Services Related to a Highway - Roads	\$41,962.40	0.0081	lane km of roadways	5,180,543	per km	1,769,008,897
	Services Related to a Highway - Bridges, Culverts & Structures	\$4,185.47	0.0006	Number of Bridges, Culverts & Structures	6,975,783	per item	176,446,859
	Services Related to a Highway - Traffic Signals	\$343.47	0.0010	No. of Traffic Signals	343,470	per signal	14,479,665
Public Works	Public Works - Facilities	\$840.56	1.5673	sq.ft. of building area	536	per sq.ft.	52,229,036
	Public Works - Vehicles & Equipment	\$242.15	0.0022	No. of vehicles and equipment	110,068	per vehicle	15,046,232
Fire Protection	Fire Protection Services - Facilities	\$370.08	0.4759	sq.ft. of building area	778	per sq.ft.	22,995,291
	Fire Protection Services - Vehicles & Equipment	\$176.77	0.0002	No. of vehicles	883,850	per vehicle	10,983,781
	Fire Protection Services - Small Equipment and Gear	\$43.22	0.0086	No. of equipment and gear	5,026	per item	2,685,518
Policing	Policing Services - Facilities	\$694.60	0.6125	sq.ft. of building area	1,134	per sq.ft.	43,159,666
	Policing Services - Vehicles	\$41.71	0.0005	No. of vehicles and equipment	83,420	per vehicle	2,591,693
	Policing Services - Small Equipment and Gear	\$28.60	0.0018	No. of equipment and gear	15,889	per item	1,777,090
Parks & Recreation	Parkland Development	\$567.87	0.0113	Acres of Parkland	50,254	per acre	35,285,170
	Parkland Amenities	\$629.45	0.0335	No. of parkland amenities	18,790	per amenity	39,111,505
	Parkland Amenities - Buildings	\$15.20	0.1098	sq.ft. of building area	138	per sq.ft.	944,467



SUMMARY OF SERVICE STANDARDS AS PER DEVELOPMENT CHARGES ACT, 1997, AS AMENDED

Service Category	Sub-Component	15 Year Average Service Standard					Maximum Ceiling LOS
		Cost (per capita)		Quantity (per capita)	Quality (per capita)		
Parks & Recreation	Parkland Trails	\$29.99	0.0001	Linear Kilometres of Paths and Trails	299,900	per linear m	1,863,459
	Parks Equipment	\$0.33	0.0001	No. of equipment	6,600	per vehicle	20,505
	Recreation Facilities	\$3,634.39	4.0864	sq.ft. of building area	889	per sq.ft.	225,826,457
	Indoor Recreation Facilities - Buildings Withing Parks	\$114.74	0.4287	sq.ft. of building area	268	per sq.ft.	7,129,485
	Recreation Equipment	\$0.69	0.0001	No. of equipment	6,900	per vehicle	42,874
Library	Library Services - Facilities	\$732.17	0.7107	sq.ft. of building area	1,030	per sq.ft.	45,494,115
	Library Services - Collection Materials	\$87.99	2.0247	No. of library collection items	43	per collection item	5,467,347
	Library Services - Vehicles	\$3.28	0.0000	No. of equipment	328,000	per vehicle	203,806
Ambulance	Ambulance Facilities	\$90.41	0.1108	sq.ft. of building area	816	per sq.ft.	5,617,716
	Ambulance Vehicles	\$40.76	0.0006	No. of vehicles and equipment	67,933	per vehicle	2,532,663
Long-term Care	Long-term Care Facilities	\$577.53	0.6464	sq.ft. of building area	893	per sq.ft.	35,885,404
Childcare	Child Care and Early Years Programs - Facilities	\$47.78	0.0638	sq.ft. of building area	749	per sq.ft.	2,968,858
Provincial Offences Act	POA Facilities	\$43.07	0.0577	sq.ft. of building area	746.4471	per sq.ft.	2,676,198
Public Health	Public Health - Facilities	\$106.33	0.1913	sq.ft. of building area	556	per sq.ft.	6,606,921
	Public Health - Vehicles & Equipment	\$1.21	0.000002	No. of Vehicles and Equipment	605,000	per vehicle	75,185
Waste Diversion	Waste Diversion - Facilities	\$465.14	0.7840	sq.ft. of building area	593	per sq.ft.	28,901,939
	Waste Diversion - Vehicles & Equipment	\$103.57	0.0004	No. of vehicles and equipment	258,925	per vehicle	6,435,426
	Waste Diversion - Carts & Containers	\$20.95	1.4724	No. of items	14	per item	1,301,749



**City of Hamilton
Service Standard Calculation Sheet**

Service: Services Related to a Highway - Roads
Unit Measure: lane km of roadways

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/lane km)
Roads (lane km):																
Rural Arterial	167	166	165	164	164	164	173	183	180	180	180	180	182	185	185	\$2,540,000
Rural Collector	1,193	1,193	1,193	1,193	1,193	1,193	1,193	1,193	1,193	1,193	1,193	1,197	1,197	1,197	1,197	\$5,360,000
Urban Collector	786	800	814	829	819	819	819	810	816	819	826	830	830	830	830	\$6,933,000
Urban Arterial Minor	421	412	403	395	393	393	393	393	393	393	393	394	394	394	395	\$4,992,000
Urban Arterial Major	955	958	962	965	965	965	976	987	952	961	963	974	974	974	981	\$4,616,000
Expressway	133	133	133	133	133	133	133	133	133	133	133	133	133	133	133	\$15,291,000
Provision for Sidewalks/Signalization/Boulevards/ etc. 20% of Urban and Industrial	475	488	489	491	491	491	491	491	486	488	490	498	498	498	498	\$2,645,000
Active Transportation:																
Bicycle Lanes (on road)	55	63	74	85	98	117	129	142	156	170	196	208	217	224	231	\$1,360,094
Cycle Track (Barrier)	-	-	-	-	-	-	-	2	10	10	10	21	25	29	30	\$500,000
Multi-use Trails (Commuter)	15	15	15	16	16	16	17	18	18	19	19	20	20	22	22	\$750,000
Expanded Paved Shoulders on Rural Roads for Cycling	10	10	11	11	11	11	11	11	11	11	11	11	11	11	11	\$3,683,617
Total	4,210	4,238	4,259	4,282	4,283	4,302	4,335	4,363	4,349	4,378	4,415	4,465	4,480	4,496	4,513	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.008	0.008	0.008	0.008	0.008	0.008	0.008	0.008	0.008	0.008	0.008	0.008	0.008	0.008	0.008

15 Year Average	2008-2022
Quantity Standard	0.0081
Quality Standard	\$5,180,543
Service Standard	\$41,962

D.C. Amount (before deductions)	Service Target
Forecast Population	42,157
\$ per Capita	\$41,962
Eligible Amount	\$1,769,008,897



**City of Hamilton
Service Standard Calculation Sheet**

Service: Services Related to a Highway - Bridges, Culverts & Structures
Unit Measure: Number of Bridges, Culverts & Structures

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/item)
Bridges	253	259	265	270	276	270	276	282	193	162	167	166	166	166	166	\$9,570,000
Culverts	123	122	121	119	118	119	118	117	117	117	117	117	117	117	117	\$822,000
Wilson at Meadowbrook (Ancaster) Roundabout	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$1,350,000
Wilson at Shaver (Ancaster) Roundabout	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$3,380,000
Binbrook at Fall Fair Way (Binbrook) Roundabout	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$845,000
Binbrook at Pumpkin Pass (Binbrook) Roundabout	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$1,350,000
Total	380	385	389	394	398	394	398	403	314	283	288	287	287	287	287	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.0007	0.0007	0.0008	0.0008	0.0008	0.0007	0.0008	0.0008	0.0006	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005

15 Year Average	2008-2022
Quantity Standard	0.0006
Quality Standard	\$6,975,783
Service Standard	\$4,185

D.C. Amount (before deductions)	Service Target
Forecast Population	42,157
\$ per Capita	\$4,185
Eligible Amount	\$176,446,859



**City of Hamilton
Service Standard Calculation Sheet**

Service: Services Related to a Highway - Traffic Signals
Unit Measure: No. of Traffic Signals

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/item)
Full Signals (# of units)	413	424	435	446	446	446	457	468	483	491	501	509	524	543	554	\$355,000
Pedestrian Signals (# of units)	45	51	58	64	64	64	70	77	81	85	88	90	98	102	109	\$213,000
Total	458	475	493	510	510	510	527	545	564	576	589	599	622	645	663	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.0009	0.0009	0.0010	0.0010	0.0010	0.0010	0.0010	0.0010	0.0011	0.0011	0.0011	0.0011	0.0011	0.0011	0.0011

15 Year Average	2008-2022
Quantity Standard	0.0010
Quality Standard	\$343,470
Service Standard	\$343

D.C. Amount (before deductions)	Service Target
Forecast Population	42,157
\$ per Capita	\$343
Eligible Amount	\$14,479,665



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Stoney Creek																	
Operations Centre (349 Jones Rd.)	44,185	44,185	44,185	44,185	44,185	44,185	44,185	44,185	44,185	44,185	44,185	44,186	44,186	44,186	44,186	\$430	\$547
Operations Centre (345 Jones Rd.)	2,773	2,773	2,773	2,773	2,773	2,773	2,773	2,773	2,773	2,773	2,773	2,773	2,773	2,773	2,773	\$589	\$1,281
Animal Control Facility (245 Dartnall Rd.)	-	24,468	24,468	24,468	24,468	24,468	24,468	24,468	24,468	24,468	24,468	24,468	24,468	24,468	24,468	\$430	\$514
Stoney Creek Operations Centre - Salt Building (349 Jones Rd.)	5,549	5,549	5,549	5,549	5,549	5,549	5,549	5,549	7,200	7,200	7,200	7,200	7,200	7,200	7,200	\$395	\$507
Stoney Creek Operations Centre - Sand Building (349 Jones Rd.)	12,600	12,600	12,600	12,600	12,600	12,600	12,600	12,600	12,600	12,600	12,600	12,600	12,600	12,600	12,600	\$395	\$476
Taplestown, Storage (119 Taplestown Rd.)	12,366	12,366	12,366	12,366	12,366	12,366	12,366	12,366	12,366	12,366	12,366	12,366	-	-	-	\$273	\$342
Taplestown, Sand Hut (119 Taplestown Rd.)	1,027	1,027	1,027	1,027	1,027	1,027	1,027	1,027	1,027	1,027	1,027	1,052	1,052	1,052	1,052	\$273	\$342
Taplestown, Salt Dome (119 Taplestown Rd.)	6,913	6,913	6,913	6,913	6,913	6,913	6,913	6,913	6,913	6,913	6,913	6,913	6,913	6,913	6,913	\$395	\$476
Stoney Creek Storage Building & Workshop (77 King St. W.)	5,829	5,829	5,829	5,829	5,829	5,829	5,829	5,829	5,829	5,829	-	-	-	-	-	\$273	\$342
Heritage Green Equipment Storage (355 First Rd. W.)	-	-	-	-	-	-	-	-	-	-	5,167	5,167	5,167	5,167	5,167	\$273	\$342
Ancaster																	
Vehicle Storage Garage (334 Wilson St. E)	5,432	5,432	5,432	5,432	5,432	5,432	-	-	-	-	-	-	-	-	-	\$537	\$633
Operations New Garage (501 Shaver Rd.)	21,861	21,861	21,861	21,861	21,861	21,861	21,861	21,861	21,861	21,861	21,861	21,861	21,861	21,861	21,861	\$537	\$633
Operations Old Garage (501 Shaver Rd.)	8,092	8,092	8,092	8,092	8,092	8,092	8,092	8,092	8,092	8,092	8,092	8,092	8,092	8,092	8,092	\$624	\$729
Operations New Offices (501 Shaver Rd.)	3,634	3,634	3,634	3,634	3,634	3,634	3,634	3,634	3,634	3,634	3,634	3,634	3,634	3,634	3,634	\$624	\$729
Ancaster Operations - Sand Hut (501 Shaver Rd.)	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	\$395	\$476



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Fiddler's Green Maintenance Yard, Shop/Garage (1104 Fiddler's Green Rd.)	12,128	12,128	12,128	12,128	12,128	12,128	12,128	12,128	12,128	12,128	-	-	-	-	-	\$537	\$633
Fiddler's Green Maintenance Yard, Sand Hut (1104 Fiddler's Green Rd.)	1,156	1,156	1,156	1,156	1,156	1,156	1,156	1,156	-	-	-	-	-	-	-	\$273	\$342
Fiddler's Green Maintenance Yard, Salt Dome (1104 Fiddler's Green Rd.)	5,806	5,806	5,806	5,806	5,806	5,806	5,806	-	-	-	-	-	-	-	-	\$395	\$476
Dundas																	
Dundas Physical Services - Storage Building - A (135 King St. E.)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	\$273	\$342
Dundas Physical Services - Storage Building - B (135 King St. E.)	260	260	260	260	260	260	260	260	260	260	260	260	260	260	260	\$273	\$342
King St. Public Works Facility (189 King St. E.)	6,874	6,874	6,874	6,874	6,874	6,874	6,874	6,874	6,874	6,874	6,874	6,874	6,874	6,874	6,874	\$747	\$864
Sand Hut (189 King St. E.)	2,546	2,546	2,546	2,546	2,546	2,546	-	-	-	-	-	-	-	-	-	\$110	\$162
Salt Dome (189 King St. E.)	1,661	1,661	1,661	1,661	1,661	1,661	-	-	-	-	-	-	-	-	-	\$110	\$162
New Salt/Salt Quonset, (189 King St. E.)	-	-	-	-	-	-	9,600	9,600	9,600	9,600	9,600	9,600	9,600	9,600	9,600	\$110	\$162
Paint Shop - Dundas Driving Park (Cross St.)	2,808	2,808	2,808	2,808	2,808	2,808	2,808	2,808	2,808	2,808	2,808	2,808	2,808	2,808	2,808	\$551	\$648
Works Bldg - Dundas Driving Park (Cross St.)	3,053	3,053	3,053	3,053	3,053	3,053	3,053	3,053	3,053	3,053	3,053	3,053	3,053	3,053	3,053	\$551	\$648
Glanbrook																	
Airport Road (Building), Yard #2 (7098 Airport Rd.)	5,539	5,539	5,539	5,539	5,539	5,539	5,539	5,539	5,539	5,539	5,539	5,539	5,539	5,539	5,539	\$551	\$649
Airport Road, Mount Hope Rd. Shed, Yard #2 (7098 Airport Rd.)	2,580	2,580	2,580	2,580	2,580	2,580	2,580	2,580	2,580	2,580	2,580	2,580	2,580	2,580	2,580	\$395	\$476
Glanbrook Yard #1 (Maintenance Shop/Garage), 2111 Binbrook Dr.	5,509	5,509	5,509	5,509	5,509	5,509	5,509	5,509	5,509	5,509	5,509	5,509	5,509	5,509	5,509	\$551	\$649



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Glanbrook Yard #1 (Storage Bldg.) (2111 Binbrook Dr.)	130	130	130	130	130	130	130	130	130	130	130	130	130	130	130	\$273	\$342
Glanbrook Yard #1 (Sand/Salt) (2111 Binbrook Dr.)	2,539	2,539	2,539	2,539	2,539	2,539	2,539	2,539	2,539	2,539	2,539	2,539	2,539	2,539	2,539	\$110	\$162
Flamborough																	
Centre Road Block (Building) (1255 Centre Rd.)	5,538	5,538	5,538	5,538	5,538	-	-	-	-	-	-	-	-	-	-	\$430	\$640
Centre Road Steel (Building) (1255 Centre Rd.)	1,579	1,579	1,579	1,579	1,579	-	-	-	-	-	-	-	-	-	-	\$430	\$640
Brock Road Shed (Building) (867 4th Concession Rd. W.)	10,925	10,925	10,925	10,925	10,925	10,925	10,925	10,925	10,925	10,925	10,925	10,925	10,925	10,925	10,925	\$346	\$422
Brock Road Steel (Building) (867 4th Concession Rd. W.)	1,549	1,549	1,549	1,549	1,549	1,549	1,549	1,549	1,549	1,549	1,549	1,549	1,549	1,549	-	\$273	\$532
Brock Road (Salt storage building) (867 4th Concession Rd. W.)	-	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	\$110	\$162
Millgrove Yard #1, Maintenance Shop/Garage (594 5th Concession Rd., W.)	11,158	11,158	11,158	11,158	11,158	11,158	11,158	-	-	-	-	-	-	-	-	\$537	\$633
Millgrove Yard #1, Salt Dome (594 5th Concession Rd., W.)	6,361	6,361	6,361	6,361	6,361	6,361	6,361	-	-	-	-	-	-	-	-	\$110	\$162
Rockton Yard #2, Maint. Shop/Garage (810 Woodhill Rd.)	7,176	7,176	7,176	7,176	7,176	7,176	7,176	7,176	7,176	7,176	7,176	7,176	7,176	7,176	7,176	\$551	\$649
Rockton Yard #2, Salt Dome (810 Woodhill Rd.)	6,324	6,324	6,324	6,324	6,324	6,324	6,324	6,324	6,324	6,324	6,324	6,324	6,324	6,324	6,324	\$395	\$476
Joe Sam's Works Yard - Pole Barn Storage for Public Works	-	14,406	14,406	14,406	14,406	14,406	14,406	14,406	14,406	14,406	14,406	14,406	14,406	14,406	14,406	\$407	\$489
Joe Sam's Works Yard - Storage Building	-	14,836	14,836	14,836	14,836	14,836	14,836	14,836	14,836	14,836	14,836	14,836	14,836	14,836	14,836	\$407	\$489
Hamilton																	
CN Building (Storage) (241 Stuart St.)	75,390	75,390	-	-	-	-	-	-	-	-	-	-	-	-	-	\$273	\$342



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Arvin Yard (Water) (911 Arvin Ave.)	7,355	7,355	7,355	7,355	7,355	7,355	7,355	7,355	7,355	7,355	7,355	7,355	-	-	-	\$273	\$342
Arvin Yard Cold Storage (911 Arvin Ave.)	-	-	-	-	-	4,523	4,523	4,523	4,523	4,523	4,523	4,523	-	-	-	\$537	\$633
Bernie Court Yard, Maintenance Shop/Garage (308 Rymal Rd.)	20,720	20,720	20,720	20,720	20,720	20,720	20,720	20,720	20,720	20,720	20,720	20,720	20,720	20,720	20,720	\$529	\$624
Bernie Court Yard Garage	665	665	665	665	665	665	665	665	665	665	665	665	665	665	665	\$537	\$633
Bernie Court Yard Sand Hut	588	588	588	588	588	4,796	4,796	4,796	4,796	4,796	4,796	4,796	4,796	4,796	4,796	\$110	\$162
Bernie Court Yard, Salt Dome (308 Rymal Rd.)	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	4,880	\$395	\$476
Bernie Court Yard, Large Garage (308 Rymal Rd.)	10,576	10,576	10,576	10,576	10,576	10,576	10,576	10,576	10,576	10,576	10,576	10,576	10,576	10,576	10,576	\$407	\$489
Bernie Court Yard, Storage Barn (308 Rymal Rd.)	8,866	8,866	8,866	8,866	8,866	8,866	8,866	8,866	8,866	8,866	8,866	8,866	8,866	8,866	8,866	\$553	\$651
Bernie Court Yard, Butler Building (308 Rymal Rd.)	-	-	-	-	-	-	-	-	-	-	-	-	665	665	665	\$168	\$226
Brampton Yard, Office (2200 Brampton St.)	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	\$1,096	\$1,249
Brampton Yard, Quonset (2200 Brampton St.)	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	\$551	\$649
Brampton Yard, Salt Dome (2200 Brampton St.)	4,796	4,796	4,796	4,796	4,796	4,796	4,796	4,796	4,796	4,796	4,796	4,796	4,796	4,796	4,796	\$395	\$476
Brampton Yard, Storage Building (2200 Brampton St.)	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	3,464	-	\$273	\$1,317
Barton Yard, Storage/Office/Shop (125 Barton St. W.)	60,632	60,632	60,632	60,632	60,632	60,632	60,632	60,632	60,632	60,632	60,632	60,632	60,632	60,632	60,632	\$393	\$474
Barton Yard, Carpenter's Shop (125 Barton St. W.)	13,453	13,453	13,453	13,453	13,453	13,453	13,453	13,453	13,453	13,453	13,453	13,453	-	-	-	\$661	\$769
Chedoke Yard, Salt Dome (161 Studholme Rd.)	2,975	2,975	2,975	2,975	2,975	2,975	2,975	2,975	2,975	2,975	2,975	2,975	2,975	2,975	2,975	\$395	\$476
Chedoke Yard, Operations Centre (161 Studholme Rd.)	9,947	9,947	9,947	9,947	9,947	9,947	9,947	9,947	9,947	9,947	9,947	9,947	-	-	-	\$551	\$649
Chedoke Yard, Garage/Fuel Building (161 Studholme Rd.)	15,216	15,216	15,216	15,216	15,216	15,216	15,216	15,216	15,216	15,216	15,216	15,216	15,216	15,216	15,216	\$564	\$663



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Forestry Depot, Maintenance Shop/Garage (1301 Upper Ottawa)	7,185	7,185	7,185	7,185	7,185	7,185	7,185	7,185	15,382	15,382	15,382	15,382	15,382	15,382	15,382	\$551	\$649
Forestry Depot, Quonset (1301 Upper Ottawa)	3,129	3,129	3,129	3,129	3,129	3,129	3,129	3,129	3,129	3,129	3,129	3,129	-	-	-	\$273	\$342
Forestry Depot, Storage Bldg. (1301 Upper Ottawa)	4,219	4,219	4,219	4,219	4,219	4,219	4,219	4,219	4,219	4,219	4,219	4,219	4,219	4,219	4,219	\$395	\$476
Gage Park Greenhouse #8/Production (1000 Main St. E.)	6,090	6,090	6,090	6,090	6,090	6,090	6,090	6,090	6,090	6,090	6,090	-	-	-	-	\$538	\$634
Gage Park Potting Shed (1000 Main St. E.)	3,120	3,120	3,120	-	-	-	-	-	-	-	-	-	-	-	-	\$273	\$342
Gage Park Boilerhouse (1000 Main St. E.)	-	575	575	575	575	575	575	575	575	575	575	575	575	575	575	\$273	\$342
Traffic Operations Centre (1375 Upper Ottawa)	52,017	52,017	52,017	52,017	52,017	52,017	52,017	52,017	52,017	52,017	52,017	52,017	52,017	52,017	52,017	\$430	\$514
Upper Ottawa Salt Shed (1199 Upper Ottawa)	6,640	6,640	6,640	6,640	6,640	11,187	11,187	11,187	11,187	11,187	11,187	11,187	11,187	11,187	11,187	\$395	\$476
WSOC - Wentworth Street Operation Centre (330 Wentworth St. N)	263,488	263,488	263,488	263,488	263,488	263,488	263,488	263,488	263,488	263,488	263,488	263,488	263,488	263,488	263,488	\$479	\$569
330 Wentworth St. perations Centre - Salt/Sand Dome	-	11,263	11,263	11,263	11,263	11,263	11,263	11,263	11,263	11,263	11,263	11,263	11,263	11,263	11,263	\$110	\$162
Hamilton City Centre (77 James St. N., Suite 400)	-	37,603	37,603	37,603	37,603	37,603	37,603	37,603	37,603	37,603	37,603	37,603	37,603	37,603	37,603	\$273	\$342
Shipping Containers:																	
Hamilton - Mohawk Sports Park (Bernie Arbour Stadium) (685 Upper Kenilworth Avenue)	-	-	160	160	160	320	320	320	320	320	320	320	320	320	320	\$56	\$102
Heritage Green Sports Park, Stoney Creek (341 First Road W.)	-	160	160	160	160	160	160	160	160	160	160	160	160	160	160	\$56	\$102
Jones Road Yard, Stoney Creek (345 Jones Rd.)	-	-	-	-	-	-	-	-	160	160	160	160	160	160	160	\$56	\$102
Gage Park, Hamilton (1000 Main St. E.)	-	-	-	160	160	320	320	320	320	320	320	320	320	320	320	\$56	\$102



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Wentworth Street Operations Centre, Hamilton (330 Wenworth St. N.)	-	160	160	160	160	160	160	160	480	480	480	480	480	480	480	\$56	\$102
Bernie Court Yard, Hamilton (308 Rymal Road East)	-	-	-	-	-	-	-	-	320	320	320	320	320	320	320	\$56	\$102
Chedoke Yard, Hamilton (161 Studholme Road)	-	640	640	640	800	800	800	800	800	800	800	800	800	800	800	\$56	\$102
Dundas Yard, Dundas (189 King St E)	-	-	-	-	-	-	-	-	640	640	640	640	640	640	640	\$56	\$102
Shaver Yard, Ancaster (501 Shaver Rd.)	-	-	-	-	-	-	-	-	320	320	320	320	320	320	320	\$56	\$102
Land Only:																	
Old Rheem Property Snow Dump (128 Barton St.) (land only, 4.06 acres)	-	-	4.06	4.06	4.06	4.06	4.06	4.06	4.06	4.06	4.06	4.06	4.06	4.06	4.06		\$509,000
Total	829,773	938,696	863,470	860,510	860,670	867,151	867,112	843,787	854,239	859,405	841,448	811,983	785,276	785,276	742,659		

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	1.6225	1.8236	1.6747	1.6550	1.6469	1.6458	1.6369	1.5810	1.5910	1.5818	1.5310	1.4615	1.3962	1.3792	1.2828

15 Year Average	2008-2022
Quantity Standard	1.5673
Quality Standard	\$536
Service Standard	\$841

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$841
Eligible Amount	\$52,229,036



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Shared Vehicles: Water Services, Wastewater Services, Stormwater Services and Services Related to a Highway																
021-1/2 T PICK UP	-	-	-	-	-	-	-	-	-	-	-	-	1	1	1	\$40,800
124-SUV 4X4	-	-	-	-	-	1	1	1	1	-	-	-	-	5	5	\$53,600
012-TRAILER SINGLE AXLE	-	-	-	-	-	-	-	-	-	-	-	2	2	1	1	\$9,400
015C-POST HOLE DIGGER - 3 PT	-	-	-	-	-	1	1	1	1	1	1	-	-	-	-	\$13,400
017X - EXT.USE HYBRID VEHICLES	-	-	-	-	-	-	-	-	-	-	-	1	1	1	2	\$44,200
018-CARS COMPACT	-	-	-	-	-	2	1	1	1	1	1	1	1	-	-	\$33,500
018X-EXT USE CAR COMPACT	-	-	-	-	-	2	-	-	-	-	-	-	-	-	-	\$36,200
019-CARS FULL SIZE	-	-	-	-	-	-	-	1	-	1	1	-	-	-	-	\$42,900
020-PICKUP TRUCK COMPACT	-	-	-	-	-	-	-	-	-	-	-	-	-	2	2	\$35,700
021-1/2 T PICK UP	-	-	-	-	-	-	-	-	-	-	-	-	-	6	7	\$40,800
021X-EXT. USE PICKUP 1/2 T	-	-	-	-	-	2	2	2	2	-	-	-	-	3	2	\$33,400
022-VAN 1/2 T	-	-	-	-	-	12	11	11	8	14	14	30	30	11	11	\$56,100
023-VAN 3/4 T	-	-	-	-	-	2	2	1	1	1	1	9	9	6	8	\$54,100
026C-CUBE VAN 1T	-	-	-	-	-	1	1	1	1	2	2	1	1	1	1	\$84,400
026-VAN 1 T	-	-	-	-	-	16	16	16	16	16	16	9	9	6	6	\$84,400
074-PICKUP TRUCK 1 T	-	-	-	-	-	1	1	1	1	1	1	-	-	-	-	\$67,000
084-TURF UTILTY VEH LESS \$20K VALUE	-	-	-	-	-	2	2	2	2	2	2	2	2	2	2	\$26,800
110-MOWER 7 GANG	-	-	-	-	-	1	-	-	-	1	1	-	-	-	-	\$53,600
121A-DMP 1T STD CAB W PLOW	-	-	-	-	-	1	1	-	-	-	-	-	-	-	-	\$73,800
122 - HOIST TRUCK FORESTRY	-	-	-	-	-	-	-	-	-	-	-	1	1	-	-	\$40,200
125-SWEEPER SIDEWALK	-	-	-	-	-	2	3	3	3	3	3	3	3	3	3	\$77,700
152H-ALUM. DUMP-HIGH MILEAGE	-	-	-	-	-	1	1	1	1	1	1	-	-	-	-	\$93,800
160-RAKE POWER RIDING SAND TRA	-	-	-	-	-	2	2	2	2	2	2	-	-	-	-	\$134,000
203-SCISSOR MANLIFT	-	-	-	-	-	4	3	3	2	3	3	5	5	5	5	\$26,800
090-AERIAL TRUCK FORESTRY	-	-	-	-	-	4	4	4	4	4	4	5	5	5	5	\$375,300



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Shared Vehicles: Water Services, Wastewater Services, Stormwater Services and Services Related to a Highway																
017X-EXT.USE HYBRID VEHICLES	-	-	-	-	-	1	-	-	1	1	1	3	-	-	-	\$51,400
020X-EXT. USE PICKUP COMPACT	-	-	-	-	-	1	-	-	-	1	1	-	-	-	-	\$33,400
017-HYBRID VEHICLES	-	-	-	-	-	8	8	8	8	8	8	6	6	-	-	\$46,900
124C-2WD SUV	-	-	-	-	-	3	3	3	3	3	3	5	5	6	6	\$40,200
21 - 1/2 T PICK UP	-	-	-	-	-	-	-	-	-	1	1	1	2	2	2	\$45,600
124-SUV 4X4	-	-	-	-	-	-	-	-	-	-	-	-	-	10	10	\$35,700
021-1/2 T PICK UP	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2	\$37,500
150-ATT MISCELLANEOUS	-	-	-	-	-	4	2	2	2	5	5	-	-	1	1	\$13,400
015-POST POUNDERS	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$10,800
020-PICKUP TRUCK COMPACT	-	-	-	-	-	2	4	4	13	10	10	10	10	-	-	\$34,900
024-PICKUP TRUCK CREW CAB	-	-	-	-	-	1	1	1	1	1	1	1	1	-	-	\$57,600
026B-VAN 1TON WITH SHELIVING	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	\$84,400
026X-EXT. USE VAN 1 T	-	-	-	-	-	2	-	-	-	-	-	-	-	-	-	\$52,200
029-1.5T DUMP W/SPRAYER	-	-	-	-	-	1	1	-	-	-	-	-	-	-	-	\$95,600
031-DUMP MEDIUM W WATER TANK	-	-	-	-	-	-	-	-	2	-	-	-	-	-	-	\$130,400
043A-TRACTOR FARM TYPE-SMALL	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	\$73,700
043B-TRACTOR FARM TYPE - MED	-	-	-	-	-	1	2	1	3	8	8	6	6	-	-	\$73,700
043C-TRACTOR FARM TYPE - LRG	-	-	-	-	-	-	-	-	-	3	3	-	-	-	-	\$73,700
043D-TRACTOR FARM TYPE - XLRG	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	\$94,200
049-STEAM GENERATORS	-	-	-	-	-	8	8	8	5	4	4	5	5	-	-	\$15,300
065-RODDING MACHINE SEWER	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	\$14,400
067-WELDERS	-	-	-	-	-	1	1	-	-	-	-	-	-	-	-	\$21,800



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Shared Vehicles: Water Services, Wastewater Services, Stormwater Services and Services Related to a Highway																
073B-3/4TPU PLOW TGATE DUMP	-	-	-	-	-	1	1	1	1	1	1	-	-	-	-	\$51,000
074A-1 T PICKUP W/PLOW	-	-	-	-	-	2	2	2	2	2	2	1	1	1	1	\$67,000
153X-EXT. USE MINI VAN	-	-	-	-	-	2	-	-	-	-	-	-	-	-	1	\$93,800
022X-EXT.USE VAN 1/2 T	-	-	-	-	-	-	-	-	-	1	1	1	1	2	1	\$55,000
124 - SUV 4X4	-	-	-	-	-	-	-	-	-	-	-	3	3	3	3	\$37,900
074X-EXT. USE PICK UP 1 T	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	\$55,000
202R-RECYCLE FORKLIFT RENTAL	-	-	-	-	-	-	-	-	-	1	1	1	1	-	-	\$91,100
205-PLATFORM LADDER	-	-	-	-	-	-	-	-	-	2	2	2	2	2	2	\$26,800
022-VAN 1/2 T	-	-	-	-	-	-	-	-	-	-	-	-	-	19	19	\$56,100
124C-2WD SUV	-	-	-	-	-	-	-	-	-	-	-	5	5	4	5	\$40,200
153-VAN MINI	-	-	-	-	-	-	-	-	-	-	-	-	-	3	3	\$33,700
Emergency Preparedness																
153-VAN MINI	-	-	-	-	-	5	4	4	4	4	4	5	5	2	2	\$40,600
124X-EXT.USE SUV 4X4	-	-	-	-	-	1	-	-	-	-	-	-	-	2	1	\$0
017X-EXT.USE HYBRID VEHICLES	-	-	-	-	-	-	-	-	-	-	-	-	-	3	3	\$35,700
020X-EXT. USE PICKUP COMPACT	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$26,500
073AX - Service Body-Utility Extended	-	-	-	-	-	-	-	-	-	-	-	1	1	1	1	\$82,100



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Shared Vehicles: Parks Services and Services Related to a Highway						-	-	-	-	-	-	-	-	-	-	\$0
017X - EXT.USE HYBRID VEHICLES	-	-	-	-	-	60	61	61	57	45	45	12	12	-	1	\$44,200
005-ANTI-ICE TANDEM TRUCK	-	-	-	-	-	1	1	1	1	1	1	1	-	-	-	\$241,300
012A-TRAILER,SINGLE AXLE, SMALL	-	-	-	-	-	1	1	1	1	1	1	-	-	-	-	\$9,400
017-HYBRID VEHICLES	-	-	-	-	-	-	2	3	3	3	3	1	1	1	1	\$46,900
017X - EXT.USE HYBRID VEHICLES	-	-	-	-	-	-	-	-	-	-	-	1	1	1	2	\$44,200
018-CARS COMPACT	-	-	-	-	-	-	1	1	-	-	-	-	-	-	-	\$33,500
020-PICKUP TRUCK COMPACT	-	-	-	-	-	-	-	1	4	4	4	2	2	2	2	\$34,900
021-1/2 T PICK UP	-	-	-	-	-	-	13	13	13	14	14	16	16	15	15	\$40,800
021X-EXT. USE PICKUP 1/2 T	-	-	-	-	-	-	-	-	-	2	2	-	-	-	2	\$30,800
023-VAN 3/4 T	-	-	-	-	-	-	-	1	1	1	1	1	1	-	-	\$54,100
023X-EXT.USE VAN 3/4 T	-	-	-	-	-	-	-	-	-	1	1	1	1	1	-	\$71,000
034-LOADER FRONT END 1 CU YD	-	-	-	-	-	-	1	1	-	1	1	-	-	1	1	\$124,700
034A-LOADER FRT END 1YD 4WD	-	-	-	-	-	1	1	1	1	1	1	1	2	2	2	\$124,700
035-LOADER FRNT END LG ARTIC	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$274,800
035X - EXT LOADER FRNT END	-	-	-	-	-	-	-	-	-	-	-	-	1	1	1	\$315,800
043B-TRACTOR FARM TYPE - MED	-	-	-	-	-	-	-	1	-	1	1	-	-	-	-	\$73,700
072-AERIAL TRUCK TRAFFIC	-	-	-	-	-	-	-	-	-	1	1	1	1	2	2	\$375,000
073-PICKUP TRUCK 3/4 T	-	-	-	-	-	-	-	-	1	-	-	-	-	1	1	\$71,400
084-TURF UTILTY VEH LESS \$20K VALUE	-	-	-	-	-	-	1	1	1	1	1	2	2	2	2	\$26,800
088-CHIPPER WOOD	-	-	-	-	-	15	15	15	15	14	14	14	13	14	14	\$120,600
089-STUMPER TREE	-	-	-	-	-	1	1	1	2	3	3	3	2	2	2	\$81,600
090A-AERIAL TRUCK FORESTRY	-	-	-	-	-	1	1	1	1	1	1	6	6	6	6	\$375,300



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Shared Vehicles: Parks Services and Services Related to a Highway						-	-	-	-	-	-	-	-	-	-	\$0
090-AERIAL TRUCK FORESTRY	-	-	-	-	-	-	1	1	1	1	1	1	1	-	-	\$375,300
090B-AERIAL TRUCK CHIPPER BOD	-	-	-	-	-	2	1	1	1	1	1	-	-	-	-	\$375,300
090C - Aerial Truck - Super Duty	-	-	-	-	-	-	-	-	-	-	-	1	1	1	1	\$757,900
098-MOWER FRONT MNT RIDING ROT	-	-	-	-	-	-	1	1	1	1	1	1	1	1	1	\$60,300
103-TRAILER TANDEM AXLE	-	-	-	-	-	1	5	5	5	5	5	5	5	5	5	\$16,100
103X - EXT.USE TANDEM TRAILER	-	-	-	-	-	-	-	-	-	-	-	2	2	-	-	\$12,600
122-HOIST TRUCK FORESTRY	-	-	-	-	-	2	2	2	5	5	5	5	5	5	5	\$306,000
124C-2WD SUV	-	-	-	-	-	-	-	-	1	2	2	2	3	3	3	\$40,200
126 - WATER TANK TRUCK MTD	-	-	-	-	-	-	-	-	-	-	-	2	2	2	2	\$176,900
126X - Water Tank Truck MTD Extended Service	-	-	-	-	-	-	-	-	-	-	-	1	1	1	1	\$176,900
137-TRAILER DUMP BOX	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	\$15,300
151A-ALU.DUMP PLOW&TCSIGN 1.5T	-	-	-	-	-	-	1	1	1	1	1	1	1	1	1	\$100,500
152A-ALUMINUM DUMP/CREW	-	-	-	-	-	-	5	7	6	2	2	2	2	4	4	\$93,800
152AR-ALUMINUM DUMP/CREW	-	-	-	-	-	-	-	-	-	3	3	3	3	2	2	\$93,800
152ARA-ALU.DUMP PLOW&TCSIGN 1.5T - ROADS	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$93,800
152ARR-ALUMINUM DUMP/CREW	-	-	-	-	-	-	-	-	-	2	2	2	2	1	1	\$93,800
155-DUMP STAKE CREW 1 T	-	-	-	-	-	-	4	8	8	3	3	-	-	-	-	\$93,800
155P-DUMP STAKE CREW 1 T	-	-	-	-	-	-	-	-	-	3	3	3	3	3	3	\$93,800
158-ARROW BOARDS	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$317,700
159A-CHIPPER TRUCK TANDEM	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$183,600
159C-CHIPPER TRUCK COMPACT	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$241,300
159-CHIPPER TRUCK	-	-	-	-	-	5	5	5	5	5	5	5	5	5	5	\$153,000
162 - DUMP STEEL CREW 1T	-	-	-	-	-	-	-	-	-	-	-	3	3	3	3	\$88,400
164-LOADER FRONT END 3/4 CU YD	-	-	-	-	-	1	1	1	1	1	1	1	1	-	-	\$150,100



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Shared Vehicles: Parks Services and Services Related to a Highway						-	-	-	-	-	-	-	-	-	-	\$0
202-FORKLIFTS-SKID STEERS	-	-	-	-	-	-	1	1	1	1	1	1	1	1	1	\$91,100
202R-RECYCLE FORKLIFT RENTAL	-	-	-	-	-	-	-	-	-	1	1	1	1	-	-	\$91,100
202L - FORKLIFT LARGE	-	-	-	-	-	-	-	-	-	-	-	2	2	-	-	\$69,400
024X-EXT.USE P/U CREW CAB	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	\$43,900
074X-EXT. USE PICK UP 1 T	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	\$51,000
124CX - 2WD SUV Extended Service	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	\$30,600
150B-ATT DROP-IN SANDER	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$10,200
089AX-Stumper Tree Small Extended Service	-	-	-	-	-	-	-	-	-	-	-	-	-	1	-	\$81,600
Parks & Recreation Services																\$0
161B-MOWER RIDING	-	-	-	-	-	7	7	7	6	5	5	4	3	5	5	\$134,000
161-MOWER ROTARY GANG RIDING	-	-	-	-	-	14	12	13	12	14	14	16	16	14	14	\$107,100
140X-EXT. USE ICE RESURFACER	-	-	-	-	-	-	-	-	-	3	3	3	3	4	4	\$126,300
140-ICE RESURFACER	-	-	-	-	-	24	24	23	23	24	24	24	24	24	24	\$127,300
161B-MOWER RIDING	-	-	-	-	-	-	-	-	1	1	1	2	2	-	-	\$56,100
124C-2WD SUV	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$40,200
073B-3/4TPU PLOW TGATE DUMP	-	-	-	-	-	1	1	1	1	1	1	-	-	-	-	\$67,000
074A-1 T PICKUP W/PLOW	-	-	-	-	-	2	2	2	2	2	2	1	1	1	1	\$67,000
124-SUV 4X4	-	-	-	-	-	-	-	-	1	1	1	1	1	1	1	\$53,600
073-PICKUP TRUCK 3/4 T	-	-	-	-	-	-	-	1	1	2	2	2	2	2	2	\$71,400
150-ATT MISCELLANEOUS	-	-	-	-	-	-	-	-	-	-	-	1	1	1	1	\$13,400
007C-MOWER WALK BEHIND GREENS	-	-	-	-	-	-	-	-	-	-	-	3	2	2	2	\$9,200
017-HYBRID VEHICLES	-	-	-	-	-	-	-	-	-	-	-	1	1	1	1	\$44,200
017X - EXT.USE HYBRID VEHICLES	-	-	-	-	-	-	-	-	-	-	-	3	-	3	-	\$44,200
021-1/2 T PICK UP	-	-	-	-	-	-	-	-	-	-	-	-	-	4	4	\$40,800



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Shared Vehicles: Parks Services and Services Related to a Highway						-	-	-	-	-	-	-	-	-	-	\$0
022- VAN 1/2 T	-	-	-	-	-	4	4	4	3	3	3	1	4	1	1	\$41,200
023-VAN 3/4 T	-	-	-	-	-	-	-	-	-	-	-	1	1	-	-	\$67,000
025-TRUCK W/HYD TAILGATE	-	-	-	-	-	-	-	-	-	-	-	1	1	-	-	\$72,400
026-VAN 1 T	-	-	-	-	-	1	1	1	1	-	-	-	-	-	-	\$84,400
043A-TRACTOR FARM TYPE-SMALL	-	-	-	-	-	-	-	-	-	-	-	5	5	3	3	\$79,600
043C-TRACTOR FARM TYPE - LRG	-	-	-	-	-	-	-	-	-	-	-	2	2	1	1	\$73,700
066-MOWER RIDING FAIRWAY	-	-	-	-	-	-	-	-	-	-	-	-	1	11	11	\$60,300
074-PICKUP TRUCK 1 T	-	-	-	-	-	-	-	-	-	-	-	2	2	-	-	\$67,000
076-VACUUM LEAF	-	-	-	-	-	2	2	1	1	1	1	-	-	2	2	\$13,400
079-MOWER TRIPLEX	-	-	-	-	-	-	-	-	-	-	-	-	2	5	5	\$60,300
083-TURF UTILITY VEH OVER \$20K	-	-	-	-	-	-	-	-	-	-	-	5	5	6	6	\$40,800
97 - MOWER ROTARY TRIM	-	-	-	-	-	-	-	-	-	-	-	6	6	5	5	\$44,200
098-MOWER FRONT MNT RIDING ROT	-	-	-	-	-	-	-	-	-	-	-	5	6	-	-	\$60,300
103-TRAILER TANDEM AXLE	-	-	-	-	-	-	-	-	-	-	-	2	2	-	-	\$16,100
106-AERIFIER	-	-	-	-	-	-	-	-	-	-	-	2	2	3	3	\$26,800
106B-AERIFIER LARGE	-	-	-	-	-	-	-	-	-	-	-	3	3	1	1	\$53,600
124C - 2WD SUV	-	-	-	-	-	-	-	-	-	-	-	1	1	-	-	\$34,100
135-BLOWER LEAF LG PTO	-	-	-	-	-	-	-	-	-	-	-	1	1	3	3	\$13,400
137-TRAILER DUMP BOX	-	-	-	-	-	-	-	-	-	-	-	3	3	2	2	\$15,300
152-ALUMINUM DUMP/REG CAB	-	-	-	-	-	-	-	-	-	-	-	2	2	-	-	\$93,800
152PP-ALUM.DUMP CREW&PLOW - PARKS	-	-	-	-	-	-	-	-	-	-	-	1	2	-	-	\$93,800
027 - GOLF CART	-	-	-	-	-	-	-	-	-	-	-	-	-	5	5	\$10,200
102G-RIDE-ON WEED SPRAYER	-	-	-	-	-	-	-	-	-	-	-	-	-	2	2	\$40,800
105 - TOP DRESSER	-	-	-	-	-	-	-	-	-	-	-	-	-	2	2	\$20,400
153 - VAN MINI	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	\$33,700
160 - RAKE POWER RIDING SAND TRA	-	-	-	-	-	-	-	-	-	-	-	-	-	2	2	\$40,800



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Shared Vehicles: Parks Services and Services Related to a Highway						-	-	-	-	-	-	-	-	-	-	\$0
007A - MOWERS STAND-ON	-	-	-	-	-	-	-	-	-	-	-	1	1	1	1	\$8,900
007C-MOWER WALK BEHIND GREENS	-	-	-	-	-	6	5	5	5	8	8	8	8	3	4	\$9,400
017-HYBRID VEHICLES	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$46,900
017X - EXT.USE HYBRID VEHICLES	-	-	-	-	-	-	-	-	-	-	-	1	1	1	2	\$44,200
020-PICKUP TRUCK COMPACT	-	-	-	-	-	10	7	6	2	2	2	2	2	8	8	\$35,700
021-1/2 T PICK UP	-	-	-	-	-	-	-	-	-	-	-	-	-	18	18	\$40,800
021X-EXT. USE PICKUP 1/2 T	-	-	-	-	-	2	2	2	2	-	-	-	-	3	2	\$33,400
032-BEACH RAKE	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$120,600
043C-TRACTOR FARM TYPE - LRG	-	-	-	-	-	17	17	17	17	17	17	18	18	18	18	\$73,700
066-MOWER RIDING FAIRWAY	-	-	-	-	-	14	14	14	14	15	15	2	4	2	2	\$60,300
070 - Trailer/Boat/Motor	-	-	-	-	-	-	-	-	-	-	-	-	1	1	1	\$12,600
073A-SERVICE BODY-UTILITY	-	-	-	-	-	9	8	8	8	8	8	3	5	5	5	\$87,100
081A-LAWN MOWER SM ROT TOW BEH	-	-	-	-	-	5	5	5	5	5	5	5	5	5	5	\$13,400
081-MOWER TOW BEHIND ROTARY	-	-	-	-	-	1	1	1	1	1	1	5	5	5	5	\$26,800
083A-UTILITY VEH LARGE	-	-	-	-	-	1	1	1	1	-	-	1	1	1	1	\$134,000
083-TURF UTILITY VEH OVER \$20K VALUE	-	-	-	-	-	10	8	8	8	8	8	7	7	7	7	\$26,800
084-TURF UTILITY VEH LESS \$20K VALUE	-	-	-	-	-	16	16	16	16	16	16	16	16	17	17	\$26,800
098-MOWER FRONT MNT RIDING ROT	-	-	-	-	-	48	42	42	42	42	42	55	55	55	55	\$60,300
098X-EXT. USE MOWER FRONT MNT	-	-	-	-	-	1	-	-	-	2	2	2	2	2	2	\$27,600
102G-RIDE-ON WEED SPRAYER	-	-	-	-	-	2	2	2	2	2	2	-	-	1	1	\$53,600



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Shared Vehicles: Parks Services and Services Related to a Highway						-	-	-	-	-	-	-	-	-	-	\$0
103B-TRAILER TANDEM ENCLOSED	-	-	-	-	-	2	2	2	2	2	2	2	2	2	2	\$16,100
103-TRAILER TANDEM AXLE	-	-	-	-	-	26	24	22	22	23	23	11	11	28	28	\$16,100
104-OVERSEEDER/RENOVATOR	-	-	-	-	-	4	4	4	4	4	4	4	4	3	3	\$26,800
105A-TOP DRESSER-LARGE	-	-	-	-	-	1	1	1	1	1	1	2	4	4	4	\$53,600
106A-AERIFIER, SMALL	-	-	-	-	-	7	6	7	7	8	8	8	8	9	9	\$13,400
106B-AERIFIER LARGE	-	-	-	-	-	2	2	2	2	2	2	1	1	1	1	\$53,600
109-TRAILER TRI-AXLE	-	-	-	-	-	2	2	2	2	2	2	2	2	2	2	\$16,100
135-BLOWER LEAF LG PTO	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$13,400
150B - ATT DROP-IN SANDER	-	-	-	-	-	-	-	-	-	-	-	5	10	10	10	\$12,600
151A-ALU.DUMP PLOW&TCSIGN 1.5T	-	-	-	-	-	2	1	1	1	1	1	1	1	1	1	\$100,500
152A-ALUMINUM DUMP/CREW	-	-	-	-	-	8	3	1	2	6	6	3	3	5	5	\$93,800
152-ALUMINUM DUMP/REG CAB	-	-	-	-	-	1	1	1	1	1	1	-	-	1	1	\$93,800
152PP-ALUM.DUMP CREW&PLOW - PARKS	-	-	-	-	-	-	-	-	-	-	-	1	1	1	1	\$60,300
155A-DUMP STAKE CREW 1T W/PLOW	-	-	-	-	-	1	-	-	-	-	-	-	-	1	1	\$93,800
155-DUMP STAKE CREW 1 T	-	-	-	-	-	15	8	7	7	10	10	11	11	11	11	\$71,400
155X-EXT. USE DUMP STAKE CREW	-	-	-	-	-	1	-	-	-	1	1	-	-	-	-	\$222,500
157A-TRUCK, PACKER 3500 CHAS	-	-	-	-	-	4	4	5	5	3	3	4	4	7	7	\$169,300
038-GROOMER BALL DIAMOND 3PT	-	-	-	-	-	-	-	-	-	-	-	-	-	9	9	\$10,200
202L-FORKLIFT LARGE	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$69,400
125B-SWEEPER SIDEWK ARTICULATE	-	-	-	-	-	-	-	-	-	-	-	-	-	2	2	\$168,300
125A-SWEEPER VAC SMALL	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$10,200
152PRX-Alum. Dump Crew&Plow – Extended Use	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	\$81,600



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Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Shared Vehicles: Parks Services and Services Related to a Highway						-	-	-	-	-	-	-	-	-	-	\$0
124CX - 2WD SUV Extended Service	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$27,500
157AX-Ext. Use Truck, packer 3500 Chas	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	\$306,000
043AX-Ext. Tractor Farm Type-small	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	\$56,100
048R-PRESSURE WASHER - ROADS	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$13,400
083AR-UTILITY VEH LARGE - ROADS	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$134,000
150-ATT MISCELLANEOUS	-	-	-	-	-	4	2	2	2	5	5	-	-	3	3	\$13,400
152ARRX - ALUMINUM DUMP/CREW	-	-	-	-	-	-	-	-	-	-	-	1	1	1	2	\$71,400
080W-TRACTOR/LOADER/BACKHOE	-	-	-	-	-	-	-	-	-	2	2	3	3	3	3	\$201,000
088 - CHIPPER WOOD	-	-	-	-	-	-	-	-	-	-	-	1	1	1	1	\$141,500
088X-EXT.USE CHIPPER WOOD	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$136,600
152AR-ALUMINUM DUMP/CREW	-	-	-	-	-	-	-	-	-	5	5	3	3	2	2	\$93,800
155AA-DUMP STAKE CREW 1T W/PLOW	-	-	-	-	-	-	-	-	-	3	3	3	3	3	3	\$93,800
097-MOWER ROTARY TRIM	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$60,300
162-DUMP STEEL CREW 1T	-	-	-	-	-	4	3	3	3	3	3	3	3	3	3	\$281,500
073AX - Service Body-Utility Extended	-	-	-	-	-	-	-	-	-	-	-	2	2	2	1	\$82,100
106-AERIFIER	-	-	-	-	-	7	7	7	7	7	7	4	4	5	5	\$26,800
202-FORKLIFTS-SKID STEERS	-	-	-	-	-	7	6	6	6	6	6	6	6	6	6	\$76,500
043A-TRACTOR FARM TYPE-SMALL	-	-	-	-	-	8	8	8	8	8	8	6	6	6	6	\$73,700
103A-TRAILER TANDEM 12T FLOAT	-	-	-	-	-	1	1	1	1	-	-	1	1	1	1	\$26,800



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Shared Vehicles: Parks Services and Services Related to a Highway						-	-	-	-	-	-	-	-	-	-	\$0
152P-ALUM.DUMP CREW&PLOW	-	-	-	-	-	-	-	-	-	-	-	-	-	7	7	\$93,800
043B-TRACTOR FARM TYPE - MED	-	-	-	-	-	1	1	1	1	1	1	2	2	4	4	\$73,700
025-TRUCK W/HYD TAILGATE	-	-	-	-	-	2	2	2	2	2	2	5	5	5	5	\$67,000
074A-1 T PICKUP W/PLOW	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$67,000
124C-2WD SUV	-	-	-	-	-	4	4	3	1	1	1	5	5	4	4	\$40,200
073X-EXT. USE PICKUP 3/4 T	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	\$59,400
POA, including by-law enforcement services																
020B-COMPACT 4X4 PICKUP	-	-	-	-	-	1	1	1	-	-	-	-	-	1	1	\$35,700
124C-2WD SUV	-	-	-	-	-	-	-	-	1	1	1	1	1	18	18	\$40,200
124-SUV 4X4	-	-	-	-	-	-	-	-	1	1	1	1	1	10	10	\$53,600
021-1/2 T PICK UP	-	-	-	-	-	1	1	1	1	1	1	1	1	4	4	\$40,800
022-VAN 1/2 T	-	-	-	-	-	-	-	-	-	-	-	3	3	3	3	\$63,100
017-HYBRID VEHICLES	-	-	-	-	-	-	-	-	-	-	-	-	-	10	10	\$35,700
017X - EXT.USE HYBRID VEHICLES	-	-	-	-	-	-	-	-	-	-	-	-	-	2	6	\$35,700
020-PICKUP TRUCK COMPACT	-	-	-	-	-	-	-	-	-	-	-	-	-	2	2	\$35,700
124A-SUV ELECTRIC	-	-	-	-	-	-	-	-	-	-	-	-	-	2	2	\$51,000
153X - EXT. USE MINI VAN	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$35,700
020B - COMPACT 4X4 PICKUP	-	-	-	-	-	12	13	13	4	3	3	1	2	-	-	\$32,900
153-VAN MINI	-	-	-	-	-	1	1	1	1	1	1	2	4	4	4	\$60,300
Services Related to a Highway:																
162-DUMP STEEL CREW 1T	-	-	-	-	-	4	3	3	3	3	3	13	13	13	13	\$281,500
202-FORKLIFTS-SKID STEERS	-	-	-	-	-	-	-	-	-	-	-	-	-	3	3	\$76,500



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
043A-TRACTOR FARM TYPE-SMALL	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$73,700
103A-TRAILER TANDEM 12T FLOAT	-	-	-	-	-	1	1	1	1	-	-	1	1	1	1	\$26,800
124 - SUV 4X4	-	-	-	-	-	-	-	-	-	-	-	3	7	7	7	\$37,900
152P-ALUM.DUMP CREW&PLOW	-	-	-	-	-	6	6	6	6	6	6	4	4	12	12	\$93,800
043B-TRACTOR FARM TYPE - MED	-	-	-	-	-	4	3	2	2	2	2	2	2	6	6	\$73,700
026X-EXT. USE VAN 1 T	-	-	-	-	-	1	1	1	1	1	1	4	4	2	3	\$52,200
073-PICKUP TRUCK 3/4 T	-	-	-	-	-	2	2	2	1	2	2	9	8	8	8	\$71,400
074X-EXT. USE PICK UP 1 T	-	-	-	-	-	1	-	-	-	2	2	2	2	2	2	\$55,000
080L-Large Tractor/Backhoe/	-	-	-	-	-	-	-	-	-	1	1	2	2	2	2	\$246,100
158-ARROW BOARDS	-	-	-	-	-	12	9	9	9	10	10	9	9	9	9	\$13,400
017-HYBRID VEHICLES	-	-	-	-	-	52	52	52	49	36	36	13	13	1	1	\$46,900
017X - EXT.USE HYBRID VEHICLES	-	-	-	-	-	-	-	-	-	-	-	4	4	4	4	\$44,200
020X-EXT. USE PICKUP COMPACT	-	-	-	-	-	1	1	1	1	3	3	1	1	2	1	\$33,400
021-1/2 T PICK UP	-	-	-	-	-	30	16	17	16	16	16	-	-	40	40	\$40,800
021X-EXT. USE PICKUP 1/2 T	-	-	-	-	-	2	2	2	2	-	-	-	-	1	1	\$33,400
026B-VAN 1TON WITH SHELIVING	-	-	-	-	-	1	1	1	1	1	1	-	-	-	-	\$84,400
034-LOADER FRONT END 1 CU YD	-	-	-	-	-	2	1	1	2	1	1	1	1	-	-	\$124,700
048-PRESSURE WASHER	-	-	-	-	-	1	1	1	1	1	1	1	-	-	-	\$13,400
049-STEAM GENERATORS	-	-	-	-	-	1	1	1	1	1	1	1	-	5	5	\$15,300
076-VACUUM LEAF	-	-	-	-	-	3	3	3	3	3	3	-	-	-	-	\$13,400
079-MOWER TRIPLEX	-	-	-	-	-	7	7	7	7	7	7	-	-	-	-	\$60,300
080-TRACTOR/LOADER/BACKHOE	-	-	-	-	-	5	-	-	-	2	2	-	-	7	7	\$150,100
098X-EXT. USE MOWER FRONT MNT	-	-	-	-	-	1	-	-	-	-	-	1	1	1	1	\$27,600
103B-TRAILER TANDEM ENCLOSED	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$16,100
103-TRAILER TANDEM AXLE	-	-	-	-	-	26	24	22	22	23	23	11	11	8	8	\$16,100



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
105-TOP DRESSER	-	-	-	-	-	5	5	5	5	5	5	-	-	-	-	\$26,800
137-TRAILER DUMP BOX	-	-	-	-	-	1	1	1	1	2	2	-	-	-	-	\$15,300
150G-ATT RAM HOW	-	-	-	-	-	-	-	-	-	-	-	-	-	2	2	\$13,400
150BX - ATT Drop-in Sander Extended	-	-	-	-	-	-	-	-	-	-	-	1	1	1	-	\$12,600
151-ALUM. DUMP W/ PLOW 1.5 T	-	-	-	-	-	2	-	-	-	-	-	-	-	1	1	\$100,500
152A-ALUMINUM DUMP/CREW	-	-	-	-	-	-	-	-	-	-	-	-	-	4	4	\$93,800
152B-ALUM DUMP CREW/CRANE	-	-	-	-	-	1	1	1	1	1	1	-	-	1	1	\$93,800
152C-ALUM.DUMP CREW&PLOW&CRANE	-	-	-	-	-	1	1	1	1	1	1	4	4	1	1	\$93,800
202RX - Recycle Forklift Rental	-	-	-	-	-	-	-	-	-	-	-	-	1	1	1	\$85,900
152CX-EXT. USE Alum Dump Crew&Plow&Crane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2	\$71,400
103X - EXT.USE TANDEM TRAILER	-	-	-	-	-	-	-	-	-	-	-	-	-	2	3	\$7,700
041-STRIPER PAINT LG CENTRE	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$643,000
012C-TRAILER CABLE	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$9,400
103WWW-TRAILER TANDEM AXLE (WATER)	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$16,100
127TT-TRUCK WITH AUGER - TRAFFIC	-	-	-	-	-	-	-	-	-	2	2	1	1	3	3	\$222,900
072T-AERIAL TRUCK TRAFFIC (BOOM)	-	-	-	-	-	-	-	-	-	1	1	1	-	-	-	\$375,000
123-PLATFORM W/PORT. CEMENT MI	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$288,600
153R-VAN MINI - ROADS	-	-	-	-	-	-	-	-	-	1	1	1	1	-	-	\$60,300
026BT-VAN 1TON WITH SHELIVING (TRAFFIC)	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$84,400
119-STRIPER PAINT CROSSWALK/BE	-	-	-	-	-	4	3	4	4	4	4	4	4	4	4	\$13,400
156-SIGN TRUCK TRAFFIC	-	-	-	-	-	6	6	6	6	4	4	4	7	7	7	\$183,600
156TT-SIGN TRUCK TRAFFIC	-	-	-	-	-	-	-	-	-	2	2	2	-	-	-	\$128,700
156T-SIGN TRUCK TRAFFIC	-	-	-	-	-	-	-	-	-	1	1	1	-	-	-	\$128,700
202B-FORKLIFT WALK BEHIND	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$91,100
025-TRUCK W/HYD TAILGATE	-	-	-	-	-	3	3	3	3	3	3	3	3	3	3	\$67,000



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
072-AERIAL TRUCK TRAFFIC	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$375,000
023-VAN 3/4 T	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$54,100
021-1/2 T PICK UP	-	-	-	-	-	9	9	9	9	9	9	9	9	9	9	\$37,500
202X - Forklifts-Skid Steers Extended	-	-	-	-	-	-	-	-	-	-	-	1	1	1	1	\$85,900
022-VAN 1/2 T	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$56,100
090A-AERIAL TRUCK FORESTRY	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$255,000
090-AERIAL TRUCK FORESTRY	-	-	-	-	-	1	-	1	1	1	1	1	1	-	-	\$375,300
072-AERIAL TRUCK TRAFFIC	-	-	-	-	-	5	5	5	5	3	3	1	1	-	-	\$375,000
049R-STEAM GENERATORS (ROADS)	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$13,400
103R-TRAILER TANDEM AXLE - ROADS	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$16,100
001-SANDER W/WING & FRNT 5.5	-	-	-	-	-	7	6	3	3	-	-	-	-	-	-	\$295,100
001X-EXT.USE SANDER	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	\$318,600
002A-ALUM.SANDER PREW BEL FLOW	-	-	-	-	-	5	5	5	5	5	5	5	5	3	3	\$295,100
005-ANTI-ICE TANDEM TRUCK	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$241,300
012A-TRAILER,SINGLE AXLE,SMALL	-	-	-	-	-	5	5	5	6	7	7	7	7	6	6	\$9,400
035-LOADER FRNT END LG ARTIC	-	-	-	-	-	14	14	14	14	14	14	13	13	12	12	\$260,100
037-GRADER	-	-	-	-	-	5	5	5	5	5	5	5	5	5	5	\$335,000
045A-SWEEPER LRG MOBILE PM10	-	-	-	-	-	18	18	17	17	18	18	18	19	19	19	\$429,100
060-BLOWER SNOW ATTACHMENT	-	-	-	-	-	5	5	5	5	5	5	5	5	5	5	\$240,900
064-FLUSHER STREET	-	-	-	-	-	4	4	4	4	4	4	3	4	4	4	\$335,000
064X-EXT.USE FLUSHER	-	-	-	-	-	1	-	-	-	1	1	1	1	1	1	\$289,800
080-TRACTOR/LOADER/BACKHOE	-	-	-	-	-	8	12	12	12	8	8	8	8	-	-	\$150,800
093A-ASPHALT RECYCLER	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$240,900
094-HOTPOT TRANSPORTER	-	-	-	-	-	18	14	10	11	10	10	10	10	8	8	\$53,600



City of Hamilton
Service Standard Calculation Sheet

Class of Service: Public Works - Vehicles & Equipment
 Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
095A-ROLLER ASPHALT-SMALL	-	-	-	-	-	2	2	2	2	2	2	2	2	2	2	\$20,400
095-ROLLER ASPHALT	-	-	-	-	-	5	5	5	5	4	4	5	5	5	5	\$26,800
098-MOWER FRONT MNT RIDING ROT	-	-	-	-	-	2	7	6	12	12	12	-	-	-	-	\$60,300
109-TRAILER TRI-AXLE	-	-	-	-	-	1	1	-	1	-	-	-	-	-	-	\$12,200
121-DUMP STAKE 1 T STD CAB	-	-	-	-	-	-	1	1	1	1	1	1	1	-	-	\$93,800
124A-SUV 4X4 SMALL	-	-	-	-	-	1	-	-	-	-	-	-	-	-	-	\$58,000
126-WATER TANK TRUCK MTD	-	-	-	-	-	2	2	2	2	4	4	-	-	-	-	\$142,800
127-TRUCK WITH AUGER	-	-	-	-	-	3	3	3	3	-	-	-	-	-	-	\$222,500
128A-ROLLER ASHPALT LG STEEL	-	-	-	-	-	1	1	-	-	-	-	-	-	-	-	\$173,800
150-ATT MISCELLANEOUS	-	-	-	-	-	-	2	2	2	5	5	4	4	-	-	\$10,200
150H-ATT FLAIL MOWER	-	-	-	-	-	-	-	-	1	-	-	-	-	-	-	\$10,200
151A-ALU.DUMP PLOW&TCSIGN 1.5T	-	-	-	-	-	1	1	1	1	-	-	-	-	-	-	\$100,500
151-ALUM. DUMP W/ PLOW 1.5 T	-	-	-	-	-	1	3	3	3	3	3	3	3	-	-	\$100,500
152A-ALUMINUM DUMP/CREW	-	-	-	-	-	8	8	14	14	-	-	-	-	-	-	\$93,800
152B-ALUM DUMP CREW/CRANE	-	-	-	-	-	7	7	10	10	-	-	-	-	-	-	\$93,800
152C-ALUM.DUMP CREW&PLOW&CRANE	-	-	-	-	-	6	6	9	9	12	12	4	4	-	-	\$93,800
152H-ALUM. DUMP-HIGH MILEAGE	-	-	-	-	-	6	6	6	6	6	6	1	1	-	-	\$93,800
152P-ALUM.DUMP CREW&PLOW	-	-	-	-	-	6	6	8	8	-	-	-	-	-	-	\$93,800
153E-VAN MINI ELECTRIC	-	-	-	-	-	1	1	1	1	-	-	-	-	-	-	\$109,100
155A-DUMP STAKE CREW 1T W/PLOW	-	-	-	-	-	1	2	7	7	4	4	4	4	-	-	\$93,800
155-DUMP STAKE CREW 1 T	-	-	-	-	-	4	8	5	5	4	4	-	-	-	-	\$93,800
158X - Arrow Boards Extended Service	-	-	-	-	-	-	-	-	-	-	-	1	1	1	1	\$12,600
162A-DMP STL CREW CRANE/PLOW	-	-	-	-	-	4	4	-	-	-	-	-	-	-	-	\$76,800
162-DUMP STEEL CREW 1T	-	-	-	-	-	5	6	-	-	-	-	-	-	-	-	\$93,800
172-SNDRRADIUSDUMPW/2WAYFRONT&	-	-	-	-	-	4	4	1	-	-	-	-	-	-	-	\$333,200



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
172X-SNDRRADIUSDUMPW/2WAY	-	-	-	-	-	5	-	-	-	-	-	-	-	-	-	\$333,200
173-SANDER PRE-WET 2WAY W/WING	-	-	-	-	-	10	10	4	7	3	3	3	3	3	3	\$362,100
174-TRACKLESS	-	-	-	-	-	5	5	5	5	5	5	6	6	7	7	\$214,200
185-GRADAL	-	-	-	-	-	3	3	3	3	3	3	3	3	3	3	\$431,600
187A-ALUM.SAND PREW FR&WG PLOW	-	-	-	-	-	12	12	12	12	12	12	11	11	3	3	\$295,100
187-SANDER 1 AXL PREWET PL/WG	-	-	-	-	-	9	9	9	9	14	14	22	22	26	26	\$295,100
188A-ALUM.SAND PREW FR&WG PLOW	-	-	-	-	-	32	32	41	32	33	33	27	27	20	20	\$362,100
188-SANDER TAND PREWET PL/WG	-	-	-	-	-	10	10	10	22	26	26	34	34	41	41	\$362,100
189-SANDER 1 AXL PREWET PLOW	-	-	-	-	-	8	8	8	8	4	4	-	-	6	6	\$295,100
193-SANDER TAND PREWET PLOW	-	-	-	-	-	4	4	4	4	1	1	-	-	-	-	\$362,100
200-CRASH ATTENUATORS	-	-	-	-	-	2	2	2	2	1	1	1	2	2	2	\$51,000
024X-EXT.USE P/U CREW CAB	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$57,600
093-PAVER ASPHALT	-	-	-	-	-	-	-	-	1	1	1	-	-	-	-	\$504,500
025X-EXT. USE TRUCK W/HYD TAIL	-	-	-	-	-	-	-	-	-	2	2	-	-	-	-	\$76,400
080X-EXT.USE TRACTOR/LOAD/BHOE	-	-	-	-	-	-	-	-	-	1	1	1	1	1	-	\$150,800
084X-EXT.USE TURF LESS \$20K	-	-	-	-	-	-	-	-	-	2	2	2	2	2	2	\$26,800
095R-ROLLER ASPHALT	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$26,800
095XR-EXT.USE ROLLER ASPHALT	-	-	-	-	-	-	-	-	-	1	1	1	1	1	-	\$26,800
095X - EXT.USE ROLLER ASPHALT	-	-	-	-	-	-	-	-	-	-	-	1	1	1	1	\$50,500
12-TRAILER SINGLE AXLE	-	-	-	-	-	-	-	-	-	3	3	2	2	-	-	\$9,400



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
13-GENERATORS	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$26,800
150C-ATT SNOW BLW SKID STEER	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$13,400
151ARA-ALU.DUMP PLOW&TCSIGN 1.5T - ROADS	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$100,500
152ARA-ALU.DUMP PLOW&TCSIGN 1.5T - ROADS	-	-	-	-	-	-	-	-	-	11	11	11	9	4	4	\$93,800
152AR-ALUMINUM DUMP/CREW	-	-	-	-	-	-	-	-	-	2	2	1	1	1	1	\$93,800
152ARR-ALUMINUM DUMP/CREW	-	-	-	-	-	-	-	-	-	4	4	3	3	1	1	\$93,800
152CR-ALUM.DUMP CREW&PLOW&CRANE	-	-	-	-	-	-	-	-	-	3	3	3	3	3	3	\$93,800
152PR-ALUM.DUMP CREW&PLOW	-	-	-	-	-	-	-	-	-	1	1	1	1	-	-	\$93,800
157AR-TRUCK, PACKER 3500 CHAS	-	-	-	-	-	-	-	-	-	1	1	1	1	-	-	\$222,900
173X-SANDER PRE-WET 2WAY W/WING	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$362,100
187X-Ext use Sander 1AXL prewet PL/WG	-	-	-	-	-	-	-	-	-	2	2	1	1	1	5	\$295,100
188R-SANDER TAND PREWET PL/WG	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$368,500
188X-Ext use Sander Tand Prewet PL/WG	-	-	-	-	-	-	-	-	-	6	6	7	7	7	7	\$368,500
189X-Ext use Sander 1axl prewet plow	-	-	-	-	-	-	-	-	-	2	2	1	1	1	-	\$295,100
193X-Ext use Sander Tand prewet plow	-	-	-	-	-	-	-	-	-	3	3	1	1	1	-	\$362,100
1-SANDER W/WING & FRNT 5.5	-	-	-	-	-	-	-	-	-	2	2	-	-	-	-	\$295,100
200R-CRASH ATTENUATORS	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$67,000
020B-COMPACT 4X4 PICKUP	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$35,700
073X-EXT. USE PICKUP 3/4 T	-	-	-	-	-	1	-	-	-	-	-	2	2	2	2	\$59,400
Water Services																
080L-Large Tractor/Backhoe/	-	-	-	-	-	1	1	1	1	2	2	2	2	3	3	\$246,100



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
158-ARROW BOARDS	-	-	-	-	-	2	2	4	3	4	4	4	4	4	4	\$13,400
017-HYBRID VEHICLES	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$46,900
030-DUMP MEDIUM DUTY	-	-	-	-	-	2	2	1	1	1	1	1	1	-	-	\$150,100
025-TRUCK W/HYD TAILGATE	-	-	-	-	-	4	5	5	3	1	1	-	-	1	1	\$67,000
023-VAN 3/4 T	-	-	-	-	-	5	4	5	5	7	7	-	-	4	4	\$42,900
021-1/2 T PICK UP	-	-	-	-	-	49	55	52	55	65	65	71	92	21	21	\$37,500
012A-TRAILER,SINGLE AXLE, SMALL	-	-	-	-	-	-	-	-	1	1	1	1	1	1	1	\$9,400
012-TRAILER SINGLE AXLE	-	-	-	-	-	5	5	5	4	-	-	-	-	2	2	\$9,400
013A-LARGE GENERATOR	-	-	-	-	-	5	-	-	-	5	5	5	5	5	5	\$8,000
026A-CUBE VANS	-	-	-	-	-	8	8	8	8	-	-	-	-	3	3	\$96,500
026-VAN 1 T	-	-	-	-	-	19	13	19	19	2	2	-	-	3	3	\$84,400
030A-TANDEM DUMP	-	-	-	-	-	4	4	4	4	-	-	-	-	1	1	\$241,300
030B-DUMP MEDIUM DUTY w/PLOW	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$295,100
030C-TRIAxLE DUMP	-	-	-	-	-	-	2	2	2	-	-	-	-	2	2	\$255,100
030-DUMP MEDIUM DUTY	-	-	-	-	-	2	4	4	3	-	-	-	-	1	1	\$150,800
034-LOADER FRONT END 1 CU YD	-	-	-	-	-	1	1	1	-	1	1	1	1	1	1	\$94,900
040-VALVE MAINTENANCE TRAILER	-	-	-	-	-	-	-	-	2	-	-	2	2	2	2	\$134,000
058-VACTOR TRUCK	-	-	-	-	-	2	2	2	2	2	2	2	2	2	2	\$617,200
062-COMPRESSOR	-	-	-	-	-	5	5	5	5	1	1	2	2	2	2	\$25,500
073A-SERVICE BODY-UTILITY	-	-	-	-	-	5	3	6	5	5	5	7	5	10	10	\$87,100
073C-SERVICE BODY-VALVE TRUCK	-	-	-	-	-	2	2	2	5	4	4	3	6	6	6	\$87,100
073-PICKUP TRUCK 3/4 T	-	-	-	-	-	5	6	5	6	7	7	-	-	6	5	\$71,400
083-TURF UTILITY VEH OVER \$20K	-	-	-	-	-	5	7	7	7	7	7	7	7	2	2	\$40,800
103-TRAILER TANDEM AXLE	-	-	-	-	-	18	16	17	22	18	18	29	29	9	12	\$16,100
150G-ATT RAM HOE	-	-	-	-	-	9	6	6	7	9	9	10	10	8	8	\$13,400



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
152D-ALUM.DUMP CAB OVER	-	-	-	-	-	2	2	2	2	1	1	1	1	1	1	\$87,100
200-CRASH ATTENUATORS	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$51,000
202-FORKLIFTS-SKID STEERS	-	-	-	-	-	4	4	3	3	2	2	3	5	3	3	\$91,100
021W-1/2 T PICK UP (WATER)	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$45,600
080W-TRACTOR/LOADER/BACKHOE	-	-	-	-	-	-	-	-	-	2	2	3	3	3	3	\$201,000
124-SUV 4X4	-	-	-	-	-	-	-	-	-	1	1	1	1	16	16	\$46,900
152DW-ALUM.DUMP CAB OVER	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$87,100
012S-TRAILER SHORING (WATER)	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$9,400
017SUV-HYBRID VEHICLES (WATER - SUV)	-	-	-	-	-	-	-	-	-	4	4	4	4	1	1	\$46,900
017W-HYBRID VEHICLES (WATER)	-	-	-	-	-	-	-	-	-	9	9	3	3	2	2	\$46,900
020W-PICKUP TRUCK COMPACT (WATER)	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$40,200
020WW-PICKUP TRUCK COMPACT (WATER MAINT)	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$40,200
022W-VAN 1/2 T (WATER)	-	-	-	-	-	-	-	-	-	3	3	3	2	2	2	\$55,000
023W-VAN 3/4 T (WATER)	-	-	-	-	-	-	-	-	-	2	2	1	1	-	-	\$71,000
026AW-VAN 1 T (WATER)	-	-	-	-	-	-	-	-	-	7	7	7	7	4	4	\$96,500
026AWW-VAN 1 T (WATER)	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$96,500
026WW-VAN 1 T - WATER	-	-	-	-	-	-	-	-	-	8	8	1	1	1	1	\$84,400
030AW-TANDEM DUMP (WATER)	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$240,900
030WT-DUMP MEDIUM DUTY (WATER TNDM)	-	-	-	-	-	-	-	-	-	1	1	1	1	-	-	\$150,800
030WW-DUMP MEDIUM DUTY (WATER)	-	-	-	-	-	-	-	-	-	7	7	7	7	6	6	\$150,800
035W-LOADER FRNT END LG ARTIC - WATER	-	-	-	-	-	-	-	-	-	1	1	1	4	3	3	\$335,000
049W-STEAM GENERATORS (WATER)	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$13,400
062W-COMPRESSOR (WATER)	-	-	-	-	-	-	-	-	-	2	2	-	-	-	-	\$26,800
073AW-SERVICE BODY-UTILITY (WATER)	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$87,100



**City of Hamilton
Service Standard Calculation Sheet**

Class of Service: Public Works - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
103W-TRAILER TANDEM AXLE (WATER)	-	-	-	-	-	-	-	-	-	7	7	6	6	5	5	\$16,100
103WW-TRAILER TANDEM AXLE (WATER)	-	-	-	-	-	-	-	-	-	2	2	-	-	-	-	\$16,100
202X - Forklifts-Skid Steers Extended	-	-	-	-	-	-	-	-	-	-	-	1	1	1	1	\$85,900
202W-FORKLIFTS-SKID STEERS - WATER	-	-	-	-	-	-	-	-	-	1	1	-	-	-	-	\$91,100
030X-EXT.USE MED. DUMP	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2	\$114,200
103B-TRAILER TANDEM ENCLOSED	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$12,200
122-HOIST TRUCK FORESTRY	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$306,000
124C-2WD SUV	-	-	-	-	-	-	-	-	-	-	-	-	-	6	6	\$30,600
153X-EXT. USE MINI VAN	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$30,600
202L - FORKLIFT LARGE	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$69,400
020B-COMPACT 4X4 PICKUP	-	-	-	-	-	3	2	2	2	1	1	1	1	4	4	\$35,700
103A-TRAILER TANDEM 12T FLOAT	-	-	-	-	-	6	6	6	4	4	4	4	4	2	2	\$26,800
153-VAN MINI	-	-	-	-	-	5	5	5	8	5	5	-	-	8	8	\$33,700
2008 Vehicles & Equipment*	1,169															\$109,700
2009 Vehicles & Equipment*	-	1,135	-	-	-	-	-	-	-	-	-	-	-	-	-	\$114,100
2010 Vehicles & Equipment*	-	-	1,185	-	-	-	-	-	-	-	-	-	-	-	-	\$113,100
2011 Vehicles & Equipment*	-	-	-	1,185	-	-	-	-	-	-	-	-	-	-	-	\$115,400
2012 Vehicles & Equipment*	-	-	-	-	1,158	-	-	-	-	-	-	-	-	-	-	\$115,100
Total	1,169	1,135	1,185	1,185	1,158	1,180	1,130	1,133	1,150	1,241	1,241	1,159	1,204	1,283	1,307	

*Based on previous D.C. Studies

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.002	0.002	0.002	0.002	0.002	0.002	0.002	0.002	0.002	0.002	0.002	0.002	0.002	0.002	0.002

15 Year Average	2008-2022
Quantity Standard	0.0022
Quality Standard	\$110,068
Service Standard	\$242

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$242
Eligible Amount	\$15,046,232



**City of Hamilton
Service Standard Calculation Sheet**

Service: Fire Protection Services - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Station 1 - 35 - 43 John Street North	16,873	16,873	16,873	16,873	16,873	16,873	16,873	16,873	16,873	16,873	16,873	16,873	16,873	16,873	16,873	\$602	\$705
Station 2 - 1400 Upper Wellington Street	7,503	7,503	7,503	7,503	7,503	7,503	7,503	7,503	7,503	7,503	7,503	7,503	7,503	7,503	7,503	\$747	\$864
Station 3 - 965 Garth Street	5,948	5,948	5,948	5,948	5,948	5,948	5,948	5,948	5,948	5,948	5,948	5,948	5,948	5,948	5,948	\$747	\$864
Station 4 - 729 Upper Sherman Avenue	22,074	22,074	22,074	22,074	22,074	22,074	22,074	22,074	22,074	22,074	22,074	22,074	22,074	22,074	22,074	\$602	\$705
Station 5 - 1000 Limeridge Road East (EMS as of 2011)	7,060	7,060	7,060	-	-	-	-	-	-	-	-	-	-	-	-	\$670	\$779
Station 5 - 1227 Stone Church Road Building A	-	-	-	9,494	9,494	9,494	9,494	9,494	9,494	9,494	9,494	9,494	9,494	9,494	9,494	\$670	\$779
Station 6 - 246 Wentworth Street North	12,864	12,864	12,864	12,864	12,864	12,864	12,864	12,864	12,864	12,864	12,864	12,864	12,864	12,864	12,864	\$602	\$705
Station 7 - 225 Quigley Road	6,022	6,022	6,022	6,022	6,022	6,022	6,022	6,022	6,022	6,022	6,022	6,022	6,022	6,022	6,022	\$747	\$864
Station 8 - 400 Melvin Avenue	5,674	5,674	5,674	5,674	5,674	5,674	5,674	5,674	5,674	5,674	5,674	5,674	5,674	5,674	5,674	\$747	\$864
Station 9 - 125 Kenilworth Avenue North	7,098	7,098	7,098	7,098	7,098	7,098	7,098	7,098	7,098	7,098	7,098	7,098	7,098	7,098	7,098	\$747	\$864
Station 10 - 1455 Main Street West	7,504	7,504	7,504	7,504	7,504	7,504	7,504	7,504	7,504	7,504	7,504	7,504	7,504	7,504	7,504	\$747	\$864
Station 11 - 24 Ray Street South	3,484	3,484	3,484	3,484	3,484	3,484	3,484	3,484	3,484	3,484	3,484	3,484	3,484	3,484	3,484	\$747	\$864
Station 12 - 199 Highway #8, Stoney Creek	8,973	8,973	8,973	8,973	8,973	8,973	8,973	8,973	8,973	8,973	8,973	8,973	8,973	8,973	8,973	\$602	\$705
Station 13 - 177 Bay Street North (Mechanical Division)	14,856	14,856	14,856	14,856	14,856	14,856	14,856	14,856	14,856	14,856	14,856	14,856	14,856	14,856	14,856	\$602	\$705
Station 14 - 595 Chapel Hill Road, Elfrida	3,977	3,977	3,977	3,977	3,977	3,977	3,977	3,977	3,977	3,977	3,977	3,977	3,977	3,977	3,977	\$602	\$675
Station 15 - 415 Arvin Avenue, Stoney Creek	4,152	4,152	4,152	4,152	4,152	4,152	4,152	4,152	4,152	4,152	4,152	4,152	4,152	4,152	4,152	\$747	\$864
Station 16 - 939 Barton Street, Stoney Creek	6,671	6,671	6,671	6,671	6,671	6,671	6,671	6,671	6,671	6,671	6,671	6,671	6,671	6,671	6,671	\$747	\$864
Station 17 - 363 Isaac Brock Drive, Stoney Creek	5,435	5,435	5,435	5,435	5,435	5,435	5,435	5,435	5,435	5,435	5,435	5,435	5,435	5,435	5,435	\$747	\$834
Station 18 - 2636 Highway #56, Binbrook	9,030	9,030	9,030	9,030	9,030	9,030	9,030	9,030	9,030	9,030	9,030	9,030	9,030	9,030	9,030	\$785	\$876
Station 19 - 3303 Homestead Drive, Mount Hope	5,740	5,740	5,740	5,740	5,740	5,740	5,740	5,740	5,740	5,740	5,740	5,740	5,740	5,740	5,740	\$602	\$705
Station 20 - Garner and Kitty Murray	-	5,484	5,484	5,484	5,484	5,484	5,484	5,484	5,484	5,484	5,484	5,484	5,484	5,484	5,484	\$747	\$864
Station 21 - 365 Wilson Street, Ancaster	10,557	10,557	10,557	10,557	10,557	10,557	10,557	10,557	10,557	10,557	10,557	10,557	10,557	10,557	10,557	\$602	\$705
Station 22 - 1227 Stone Church Road East (Training)	6,396	6,396	-	-	-	-	-	-	-	-	-	-	-	-	-	\$747	\$865
Station 23 - Memorial Square, Dundas	7,189	7,189	7,189	7,189	7,189	7,189	7,189	7,189	7,189	7,189	7,189	7,189	7,189	7,189	7,189	\$602	\$705
Station 24 - 256 Parkside Drive, Waterdown	8,250	8,250	8,250	8,250	8,250	8,250	8,250	8,250	8,250	8,250	8,250	8,250	8,250	8,250	8,250	\$602	\$705
Station 25 - 361 Old Brock Road, Greensville	1,717	1,717	1,717	1,717	1,717	1,717	1,717	1,717	1,717	1,717	1,717	1,717	1,717	1,717	1,717	\$747	\$834
Station 26 - 119 Lynden Road, Lynden	4,824	4,824	4,824	4,824	4,824	4,824	4,824	4,824	4,824	4,824	4,824	4,824	4,824	4,824	4,824	\$602	\$705
Station 27 - 795 Old Highway #8, Rockton	4,825	4,825	4,825	4,825	4,825	4,825	4,825	4,825	4,825	4,825	4,825	4,825	4,825	4,825	4,825	\$602	\$675
Station 28 - 1801 Brock Road, Freelon	4,402	4,402	4,402	4,402	4,402	4,402	4,402	4,402	4,402	4,402	4,402	4,402	4,402	4,402	4,402	\$602	\$675
Station 29 - 189 King Street East, Dundas (Fire Prevention)	4,035	4,035	4,035	4,035	4,035	4,035	-	-	-	-	-	-	-	-	-	\$602	\$705



**City of Hamilton
Service Standard Calculation Sheet**

Service: Fire Protection Services - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
55 King William Street (includes Fire Prevention)	6,857	6,857	6,857	6,857	6,857	6,857	6,857	6,857	6,857	6,857	6,857	6,857	6,857	6,857	6,857	\$907	\$1,041
Station 30 - 489 Victoria Avenue North (Stores)	3,685	3,685	3,685	3,685	3,685	3,685	3,685	3,685	3,685	3,685	3,685	3,685	3,685	3,685	3,685	\$747	\$864
Building 'B' Administration - 1227 Stone Church Road East (MATC)	-	-	-	15,946	15,946	15,946	15,946	15,946	15,946	15,946	15,946	15,946	15,946	15,946	15,946	\$750	\$868
Building 'C' Training - 1227 Stone Church Road East (MATC)	-	-	-	21,030	21,030	21,030	21,030	21,030	21,030	21,030	21,030	21,030	21,030	21,030	21,030	\$747	\$865
Building 'D' Training - 1227 Stone Church Road East (MATC)	-	-	-	-	-	5,522	5,522	5,522	5,522	5,522	5,522	5,522	5,522	5,522	5,522	\$273	\$342
Total	223,675	229,160	222,764	262,174	262,174	267,696	263,661										
Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957		
Per Capita Standard	0.4374	0.4452	0.4321	0.5042	0.5017	0.5081	0.4977	0.4940	0.4911	0.4853	0.4797	0.4746	0.4688	0.4631	0.4554		

15 Year Average	2008-2022
Quantity Standard	0.4759
Quality Standard	\$778
Service Standard	\$370

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$370
Eligible Amount	\$22,995,291



**City of Hamilton
Service Standard Calculation Sheet**

Service: Fire Protection Services - Vehicles & Equipment
Unit Measure: No. of vehicles

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Urban Rescue Pumps/Engine	20	20	20	20	20	20	20	20	20	20	20	20	20	21	21	\$1,450,000
Urban Rescue	3	3	3	3	3	3	3	3	3	3	3	3	3	-	-	\$949,000
Urban Heavy Rescue	3	3	3	3	4	3	4	4	4	4	4	4	4	-	-	\$1,030,000
Fire Prevention Trailer	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$142,000
Decon Truck	1	-	1	1	1	1	1	1	1	1	1	1	1	1	1	\$320,000
Hazmat Support	-	-	-	1	1	1	1	1	1	1	1	1	1	1	1	\$1,810,000
RIT Training Trailer	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$277,000
Towers	1	1	1	1	1	1	1	1	1	1	1	1	-	-	-	\$1,980,000
Command Staff - SUV	8	8	8	9	9	9	9	9	9	8	8	8	8	5	5	\$91,000
Support Units	7	7	7	7	7	7	7	7	5	5	5	5	5	6	6	\$139,000
Sedans (Command + Support Division)	7	7	7	7	7	7	7	7	9	9	9	9	9	6	6	\$71,000
Rural Heavy Rescue	2	2	2	2	2	2	2	2	2	2	2	2	2	5	5	\$960,000
Rural Tanker/Pumper	12	12	12	12	12	12	12	12	12	12	12	12	7	7	6	\$1,450,000
Rural Rescue Pumpers	9	9	9	9	9	9	9	9	9	9	9	9	8	9	9	\$1,281,000
Rural Tankers	-	-	-	-	-	-	-	-	-	-	-	-	6	6	6	\$1,067,000
Quints	8	8	9	9	9	9	9	9	9	9	9	9	9	9	9	\$1,980,000
Platform Ladder	-	-	-	-	1	-	1	1	1	1	1	1	1	1	1	\$2,080,000
Pumper/Tankers (Bush Truck)	1	1	1	1	1	1	1	-	-	-	-	-	-	-	-	\$1,108,000
Brush Truck (Small)	-	-	-	-	-	-	-	1	1	1	1	1	1	1	1	\$555,000
Urban Interface Truck	-	-	-	-	-	-	-	1	1	1	1	1	1	1	1	\$1,030,000
Mobil Command Van	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$772,000
Light Trucks and Vans	8	8	8	8	8	8	11	11	12	12	12	12	10	11	11	\$107,000
Hybrid Fuel Cars/SUV	8	8	8	8	8	8	8	8	7	1	1	-	-	-	-	\$69,000
Compact Cars	12	12	12	12	6	6	6	6	6	13	13	13	13	14	14	\$49,000
Logistic Trailer	-	-	-	-	-	-	-	-	-	1	1	1	1	1	1	\$13,000
Portable Pump Test Trailer	-	-	-	-	-	-	-	-	1	1	1	1	1	1	1	\$141,000
New - Command Staff Pick-up Trucks	-	-	-	-	-	-	-	-	-	-	-	-	-	5	5	\$160,000
New - Foam Unit	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	\$1,450,000
New - UTV Trailer	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	\$14,000



**City of Hamilton
Service Standard Calculation Sheet**

Service: Fire Protection Services - Vehicles & Equipment
Unit Measure: No. of vehicles

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
New - UTV Unit	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	\$61,000
Rural Rescue Squads	-	-	-	-	-	-	-	-	-	-	-	-	-	2	2	\$300,000
Total	113	112	114	116	112	110	115	116	117	118	118	117	114	116	118	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002

15 Year Average	2008-2022
Quantity Standard	0.0002
Quality Standard	\$883,850
Service Standard	\$177

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$177
Eligible Amount	\$10,983,781



**City of Hamilton
Service Standard Calculation Sheet**

Service: Fire Protection Services - Small Equipment and Gear
Unit Measure: No. of equipment and gear

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/item)
Hurst Auto Extractors	51	51	51	57	57	57	57	57	57	57	57	57	57	57	57	\$31,000
Station Air Compressors	28	28	28	28	28	28	28	28	28	28	28	28	28	28	28	\$3,900
Cascade Systems	5	5	5	5	5	5	5	5	5	5	5	5	5	5	5	\$167,700
S.C.B.A.'s packs	363	363	363	363	363	363	363	363	363	363	363	363	363	425	425	\$7,000
Washer Extractors	16	16	16	18	18	18	21	21	23	23	23	23	23	23	23	\$15,000
Defibrillators-Fire	41	45	53	53	53	53	53	57	57	57	57	57	57	57	76	\$3,500
Defibrillators-Fire Training Units	41	8	8	8	8	8	8	9	9	9	9	9	9	9	-	\$3,500
Bunker Gear & Protective Clothing	825	825	825	825	825	825	825	825	825	825	1,650	1,650	1,650	1,650	1,650	\$5,000
Portable Trunk Radios	470	470	470	470	470	470	470	470	470	525	525	525	525	525	525	\$8,900
Portable Pumps	15	15	15	15	15	15	15	16	16	16	16	16	16	16	16	\$6,500
Ram Kits	38	38	38	40	40	40	40	40	40	40	40	40	40	40	40	\$15,300
AirBags	62	62	62	64	64	64	64	64	64	64	64	64	64	64	64	\$14,700
TMX Gas Detectors	32	32	32	32	32	32	32	-	-	-	-	-	-	-	-	\$9,300
Ventis MX4 Gas Detectors	-	-	-	-	-	-	-	47	47	47	47	47	47	47	44	\$4,400
Ventis MX6 Gas Detectors	-	-	-	-	-	-	-	2	2	2	2	2	2	2	13	\$8,400
Thermal Imaging Cameras	13	13	13	13	13	13	13	19	19	19	30	30	35	35	35	\$16,300
Highrise Packs (parachute kits)	22	22	22	22	22	22	22	22	22	22	22	22	22	22	22	\$5,000
Hazmat Detection Equipment	2	2	2	2	2	2	2	2	2	2	2	2	4	4	4	\$83,600
S.C.B.A.'s face pieces	825	825	825	825	825	825	825	825	825	825	825	825	825	825	825	\$600
S.C.B.A. Cylinders	1,400	1400	1400	1400	1400	1,400	1,400	1,400	1,400	1,400	1,400	1,400	1,400	1,400	1,400	\$1,400
Station Exhaust Systems	27	27	27	27	27	27	27	27	27	27	27	27	27	27	27	\$65,700
Confined Space	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$35,000
Hazmat P.P.E. & Response Equipment	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$511,800
High Angle Rope Rescue	5	5	5	5	5	5	5	5	5	5	5	5	5	5	5	\$42,600
RPAS Response Equipment	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$209,000



**City of Hamilton
Service Standard Calculation Sheet**

Service: Fire Protection Services - Small Equipment and Gear
Unit Measure: No. of equipment and gear

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/item)
Commercial Washers & Dryers	-	-	-	-	-	-	-	-	-	-	-	-	-	26	26	\$1,900
Ice Water Rescue	-	-	-	-	-	-	-	-	-	-	-	-	5	5	5	\$43,400
Total	4,283	4,254	4,262	4,274	4,274	4,274	4,277	4,306	4,308	4,363	5,199	5,199	5,211	5,300	5,318	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.0084	0.0083	0.0083	0.0082	0.0082	0.0081	0.0081	0.0081	0.0080	0.0080	0.0095	0.0094	0.0093	0.0093	0.0092

15 Year Average	2008-2022
Quantity Standard	0.0086
Quality Standard	\$5,026
Service Standard	\$43

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$43
Eligible Amount	\$2,685,518



**City of Hamilton
Service Standard Calculation Sheet**

Service: Policing Services - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
City Owned																	
Central Station (155 King William) - Station 10	132,000	132,000	132,000	132,000	132,000	132,000	132,000	132,000	132,000	132,000	132,000	132,000	132,000	132,000	132,000	\$1,133	\$1,318
East End Station (2825 King St E) - Station 20	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	\$1,039	\$1,246
Mountain Station (488 Upper Wellington)	25,000	25,000	25,000	25,000	25,000	25,000	25,000	25,000	25,000	25,000	25,000	25,000	25,000	-	-	\$1,039	\$1,221
Marine Facility (Guise St)	5,000	5,000	5,000	5,000	5,000	5,000	5,000	5,000	5,000	5,000	5,000	-	-	-	-	\$1,039	\$1,227
Marine Facility (110 HARBOURFRONT DRIVE) - Temporary Facility	-	-	-	-	-	-	-	-	-	-	-	2,650	2,650	2,650	2,650	\$1,096	\$1,214
Divisional 30 Headquarters (Rymal Rd)	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	40,000	\$1,039	\$1,252
Station #19, Police, 3302 Homestead Rd.	285	285	285	285	285	285	285	285	-	-	-	-	-	-	-	\$1,039	\$1,217
Station #18, Police, 2636 Hwy 56, Binbrook	334	334	334	334	334	334	334	334	-	-	-	-	-	-	-	\$1,039	\$1,219
ISD Facility, 100 Wilson Street	-	-	-	-	-	-	-	-	-	-	-	-	62,754	62,754	62,754	\$1,133	\$1,350
City Leased																	
Dundas Station (2 King St W)	1,050	1,050	1,050	1,050	1,050	1,050	1,050	1,050	1,050	1,050	1,050	1,050	1,050	1,050	1,050	\$350	\$427
601 Burlington Street	2,852	2,852	2,852	2,852	2,852	2,852	2,852	2,852	2,852	2,852	-	-	-	-	-	\$350	\$446
Holly Oakes Farms (3517 Powerline Road)	23,090	23,090	23,090	23,090	23,090	23,090	23,090	23,090	23,090	23,090	23,090	23,090	23,090	23,090	23,090	\$350	\$445
Goodwill - 3rd floor (229 King William Street)	-	-	-	-	-	-	-	-	-	-	-	-	3,661	4,296	4,296	\$350	\$445
Goodwill - 4th floor (229 King William Street)	-	-	-	-	-	-	-	-	-	-	-	6,871	6,871	6,871	6,871	\$350	\$445
Community Policing Centres and Other																	
Professional Standards Branch	1,400	1,400	1,400	-	-	-	-	-	-	-	-	-	-	-	-	\$350	\$445
Jackson Square	750	-	-	-	-	-	-	-	-	-	-	-	-	-	-	\$350	\$404



**City of Hamilton
Service Standard Calculation Sheet**

Service: Policing Services - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Landsdale-Stinson	800	800	800	800	800	800	800	800	-	-	-	-	-	-	-	\$350	\$445
Centre Mall	850	850	850	850	850	850	850	-	-	-	-	-	-	-	-	\$350	\$445
Ancaster Municipal Office	400	400	400	400	-	400	-	-	-	-	-	-	-	-	-	\$350	\$445
Spartan Plaza	400	-	-	-	-	-	-	-	-	-	-	-	-	-	-	\$350	\$445
Concession Street	850	850	850	850	850	850	850	850	850	-	-	-	-	-	-	\$350	\$445
Flamborough Municipal Office	750	750	750	750	-	750	-	-	-	-	-	-	-	-	-	\$350	\$445
Lime Ridge Mall	750	-	-	-	-	-	-	-	-	-	-	-	-	-	-	\$350	\$445
Innovation Drive-Flamborough	-	-	-	-	984	-	984	984	984	984	278	278	278	378	378	\$350	\$445
Tisdale House 312 Wilson Street Ancaster	-	-	-	-	940	-	940	940	940	940	940	940	940	940	940	\$350	\$445
460 Barton Street	-	-	-	-	-	-	-	3,072	3,072	3,072	-	-	-	-	-	\$350	\$445
Blacks Stables	-	-	4,800	4,800	4,800	4,800	4,800	-	-	-	-	-	-	-	-	\$350	\$445
Ancaster Fairgrounds Stables	-	-	-	-	-	-	-	5,000	5,000	5,000	5,000	5,000	5,000	5,000	5,000	\$350	\$415
John Sopinka Courthouse (45 Main St. E.)	12,570	12,570	12,570	12,570	12,570	12,570	12,570	12,570	12,570	12,570	12,570	12,570	12,570	12,570	12,570	\$641	\$781
Superior Courthouse (55 Main St. W.)	1,599	1,599	1,599	1,599	1,599	1,599	1,599	1,599	1,599	1,599	1,599	1,599	1,599	1,599	1,599	\$350	\$445
POA Courthouse (50 Main St. E.)	-	-	-	-	-	-	-	-	-	-	-	-	16,736	16,736	16,736	\$641	\$781
Centre Road Block (Building), 1255 Centre Rd.	-	-	-	-	-	-	-	2,147	2,147	2,147	2,147	2,147	2,147	2,147	-	\$430	\$643
Building 'B' Administration - 1227 Stone Church Road East (MATC)	-	-	-	13,286	13,286	13,286	13,286	13,286	13,286	13,286	13,286	13,286	13,286	13,286	13,286	\$750	\$888
Building 'C' Training - 1227 Stone Church Road East (MATC)	-	-	-	16,625	16,625	16,625	16,625	16,625	16,625	16,625	16,625	16,625	16,625	16,625	16,625	\$747	\$885
Total	290,729	288,829	293,629	322,140	322,914	322,140	322,914	327,483	326,064	325,214	318,584	323,105	406,256	381,991	379,845		
Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957		
Per Capita Standard	0.5685	0.5611	0.5695	0.6196	0.6179	0.6114	0.6096	0.6136	0.6073	0.5986	0.5796	0.5815	0.7223	0.6709	0.6561		



City of Hamilton
Service Standard Calculation Sheet

Service: Policing Services - Facilities
Unit Measure: sq.ft. of building area

15 Year Average	2008-2022
Quantity Standard	0.6125
Quality Standard	1,134
Service Standard	\$695

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$695
Eligible Amount	\$43,159,666



**City of Hamilton
Service Standard Calculation Sheet**

Service: Policing Services - Vehicles
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Patrol Vehicles	117	117	117	117	120	123	123	122	122	124	122	105	93	107	102	\$113,000
Non-Patrol Vehicles	33	78	79	81	156	174	164	169	172	170	170	173	167	170	193	\$42,000
Marine Vessel - Hike 941	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$1,112,200
Marine Vessel - Zodiac 942	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$346,100
Marine Vessel - Argo 944	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$52,900
Marine Vessel - Zodiac 943	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$24,100
Explosive Disposal Unit - Bomb Truck 962	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$292,300
Court Security - Prisoner Van 197,198	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$160,000
ATV Team 920	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$31,800
ATVs 828,829	-	-	-	-	-	-	-	2	2	2	2	2	2	2	2	\$19,100
ATV Trailer 615	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$10,600
Emergency Response Unit - Utility Rescue 960	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$439,700
Specialties Unit - Traditional Organized Crime 961	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$292,700
Emergency Response Unit Vehicle 964	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$443,200
Total	161	206	207	209	287	309	299	305	308	308	306	292	274	291	309	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.0003	0.0004	0.0004	0.0004	0.0005	0.0006	0.0006	0.0006	0.0006	0.0006	0.0006	0.0005	0.0005	0.0005	0.0005

15 Year Average	2008-2022
Quantity Standard	0.0005
Quality Standard	\$83,420
Service Standard	\$42

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$42
Eligible Amount	\$2,591,693



**City of Hamilton
Service Standard Calculation Sheet**

Service: Policing Services - Small Equipment and Gear
Unit Measure: No. of equipment and gear

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/item)
Equipped Officers	787	787	793	797	797	797	797	812	812	812	812	813	855	855	855	\$18,300
Special Constables	98	95	104	103	103	103	109	85	85	85	85	88	88	88	121	\$2,900
Auxiliary	65	50	63	70	82	70	82	78	78	78	78	76	76	76	43	\$3,200
Cadets	-	-	-	-	-	-	-	4	4	4	4	4	12	12	18	\$3,500
Total	950	932	960	970	982	970	988	979	979	979	979	981	1,031	1,031	1,037	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.0019	0.0018	0.0019	0.0019	0.0019	0.0018	0.0019	0.0018	0.0018	0.0018	0.0018	0.0018	0.0018	0.0018	0.0018

15 Year Average	2008-2022
Quantity Standard	0.0018
Quality Standard	\$15,889
Service Standard	\$29

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$29
Eligible Amount	\$1,777,090



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Development
Unit Measure: Acres of Parkland

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Acre)
City Wide	1,098	1,117	1,117	1,117	1,117	1,148	1,110	1,110	1,110	1,110	1,110	1,098	1,098	1,097	1,101	\$82,000
Neighbourhood	653	671	671	686	688	689	732	735	744	751	757	764	767	772	782	\$67,000
Parkette	68	68	68	73	74	74	66	66	67	67	67	67	69	69	69	\$145,000
Community	799	837	839	851	889	889	826	826	826	826	801	803	803	798	798	\$82,000
Heritage Parkland	409	409	409	409	409	409	404	404	404	404	404	404	404	404	404	\$47,400
Natural Open Space	2,114	2,114	2,114	2,137	2,137	2,052	1,948	1,948	1,948	1,948	1,943	1,956	1,956	1,972	1,972	\$14,800
General Open Space	191	191	191	185	195	231	253	253	253	253	253	251	251	251	253	\$47,400
Parks on Utility Lands	77	75	75	72	72	72	99	99	99	99	99	99	99	99	99	\$14,800
Leased Land	55	-	-	-	-	-	-	-	-	-	-	-	-	-	-	\$15,400
Other Utility Lands	118	118	118	119	119	119	81	81	81	81	81	81	81	81	81	\$14,800
School Lands	395	395	395	395	381	356	314	314	314	314	314	370	426	425	425	\$50,000
Non-City-Owned Lands (not including School Lands, Royal Botanical Garden lands or Conservation Authority Lands that the City maintains as parkland)	169	169	169	159	129	130	88	127	127	127	127	128	128	128	132	\$47,400
Total	6,146	6,164	6,166	6,203	6,210	6,169	5,921	5,965	5,974	5,982	5,957	6,021	6,083	6,097	6,116	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01

15 Year Average	2008-2022
Quantity Standard	0.0113
Quality Standard	\$50,254
Service Standard	\$568

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$568
Eligible Amount	\$35,285,170



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Amenities
Unit Measure: No. of parkland amenities

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/item)
Tennis Club Lit	44	46	46	46	46	46	48	48	48	48	48	48	48	48	48	\$108,100
Tennis Public Lit	24	25	25	25	25	25	22	22	22	22	22	22	20	20	20	\$108,100
Tennis Public Unlit	17	17	17	17	18	23	20	20	20	20	21	20	17	19	17	\$70,500
Soccer Class A+ (Lit) - Artificial Turf	-	-	-	1	1	1	1	1	1	1	1	1	1	1	1	\$4,000,000
Soccer Class A+ (Lit)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$860,200
Soccer Class A Lit	10	17	17	17	15	15	15	15	15	15	15	15	15	16	1	\$398,000
Soccer Class B Lit	9	9	9	9	9	9	8	8	8	8	8	8	9	9	9	\$329,000
Soccer Class B Unlit	3	6	6	6	6	8	11	11	11	11	11	11	12	12	13	\$277,300
Soccer Class C Unlit	129	160	160	160	161	162	201	201	201	201	201	201	201	202	202	\$117,500
Soccer Class D Unlit	1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	\$85,200
Lit Football Fields	5	3	3	3	3	3	4	4	4	5	6	6	6	6	6	\$220,900
Unlit Football Fields	6	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$106,500
Hardball Lit (premier diamond)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$506,000
Hardball Lit	12	14	14	15	15	15	15	15	15	15	15	15	15	15	15	\$285,100
Hardball Unlit	25	22	22	22	22	21	21	21	21	21	21	21	21	21	21	\$123,800
Softball Lit	32	33	33	36	39	40	37	37	37	39	41	41	41	40	40	\$285,100
Softball Unlit	153	139	139	139	127	126	121	116	111	106	101	101	101	98	97	\$123,800
Tball	38	38	38	39	43	43	42	41	40	39	38	38	38	36	35	\$51,700
Batting Cages	16	12	12	12	12	12	12	12	13	16	16	16	16	16	18	\$27,900
Lit Bocce Courts	32	32	32	32	32	32	35	35	29	29	29	29	29	29	29	\$20,300
Regulation Bocce Courts Lit (min. 2 lanes)	10	10	10	10	10	10	8	8	8	8	8	8	8	8	8	\$175,500
Unlit Bocce Courts	9	7	7	7	7	5	2	2	2	2	2	2	2	2	2	\$11,000
Basketball Full-court	93	93	93	93	93	93	91	90	89	88	87	82	79	78	75	\$72,100
Basketball Half-court	-	-	-	-	-	-	159	159	159	160	160	162	160	164	164	\$36,000
Multi-Purpose Court	6	7	7	8	11	13	15	18	21	24	27	36	41	43	46	\$89,300
Spray Pads - Community/City Wide	16	16	16	17	17	20	20	21	21	22	26	27	27	28	28	\$459,900
Spray Pads - Neighbourhood/Parkette	35	35	35	35	37	38	38	38	37	39	41	42	42	42	42	\$348,400
Wading Pools	16	16	16	16	16	15	14	13	11	9	8	8	8	7	7	\$226,900
Play Structure - Neighbourhood/Parkette Parks	157	157	157	163	187	190	205	213	221	229	237	258	261	272	279	\$146,300



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Amenities
Unit Measure: No. of parkland amenities

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/item)
Play Structure - Community/City-wide Parks	59	59	59	62	67	69	71	74	77	80	83	92	92	96	101	\$283,500
Play Structure - Other Parks (School, Historical, Open Space)	38	38	39	27	26	27	29	30	31	32	33	34	35	36	36	\$119,000
Play Equipment - Community Parks/City-wide Parks	160	160	160	157	157	160	158	158	158	158	158	179	180	174	200	\$34,400
Play Equipment - Neighbourhood/Parkette Parks	367	367	367	402	420	436	432	427	422	417	412	430	436	441	456	\$25,100
Play Equipment - Other Parks (School, Historical, Open Space)	-	108	108	81	86	83	72	73	74	75	76	85	87	89	89	\$15,600
Natural Playground	-	-	-	-	-	-	4	5	6	7	7	7	7	8	8	\$174,200
Accessible Swing Seats	49	53	53	52	74	80	83	90	95	100	108	115	117	126	127	\$3,100
Swing Sets, 4 seats	10	157	159	161	163	165	167	169	171	173	175	181	182	181	182	\$54,600
Swing Sets, 6 seats	-	50	52	54	56	58	60	61	62	63	64	64	65	67	69	\$71,100
Swing Sets, 8 seats	3	40	41	42	43	44	45	46	47	48	49	50	50	48	49	\$87,500
Exercise Stations (per fitness station)	33	33	33	33	33	33	33	33	41	46	46	46	46	63	70	\$12,800
Skateboard Parks	4	5	5	5	5	5	5	5	5	5	6	6	6	6	7	\$1,212,500
Lawn bowling Greens	10	10	10	10	10	10	4	4	4	4	4	4	4	4	4	\$15,600
Volleyball Courts	5	5	5	5	5	5	20	20	20	20	20	20	20	20	20	\$20,300
Running Tracks	5	5	5	5	6	6	10	10	10	11	11	11	11	11	11	\$109,700
Public Beaches within Parks/along Trails	3	3	3	3	3	3	5	5	5	5	5	5	5	5	5	\$3,100
Public Boat Launches within Parks	2	2	2	2	2	2	1	1	1	1	1	1	1	1	1	\$20,300
Track and Field Amenities:																
High Jump Area	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$11,000
Discus Area	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	\$11,000
Long Jump pits	9	9	9	9	9	9	9	9	9	9	9	9	9	9	9	\$11,000
Hop Skip Jump area	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$11,000



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Amenities
Unit Measure: No. of parkland amenities

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/item)
Shot-put/discus	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$11,000
Steeplechase waterpit	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$15,600
Javelin runway	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$11,000
Benches	2545	2545	2545	2550	2555	2,560	2,610	2,660	2,710	2,760	2,810	2,860	2,910	2,960	3,010	\$1,500
Bleachers	279	277	277	274	274	273	277	281	285	289	293	293	298	301	301	\$11,000
Display Fountains	5	5	6	7	8	9	11	11	11	11	11	11	11	11	11	\$25,100
Drinking Fountains	81	79	76	74	71	68	70	72	74	76	78	84	85	90	94	\$69,700
Trash Receptacles	1296	1302	1307	1314	1320	1,327	1,377	1,427	1,477	1,527	1,577	1,602	1,627	1,652	1,677	\$1,500
Lighting Standards	1827	1968	2109	2250	2391	2,532	2,557	2,582	2,607	2,632	2,657	2,694	2,700	2,737	2,823	\$6,300
Bridges - Pedestrian	20	24	28	33	38	42	38	38	38	38	38	38	38	38	38	\$86,100
Bridges - Vehicle	9	11	12	15	17	18	13	13	13	13	13	13	13	13	13	\$148,800
Gates - Vehicle	112	112	112	113	114	115	117	119	121	123	125	125	127	127	127	\$14,900
Gates - Pedestrian	167	167	167	163	161	159	162	165	168	171	174	178	178	178	196	\$11,100
Irrigation Systems	55	55	55	55	58	58	60	62	62	64	64	67	72	72	72	\$11,000
Band shell (Battlefield Park)	2	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$477,900
Cricket Pitch - Class A (natural turf, irrigated, unlit)	-					-	-	-	-	-	-	-	1	1	1	\$936,900
Cricket Pitch	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$123,800
Cricket Practice Pitch	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$62,700
Australian Football Field	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$106,500
Viewing Platform	1	1	1	1	1	2	8	8	8	8	8	8	8	8	8	\$490,400
Escarpment Stairs	6	6	6	6	6	6	12	12	12	12	12	12	12	12	12	\$2,513,200
Outdoor Ice Rink - Naturally Cooled	66	66	66	66	66	66	66	66	66	67	67	67	67	68	67	\$136,600
Outdoor Ice Rink - Artificially Cooled	1	1	1	2	2	2	3	3	3	3	3	4	4	4	4	\$1,265,500



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Amenities
Unit Measure: No. of parkland amenities

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/item)
Park Signs - Community	87	87	87	87	87	87	88	89	90	91	92	92	93	93	93	\$13,200
Park Signs - Internal	609	609	609	609	609	609	614	619	624	629	634	635	637	637	638	\$12,800
Park Signs - Neighbourhood	237	237	237	239	240	243	245	245	246	250	250	252	253	254	283	\$9,100
Parking - Asphalt - lit (per stall)	9	9	9	9	9	9	1,533	1,583	1,633	1,683	1,733	1,760	1,900	1,927	2,077	\$7,800
Parking - Asphalt - unlit (per stall)	3,427	3,427	3,428	3,428	3,428	3,428	1,824	1,874	1,924	1,974	2,024	2,024	2,024	2,015	2,018	\$4,500
Parking - Granular - unlit (per stall)	3,931	3,931	3,932	3,932	3,932	3,932	3,194	3,244	3,294	3,344	3,444	3,444	3,444	3,402	3,402	\$1,500
Parking - Pervious Concrete - unlit (per stall)	-	-	-	-	22	22	22	22	22	22	22	22	22	22	22	\$25,100
Parking - Grasspave - unlit (per stall)	-	-	-	-	140	140	-	-	-	-	-	-	-	-	-	\$1,800
Pump Track (BMX/Bike Track) - Gage Park	-	-	-	-	-	-	-	1	1	1	1	1	1	1	1	\$155,800
Bob Mackenzie Ball Hockey Court (Roxborough ave)	-	-	-	-	-	-	-	1	1	1	1	1	1	1	1	\$206,800
Leash Free Dog Areas - Fenced	2	2	2	3	3	4	5	6	7	8	8	8	8	9	10	\$115,000
Leash Free Dog Areas - Unfenced	3	3	3	3	3	3	3	3	3	3	3	3	3	3	4	\$4,500
Pickleball Courts	-	-	-	-	-	-	-	-	6	6	6	6	24	24	24	\$4,200
Total	16,447	16,960	17,117	17,289	17,690	17,892	17,298	17,611	17,925	18,253	18,617	18,877	19,149	19,295	19,712	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03

15 Year Average	2008-2022
Quantity Standard	0.0335
Quality Standard	\$18,790
Service Standard	\$629

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$629
Eligible Amount	\$39,111,505



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Amenities - Buildings
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Park Amenities (sq.ft.)																
Agro Park - Sun Shelter	-	-	-	-	-	-	-	-	-	400	400	400	400	400	400	\$126
Agro Park - Trellis	-	-	-	-	-	-	-	-	-	192	192	192	192	192	192	\$126
Alexander Park - Trellis	-	-	-	-	-	-	-	-	-	-	242	242	242	242	242	\$126
Allison Neighbourhood Park - Sun Shelter	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	\$126
Beasley Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	290	290	290	290	290	\$273
Redhill Summit East Park - Sun Shelter	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	\$126
Beverly Park - Pavilion	1,332	1,332	1,332	1,332	1,332	1,332	1,332	1,332	1,332	1,332	1,332	1,332	1,332	1,332	1,332	\$126
Birch Avenue Leash-Free Area - Shelter #1	-	-	-	45	45	45	45	45	45	45	45	45	45	45	45	\$126
Birch Avenue Leash-Free Area - Shelter #2	-	-	-	45	45	45	45	45	45	45	45	45	45	45	45	\$126
Bookjans Park	-	-	-	-	-	-	-	-	-	-	-	210	210	210	210	\$126
Broughton Park West - Sun Shelter	-	-	-	-	360	360	360	360	360	360	360	360	360	360	360	\$126
Buchanan Park - Sun Shelter	-	-	-	-	-	-	-	200	200	200	200	200	200	200	200	\$126
Burkholder Park - Sun Shelter	-	-	-	-	400	400	400	400	400	400	400	400	400	400	400	\$126
Carpenter Park - Sun Shelter	-	-	-	-	-	-	-	-	-	383	383	383	383	383	383	\$126
Carter Park - Sun Shelter	-	-	-	-	-	-	332	332	332	332	332	332	332	332	332	\$126
Caterini Park - Sun Shelter	-	-	-	-	-	-	-	-	-	400	400	400	400	400	400	\$126
Centennial Heights Park - Pavilion	1,313	1,313	1,313	1,313	1,313	1,313	1,313	1,313	1,313	1,313	1,313	1,313	1,313	1,313	1,313	\$126
Central Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	-	-	-	-	400	\$126
Chappel Estates Park - Sun Shelter	-	-	-	-	-	388	388	388	388	388	388	388	388	388	388	\$126
Churchill Park - Sun Shelters	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	\$72
Cline Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	-	-	-	374	374	\$126
Confederation Beach Park - Edgewater Pavilion	5,756	5,756	5,756	5,756	5,756	5,756	5,756	5,756	5,756	5,756	5,756	5,756	5,756	5,756	5,756	\$126
Confederation Beach Park - Willow Cove Pavilion	2,594	2,594	2,594	2,594	2,594	2,594	2,594	2,594	2,594	2,594	2,594	2,594	2,594	2,594	2,594	\$126
Confederation Beach Park Sports Park - Plaza (Drop-off area) Shade Structure	-	-	-	-	-	-	-	-	-	-	-	-	-	-	878	\$126



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Amenities - Buildings
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Park Amenities (sq.ft.)																
Confederation Beach Park Sports Park - Playground Shade Structure #1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	270	\$126
Confederation Beach Park Sports Park - Playground Shade Structure #2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	270	\$126
Confederation Beach Park Sports Park - Picnic Shelter #1 (NORTH) (unlit)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	665	\$126
Confederation Beach Park Sports Park - Picnic Shelter #2 (WEST) (unlit)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	665	\$126
Confederation Beach Park Sports Park - Picnic Shelter #3 (EAST) (unlit)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	665	\$126
Copetown Lions Park - Pavilion	1,304	1,304	1,304	1,304	1,304	1,304	1,304	1,304	1,304	1,304	1,304	1,304	1,304	1,304	1,304	\$126
Courtcliffe Park - Picnic Shelter	1,485	1,485	1,485	1,485	1,485	1,485	1,485	1,485	1,485	1,485	1,485	1,485	1,485	1,485	1,485	\$126
Cranberry Hill Park - Sun Shelter	-	-	-	-	-	-	-	-	-	282	282	282	282	282	282	\$126
Creekside Park - Sun Shelter	-	-	-	-	-	-	-	-	488	488	488	488	488	488	488	\$126
Dundas Driving Park - Pavilion - 159080	1,097	1,097	1,097	1,097	1,097	1,097	1,097	1,097	1,097	1,097	1,097	1,097	1,097	1,097	1,097	\$273
Dundas Driving Park - Pavilion - 159665	2,058	2,058	2,058	2,058	2,058	2,058	2,058	2,058	2,058	2,058	2,058	2,058	2,058	2,058	2,058	\$273
Dundas Driving Park - Trellis	665	665	665	665	665	665	665	665	665	665	665	665	665	665	665	\$126
Dundurn Park - Picnic Pavilion	1,336	1,336	1,336	1,336	1,336	1,336	1,336	1,336	1,336	1,336	1,336	1,336	1,336	1,336	1,336	\$126
Durand Park - Sun Shelter	-	-	-	-	-	-	-	366	366	366	366	366	366	366	366	\$126
Durand Park - Trellis	-	-	-	-	-	-	-	180	180	180	180	180	180	180	180	\$126
Elmar Park - Sun Shelter	-	-	-	-	-	-	373	373	373	373	373	373	373	373	373	\$126
Eringate Park - Sun Shelter	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	\$126
Fair Park (Meadowlands Ph IIX & X) Sun Shelter	-	-	-	-	-	-	-	-	400	400	400	400	400	400	400	\$126



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Amenities - Buildings
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Park Amenities (sq.ft.)																
Fairfield Park - Sun Shelter	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	\$273
Fairgrounds Community Park - Picnic Pavilion	1,816	1,816	1,816	1,816	1,816	1,816	1,816	1,816	1,816	1,816	1,816	1,816	1,816	1,816	1,816	\$126
Fairgrounds Community Park - Sun Shelter	-	-	334	334	334	334	334	334	334	334	334	334	334	334	334	\$126
Father Sean O'Sullivan Park - Sun Shelter	-	-	-	-	-	-	380	380	380	380	380	380	380	380	380	\$126
Freelton Community Park - Picnic Pavilion	1,220	1,220	1,220	1,220	1,220	1,220	1,220	1,220	1,220	1,220	1,220	1,220	1,220	1,220	1,220	\$126
Gage Park - Archway (Near Main St)	602	602	602	602	602	602	602	602	602	602	602	602	602	602	602	\$126
Gage Park - Band Shell	980	980	980	980	980	980	980	980	980	980	980	980	980	980	980	\$273
Gatesbury Sun Shelter	-	-	-	-	-	-	-	-	250	250	250	250	250	250	250	\$126
Glanbrook Hills Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	450	450	450	450	450	\$126
Globe Park - Sun Shelter	380	380	380	380	380	380	380	380	380	380	380	-	-	-	-	\$126
Hampton Park - Sun Shelter	-	-	400	400	400	400	400	400	400	400	400	400	400	400	400	\$126
Heritage Green Dog Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	-	150	150	150	150	\$273
Highland Road Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	-	-	-	-	374	\$126
Hill Street Dog Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	-	100	100	100	100	\$126
Honourable Bob McKenzie Park - Sun Shelter	-	-	-	-	-	-	272	272	272	272	272	272	272	272	272	\$126
Huntington Park - Sun Shelter	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	\$273
Inch Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	-	780	780	780	780	\$126
Jackson Heights Neighbourhood Park - Sun Shelter	-	-	-	388	388	388	388	388	388	388	388	388	388	388	388	\$126
Jerome Neighbourhood Park - Sun Shelter	-	-	-	-	590	590	590	590	590	590	590	590	590	590	590	\$126
Joe Sam's Leisure Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	1,130	1,130	1,130	1,130	1,130	\$168
John Rebecca Park - Custom Sun Shelter/Pergola	-	-	-	-	-	-	-	-	-	-	-	800	800	800	800	\$126



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Amenities - Buildings
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Park Amenities (sq.ft.)																
Johnson Tew Park - Sun Shelter	-	-	-	-	-	-	-	-	470	470	470	470	470	470	470	\$126
Kennedy East Park - Sun Shelter	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	\$126
Kings Forest Golf Club - Pavilion A	199	199	199	199	199	199	199	199	199	199	199	199	199	199	199	\$126
Kings Forest Golf Club - Sun Shelter	315	315	315	315	315	315	315	315	315	315	315	-	-	-	-	\$126
Kinsmen Park - Picnic Shelter	-	-	-	-	-	-	747	747	747	747	747	747	747	747	747	\$126
Kopperfield Park - Sun Shelter	-	-	-	-	-	-	-	400	400	400	400	400	400	400	400	\$126
Laidman Park - Sun Shelter	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	\$126
Lake Pointe Park - Sun Shelter	360	360	360	360	360	360	360	360	360	360	360	360	360	360	360	\$126
Lake Vista Park - Sun Shelter	360	360	360	360	360	360	360	360	360	360	360	360	360	360	360	\$126
Lynden Legion Park - Picnic Pavilion	337	337	337	337	337	337	337	337	337	337	337	337	337	337	337	\$126
Lynden Lions South Park - Picnic Pavilion	-	-	-	-	-	-	864	864	864	864	864	864	864	864	864	\$126
McClaren Park - Shade Structure	-	-	-	-	-	-	-	-	225	225	225	225	225	225	225	\$138
Mohawk Sports Park Sun Shelter	-	-	-	-	-	-	-	-	-	-	-	-	-	-	780	\$126
Mohawk Sports Park - First Base Dugout	212	212	212	212	212	212	212	212	212	212	212	212	212	212	212	\$126
Mohawk Sports Park - Third Base Dugout	212	212	212	212	212	212	212	212	212	212	212	212	212	212	212	\$126
Montgomery Park - Pavilion	336	336	336	336	336	336	336	336	336	336	336	336	336	336	336	\$126
Montgomery Park - Sun Shelter	336	336	336	336	336	336	336	336	336	336	336	336	336	336	336	\$126
Moorland Park - Sun Shelter	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	\$126
Mount Hope Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	724	724	724	724	724	\$126
Mount Lions Park - Sun Shelter Pavilion	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	\$273
Newlands Park - Sun Shelter	274	274	274	274	274	274	274	274	274	274	274	274	274	274	274	\$126
North Central Community Park - Sun Shelter	416	416	416	416	416	416	416	416	416	416	416	416	416	416	416	\$126
Peace Memorial Park - Trellis	1,314	1,314	1,314	1,314	1,314	1,314	1,314	1,314	1,314	1,314	1,314	1,314	1,314	1,314	1,314	\$126



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Amenities - Buildings
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Park Amenities (sq.ft.)																
Perth Park - Sun Shelter	-	-	-	-	-	-	-	232	232	232	232	232	232	232	232	\$126
Pier 4 Park - Pavilion/Sun Shelter At Water's Edge	-	-	-	-	-	-	795	795	795	795	795	795	795	795	795	\$126
Pine Ridge Park - Sun Shelter	300	300	300	300	300	300	300	300	300	300	300	300	300	300	300	\$126
Pipeline (Geraldine Copps) Parkette - Shade Structure	-	-	-	-	-	-	-	-	-	180	180	180	180	180	180	\$126
Powell Park - Sun Shelter	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	\$126
Red Hill Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	-	-	-	400	400	\$126
Richwill Park - Sun Shelter	354	354	354	354	354	354	354	354	354	354	354	354	354	354	354	\$126
Robert E. Wade Ancaster Community Park - Sun Shelter	-	-	-	784	784	784	784	784	784	784	784	784	784	784	784	\$126
Sackville Park - Bocce Sun Shelter	105	105	105	105	105	105	105	105	105	105	105	105	105	105	105	\$126
Sam Lawrence Park - Pavilion	1,675	1,675	1,675	1,675	1,675	1,675	1,675	1,675	1,675	1,675	1,675	1,675	1,675	1,675	1,675	\$126
Sam Manson Park - Sun Shelter	-	-	-	-	-	405	405	405	405	405	405	405	405	405	405	\$126
Seabreeze Park - Sun Shelter	-	-	-	-	400	400	400	400	400	400	400	400	400	400	400	\$126
Sheffield Ball Park - Pavilion	580	580	580	580	580	580	580	580	580	580	580	580	580	580	580	\$126
Skinner Park - Sun Shelter (unlit)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	185	\$126
Southampton Estates Park - Sun Shelter	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	\$126
Southbrook Park - Sun Shelter	340	340	340	340	340	340	340	340	340	340	340	340	340	340	340	\$126
Strabane Community Park - Pavilion	880	880	880	880	880	880	880	880	880	880	880	880	880	880	880	\$126
Summerlea West Park - Sun Shelter	-	-	-	-	278	278	278	278	278	278	278	278	278	278	278	\$126
Summit Park - Sun Shelter	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	\$126
Summit Parkette - Sun Shelter	-	-	-	-	-	-	-	-	-	-	-	256	256	256	256	\$126
Templemead Park - Sun Shelter	560	560	560	560	560	560	560	560	560	560	560	560	560	560	560	\$126
Tiffany Hills (Ancaster Meadows) Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	-	256	256	256	256	\$126
Trenholme Park - Pavilion	394	394	394	394	394	394	394	394	394	394	394	394	394	394	394	\$126
Valens Park - Picnic Pavilion	1,230	1,230	1,230	1,230	1,230	1,230	1,230	1,230	1,230	1,230	1,230	1,230	1,230	1,230	1,360	\$126
Valley Community Centre Park - Picnic Pavilion	-	-	-	-	-	-	-	-	-	-	500	500	500	500	500	\$126



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Amenities - Buildings
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Park Amenities (sq.ft.)																
Valley Park - Pavilion	1,644	1,644	1,644	1,644	1,644	1,644	1,644	1,644	1,644	1,644	1,644	1,644	1,644	1,644	1,644	\$126
Valley Park - Skate Park Sun Shelter	-	-	-	-	-	-	-	-	-	-	-	-	-	-	500	\$126
Vincent Massey - Sun Shelter	-	-	-	-	-	-	-	-	400	400	400	400	400	400	400	\$126
Waterdown Memorial Park - Picnic Pavilion	1,342	1,342	1,342	1,342	1,342	1,342	1,342	1,342	1,342	1,342	1,342	1,342	1,342	1,342	1,342	\$126
Waterford Park - Sun Shelter	-	-	-	-	-	-	-	-	-	-	-	-	400	400	400	\$126
Westover Community Park - Picnic Pavilion	-	-	1,500	1,500	1,500	1,500	1,500	1,500	1,500	1,500	1,500	1,500	1,500	1,500	1,500	\$126
William Connell Park - Trellis	-	-	-	-	-	-	-	-	-	-	660	660	660	660	660	\$126
William Mcculloch - Pavilion	-	-	-	365	365	365	365	365	365	365	365	365	365	365	365	\$126
William Schwenger Park - Sun Shelter	-	-	-	-	278	278	278	278	278	278	278	278	278	278	278	\$126
Winona Park - Picnic Pavilion	1,750	1,750	1,750	1,750	1,750	1,750	1,750	1,750	1,750	1,750	1,750	1,750	1,750	1,750	1,750	\$126
Winona Park - Trellis	-	-	-	-	300	300	300	300	300	300	300	300	300	300	300	\$126
Woolverton Park - Pavilion	-	-	-	-	-	-	366	366	366	366	366	366	366	366	366	\$126
York Road Parkette (Kaga Corner) - Sun Shelter	270	270	270	270	270	270	270	270	270	270	270	270	270	270	270	\$126
Total	46,279	46,279	48,513	50,140	52,746	53,539	57,667	59,045	61,278	63,115	67,111	68,968	69,368	70,142	75,924	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.09	0.09	0.09	0.10	0.10	0.10	0.11	0.11	0.11	0.12	0.12	0.12	0.12	0.12	0.13

15 Year Average	2008-2022
Quantity Standard	0.1098
Quality Standard	\$138
Service Standard	\$15

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$15
Eligible Amount	\$944,467



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Trails
Unit Measure: Linear Kilometres of Paths and Trails

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/km)
Recreational Trails (km):																
Bayfront Park Pathway (asphalt - lit)	0.65	0.65	0.65	0.65	0.65	0.65	0.65	0.65	0.65	0.65	0.65	0.65	0.65	0.65	0.65	\$338,000
Borer's Creek Trail (Initiative 15-1 Recreational Trails Plan)	-	-	-	-	-	-	-	-	-	0.40	0.40	0.40	0.40	0.40	0.40	\$1,480,000
Chedoke Radial Trail (part asphalt - part gravel)	10.50	10.50	10.50	10.50	10.50	10.50	10.50	10.50	10.50	10.50	10.50	10.50	10.50	10.50	10.50	\$135,000
Confederation Park - Stoney Creek Pond Trail	-	-	-	-	-	-	-	0.36	0.36	0.36	0.36	0.36	0.36	0.36	0.36	\$692,000
Cootes Drive Path (asphalt - unlit)	2.70	2.70	2.70	2.70	2.70	2.70	2.70	2.70	2.70	2.70	2.70	2.70	2.70	2.70	2.70	\$180,000
Desjardins Recreational Trail (gravel - unlit)	3.40	3.40	3.40	3.40	3.40	3.40	3.40	3.40	3.40	3.40	3.40	3.40	3.40	3.40	3.40	\$338,000
East Hamilton Trail and Waterfront Link (asphalt - unlit)	-	-	-	3.50	3.50	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	\$215,000
East Mountain Trail Loop (asphalt - unlit)	-	-	-	9.00	9.00	9.00	9.00	9.00	9.00	9.00	9.00	9.00	9.00	9.00	9.00	\$164,000
East Mountain Trail Loop (EMTL) Central Park Portion (2m wide asphalt, unlit)	-	-	-	-	-	-	-	-	-	-	-	-	-	0.43	0.43	\$151,000
Escarpment Rail Trail (Tar & Chip - unlit)	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	\$317,000
Escarpment Rail Trail Extension (asphalt - unlit)	1.50	1.5	1.5	1.5	1.5	1.50	1.50	1.50	1.50	1.50	1.50	1.50	1.50	1.50	1.50	\$237,000
Gage Park Walkways (asphalt, lit)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.97	\$368,000
Green Millen Shore Estates Shoreline Trail (1.8m wide boardwalk)	-	-	-	-	-	-	-	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	\$3,690,000
Green Millen Shore Estates Shoreline Trail (2m wide limestone screening)	-	-	-	-	-	-	-	0.07	0.07	0.07	0.07	0.07	0.07	0.07	0.07	\$109,500
Green Millen Shore Estates Shoreline Trail (3m wide asphalt)	-	-	-	-	-	-	-	0.31	0.31	0.31	0.31	0.31	0.31	0.31	0.31	\$250,000
Green Millen Shore Estates Shoreline Trail (4m wide asphalt)	-	-	-	-	-	-	-	0.71	0.71	0.71	0.71	0.71	0.71	0.71	0.71	\$320,000
Green Millen Shore Estates Shoreline Trail (4m wide limestone screening)	-	-	-	-	-	-	-	0.31	0.31	0.31	0.31	0.31	0.31	0.31	0.31	\$271,000



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Trails
Unit Measure: Linear Kilometres of Paths and Trails

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/km)
Recreational Trails (km):																
Hamilton Beach Recreational Trail (asphalt - lit - extra wide)	0.35	0.35	0.35	0.35	0.35	0.35	0.35	0.35	0.35	0.35	0.35	0.35	0.35	0.35	0.35	\$338,000
Hamilton Harbour Waterfront Trail (asphalt - lit - extra wide)	1.90	1.90	1.90	1.90	1.90	1.90	1.90	1.90	1.90	1.90	1.90	1.90	1.90	1.90	1.90	\$338,000
Hamilton Harbour Waterfront Trail Extension (asphalt - lit - extra wide)	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	\$193,000
Heritage Green Trail (3m wide limestone screenings - unlit)	-	-	-	-	-	-	-	-	-	-	-	-	0.58	0.58	0.58	\$726,000
Joe Sams Leisure Park Walkway (3m wide limestone screenings - unlit)	-	-	-	-	-	-	-	-	-	-	-	-	-	0.33	0.33	\$471,000
Kay Drage Park Trail	-	-	-	-	-	-	-	-	-	-	0.30	0.30	0.30	0.30	0.30	\$117,500
Macassa Bay Walkway (asphalt - lit)	1.48	1.48	1.48	1.48	1.48	1.48	1.48	1.48	1.48	1.48	1.48	1.48	1.48	1.48	1.48	\$241,000
Mountain Brow Road Link (HRTMP Initiative 15-12) (asphalt - unlit)	-	-	-	-	-	-	-	-	-	-	-	-	-	0.83	0.83	\$928,000
Olmsted Trail	-	-	-	-	-	-	-	-	0.37	0.37	0.37	0.37	0.37	0.37	0.37	\$344,000
Pier 4 Park Pathway (asphalt - lit)	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	\$166,000
Pine Ridge Trail	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	\$259,000
Red Hill Valley Recreational Trails (tar & chip - unlit)	1.30	1.30	1.30	1.30	1.30	1.30	1.30	1.30	1.30	1.30	1.30	1.30	1.30	1.30	1.30	\$125,000
Red Hill Valley Trail, (granular - unlit)	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	\$237,000
Ryckman Parks Trail	-	-	-	-	-	-	-	0.29	0.29	0.29	0.29	0.29	0.29	0.29	0.29	\$305,000
Shaver Estates Trail	-	-	-	-	-	-	-	-	-	-	0.38	0.38	0.38	0.38	0.38	\$1,660,000
Shrewsbury Trail	-	-	-	-	-	-	-	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	\$344,000
Waterdown Wetlands Recreational Trail (asphalt & boardwalk - unlit)	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	\$102,200
Waterdown Wetlands Secondary Trails (screenings - until)	4.20	4.20	4.20	4.20	4.20	4.20	4.20	4.20	4.20	4.20	4.20	4.20	4.20	4.20	4.20	\$317,000



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parkland Trails
Unit Measure: Linear Kilometres of Paths and Trails

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/km)
Recreational Multi-Use Pathways (km):																
Park Corridor (asphalt & gravel - unlit)	1.70	1.70	1.70	1.70	1.70	1.70	1.70	1.70	1.70	1.70	1.70	1.70	1.70	1.70	1.70	\$238,000
Ancaster Radial Right of Way (gravel unlit)	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	\$237,000
Stoney Creek Multi-Use Path (asphalt unlit)	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	2.50	\$66,600
Spencer Creek Trail (natural footpath unlit)	1.20	1.20	1.20	1.20	1.20	1.20	1.20	1.20	1.20	1.20	1.20	1.20	1.20	1.20	1.20	\$145,000
Pipeline Walkway (asphalt - lit)	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	\$3,310,000
Pier 7 & 8 Boardwalk	-	-	-	-	-	-	-	-	0.18	0.18	0.18	0.18	0.18	0.18	0.18	\$6,490,000
Total	45.63	45.63	45.63	58.13	58.13	59.43	59.43	61.61	62.16	62.56	63.24	63.24	63.82	65.40	67.37	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001	0.0001

15 Year Average	2008-2022
Quantity Standard	0.0001
Quality Standard	\$299,900
Service Standard	\$30

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$30
Eligible Amount	\$1,863,459



**City of Hamilton
Service Standard Calculation Sheet**

Service: Parks Equipment
Unit Measure: No. of equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Fertilizer Spreader	-	6	6	6	6	6	6	6	6	6	6	6	6	6	5	\$7,200
Aerator	-	5	5	5	5	5	5	5	5	5	5	5	5	5	6	\$10,200
Topdresser/box scraper	7	7	7	7	7	7	7	7	7	7	7	7	7	7	7	\$5,900
Rototiller	-	9	9	9	9	9	9	9	9	9	9	9	9	9	3	\$5,900
Total	7	27	21													

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.00001	0.00005	0.00005	0.00005	0.00005	0.00005	0.00005	0.00005	0.00005	0.00005	0.00005	0.00005	0.00005	0.00005	0.00004

15 Year Average	2008-2022
Quantity Standard	0.0001
Quality Standard	\$6,600
Service Standard	\$0.33

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$0.33
Eligible Amount	\$20,505



**City of Hamilton
Service Standard Calculation Sheet**

Service: Recreation Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
City of Hamilton																	
Eastwood Arena - 111 Burlington St. E.	26,323	26,323	26,323	26,323	26,323	26,323	26,323	26,323	26,323	26,323	26,323	26,323	26,323	26,323	26,323	\$790	\$912
Scott Park Arena - 876 Cannon St. E.	23,950	23,950	23,950	23,950	23,950	23,950	23,950	-	-	-	-	-	-	-	-	\$790	\$912
Bill Friday Lawfield Arena - 150 Folkstone Rd. (formerly Lawfield Arena).	31,183	31,183	31,183	31,183	31,183	31,183	31,183	31,183	31,183	31,183	31,183	31,183	31,183	31,183	31,183	\$917	\$1,052
Coronation Arena - 81 Macklin St. N.	27,098	27,098	27,098	27,098	27,098	27,098	27,098	27,098	27,098	27,098	27,098	27,098	27,098	27,098	27,098	\$790	\$912
Chedoke Twin Pad - 91 Chedmac Dr.	89,421	89,421	89,421	89,421	89,421	89,421	89,421	89,421	89,421	89,421	89,421	89,421	89,421	89,421	89,421	\$664	\$773
Parkdale Arena (Pat Quinn) - 1770 Main St. E.	34,018	34,018	34,018	34,018	34,018	34,018	34,018	34,018	34,018	34,018	34,018	34,018	34,018	34,018	34,018	\$790	\$912
Inch Park Arena - 400 Queensdale Ave.	33,995	33,995	33,995	33,995	33,995	33,995	33,995	33,995	33,995	33,995	33,995	33,995	33,995	33,995	33,995	\$790	\$912
Mountain Arena and Skating Arena (Twin Pad - Dave Anderchck) - 25-55 Hester St.	76,286	76,286	76,286	76,286	76,286	76,286	76,286	76,286	76,286	76,286	76,286	76,286	76,286	76,286	76,286	\$664	\$773
Rosedale Arena - 100 Greenhill Ave.	38,072	38,072	38,072	38,072	38,072	38,072	38,072	38,072	38,072	38,072	38,072	38,072	38,072	38,072	38,072	\$917	\$1,052
Mohawk 4 Arena - 710 Mountain Brow Blvd.	136,000	136,000	136,000	136,000	136,000	136,000	136,000	136,000	136,000	136,000	136,000	136,000	136,000	136,000	136,000	\$664	\$773
Birge Outdoor Pool - 167 Birge St.	700	700	700	700	700	700	700	700	700	700	700	700	700	700	700	\$398	\$479
Parkdale Outdoor Pool - 1770 Main St. E.	4,700	4,700	4,700	4,700	4,700	4,700	4,700	4,700	4,700	4,700	4,700	4,700	4,700	4,700	4,700	\$398	\$479
Rosedale Outdoor Pool - 30 Greenhill Ave.	-	-	-	-	-	-	596	596	596	596	596	596	596	596	596	\$8,980	\$9,941
Victoria Outdoor Pool - 100 Strathcona	7,470	7,470	7,470	7,470	7,470	7,470	7,470	7,470	7,470	7,470	7,470	7,470	7,470	7,470	7,470	\$398	\$479
Chedoke Outdoor Pool - 500 Bendamere	7,834	7,834	7,834	7,834	7,834	7,834	7,834	7,834	7,834	7,834	7,834	7,834	7,834	7,834	7,834	\$398	\$479
Walker Outdoor Pool - 60 Dicenzo Dr.	-	10,764	10,764	10,764	10,764	10,764	10,764	10,764	10,764	10,764	10,764	10,764	10,764	10,764	10,764	\$398	\$479
Inch Park Outdoor Pool - 400 Queensdale Ave.	-	-	-	2,755	2,755	2,755	2,755	2,755	2,755	2,755	2,755	2,755	2,755	2,755	2,755	\$2,286	\$2,560
Coronation Outdoor Pool - 80 Macklin St. N.	-	-	-	-	-	-	-	27,087	27,087	27,087	27,087	27,087	27,087	27,087	27,087	\$398	\$479
Chedoke Golf, Club House - 565 Aberdeen Ave.	12,420	12,420	12,420	12,420	12,420	11,443	11,443	11,443	11,443	11,443	11,443	11,443	11,443	11,443	11,443	\$260	\$327
Chedoke Golf, Pro Shop - 565 Aberdeen Ave.	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	\$260	\$327
Kings Forest Golf Clubhouse - 100 Greenhill Ave.	13,454	13,454	13,454	13,454	13,454	13,454	13,454	13,454	13,454	13,454	13,454	13,454	13,454	13,454	13,454	\$260	\$327
Ivor Wynne Stadium, Grandstands & Press Box - 75 Balsam Ave. N.	128,675	128,675	128,675	128,675	128,675	-	-	-	-	-	-	-	-	-	-	\$756	\$874
Tim Horton's Field	-	-	-	-	-	-	-	327,148	327,148	327,148	327,148	327,148	327,148	327,148	327,148	\$756	\$874



**City of Hamilton
Service Standard Calculation Sheet**

Service: Recreation Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
City of Hamilton																	
Churchill Fields Lawn Bowling (167 Cline N) - 167 Cline N.	4,568	4,568	4,568	4,568	4,568	4,568	4,568	4,568	4,568	4,568	4,568	4,568	4,568	4,568	4,568	\$260	\$327
Hamilton Tennis Club (257 Duke at HAAA Park)	7,064	7,064	7,064	7,064	7,064	7,064	7,064	7,064	7,064	7,064	7,064	7,064	7,064	7,064	7,064	\$553	\$651
Rosedale Tennis Club (Within Gage Park)	4,018	4,018	4,018	4,018	4,018	2,210	2,210	2,210	2,210	2,210	2,210	2,210	2,210	2,210	2,210	\$855	\$984
Rosedale Lawn Bowling (Within Gage Park) - 1000 Main St. E.	3,757	3,757	3,757	3,757	3,757	4,018	4,018	4,018	4,018	4,018	4,018	4,018	4,018	4,018	4,018	\$260	\$327
Gage Park Greenhouse #1/Tropical - 1000 Main St. E.	-	3,363	3,363	3,363	3,363	3,363	3,363	3,363	3,363	3,363	14,068	37,868	37,868	37,868	37,868	\$260	\$295
Gage Park Horticulture/Staff Bldg. - 1000 Main St. E.	-	7,389	7,389	7,389	7,389	6,271	6,271	6,271	6,271	6,271	6,271	6,271	6,271	6,271	6,271	\$260	\$1,016
Sackville Hill Senior Centre (780 Upper Wentworth)	24,452	24,452	24,452	24,452	24,452	24,452	24,452	24,452	24,452	24,452	24,452	24,452	24,452	24,452	24,452	\$597	\$699
Turner Park YMCA (Community Centre, Pool)	59,490	59,490	59,490	59,490	59,490	59,490	59,490	59,490	59,490	59,490	59,490	59,490	59,490	59,490	59,490	\$971	\$1,111
YWCA - Hamilton Seniors' Active Living Centre (75 MacNab St. S. - basement level)	7,529	7,529	7,529	7,529	7,529	7,529	7,529	7,529	7,529	7,529	7,529	7,529	7,529	7,529	7,529	\$589	\$690
YWCA - Ottawa St. Seniors Leisure Centre - 52 & 66 Ottawa St. N. (In two Buildings)	5,220	5,220	5,220	5,220	5,220	5,220	5,220	5,220	5,220	5,220	5,220	-	-	-	-	\$589	\$690
Main Hess Senior Centre (181 Main St. W. - 3rd Floor)	10,930	10,930	10,930	10,930	10,930	10,930	10,930	10,930	10,930	10,930	10,930	10,930	10,930	10,930	10,930	\$589	\$690
Lister Block	-	-	-	16,285	16,285	16,285	16,285	16,285	16,285	16,285	16,285	16,285	16,285	16,285	16,285	\$790	\$912
Barton Community Hall (Formerly Barton Yard, Carpenter's Shop (125 Barton St. W.))	-	-	-	-	-	-	-	-	-	-	-	13,453	13,453	13,453	13,453	\$790	\$912
Bernie Morelli Recreation Centre (& Senior's Centre) & outdoor rink/splashpad	-	-	-	-	-	-	-	-	-	-	54,895	54,895	54,895	54,895	54,895	\$896	\$1,028



**City of Hamilton
Service Standard Calculation Sheet**

Service: Recreation Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Stoney Creek																	
H.G./Brewster Pool - 200 Dewitt Rd.	10,654	10,654	10,654	10,654	10,654	10,654	10,654	10,654	10,654	10,654	10,654	10,654	10,654	10,654	10,654	\$1,144	\$1,302
Green Acres Outdoor Pool - 50 Randall Ave	15,414	15,414	15,414	15,414	15,414	15,414	15,414	15,414	15,414	15,414	15,414	15,414	15,414	15,414	15,414	\$398	\$479
Stoney Creek Arena - 37 King St. W.	28,278	28,278	28,278	28,278	28,278	28,278	28,278	28,278	28,278	28,278	28,278	28,278	28,278	28,278	28,278	\$790	\$912
Saltfleet Arena - 24 Sherwood Park Rd.	24,980	24,980	24,980	24,980	24,980	24,980	24,980	24,980	24,980	24,980	24,980	24,980	24,980	24,980	24,980	\$790	\$912
Optimist Club Community Centre - 890 Queenston	4,772	4,772	4,772	4,772	4,772	4,772	4,772	4,772	4,772	4,772	4,772	4,772	4,772	4,772	4,772	\$790	\$912
Stoney Creek Tennis Club (at Little League Park) - 880 Queenston Rd.	2,357	2,357	2,357	2,357	2,357	2,357	2,357	2,357	2,357	2,357	2,357	2,357	2,357	2,357	2,357	\$553	\$651
Valley Park Community Centre/Aquatic Centre - 970 Paramount Dr	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	38,117	\$790	\$912
Valley Park Tennis Club - 970 Paramount Dr.	1,690	1,690	1,690	1,690	1,690	1,690	1,690	1,690	1,690	1,690	1,690	1,690	1,690	1,690	1,690	\$553	\$651
Valley Park Arena - 970 Paramount Dr.	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	35,587	\$790	\$912
Fruitland Community Centre (Lion's Club) (14 Sherwood Park Rd)	5,047	5,047	5,047	5,047	5,047	5,047	5,047	5,047	5,047	5,047	5,047	5,047	5,047	5,047	5,047	\$790	\$912
Winona Scout Hall (Ward 11)	1,807	2,142	2,142	2,142	2,142	2,142	2,142	2,142	2,142	2,142	2,142	2,142	2,142	2,142	2,142	\$790	\$912
Winona Public School purchased for temporary community centre (facilities data)	-	-	-	-	-	-	-	-	33,480	33,480	33,480	33,480	33,480	33,480	33,480	\$790	\$912
Stoney Creek Scout Hall (37 King St. W.)	2,763	2,763	2,763	-	-	-	-	-	-	-	-	-	-	-	-	\$790	\$912
Stoney Creek Recreation Centre (New) - 45 King St. W.	-	-	-	-	27,992	27,992	27,992	27,992	27,992	27,992	27,992	27,992	27,992	27,992	27,992	\$971	\$1,111
Winona Seniors - 1239 Highway 8 (Ward 11)	3,911	3,911	3,911	3,911	3,911	3,911	3,911	3,911	3,911	3,911	3,911	3,911	3,911	3,911	3,911	\$855	\$984
Club 60 - 4-6 King St. W.	3,568	3,568	3,568	3,568	3,568	3,568	3,568	3,568	3,568	3,568	3,568	3,568	3,568	3,568	3,568	\$589	\$690
Ancaster																	
Ancaster Community Centre (Morgan Firestone Arena) - 385 Jerseyville Rd.	56,972	56,972	56,972	56,972	56,972	92,570	92,570	92,570	92,570	92,570	92,570	92,570	92,570	92,570	92,570	\$618	\$722
Ancaster Community & Rotary Centre - 385 Jerseyville Rd.	41,236	41,236	41,236	41,236	41,236	44,317	44,317	44,317	44,317	44,317	44,317	44,317	44,317	44,317	44,317	\$790	\$912



**City of Hamilton
Service Standard Calculation Sheet**

Service: Recreation Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Ancaster Senior Achievement Centre - 622 Alberton Rd.	14,377	14,377	14,377	14,377	14,377	14,377	14,377	14,377	14,377	14,377	14,377	14,377	14,377	14,377	14,377	\$589	\$690
Lawn Bowling Club House - 291 Lodor St.	847	847	847	847	847	847	1,948	1,948	1,948	1,948	1,948	1,948	1,948	1,948	1,948	\$553	\$651
Community Centre (Old Town Hall) - 310 Wilson St.	3,780	3,780	3,780	3,780	3,780	3,780	3,780	3,780	3,780	-	-	-	-	-	-	\$790	\$912
Tennis Club House - 291 Lodor St.	1,076	1,076	1,076	1,076	1,076	1,076	791	791	791	791	791	791	791	791	791	\$553	\$651
Carluka Community Centre - Carluka Rd.	2,553	2,553	2,553	2,553	2,553	2,553	2,553	2,553	2,553	-	-	-	-	-	-	\$790	\$912
Optimist Youth Centre - 237 Manitou Way	3,819	3,819	3,819	3,819	3,819	3,819	3,819	3,819	3,819	3,819	3,819	3,819	3,819	3,819	3,819	\$790	\$912
Lions (South) Club Building Lynden Park - 4070 Governors Rd.	1,968	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	\$790	\$912
Copetown & District Lions Community Centre - 1950 Governors Rd.	8,190	8,190	8,190	8,190	8,190	8,190	8,190	8,190	8,190	8,190	8,190	8,190	8,190	8,190	8,190	\$790	\$912
Ancaster Lions Outdoor Pool - 236 Jerseyville Rd.	10,526	10,526	10,526	10,526	10,526	10,526	10,526	10,526	10,526	10,526	10,526	10,526	10,526	10,526	10,526	\$398	\$479
Spring Valley Arena - 29 Orchard Drive	29,628	29,628	29,628	29,628	29,628	29,628	29,628	29,628	29,628	29,628	29,628	29,628	29,628	29,628	29,628	\$790	\$912
Aquatic Centre - 47 Meadowbrook Dr.	19,067	19,067	19,067	19,067	19,067	19,067	19,067	19,067	19,067	19,067	19,067	19,067	19,067	19,067	19,067	\$971	\$1,111
Dundas																	
Dundas Outdoor Community Pool - 39 Market St. S.	11,457	11,457	11,457	11,457	-	-	-	-	-	-	-	-	-	-	-	\$1,144	\$1,302
Dundas Community Pool	10,364	10,364	10,364	10,364	10,364	10,364	10,364	10,364	10,364	10,364	10,364	10,364	10,364	10,364	10,364	\$398	\$479
Dundas Market Street Arena - Grighmire - 35 Market St. S.	41,416	41,416	41,416	41,416	41,416	104,578	104,578	104,578	104,578	104,578	104,578	124,578	124,578	124,578	124,578	\$790	\$912
Olympic Arena - Westoby - 88 Olympic Dr.	27,086	27,086	27,086	27,086	27,086	27,086	27,086	27,086	27,086	27,086	27,086	27,086	27,086	27,086	27,086	\$790	\$912
Dundas Memorial Community Centre - 10 Market St. S.	13,600	13,600	13,600	13,600	13,600	13,600	13,600	13,600	13,600	13,600	13,600	13,600	13,600	13,600	13,600	\$793	\$915
Valleyfield Community Centre (Nigel Charloug Community Centre) - 287 Old Guelph Rd.	3,780	3,780	3,780	3,780	3,780	3,780	3,780	3,780	3,780	-	-	-	-	-	-	\$790	\$912
Dundas Driving Park Outdoor Rink Building - 71 Cross St. (Concession / Washroom / Ice Plant)	-	206	206	206	206	206	206	206	206	206	206	206	206	206	206	\$273	\$342
Tennis Club Building (Cross St.)	1,745	1,745	1,745	1,745	1,745	1,745	1,745	1,745	1,745	1,745	1,745	1,745	1,745	1,745	1,745	\$553	\$651
Lawn Bowling Club House (Cross St.)	1,728	1,728	1,728	1,728	1,728	1,728	1,728	1,728	1,728	1,728	1,728	1,728	1,728	1,728	1,728	\$553	\$651



**City of Hamilton
Service Standard Calculation Sheet**

Service: Recreation Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Glanbrook																	
Mt. Hope Hall - 3027 Homestead	6,400	7,492	7,492	7,492	7,492	7,492	7,492	7,492	7,492	7,492	7,492	7,492	7,492	7,492	7,492	\$790	\$882
Glanbrook Auditorium - 4300 Binbrook Rd	4,810	4,810	4,810	4,810	4,810	4,810	4,810	4,810	4,810	4,810	4,810	4,810	4,810	4,810	4,810	\$720	\$805
Glanbrook Arena - 4300 Binbrook Road	36,353	36,353	36,353	36,353	36,353	36,353	36,353	36,353	36,353	36,353	36,353	36,353	36,353	36,353	36,353	\$720	\$805
Binbrook Memorial Hall - 2600 Hwy 56	7,596	7,596	7,596	7,596	7,596	7,596	7,596	7,596	7,596	7,596	7,596	7,596	7,596	7,596	7,596	\$790	\$912
Woodburn Centennial Hall - 1062 Golf Club Road	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	2,974	\$790	\$912
Lions Youth Centre - 3027 Homestead Dr.	6,035	6,035	6,035	6,035	6,035	6,035	6,035	6,035	6,035	6,035	6,035	6,035	6,035	6,035	6,035	\$790	\$882
Flamborough																	
Beverly Arena - 680 Highway 8	32,969	32,969	32,969	32,969	32,969	32,969	32,969	32,969	32,969	32,969	32,969	32,969	32,969	32,969	32,969	\$790	\$882
Beverly Community Centre - 680 Highway 8	4,630	4,630	4,630	4,630	4,630	4,630	4,630	4,630	4,630	4,630	4,630	4,630	4,630	4,630	4,630	\$790	\$882
Carlisle Arena - 1496 Centre Rd.	33,062	33,062	33,062	33,062	33,062	33,062	33,062	33,062	33,062	33,062	33,062	33,062	33,062	33,062	33,062	\$790	\$882
Carlisle Community Centre - 1496 Centre Rd. (Includes Storage / Washroom)	4,900	4,900	4,900	4,900	4,900	4,900	4,900	4,900	4,900	4,900	4,900	4,900	4,900	4,900	4,900	\$790	\$882
North Wentworth Arena	27,888	27,888	27,888	27,888	-	-	-	-	-	-	-	-	-	-	-	\$790	\$912
North Wentworth Community Centre	3,900	3,900	3,900	-	-	-	-	-	-	-	-	-	-	-	-	\$790	\$912
Harry Howell Arena (Formerly North Wentworth Twin Pad) - 27 Highway 5 W.	-	-	-	-	92,641	92,641	92,641	92,641	92,641	92,641	92,641	92,641	92,641	92,641	92,641	\$618	\$722
Beverly Township Hall - 795 Old Highway 8	2,422	2,422	2,422	2,422	2,422	3,995	3,995	3,995	3,995	3,995	3,995	3,995	3,995	3,995	3,995	\$790	\$882
Carlisle Memorial Hall - 273 Carlisle Rd.	4,513	4,513	4,513	4,513	4,513	4,513	4,513	4,513	4,513	4,513	4,513	4,513	4,513	4,513	4,513	\$790	\$882
Lynden Legion Park - 204 Lynden Rd.	8,400	8,400	8,400	8,400	8,400	8,400	8,400	8,400	8,400	8,400	8,400	8,400	8,400	8,400	8,400	\$395	\$447
Waterdown Memorial Hall - 317 Dundas St. E.	3,003	3,003	3,003	3,003	3,003	3,003	3,003	3,003	3,003	3,003	3,003	3,003	3,003	3,003	3,003	\$790	\$912
Millgrove Community Centre - 855 Millgrove Side. Rd.	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	4,811	\$790	\$882
Mountsberg Hall - 2133 Centre Rd.	1,432	1,432	1,432	1,432	1,432	1,432	1,432	1,432	1,432	1,432	1,432	1,432	1,432	1,432	1,432	\$790	\$882
Sealy Park Scout Hall - 115 Main St. S.	3,016	3,016	3,016	3,016	3,016	3,016	3,016	3,016	3,016	3,016	3,016	3,016	3,016	3,016	3,016	\$790	\$912
Sheffield Community Centre - 2339 5th Concession Rd. W.	2,836	2,836	2,836	2,836	2,836	4,267	4,267	4,267	4,267	4,267	4,267	4,267	4,267	4,267	4,267	\$790	\$912
Greenville Hall - 283 Brock Rd.	2,867	2,867	2,867	2,867	2,867	2,867	2,867	2,867	2,867	2,867	2,867	2,867	2,867	2,867	2,867	\$790	\$882
Valens Community Centre - 1818 Valens Rd.	3,180	3,180	3,180	3,180	3,180	3,180	3,180	3,180	3,180	3,180	3,180	3,180	3,180	3,180	3,180	\$790	\$882
Flamborough YMCA (207 Parkside Dr.) (50% City Benefit)	31,425	31,425	31,425	31,425	31,425	31,425	31,425	31,425	31,425	31,425	31,425	31,425	31,425	31,425	31,425	\$971	\$1,111



**City of Hamilton
Service Standard Calculation Sheet**

Service: Recreation Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Flamborough Seniors Centre 163 Dundas St. E.	-	-	-	-	-	-	-	-	5,560	5,560	5,560	5,560	5,560	5,560	5,560	\$589	\$690
Confederation Beach Park & Wild Water Works (10 Facilities)	24,710	24,710	24,710	24,710	24,710	24,710	24,710	24,710	24,710	24,710	24,710	24,710	24,710	24,710	24,710	\$260	\$327
Confederation Beach Park & Wild Water Works - Park Sheds (13 Facilities)	9,395	9,395	9,395	9,395	9,395	9,395	9,395	9,395	9,395	9,395	9,395	9,395	9,395	9,395	9,395	\$260	\$327
Confederation Beach Park & Wild Water Works - Admin Building & Main Kiosk	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	\$260	\$327
Confederation Beach Park & Wild Water Works - Workshop	1,290	1,290	1,290	1,290	1,290	1,290	1,290	1,290	1,290	1,290	1,290	1,290	1,290	1,290	1,290	\$260	\$327
Chedoke Yard, Storage Bldg., 565 Aberdeen Ave.	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	3,000	\$260	\$489
Greensville Community Centre	-	-	-	-	-	-	-	-	-	-	-	-	-	8,602	8,602	\$790	\$912
Beverly Community Centre	-	-	-	-	-	-	-	-	-	-	-	-	-	10,822	10,822	\$790	\$912
Total	1,879,994	1,891,281	1,897,438	1,909,815	2,027,916	2,000,444	2,001,856	2,332,141	2,371,181	2,361,068	2,426,668	2,478,701	2,478,701	2,498,125	2,509,114		

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	3.6761	3.6742	3.6801	3.6731	3.8804	3.7967	3.7789	4.3698	4.4163	4.3458	4.4151	4.4613	4.4069	4.3877	4.3339

15 Year Average	2008-2022
Quantity Standard	4.0864
Quality Standard	\$889
Service Standard	\$3,634

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$3,634
Eligible Amount	\$225,826,457



**City of Hamilton
Service Standard Calculation Sheet**

Service: Indoor Recreation Facilities - Buildings Withing Parks
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Buildings within parks (sq.ft.)																
Alexander Park - Washroom / Concession / Storage	1,954	1,954	1,954	1,954	1,954	1,954	1,954	1,954	1,954	1,954	1,954	1,954	1,954	1,954	1,954	\$273
Cathedral Park - Field House / Washrooms / Storage	1,475	1,475	1,475	1,475	1,475	1,475	1,475	1,475	1,475	1,475	1,475	1,475	1,475	1,475	1,475	\$273
Highland Gardens Park - Block Storage Hut	124	124	124	124	124	124	124	124	124	124	124	-	-	-	-	\$168
Escarpment Ward 1 - Utility Structure Associated With C.S.O. Tank Above Chedoke	282	282	282	282	282	282	282	282	282	282	282	282	282	282	282	\$273
Bayfront Park - Concession	693	693	693	693	693	693	693	693	693	693	693	693	693	693	693	\$273
Bayfront Park - Public Works Storage Building	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	\$168
Bayfront Park - Storage Building West Of Yacht Club	455	455	455	455	455	455	455	455	455	455	455	455	455	455	455	\$273
Bayfront Park - Washroom At Parking Lot With Roof Top Lookout	2,600	2,600	2,600	2,600	2,600	2,600	2,600	2,600	2,600	2,600	2,600	2,600	2,600	2,600	2,600	\$273
Bayfront Park - Yacht Club Building	3,813	3,813	3,813	3,813	3,813	3,813	3,813	3,813	3,813	3,813	3,813	3,813	3,813	3,813	3,813	\$260
Broughton Park East - Sunshelter With Storage Building	671	671	671	671	671	671	671	671	671	671	671	671	671	671	671	\$168
Jack C. Beemer Park Washroom & Concession	-	-	-	-	-	-	2,000	2,000	2,000	2,000	2,000	2,000	2,000	2,000	2,000	\$273
Carter Park - Washrooms / Storage	333	333	333	333	333	333	333	333	333	333	333	333	333	333	333	\$273
Central Park - Block Building With Concession Area & Shelter	695	695	695	695	695	695	695	695	695	695	695	695	695	695	695	\$273
Corktown Park - Washrooms / Storage	1,546	1,546	1,546	1,546	1,546	1,546	1,546	1,546	1,546	1,546	1,546	1,546	1,546	1,546	1,546	\$273
Eastwood Park- Concession	2,777	2,777	2,777	2,777	2,777	2,777	2,777	2,777	2,777	2,777	2,777	2,777	2,777	2,777	2,777	\$273
Ferguson Ave Shelter - Pavilion	4,205	4,205	4,205	4,205	4,205	4,205	4,205	4,205	4,205	4,205	4,205	4,205	4,205	4,205	4,205	\$273
Jackie Washington Rotary Park - Washrooms / Concession	678	678	678	678	678	678	678	678	678	678	678	678	678	678	678	\$273
Pier 4 Park - Gartshore - Thomson Building	1,975	1,975	1,975	1,975	1,975	1,975	1,975	1,975	1,975	1,975	1,975	1,975	1,975	1,975	1,975	\$395



**City of Hamilton
Service Standard Calculation Sheet**

Service: Indoor Recreation Facilities - Buildings Withing Parks
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Buildings within parks (sq.ft.)																
Shamrock Park - Storage	156	156	156	156	156	156	156	156	156	156	156	156	156	156	156	\$273
Belview Park - Utility Building For Spray Pad And Supie	365	365	365	365	365	365	365	365	365	365	365	365	365	365	365	\$273
Lucy Day Park - Storage/Utility/Washroom	351	351	351	351	351	351	351	351	351	351	351	351	351	351	351	\$273
Myrtle Park - Pavilion/Storage	1,160	1,160	1,160	1,160	1,160	1,160	1,160	1,160	1,160	1,160	1,160	1,160	1,160	1,160	1,160	\$273
Powell Park - Washrooms, Small Meeting Space, Storage	4,305	4,305	4,305	4,305	4,305	4,305	4,305	4,305	4,305	4,305	4,305	4,305	4,305	4,305	4,305	\$273
Woodlands Park - Concession / Washrooms	2,495	2,495	2,495	2,495	2,495	2,495	2,495	2,495	2,495	2,495	2,495	2,495	2,495	2,495	2,495	\$273
Andrew Warburton Memorial Park - Storage/Utility Building With Sun Shelter	688	688	688	688	688	688	688	688	688	688	688	688	688	688	688	\$273
Globe Park - Storages	424	424	424	424	424	424	424	424	424	424	424	-	-	-	-	\$168
Globe Park - Washrooms / Changerooms	1,765	1,765	1,765	1,765	1,765	1,765	1,765	1,765	1,765	1,765	1,765	-	-	-	-	\$168
Mahony Park - Storage For Batting Cage	139	139	139	139	139	139	139	139	139	139	139	-	-	-	-	\$168
Mahony Park - Washrooms	2,941	2,941	2,941	2,941	2,941	2,941	2,941	2,941	2,941	6,370	6,370	6,370	6,370	6,370	6,370	\$273
Montgomery Park - Washroom / Storage / Concession	2,788	2,788	2,788	2,788	2,788	2,788	2,788	2,788	2,788	2,788	2,788	2,788	2,788	2,788	2,788	\$273
Normanhurst Community Centre	2,885	2,885	2,885	2,885	2,885	2,885	2,885	2,885	2,885	2,885	-	-	-	-	-	\$168
Roxborough Park - Washroom / Storage / Concession	1,184	1,184	1,184	1,184	1,184	1,184	1,184	1,184	1,184	1,184	1,184	1,184	1,184	1,184	1,184	\$273
St. Christopher's Park - Storage With Sunshelter	652	652	652	652	652	652	652	652	652	652	652	652	652	652	652	\$273
Woodward Park - Washroom / Sun Shelter	667	667	667	667	667	667	667	667	667	667	667	667	667	667	667	\$273
Buchanan Park - Storage	125	125	125	125	125	125	125	125	125	125	125	125	125	125	125	\$273



**City of Hamilton
Service Standard Calculation Sheet**

Service: Indoor Recreation Facilities - Buildings Withing Parks
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Buildings within parks (sq.ft.)																
Buchanan Park - Washroom And Changeroom Facility	-	-	-	1,959	1,959	1,959	1,959	1,959	1,959	1,959	1,959	1,959	1,959	1,959	1,959	\$273
Gilkson Park - Small Storage Next To Playground	274	274	274	274	274	274	274	274	274	274	274	274	274	274	274	\$168
Gilkson Park - Small Utility Shed Next To Ball Diamond At Street	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	\$168
Gilkson Park - Washrooms And Utility For Spray Pad	1,234	1,234	1,234	1,234	1,234	1,234	1,234	1,234	1,234	1,234	1,234	1,234	1,234	1,234	1,234	\$273
Gourley Park - Washroom / Storage / Concession	1,377	1,377	1,377	1,377	1,377	1,377	1,377	1,377	1,377	1,377	1,377	1,377	1,377	1,377	1,377	\$273
Mountview Park - Storage / Pavilion	557	557	557	557	557	557	557	557	557	557	557	557	557	557	557	\$273
Scenic Parkette - Storage	1,129	1,129	1,129	1,129	1,129	1,129	1,129	1,129	1,129	1,129	1,129	1,129	1,129	1,129	1,129	\$168
Shawinigan Park - Storage And Sunshelter	684	684	684	684	684	684	684	684	684	684	684	684	684	684	684	\$273
William Mcculloch Park - Change / Washroom	372	372	372	372	372	372	372	372	372	372	372	372	372	372	372	\$273
William Mcculloch Park - Storage	224	224	224	224	224	224	224	224	224	224	224	224	224	224	224	\$168
Veevers Park - Sunshelter With Storage Building	671	671	671	671	671	671	671	671	671	671	671	671	671	671	671	\$273
Sam Manson Park - Washroom / Storage Building	3,250	3,250	3,250	3,250	3,250	3,250	3,250	3,250	3,250	3,250	3,250	3,250	3,250	3,250	3,250	\$273
Rosedale Park - Bocce / Small Building / Baseball Storage And Field House	-	-	-	-	-	-	5,489	5,489	5,489	5,489	5,489	5,489	5,489	5,489	5,489	\$260
Rosedale Park - Utility Bldg For Cso Tank	990	990	990	990	990	990	990	990	990	990	990	990	990	990	990	\$273
Rosedale Park - Utility Bldg For New Cso Tank Behind Arena	-	-	-	-	-	-	879	879	879	879	879	879	879	879	879	\$273
Father Sean O'Sullivan Park - Bocce Storage Shed	-	-	-	-	-	-	100	100	100	100	100	100	100	100	100	\$168



**City of Hamilton
Service Standard Calculation Sheet**

Service: Indoor Recreation Facilities - Buildings Withing Parks
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Buildings within parks (sq.ft.)																
Father Sean O'Sullivan Park - Water Chamber Structure	-	-	-	-	-	-	72	72	72	72	72	72	72	72	72	\$273
Glendale Park - Spray Pad Utility Building / Storage	683	683	683	683	683	683	683	683	683	683	683	683	683	683	683	\$273
Beach Strip Open Space - Washroom Utility Building For Trail System	1,827	1,827	1,827	1,827	1,827	1,827	1,827	1,827	1,827	1,827	1,827	1,827	1,827	1,827	1,827	\$273
Billy Sherring Park - Sunshelter Washroom Building	1,405	1,405	1,405	1,405	1,405	1,405	1,405	1,405	1,405	1,405	1,405	1,405	1,405	1,405	1,405	\$273
Bruce Park - Washrooms / Changerooms	1,903	1,903	1,903	1,903	1,903	1,903	1,903	1,903	1,903	1,903	1,903	1,903	1,903	1,903	1,903	\$273
Eastmount Community Centre	2,413	2,413	2,413	2,413	2,413	2,413	2,413	2,413	2,413	2,413	2,413	2,413	2,413	2,413	2,413	\$168
Eleanor Park - Washroom / Storage / Utility	688	688	688	688	688	688	688	688	688	688	688	688	688	688	688	\$273
Elmar Park - Park Water Chamber Bldg	-	-	-	-	-	-	72	72	72	72	72	72	72	72	72	\$273
Macassa Park - Washroom / Storage	4,075	4,075	4,075	4,075	4,075	4,075	4,075	4,075	4,075	4,075	4,075	4,075	4,075	4,075	4,075	\$273
Sackville Hill Memorial Park - Bocce Storage Shed	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	\$168
Sackville Hill Memorial Park - Changeroom / Washrooms / Parks Staff Area	-	-	-	4,000	4,000	4,000	4,000	4,000	4,000	4,000	4,000	4,000	4,000	4,000	4,000	\$273
Sackville Hill Memorial Park - Garbage Storage (Associated with Facility & Park Services)	400	400	400	400	400	400	400	400	400	400	400	400	400	400	400	\$126
Sackville Hill Memorial Park - Storage Garage Used By Parks	500	500	500	500	500	500	500	500	500	500	500	500	500	500	500	\$273
T.B. Mcquesten Park - Storage / Washroom / Utility	4,336	4,336	4,336	4,336	4,336	4,336	4,336	4,336	4,336	4,336	4,336	4,336	4,336	4,336	4,336	\$273
William Schwenger Washroom	-	-	-	-	-	-	-	-	-	-	852	852	852	852	852	\$168
Trieste Bocce Club - Bocce Court	3,500	3,500	3,500	3,500	3,500	3,500	3,500	3,500	3,500	3,500	3,500	3,500	3,500	3,500	3,500	\$273



**City of Hamilton
Service Standard Calculation Sheet**

Service: Indoor Recreation Facilities - Buildings Withing Parks
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Buildings within parks (sq.ft.)																
Trieste Bocce Club - Clubhouse	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	\$273
William Connell Park Buildings (2: 1 public washroom & 1 fieldhouse building with showers & changerooms)	-	-	-	-	-	-	-	-	-	-	2,860	2,860	2,860	2,860	2,860	\$273
Mohawk Sports Park - Bernie Arbour Stadium / Changerooms / Concessions / Washrooms	5,095	5,095	5,095	5,095	5,095	5,095	5,095	5,095	5,095	5,095	5,095	5,095	5,095	5,095	5,095	\$273
Mohawk Sports Park - Building B - Rugby Field House / Changerooms / Washrooms	2,784	2,784	2,784	2,784	2,784	2,784	2,784	2,784	2,784	2,784	2,784	2,784	2,784	2,784	2,784	\$273
Mohawk Sports Park - Building C - Small Parks Utility Building Behind The Soccer Field House	1,711	1,711	1,711	1,711	1,711	1,711	1,711	1,711	1,711	1,711	1,711	1,711	1,711	1,711	1,711	\$273
Mohawk Sports Park - Building D - Track And Field Entrance Building	6,545	6,545	6,545	6,545	6,545	6,545	6,545	6,545	6,545	6,545	6,545	6,545	6,545	6,545	6,545	\$273
Mohawk Sports Park - Small Storage Structure Adjacent To Scorer's Booth	143	143	143	143	143	143	143	143	143	143	143	143	143	143	143	\$273
Mohawk Sports Park - Small Structure Next To Rugby Building	158	158	158	158	158	158	158	158	158	158	158	158	158	158	158	\$168
Mohawk Sports Park - Soccer Field House Building / Storage For Parks	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	8,000	\$395
Mohawk Sports Park - Storage - Most Southerly Building Between 2 Ball Diamonds	243	243	243	243	243	243	243	243	243	243	243	243	243	243	243	\$168
Mohawk Sports Park - Storage / Office Space	1,565	1,565	1,565	1,565	1,565	1,565	1,565	1,565	1,565	1,565	1,565	1,565	1,565	1,565	1,565	\$273
Berrisfield Park - Utility Building For Spray Pad And Supie	688	688	688	688	688	688	688	688	688	688	688	688	688	688	688	\$273
Bobby Kerr Park - Storage - 3 Structures Side By Side	383	383	383	383	383	383	383	383	383	383	383	383	383	383	383	\$273



**City of Hamilton
Service Standard Calculation Sheet**

Service: Indoor Recreation Facilities - Buildings Withing Parks
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Buildings within parks (sq.ft.)																
New Bobby Kerr Washroom Building	-	-	-	-	-	-	-	-	-	900	900	900	900	900	900	\$168
Highview Park - Storage Shed	63	63	63	63	63	63	63	63	63	63	63	63	63	63	63	\$168
Lisgar Park - Bocce Building	-	-	-	-	-	-	765	765	765	765	765	765	765	765	765	\$273
Lisgar Park - Sun Shelter / Storage / Utility / Washrooms	690	690	690	690	690	690	690	690	690	690	690	690	690	690	690	\$273
Mountain Drive Park - Washrooms / Storage	2,152	2,152	2,152	2,152	2,152	2,152	2,152	2,152	2,152	2,152	2,152	2,152	2,152	2,152	2,152	\$273
Templemead Park - Storage	138	138	138	138	138	138	138	138	138	138	138	138	138	138	138	\$168
Trenholme - Splashpad Equipment Building	-	-	-	-	50	50	50	50	50	50	50	50	50	50	50	\$273
Trenholme Park - Bocce Storage Shed	302	302	302	302	302	302	302	302	302	302	302	302	302	302	302	\$168
Trenholme Park - Public Washrooms	-	-	-	-	-	-	-	-	-	852	852	852	852	852	852	\$273
Victoria Park - Washroom / Concession At South End Of Park (Also secondary storage building near baseball diamond)	1,982	1,982	1,982	1,982	1,982	1,982	1,982	1,982	1,982	1,982	1,982	1,982	1,982	1,982	1,982	\$273
Chedoke Golf - Golf Shelter - 113753	198	198	198	198	198	198	198	198	198	198	198	198	198	198	198	\$168
Chedoke Golf - Storage - 110526	1,217	1,217	1,217	1,217	1,217	1,217	1,217	1,217	1,217	1,217	1,217	1,217	1,217	1,217	1,217	\$168
Chedoke Golf - Storage - 111373	130	130	130	130	130	130	130	130	130	130	130	130	130	130	130	\$168
Chedoke Golf - Storage - 111427	771	771	771	771	771	771	771	771	771	771	771	771	771	771	771	\$168
Chedoke Golf - Storage - 121640	195	195	195	195	195	195	195	195	195	195	195	195	195	195	195	\$168
Chedoke Golf - Storage - 124650	435	435	435	435	435	435	435	435	435	435	435	435	435	435	435	\$168
Chedoke Golf - Washrooms - 114305	548	548	548	548	548	548	548	548	548	548	548	548	548	548	548	\$168
Chedoke Golf - Washrooms - 126793	724	724	724	724	724	724	724	724	724	724	724	724	724	724	724	\$168



**City of Hamilton
Service Standard Calculation Sheet**

Service: Indoor Recreation Facilities - Buildings Withing Parks
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Buildings within parks (sq.ft.)																
Chedoke Golf - Washrooms / Storage - 125141	396	396	396	396	396	396	396	396	396	396	396	396	396	396	396	\$168
Kings Forest Golf Club - Maintenance Building	6,474	6,474	6,474	6,474	6,474	6,474	6,474	6,474	6,474	6,474	6,474	6,474	6,474	6,474	6,474	\$168
Kings Forest Golf Club - Storage / Office	1,211	1,211	1,211	1,211	1,211	1,211	1,211	1,211	1,211	1,211	1,211	1,211	1,211	1,211	1,211	\$168
Kings Forest Golf Club - Storage Quonset	2,084	2,084	2,084	2,084	2,084	2,084	2,084	2,084	2,084	2,084	2,084	2,084	2,084	2,084	2,084	\$168
Churchill Park - Cricket Club's Storage Buildings (2)	271	271	271	271	271	271	271	271	271	271	271	271	271	271	271	\$273
Churchill Park - Garden Shed	138	138	138	138	138	138	138	138	138	138	138	138	138	138	138	\$273
Churchill Park - Small Storage Shed To East Of Main Building	182	182	182	182	182	182	182	182	182	182	182	182	182	182	182	\$273
Churchill Park - Storage Shed	110	110	110	110	110	110	110	110	110	110	110	-	-	-	-	\$168
Churchill Park - Washroom / Changeroom	857	857	857	857	857	857	857	857	857	857	857	857	857	857	857	\$273
HAAA - Field House/Changeroom/Washrooms	5,356	5,356	5,356	5,356	5,356	5,356	5,356	5,356	5,356	5,356	5,356	5,356	5,356	5,356	5,356	\$273
HAAA - Shelter For Tennis Court Area	265	265	265	265	265	265	265	265	265	265	265	265	265	265	265	\$168
Rosedale Tennis - Small Entrance Structure Attached To Tennis Bubble	205	205	205	205	205	205	205	205	205	205	205	-	-	-	-	\$168
Rosedale Tennis Club Bubble Structure	23,065	23,065	23,065	23,065	23,065	23,065	23,065	23,065	23,065	23,065	23,065	23,065	23,065	23,065	23,065	\$291
Gage Park - 2 Storage Bldgs, 1 Concrete Stucco And 1 Block	202	202	202	202	202	202	202	202	202	202	202	202	202	202	202	\$273
Gage Park - New Baseball Changeroom Building By Parking Lot	867	867	867	867	867	867	867	867	867	867	867	867	867	867	867	\$273



**City of Hamilton
Service Standard Calculation Sheet**

Service: Indoor Recreation Facilities - Buildings Withing Parks
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Buildings within parks (sq.ft.)																
Gage Park - Small Building South Of Baseball Change Rooms	158	158	158	158	158	158	158	158	158	158	158	158	158	158	158	\$168
Gage Park - Small Storage Shed Next To Lawn Bowling Club House	194	194	194	194	194	194	194	194	194	194	194	194	194	194	194	\$168
Gage Park - Small Structure North Of Tennis Courts	342	342	342	342	342	342	342	342	342	342	342	342	342	342	342	\$273
Gage Park - Washroom, Utility Building For Wading Pool And Spray Pad	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	\$273
Gage Park - Band Shell Washrooms / Storage	1,800	1,800	1,800	1,800	1,800	1,800	1,800	1,800	1,800	1,800	1,800	1,800	1,800	1,800	1,800	\$273
Turner Park - Washrooms	-	-	-	-	-	2,250	2,250	2,250	2,250	2,250	2,250	2,250	2,250	2,250	2,250	\$395
Sam Manson Park - Bocce Storage Building	-	-	-	-	-	-	-	-	-	100	100	100	100	100	100	\$168
Sam Manson Park - Bocce Club House Building	-	-	-	-	-	-	-	-	-	1,700	1,700	1,700	1,700	1,700	1,700	\$260
Riverdale East Park Bocce Storage Building - 135 Vittorito Ave. (St. Agnes Bocce Storage Bldg)	312	312	312	312	312	312	312	312	312	312	312	310	310	310	310	\$168
Glen Castle Park Bocce Storage Building - 30 Glen Castle Dr.	100	100	100	100	100	100	100	100	100	100	100	126	126	126	126	\$260
Dave Andreychuk Mountain Arena Bocce Storage Building - 25 Hester St.	190	190	190	190	190	190	190	190	190	190	190	190	190	190	190	\$168
Winona Park - Storage	630	630	630	630	630	630	630	630	630	630	630	630	630	630	630	\$273
Battlefield Park - Washroom / Concession	3,350	3,350	3,350	3,350	3,350	3,350	3,350	3,350	3,350	3,350	3,350	3,350	3,350	3,350	3,350	\$273



**City of Hamilton
Service Standard Calculation Sheet**

Service: Indoor Recreation Facilities - Buildings Withing Parks
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Buildings within parks (sq.ft.)																
Eastdale Park - Bocce / Washroom / Storage	-	-	-	-	-	-	580	580	580	580	580	580	580	580	580	\$273
Ferris Park - Bocce Club Bldg	-	-	-	-	-	-	592	592	592	592	592	592	592	592	592	\$273
Heritage Green Community Sports Park - Parks Works Building	5,600	5,600	5,600	5,600	5,600	5,600	5,600	5,600	5,600	5,600	5,600	5,600	5,600	5,600	5,600	\$395
Heritage Green Community Sports Park - Washrooms / Storage / Utilities	-	-	-	-	-	-	5,213	5,213	5,213	5,213	5,213	5,213	5,213	5,213	5,213	\$273
Little League Park - Storage	499	499	499	499	499	499	499	499	499	499	499	499	499	499	499	\$273
Little League Park - Tennis Club House (Stoney Creek) Stoney Creek Tennis Club House	2,274	2,274	2,274	2,274	2,274	2,274	2,274	2,274	2,274	2,274	2,274	2,274	2,274	2,274	2,274	\$273
Maplewood Park - Storage/Washroom	355	355	355	355	355	355	355	355	355	355	355	355	355	355	355	\$273
Memorial Park - Bocce Building (87 Glen Cannon Dr.)	-	-	-	-	-	-	560	560	560	560	560	560	560	560	560	\$273
Stoney Creek Storage Building & Workshop (77 King St. West at Battlefield Park)	875	875	875	875	875	875	875	875	875	875	875	875	875	875	875	\$551
Valley Park - Washroom / Changeroom	1,075	1,075	1,075	1,075	1,075	1,075	1,075	1,075	1,075	1,075	1,075	1,075	1,075	1,075	1,075	\$273
Ancaster Little League Park Fieldhouse (Washroom / Storage / Concession)	1,099	1,099	1,099	1,099	1,099	1,099	1,099	1,099	1,099	1,099	1,099	1,099	1,099	1,099	1,099	\$273
Ancaster Community Centre Park Fieldhouse (Washroom / Maintenance / Storage / Concession)	1,112	1,112	1,112	1,112	1,112	1,112	1,112	1,112	1,112	1,112	1,112	1,112	1,112	1,112	1,112	\$273



**City of Hamilton
Service Standard Calculation Sheet**

Service: Indoor Recreation Facilities - Buildings Withing Parks
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Buildings within parks (sq.ft.)																
Small Storage (Village Green) - 291 Lodor St.	118	118	118	118	118	118	118	118	118	118	118	118	118	118	118	\$168
Dundas Driving Park - Baseball Washroom/Concession	1,279	1,279	1,279	1,279	1,279	1,279	1,279	1,279	1,279	1,279	1,279	1,279	1,279	1,279	1,279	\$273
Dundas Driving Park - Pavilion - 160003	1,225	1,225	1,225	1,225	1,225	1,225	1,225	1,225	1,225	1,225	1,225	1,225	1,225	1,225	1,225	\$273
Dundas Driving Park - Splash Pad Utility	-	-	-	-	206	206	206	206	206	206	206	206	206	206	206	\$168
Dundas Driving Park - Washroom Small Storage Structure	105	105	105	105	105	105	105	105	105	105	105	105	105	105	105	\$273
Edwards Park - Storage / Concession	809	809	809	809	809	809	809	809	809	809	809	809	809	809	809	\$273
Martino Memorial Park - Washrooms And Changerooms	930	930	930	930	930	930	930	930	930	930	930	930	930	930	930	\$168
Martino Memorial Park - Washrooms And Concession Booth	1,832	1,832	1,832	1,832	1,832	1,832	1,832	1,832	1,832	1,832	1,832	1,832	1,832	1,832	1,832	\$273
Sanctuary Park - Washrooms (may possibly be closed most seasons)	700	700	700	700	700	700	700	700	700	700	700	700	700	700	700	\$168
Veterans Park - Storage / Concession	1,205	1,205	1,205	1,205	1,205	1,205	1,205	1,205	1,205	1,205	1,205	1,205	1,205	1,205	1,205	\$273
Binbrook Park - Ball Park Washroom	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	\$273
Glanbrook Sports Park - Concession / Washrooms	505	505	505	505	505	505	505	505	505	505	505	505	505	505	505	\$273
Woodburn Ball Park - Concession / Washroom	1,120	1,120	1,120	1,120	1,120	1,120	1,120	1,120	1,120	1,120	1,120	1,120	1,120	1,120	1,120	\$273
Flamborough Centre Park - Garage / Washroom / Concession	436	436	436	436	436	436	436	436	436	436	436	-	-	-	-	\$168
Freelton Community Park - Outdoor rink / Washrooms	-	-	-	-	-	-	-	-	3,240	3,240	3,240	3,240	3,240	3,240	3,240	\$168



**City of Hamilton
Service Standard Calculation Sheet**

Service: Indoor Recreation Facilities - Buildings Withing Parks
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Buildings within parks (sq.ft.)																
Freelton Community Park - Storage	120	120	120	120	120	120	120	120	120	120	120	120	120	120	120	\$168
Freelton Community Park - Storage Building #2	120	120	120	120	120	120	120	120	120	120	120	120	120	120	120	\$273
Gatesbury Park - Washrooms (operationally closed)	700	700	700	700	700	700	700	700	700	700	700	700	700	700	700	\$273
Joe Sam's Leisure Park - Washroom And Storage / Snack Bar	1,795	1,795	1,795	1,795	1,795	1,795	1,795	1,795	1,795	1,795	1,795	1,795	1,795	1,795	1,795	\$273
Lynden Lions South Park - Lions Community Hall	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	2,280	\$168
Lynden Lions South Park - Washroom/Concession North End Of Park	1,167	1,167	1,167	1,167	1,167	1,167	1,167	1,167	1,167	1,167	1,167	1,167	1,167	1,167	1,167	\$273
Millgrove Park - Pavilion / Concession	1,680	1,680	1,680	1,680	1,680	1,680	1,680	1,680	1,680	1,680	1,680	1,680	1,680	1,680	1,680	\$126
Millgrove Park - Small Storage / Washroom Between The Diamonds	280	280	280	280	280	280	280	280	280	280	280	280	280	280	280	\$168
Millgrove Park - Washrooms	436	436	436	436	436	436	436	436	436	436	436	436	436	436	436	\$273
Sheffield Ball Park - Concession / Shelter	1,161	1,161	1,161	1,161	1,161	1,161	1,161	1,161	1,161	1,161	1,161	1,161	1,161	1,161	1,161	\$273
Strabane Community Park - Washroom / Concession / Storage	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	\$273
Tower Park - Storage	140	140	140	140	140	140	140	140	140	140	140	140	140	140	140	\$273
Waterdown Memorial Park - Storage Shed	88	88	88	88	88	88	88	88	88	88	88	88	88	88	88	\$168
Waterdown Memorial Park & Ice Loop- Washroom / Storage / Utility For Ice Plant and Spraypad	-	-	-	-	-	-	1,610	1,610	1,610	1,610	1,610	1,610	1,610	1,610	1,610	\$273



**City of Hamilton
Service Standard Calculation Sheet**

Service: Indoor Recreation Facilities - Buildings Withing Parks
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/sq.ft.)
Buildings within parks (sq.ft.)																
Carlisle Memorial Park - Storage For Grass Cutting Equipment	632	632	632	632	632	632	632	632	632	632	632	632	632	632	632	\$273
Carlisle Memorial Park - Washroom Building East Of The Storage Garage	155	155	155	155	155	155	155	155	155	155	155	155	155	155	155	\$168
Centennial Heights Park - 2nd. Flr Concession Booth / Lower Level Washrooms / Utility Room	528	528	528	528	528	528	528	528	528	528	528	528	528	528	528	\$260
Bullocks Corner Park - Storage / Concession	280	280	280	280	280	280	280	280	280	280	280	280	280	280	280	\$273
Bullocks Corner Park - Washroom / Storage And Utility Building	1,367	1,367	1,367	1,367	1,367	1,367	1,367	1,367	1,367	1,367	1,367	1,367	1,367	1,367	1,367	\$273
Beverly Park - Concession - Located South West Corner Of Parking Lot	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	\$273
Beverly Park - Football Portable Changeroom North Building	817	817	817	817	817	817	817	817	817	817	817	-	-	-	-	\$168
Beverly Park - Football Portable Changeroom South Building	831	831	831	831	831	831	831	831	831	831	831	-	-	-	-	\$168
Beverly Park - Storage Garage At Entrance To Park	2,664	2,664	2,664	2,664	2,664	2,664	2,664	2,664	2,664	2,664	2,664	2,664	2,664	2,664	2,664	\$273
Beverly Park - Tennis Clubhouse	605	605	605	605	605	605	605	605	605	605	605	-	-	-	-	\$168
Beverly Park - Washrooms - Located North West Corner Of Parking Lot	300	300	300	300	300	300	300	300	300	300	300	300	300	300	300	\$273
Total	210,456	210,456	210,456	216,415	216,671	218,921	236,853	236,853	240,093	247,074	247,901	242,469	242,469	242,469	242,469	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.41	0.41	0.41	0.42	0.41	0.42	0.45	0.44	0.45	0.45	0.45	0.44	0.43	0.43	0.42

15 Year Average	2008-2022
Quantity Standard	0.4287
Quality Standard	\$268
Service Standard	\$115

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$115
Eligible Amount	\$7,129,485



**City of Hamilton
Service Standard Calculation Sheet**

Service: Recreation Equipment
Unit Measure: No. of equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
140A - Ice Edger	23	9	14	15	17	19	20	20	21	21	21	23	23	23	23	\$5,200
Snow Blower	-	12	13	13	13	15	15	15	16	18	18	18	18	18	18	\$1,700
Clark Focus 11	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3	\$11,700
Clark Focus L20	-	-	-	-	-	-	1	1	3	3	3	3	3	3	3	\$11,700
Micro Mag 20-D	1	1	1	1	1	2	2	2	2	2	2	2	2	2	2	\$11,700
Magnum 34-D Scrubber	-	-	-	-	1	1	1	1	1	1	1	2	2	2	2	\$11,700
Magnum 26-D Scrubber	-	-	-	-	1	1	1	1	1	1	1	1	1	1	1	\$11,700
Nobles	-	-	-	-	-	-	1	1	1	1	1	1	1	1	1	\$11,700
Nobles Speed Scrub	-	-	-	-	-	1	2	2	3	3	3	3	3	3	3	\$11,700
Nobles SS3	-	-	-	-	-	-	1	1	1	1	1	1	1	1	1	\$11,700
Numatic International	-	-	-	-	-	-	1	1	1	1	1	1	1	1	1	\$11,700
Speed Scrubber 1701 Plus	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$11,700
Tomcat 2000	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$11,700
Tomcat 2300 Version 3.0	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$11,700
Tomcat 20-D	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$11,700
Tomcat 26-D	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$11,700
Tomcat Mini Mag 21-2500	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$11,700
Tomcat Mini Mag 26-D	2	2	2	2	2	2	2	2	2	2	2	1	1	1	1	\$11,700
Tomcat Magnum 34D	-	-	-	-	1	1	1	1	1	1	1	1	1	1	1	\$11,700
Viper	-	-	-	-	-	-	1	1	1	1	1	1	1	1	1	\$11,700
Total	35	33	39	40	45	52	59	59	64	66	66	68	68	68	68	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.00007	0.00006	0.00008	0.00008	0.00009	0.00010	0.00011	0.00011	0.00012	0.00012	0.00012	0.00012	0.00012	0.00012	0.00012

15 Year Average	2008-2022
Quantity Standard	0.0001
Quality Standard	\$6,900
Service Standard	\$0.69

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$0.69
Eligible Amount	\$42,874



**City of Hamilton
Service Standard Calculation Sheet**

Service: Library Services - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Hamilton																	
Central - 55 York Blvd.	146,131	146,131	185,978	185,978	185,978	185,978	185,978	185,978	185,978	185,978	185,978	185,978	185,978	185,978	185,978	\$742	\$937
Barton - 571 Barton St. E.	7,612	7,612	7,612	7,612	7,612	7,612	7,612	7,612	7,612	7,612	7,612	7,612	7,612	7,612	7,612	\$1,038	\$1,295
Concession - 565 Concession St.	8,316	8,316	8,316	8,316	8,316	8,316	8,316	8,316	8,316	8,316	8,316	8,316	8,316	8,316	8,316	\$1,014	\$1,265
Kenilworth - 103 Kenilworth Ave.	7,960	7,960	7,960	7,960	7,960	7,960	7,960	7,960	7,960	7,960	7,960	7,960	7,960	7,960	7,960	\$1,014	\$1,265
Locke - 285 Locke St. S.	1,486	1,486	1,486	1,486	1,486	1,486	1,486	1,486	1,486	1,486	1,700	1,700	1,700	1,700	1,700	\$1,038	\$1,295
Picton (CLOSED)	3,172	3,172	-	-	-	-	-	-	-	-	-	-	-	-	-	\$790	\$995
Red Hill - 695 Queenston Rd.	11,100	11,760	11,760	11,760	11,760	11,760	11,760	11,760	11,760	11,760	11,760	11,760	11,760	11,760	11,760	\$790	\$995
Sherwood - 467 Upper Ottawa	19,195	20,400	20,400	20,400	20,400	20,400	20,400	20,400	20,400	20,400	20,400	20,400	20,400	20,400	20,400	\$790	\$995
Terryberry - 100 Mohawk Rd. E.	28,109	28,109	28,109	28,109	28,109	28,109	28,109	28,109	28,109	28,109	28,109	28,109	28,109	28,109	28,109	\$790	\$995
Westdale - 955 King St. W.	10,277	10,277	10,277	10,277	10,277	10,277	10,277	10,277	10,277	10,277	10,277	10,277	10,277	10,277	10,277	\$1,038	\$1,295
Turner Park Library - 352 Rymal Rd. E.	-	24,116	24,116	24,116	24,116	24,116	24,116	24,116	24,116	24,116	24,116	24,116	24,116	24,116	24,116	\$896	\$1,122
Parkdale - 256 Parkdale Avenue N	-	-	-	-	-	-	-	-	-	-	-	-	-	1,500	1,500	\$1,014	\$1,265
Stoney Creek																	
Stoney Creek Town Hall Library - 777 Highway 8	15,675	15,739	15,739	15,739	11,365	11,365	11,365	11,365	11,365	11,365	11,365	11,365	11,365	11,365	11,365	\$790	\$995
Saltfleet Library - 131 Gray Rd.	15,645	15,645	15,645	15,645	15,645	11,573	11,573	11,573	11,573	11,573	11,573	11,573	11,573	11,573	11,573	\$790	\$995
Valley Park Library - 970 Paramount Dr.	2,976	2,976	2,976	2,976	2,976	2,976	2,976	2,976	2,976	2,976	2,976	2,976	2,976	2,976	11,500	\$1,038	\$1,295
Ancaster																	
Library (300 Wilson St. East)	13,153	13,153	13,153	13,153	13,153	13,153	13,153	13,153	13,153	13,153	13,153	13,153	13,153	13,153	13,153	\$914	\$1,144
Dundas																	
Dundas Public Library (Ogilvie St.)	13,181	13,181	13,181	13,181	13,181	13,181	13,181	13,181	13,181	13,181	13,181	13,181	13,181	13,181	13,181	\$1,038	\$1,295
Glanbrook																	
Mount Hope - 3027 Homestead Dr.	1,600	1,600	1,600	1,600	1,600	1,600	1,600	1,600	1,600	1,600	1,600	1,600	1,600	1,600	1,600	\$1,038	\$1,265
Binbrook - 2641 Highway 56	2,958	2,958	2,958	2,958	2,958	2,958	2,958	2,958	2,958	2,958	6,000	6,000	6,000	6,000	6,000	\$1,038	\$1,265
Flamborough																	
Waterdown - 25 Mill St. N.	3,637	3,637	3,637	3,637	3,637	3,637	3,637	-	-	-	-	-	-	-	-	\$790	\$995
Waterdown - 163 Dundas St E	-	-	-	-	-	-	-	17,813	17,813	17,813	17,813	17,813	17,813	17,813	17,813	\$914	\$1,144



**City of Hamilton
Service Standard Calculation Sheet**

Service: Library Services - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Greenville - 59 Kirby Ave.	2,332	2,500	2,500	2,500	2,500	2,500	2,500	2,500	2,500	2,500	2,500	2,500	2,500	-	-	\$790	\$965
Greenville - 625 Harvest Rd.	-	-	-	-	-	-	-	-	-	-	-	-	-	3,400	3,400	\$1,038	\$1,265
Freelton - 1803 Brock Rd.	1,946	1,946	1,946	1,946	1,946	1,946	1,946	1,946	1,946	1,946	1,946	1,946	1,946	1,946	1,946	\$1,038	\$1,265
Carlisle - 1496 Centre Rd.	2,379	2,379	2,379	2,379	2,379	2,379	2,379	2,379	2,379	2,379	2,379	2,379	2,379	2,379	2,379	\$790	\$965
Carlisle - 277 Carlisle Rd	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2,350	\$273	\$341
Rockton - 795 Old Highway 8	778	778	778	778	778	-	-	-	-	-	-	-	-	-	-	\$790	\$965
Millgrove - 857 Millgrove Side Rd.	1,672	1,672	1,672	1,672	1,672	1,672	1,672	-	-	-	-	-	-	-	-	\$790	\$965
Lynden - 79 Lynden Rd.	900	900	900	900	900	900	-	-	-	-	-	-	-	-	-	\$790	\$965
Lynden - 110 Lynden Rd.	-	-	-	-	-	-	3,815	3,815	3,815	3,815	3,815	3,815	3,815	3,815	3,815	\$1,038	\$1,265
Total	322,189	348,402	385,078	385,078	380,704	375,854	378,769	391,273	391,273	391,273	394,529	394,529	394,529	396,929	405,424		

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.6300	0.6769	0.7469	0.7406	0.7285	0.7133	0.7150	0.7331	0.7287	0.7202	0.7178	0.7101	0.7014	0.6972	0.7003

15 Year Average	2008-2022
Quantity Standard	0.7107
Quality Standard	\$1,030
Service Standard	\$732

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$732
Eligible Amount	\$45,494,115



**City of Hamilton
Service Standard Calculation Sheet**

Service: Library Services - Collection Materials
Unit Measure: No. of library collection items

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/item)
Books - Adult	568,509	531,736	501,456	478,540	441,166	440,537	399,516	409,508	370,450	389,122	407,794	408,066	427,528	404,754	388,496	\$47
Books - Teen	34,907	43,324	42,292	41,992	38,728	41,458	29,140	22,201	19,147	20,770	22,393	35,821	37,215	36,281	37,299	\$31
Books - Children	323,269	322,052	151,664	141,740	258,520	254,288	238,459	234,284	213,686	154,283	213,686	246,235	252,936	232,725	219,688	\$29
Audio Books - Adult	12,490	13,516	9,889	10,953	8,084	7,606	17,348	10,133	12,949	15,765	18,581	18,515	18,759	17,203	15,249	\$63
Audio Books - Children	3,453	3,465	2,276	2,328	3,289	3,493	817	814	616	551	486	3,605	3,592	3,088	2,711	\$45
Accessible Materials	8,580	8,574	8,427	6,249	15,482	12,405	19,729	19,231	20,211	15,459	17,835	19,707	21,113	21,641	21,064	\$50
Periodicals	81,200	72,554	72,852	74,517	72,706	78,389	83,696	83,735	67,651	61,948	56,245	66,125	65,187	25,025	20,109	\$14
CDs	46,469	48,487	48,724	53,012	55,817	58,621	57,455	71,204	64,666	63,104	61,542	46,120	46,440	41,387	36,693	\$22
DVDs	79,580	95,061	90,344	110,511	134,895	143,434	134,335	133,975	124,457	130,293	136,129	137,995	132,933	124,446	115,575	\$41
Blurays	-	2,367	2,737	4,368	8,888	12,806	15,336	15,349	16,175	17,779	19,383	19,341	18,639	18,449	18,161	\$57
Video Game - Adult & Teen	-	458	741	1,023	1,968	2,413	2,266	2,179	2,344	1,909	1,474	1,177	1,047	800	649	\$72
Video Game - Children	-	929	692	455	1,566	2,143	2,308	2,245	2,284	2,169	2,054	1,703	1,605	1,377	1,210	\$61
eBooks	510	581	1,997	6,254	18,342	60,316	63,636	96,733	102,128	102,790	103,452	109,268	115,889	133,654	139,976	\$58
eAudiobook	3,039	3,892	3,589	4,116	5,871	6,621	10,066	15,301	16,154	16,259	16,364	20,231	29,265	43,893	45,240	\$190
eMagazines	-	-	-	-	-	5,733	19,535	20,568	21,601	22,454	23,307	25,203	26,999	12,234	12,597	\$25
Databases	61	73	71	27	21	51	50	45	24	24	24	23	23	26	30	\$47,000
Portable Laptop	-	-	-	-	-	-	-	-	-	-	-	-	-	16	12	\$830
Portable Tablet	-	-	-	-	-	-	-	-	-	-	-	-	-	134	128	\$720
Online Catalogue (Bibliocommons)	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$94,000
Integrated Library System (Polaris)	-	-	-	-	-	1	1	1	1	1	1	1	1	1	1	\$78,000
Total	1,162,067	1,147,069	937,751	936,085	1,065,343	1,130,316	1,093,694	1,137,507	1,054,545	1,014,681	1,100,751	1,159,137	1,199,172	1,117,135	1,074,889	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	2.27	2.23	1.82	1.80	2.04	2.15	2.06	2.13	1.96	1.87	2.00	2.09	2.13	1.96	1.86

15 Year Average	2008-2022
Quantity Standard	2.0247
Quality Standard	\$43
Service Standard	\$88

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$88
Eligible Amount	\$5,467,347



**City of Hamilton
Service Standard Calculation Sheet**

Service: Library Services - Vehicles
Unit Measure: No. of library collection items

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/item)
Bookmobile	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$766,500
022-VAN 1/2 T	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$58,300
023-VAN 3/4 T	1	1	1	1	1	1	1	1	1	1	-	-	-	-	-	\$58,300
Ford E-450 Style Truck & Body	-	-	-	-	-	-	-	-	-	-	2	2	2	2	2	\$76,700
Genie Boom	-	-	-	-	-	-	-	-	1	1	1	1	1	1	1	\$28,400
Skyjack	-	-	-	-	-	-	-	-	1	1	1	1	1	1	1	\$28,400
Total	5	7	7	8	8	8	8	8								

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.00001	0.00001	0.00001	0.00001	0.00001	0.00001	0.00001	0.00001	0.00001	0.00001	0.00001	0.00001	0.00001	0.00001	0.00001

15 Year Average	2008-2022
Quantity Standard	0.00001
Quality Standard	\$328,000
Service Standard	\$3

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$3
Eligible Amount	\$203,806



**City of Hamilton
Service Standard Calculation Sheet**

Service: Ambulance Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Station #1 - 35 - 43 John Street North	2,853	2,853	2,853	2,853	2,853	2,853	2,853	2,853	2,853	2,853	2,853	2,853	2,853	2,853	2,853	\$602	\$705
Station #3 Ambulance, 965 Garth St.	1,554	1,554	1,554	1,554	1,554	1,554	1,554	1,554	1,554	1,554	1,554	1,554	1,554	1,554	1,554	\$747	\$864
Station #4 Ambulance, 729 Upper Sherman	1,145	1,145	1,145	1,145	1,145	1,145	1,145	1,145	1,145	1,145	1,145	1,145	1,145	1,145	1,145	\$602	\$705
Station #7 Ambulance, 225 Quigley Rd.	1,038	1,038	1,038	1,038	1,038	1,038	1,038	1,038	1,038	1,038	1,038	1,038	1,038	1,038	1,038	\$747	\$864
Station #9 Ambulance, 125 Kenilworth Ave. N.	1,435	1,435	1,435	1,435	1,435	1,435	1,435	1,435	1,435	1,435	1,435	1,435	1,435	1,435	1,435	\$747	\$864
Station #10 Ambulance, Norfolk Ave.	1,364	1,364	1,364	1,364	1,364	1,364	1,364	1,364	1,364	1,364	1,364	1,364	1,364	1,364	1,364	\$747	\$864
Station #12 Ambulance, 199 Highway 8 Stoney Creek	-	-	2,983	2,983	2,983	2,983	2,983	2,983	2,983	2,983	2,983	2,983	2,983	2,983	2,983	\$602	\$705
Station #15 Ambulance, 415 Arvin Ave.	2,519	2,519	2,519	2,519	2,519	2,519	2,519	2,519	2,519	2,519	2,519	2,519	2,519	2,519	2,519	\$747	\$864
Station #17 Ambulance, 363 Isaac Brock St.	1,140	1,140	1,140	1,140	1,140	1,140	1,140	1,140	1,140	1,140	1,140	1,140	1,140	1,140	1,140	\$747	\$864
Station #18 Ambulance, 2636 (2640) Highway 56 Binbrook	-	-	1,938	1,938	1,938	1,938	1,938	1,938	1,938	1,938	1,938	1,938	1,938	1,938	1,938	\$785	\$906
Station #19 Ambulance, 3302 Homestead Rd.	1,483	1,483	1,483	1,483	1,483	1,483	1,483	1,483	1,483	1,483	1,483	1,483	1,483	1,483	1,483	\$602	\$675
Station #20 Ambulance, 365 Wilson St. W.	1,996	1,996	1,996	1,996	1,996	1,996	1,996	1,996	1,996	1,996	1,996	1,996	1,996	1,996	1,996	\$747	\$864
Station #21 Ambulance, Garner Rd., Ancaster	1,963	1,963	1,963	1,963	1,963	1,963	1,963	1,963	1,963	1,963	1,963	1,963	1,963	1,963	1,963	\$602	\$705
Station #23 Ambulance, Memorial Square	2,836	2,836	2,836	2,836	2,836	2,836	2,836	2,836	2,836	2,836	2,836	2,836	2,836	2,836	2,836	\$602	\$705
Station #24 Ambulance, 265 Parkside Dr.	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	1,656	\$602	\$705
Station #25 Ambulance, 361 Old Brock Rd.	-	-	1,802	1,802	1,802	1,802	1,802	1,802	1,802	1,802	1,802	1,802	1,802	1,802	1,802	\$747	\$864
Station #26 Ambulance, Lynden	-	-	1,204	1,204	1,204	1,204	1,204	1,204	1,204	1,204	1,204	1,204	1,204	-	-	\$602	\$705



**City of Hamilton
Service Standard Calculation Sheet**

Service: Ambulance Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Station #30 Ambulance, 489 Victoria Ave. N.	18,558	18,558	18,558	18,558	18,558	18,558	18,558	18,558	18,558	18,558	18,558	18,558	18,558	18,558	18,558	\$747	\$864
Station #32 Ambulance, 1000 Limeridge Rd.	-	-	-	7,060	7,060	7,060	7,060	7,060	7,060	7,060	7,060	7,060	7,060	7,060	7,060	\$670	\$779
Stoney Creek Mountain Training Facility (Shared Building B)	-	-	-	7,280	7,280	7,280	7,280	7,280	7,280	7,280	7,280	7,280	7,280	7,280	7,280	\$750	\$868
Total	41,539	41,539	49,466	63,806	62,602	62,602											

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.0812	0.0807	0.0959	0.1227	0.1221	0.1211	0.1204	0.1196	0.1188	0.1174	0.1161	0.1148	0.1134	0.1100	0.1081

15 Year Average	2008-2022
Quantity Standard	0.1108
Quality Standard	\$816
Service Standard	\$90

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$90
Eligible Amount	\$5,617,716



**City of Hamilton
Service Standard Calculation Sheet**

Service: Ambulance Vehicles
Unit Measure: No. of vehicles and equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Emergency Support Unit	1	1	2	2	2	2	2	2	2	2	2	2	1	1	1	\$122,900
Emergency Support Unit 2	-	-	-	-	-	-	-	-	-	-	-	-	1	1	1	\$273,300
Defibrillators	52	52	52	52	52	65	65	65	65	65	65	66	67	67	67	\$47,800
Vehicle Equipment	93	93	93	93	93	93	93	93	93	93	93	93	94	94	94	\$8,500
Ambulances	30	30	30	31	31	32	36	37	41	41	41	41	42	42	42	\$358,000
Stryker Power Stretchers	-	-	-	-	-	-	-	2	50	50	50	51	52	52	52	\$31,200
Emergency Response Vehicles	16	16	16	16	17	19	19	16	17	17	17	17	17	17	17	\$157,100
Transport Van	-	-	-	-	-	-	-	3	3	3	3	3	3	3	3	\$88,800
Stryker Power Load Systems	-	-	-	-	-	-	-	2	40	40	40	41	42	42	42	\$36,900
Specialized Training Simulator Equipment	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$136,600
Paramedic Gear	22	22	16	12	18	21	30	34	13	21	37	50	55	55	55	\$2,100
Mobile Integrated Health Vans	-	-	-	-	-	-	-	-	-	-	-	-	4	4	6	\$51,800
Autopulse	-	-	-	-	-	-	-	-	-	-	-	-	-	35	36	\$16,700
Supervisor Pickups	1	1	1	1	1	1	1	1	1	1	1	1	2	3	3	\$62,800
Stair Chairs	30	30	30	31	32	32	36	37	41	41	41	43	44	45	46	\$5,500
Total	247	247	242	240	248	267	284	294	368	376	392	410	426	463	467	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005	0.0006	0.0007	0.0007	0.0007	0.0007	0.0008	0.0008	0.0008

15 Year Average	2008-2022
Quantity Standard	0.0006
Quality Standard	\$67,933
Service Standard	\$41

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$41
Eligible Amount	\$2,532,663



**City of Hamilton
Service Standard Calculation Sheet**

Service: Long-term Care Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Wentworth Lodge	111,092	111,092	111,092	111,092	111,092	111,092	111,092	111,092	111,092	111,092	111,092	111,092	111,092	111,092	111,092	\$964	\$1,103
Macassa Lodge	236,186	236,186	236,186	236,186	236,186	236,186	236,186	236,186	236,186	236,186	236,186	236,186	236,186	236,186	236,186	\$685	\$795
Total	347,278																

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.6791	0.6747	0.6736	0.6679	0.6645	0.6591	0.6556	0.6507	0.6468	0.6392	0.6318	0.6251	0.6174	0.6100	0.5998

15 Year Average	2008-2022
Quantity Standard	0.6464
Quality Standard	\$893
Service Standard	\$578

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$578
Eligible Amount	\$35,885,404



**City of Hamilton
Service Standard Calculation Sheet**

Service: Child Care and Early Years Programs - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
Red Hill Day Care Centre	16,782	16,782	16,782	16,782	16,782	14,265	14,265	14,265	14,265	14,265	14,265	14,265	14,265	14,265	14,265	\$456	\$543
Lister Block	-	-	-	24,200	24,200	24,200	24,200	24,200	24,200	24,200	24,200	24,200	24,200	24,200	24,200	\$790	\$912
Total	16,782	16,782	16,782	40,982	40,982	38,465											

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.0328	0.0326	0.0325	0.0788	0.0784	0.0730	0.0726	0.0721	0.0716	0.0708	0.0700	0.0692	0.0684	0.0676	0.0664

15 Year Average	2008-2022
Quantity Standard	0.0638
Quality Standard	\$749
Service Standard	\$48

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$48
Eligible Amount	\$2,968,858



**City of Hamilton
Service Standard Calculation Sheet**

Service: Provincial Offences Act including By-law Enforcement - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
45 Main Street East - Dedicated Space	16,034	16,034	16,034	16,034	16,034	16,034	16,034	16,034	16,034	16,034	-	-	-	-	-	\$641	\$747
45 Main Street East - Shared Space	2,375	2,375	2,375	2,375	2,375	2,375	2,375	2,375	2,375	2,375	-	-	-	-	-	\$641	\$747
50 Main Street East -Dedicated Space	-	-	-	-	-	-	-	-	-	-	53,287	53,287	53,287	53,287	53,287	\$641	\$747
50 Main Street East - Shared Space	-	-	-	-	-	-	-	-	-	-	4,628	4,628	4,628	4,628	4,628	\$641	\$747
Total	18,409	57,915	57,915	57,915	57,915	57,915											

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.0360	0.0358	0.0357	0.0354	0.0352	0.0349	0.0348	0.0345	0.0343	0.0339	0.1054	0.1042	0.1030	0.1017	0.1000

15 Year Average	2008-2022
Quantity Standard	0.0577
Quality Standard	\$746
Service Standard	\$43

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$43
Eligible Amount	\$2,676,198



**City of Hamilton
Service Standard Calculation Sheet**

Service: Public Health - Facilities
Unit Measure: sq.ft. of building area

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
100 Main St. E., suite 220	11,392	11,392	11,392	11,392	11,392	11,392	11,392	11,392	11,392	11,392	11,392	11,392	11,392	11,392	11,392	\$392	\$473
2255 Barton St - Unit 3/4	6,773	6,773	6,773	6,773	6,773	6,773	-	-	-	-	-	-	-	-	-	\$392	\$473
2255 Barton St - Unit 8	1,200	1,200	1,200	-	-	-	-	-	-	-	-	-	-	-	-	\$392	\$473
1447 Upper Ottawa (owned)	15,143	15,143	15,143	15,143	15,143	15,143	15,143	15,143	15,143	-	-	-	-	-	-	\$431	\$516
2 King St W., (DUN)	10,825	10,825	10,825	10,825	10,825	10,825	10,825	3,635	-	-	-	-	-	-	-	\$350	\$427
21 Hunter St. E.	5,324	5,324	5,324	5,324	5,324	5,324	5,324	5,324	5,324	5,324	5,324	5,324	5,324	5,324	5,324	\$392	\$473
1 Hughson St. N.	33,015	33,015	33,015	33,015	33,015	33,015	33,015	-	-	-	-	-	-	-	-	\$392	\$473
4 Hughson St. S.	2,790	2,790	2,790	-	-	-	-	-	-	-	-	-	-	-	-	\$392	\$473
1439 Upper Ottawa	1,227	1,227	1,227	1,227	1,227	1,227	1,227	-	-	-	-	-	-	-	-	\$392	\$473
1447 Upper Ottawa (leased)	4,892	4,892	4,892	4,892	4,892	4,892	4,892	4,892	-	-	-	-	-	-	-	\$431	\$516
125 Barton - West Nile	-	-	892	892	892	892	892	-	-	-	-	-	-	-	-	\$393	\$474
1 James St.	-	-	5,626	5,626	5,626	5,626	5,626	-	-	-	-	-	-	-	-	\$431	\$516
247 Centennial Unit 8	-	-	2,114	2,114	2,114	2,114	2,114	2,114	2,114	2,114	2,114	2,114	2,114	2,114	2,114	\$392	\$473
100 Main St. West - McMaster Health Campus (leased)	-	-	-	-	-	-	-	24,122	24,122	24,122	24,122	24,122	24,122	24,122	24,122	\$654	\$762
110 King Street West (Robert Thompson)	-	-	-	-	-	-	52,300	52,300	52,300	52,300	52,300	52,300	52,300	52,300	52,300	\$527	\$622
891 Upper James (leased)	-	-	-	-	-	-	2,159	2,159	2,159	2,159	2,159	2,159	2,159	2,159	2,159	\$389	\$470
Total	92,581	92,581	101,213	97,223	97,223	97,223	144,909	121,081	112,554	97,411	97,411	97,411	97,411	97,411	97,411		

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.1810	0.1799	0.1963	0.1870	0.1860	0.1845	0.2735	0.2269	0.2096	0.1793	0.1772	0.1753	0.1732	0.1711	0.1683

15 Year Average	2008-2022
Quantity Standard	0.1913
Quality Standard	\$556
Service Standard	\$106

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$106
Eligible Amount	\$6,606,921



**City of Hamilton
Service Standard Calculation Sheet**

Service: Public Health - Vehicles & Equipment
Unit Measure: No. of Vehicles and Equipment

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Health Bus	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$500,000
Dental Bus	-	-	-	-	-	-	-	-	-	-	-	-	1	1	1	\$800,000
Total	1	2	2	2												

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.000002	0.000002	0.000002	0.000002	0.000002	0.000002	0.000002	0.000002	0.000002	0.000002	0.000002	0.000002	0.000004	0.000004	0.000003

15 Year Average	2008-2022
Quantity Standard	0.000002
Quality Standard	\$605,000
Service Standard	\$1

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$1
Eligible Amount	\$75,185



**City of Hamilton
Service Standard Calculation Sheet**

Service: Waste Diversion - Facilities
Unit Measure: sq.ft. of building area

Description	Percentage Attributable to Diversion	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Bld'g Value (\$/sq.ft.)	Value/sq.ft. with land, site works, etc.
77 James St.	100%	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	1,526	-	-	-	\$417	\$500
Transfer Stations / Community Recycling Centres:																		
Dundas - Olympic Drive - Main Building	15%	1,473	1,473	1,473	1,473	1,473	1,473	1,473	1,473	1,473	1,473	1,473	1,473	1,473	1,473	1,473	\$1,268	\$1,438
- HHW Trailer	100%	930	930	930	930	930	930	930	930	930	930	930	930	930	930	930	\$507	\$600
- HHW Office (portable)	100%	140	140	140	140	140	140	140	140	140	140	140	140	140	140	140	\$403	\$485
- TS Scalehouse	15%	21	21	21	21	21	21	21	21	21	21	21	21	21	21	21	\$198	\$259
Kenora - Kenora Avenue - Main Building	15%	2,726	2,726	2,726	2,726	2,726	2,726	2,726	2,726	2,726	2,726	2,726	2,726	2,726	2,726	2,726	\$1,268	\$1,439
- HHW Trailer	100%	731	731	731	731	731	731	731	731	731	731	731	731	731	731	731	\$1,268	\$1,438
- HHW Office	100%	97	97	97	97	97	97	97	97	97	97	97	97	97	97	97	\$580	\$680
- TS Scalehouse	15%	21	21	21	21	21	21	21	21	21	21	21	21	21	21	21	\$233	\$298
Mountain - 37 Kilbride Road - Main Building (Transfer Station)	15%	1,904	1,904	1,904	1,904	1,904	1,904	1,904	1,904	1,904	1,904	1,904	1,904	1,904	1,904	1,904	\$1,268	\$1,439
- Kilbride Yard, 37 Kilbride Rd. - Reuse Store	100%	3,561	3,561	3,561	3,561	3,561	3,561	3,561	3,561	3,561	3,561	3,561	3,561	3,561	3,561	3,561	\$559	\$657
- Mountain Community Recycling Centre - Reuse Store & HHW Depot (YRD032)	100%	12,419	12,419	12,419	12,419	12,419	12,419	12,419	12,419	12,419	12,419	12,419	12,419	12,419	12,419	12,419	\$1,268	\$1,439
- TS Scalehouse	15%	21	21	21	21	21	21	21	21	21	21	21	21	21	21	21	\$198	\$1,439
Glanbrook Landfill Site (Diversion portion only)	2%	129	129	129	129	129	129	129	129	129	129	129	129	129	129	129	\$1,268	\$259
Hamilton Materials Recycling Facility	100%	273,195	273,195	273,195	273,195	273,195	273,195	273,195	273,195	273,195	273,195	273,195	273,195	273,195	273,195	273,195	\$344	\$420
Hamilton Central Composting Facility - main processing facility & curing building (YRD076)	100%	118,457	107,387	105,125	106,504	105,734	102,894	102,196	102,058	102,288	89,465	89,465	149,109	149,109	149,109	149,109	\$737	\$853
Contracted Local Yard - 560 Seaman St. Stoney Creek	61%	-	-	-	-	-	11,162	11,162	11,162	11,162	11,162	11,162	11,162	11,162	11,162	11,162	\$403	\$768
Contracted Local Yard	61%	1,937	1,937	1,937	1,937	1,937	-	-	-	-	-	-	-	-	-	-	\$403	\$485
Total Eligible Portion of Facilities		419,288	408,218	405,956	407,335	406,565	412,950	412,252	412,114	412,344	399,522	399,522	459,165	457,639	457,639	457,639		

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.8199	0.7931	0.7874	0.7834	0.7779	0.7837	0.7782	0.7722	0.7680	0.7354	0.7269	0.8264	0.8136	0.8038	0.7905

15 Year Average	2008-2022
Quantity Standard	0.7840
Quality Standard	\$593
Service Standard	\$465

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$465
Eligible Amount	\$28,901,939



**City of Hamilton
Service Standard Calculation Sheet**

Service: Waste Diversion - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	Percentage Attributable to Diversion	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
City Owned																	
20 cyd single stream rear packer	48%	1.44	1.44	1.44	1.44	1.44	-	-	-	-	-	-	-	-	-	-	\$355,000
32 cyd single stream rear packer	48%	1.44	1.44	1.44	1.44	1.44	-	-	-	-	-	-	-	-	-	-	\$426,000
Compact pickup	48%	-	1.92	1.92	1.44	-	-	-	-	-	-	-	0.48	0.48	1.44	1.44	\$35,000
SUV 2wd	48%	0.48	0.48	1.44	-	-	0.48	0.48	1.44	1.44	1.44	1.44	0.96	0.96	0.96	0.96	\$49,800
Pick up 2wd	48%	3.84	3.84	3.36	3.84	4.32	3.84	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	\$48,400
Pickup 4x4	48%	0.48	0.48	0.48	0.48	0.48	0.48	0.48	1.44	1.44	1.44	1.44	1.92	1.92	1.92	1.92	\$71,100
Pickup 3/4 ton	48%	-	-	-	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	\$70,000
Dump truck 5 ton	48%	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	-	-	-	-	\$159,200
25 cyd single stream rear packer	48%	2.40	1.92	1.92	2.88	2.40	8.16	8.16	7.68	7.68	7.68	7.68	7.68	7.68	7.68	6.72	\$250,000
25 cyd dual stream rear packer	48%	8.64	8.64	8.64	8.64	8.64	5.28	5.28	5.28	5.28	5.28	5.28	4.32	4.32	4.32	5.28	\$400,800
31 cyd single stream sideloader	48%	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	\$426,500
31 cyd dual stream side loader	48%	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	4.80	\$426,500
Contracted (GFL Environmental Inc.)																	
Curbside/Roadside																	
Recycling																	
Mack with UHE Body - 32 yd rear packer dual stream - diesel	100%	6.00	6.00	6.00	6.00	6.00	6.00	6.00	6.00	6.00	6.00	6.00	6.00	6.00	-	-	\$355,400
Freightliner with Heil Body - 25 yd rear packer dual stream - CNG	100%	33.00	33.00	33.00	33.00	33.00	33.00	33.00	33.00	33.00	33.00	33.00	33.00	33.00	-	-	\$482,900
Peterbuilt with McNeilus Body - 32yd dual stream - diesel	100%	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	-	-	-	-	\$426,500
Freightliner with Heil Body - 30 yd rear packer dual stream CNG	100%	-	-	-	-	-	-	-	-	-	-	-	-	-	28.00	28.00	\$482,900
Freightliner with Heil Body - 25 yd rear packer dual stream CNG	100%	-	-	-	-	-	-	-	-	-	-	-	-	-	10.00	10.00	\$482,900
Organics/Garbage																	
Freightliner with UHE Body - 32 yd rear packer dual stream CNG	48%	10.08	10.08	10.08	10.08	10.08	10.08	10.08	10.08	10.08	10.08	10.08	10.08	10.08	-	-	\$575,700
Freightliner with McNeilus Body - 32 yd rear packer dual stream CNG	48%	-	-	-	-	-	-	-	-	-	-	-	-	-	12.48	12.48	\$575,700



**City of Hamilton
Service Standard Calculation Sheet**

Service: Waste Diversion - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	Percentage Attributable to Diversion	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Leaf & Yard Waste/ Bulk																	
Peterbilt with McNeilus Body - 25 yd rear packer ss diesel	48%	2.88	2.88	2.88	2.88	2.88	2.88	2.88	2.88	2.88	2.88	2.88	2.40	2.40	-	-	\$344,000
Peterbilt with McNeilus Body - 30yd dual stream - diesel	48%	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	-	-	\$355,400
Freightliner with UHE Body - 32 yd ss rear packer - diesel	48%	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	-	-	\$344,000
Freightliner with Labrie McNeilus Body - 37 25 yd single stream sideloader - diesel	48%	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.96	0.96	-	-	\$300,000
Freightliner with McNeilus Body - 32 yd rear packer single stream CNG	48%	-	-	-	-	-	-	-	-	-	-	-	-	-	3.84	3.84	\$488,400
Front Load Bin Waste and Fibre Collection																	
Mack with McNeilus Body - 40 yd single stream	48%	5.28	5.28	5.28	5.28	5.28	5.28	5.28	5.28	5.28	5.28	5.28	4.80	4.80	-	-	\$426,500
Mack with Labrie Body - 40 yd single stream	48%	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	-	-	\$426,500
Mack with Fanotech Body - 40 yd single stream	48%	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	-	-	\$426,500
Mack with Capital Body - 40 yd single stream	48%	0.48	0.48	0.48	0.48	0.48	-	-	-	-	-	-	0.48	0.48	-	-	\$426,500
Freightliner with McNeilus Body - 37 yd single stream	48%	-	-	-	-	-	-	-	-	-	-	-	-	-	2.40	2.40	\$250,000
Side-loader Fully Automated Recycling Cart Collection																	
Freightliner with Labrie Body - 33 yd dual stream	100%	4	4	4	4	4	4	4	4	4	4	4	4	4	-	-	\$575,700
Freightliner with Labrie Body - 33 yd dual stream CNG	100%	-	-	-	-	-	-	-	-	-	-	-	-	-	4	4	\$575,700
Fork Truck (front load bin)																	
Freightliner Spike Truck (Pull Out Truck)	48%	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	0.48	\$106,600
Pickup Trucks	48%	1.92	1.92	1.92	1.92	1.92	1.92	1.92	1.92	1.92	1.92	1.92	2.88	2.88	2.88	2.88	\$64,000



**City of Hamilton
Service Standard Calculation Sheet**

Service: Waste Diversion - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	Percentage Attributable to Diversion	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Spares																	
Freightliner with Labrie Body - 33 yd Sideload dual stream - Recycling	100%	-	-	-	-	-	-	-	-	-	-	-	-	-	2.00	2.00	\$575,700
Freightliner with UHE Body - 30 yd rear load single stream	48%	-	-	-	-	-	-	-	-	-	-	-	-	-	0.48	0.48	\$426,500
RECYCLING & WASTE DISPOSAL																	
CENTRAL COMPOSTING FACILITY																	
City Owned																	
Main fans	100%	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$65,400
Curing Building Fan	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$56,900
Tunnel Fans	100%	16	16	16	16	16	16	16	16	16	16	16	16	16	16	16	\$385,400
Make Up Air Units	100%	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$85,300
Grinder	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$995,100
Shredder	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$1,189,800
Stationary Screening Plant	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$28,800
PLC Units	100%	5	5	5	5	5	5	5	5	5	5	5	5	5	5	5	\$142,200
SCADA System	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$710,800
Tube Conveyor	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$142,200
Fixed Conveyors	100%	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	\$85,300
Stack Jet Fans	100%	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$56,900
Loaders Volvo L150 or Equivalent	100%	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$568,600
CAT 242 Skidsteer	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$53,400
Ramrod Mini Skidsteer	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$22,600
Genie Boom 40ft Manlift	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$58,700
Grove 54ft Manlift	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$17,000
Generator	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$142,200
Overhead Filling Cassette	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$514,500
Central Exhaust Fans	100%	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	\$167,800
Mag Conveyor	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$68,300
Hydraulic Door Wagon	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$7,100
Contracted (Harbourside Organix)																	
Volvo L110 Loader	100%	-	-	-	-	1	1	1	1	1	1	1	1	1	1	1	\$568,600



**City of Hamilton
Service Standard Calculation Sheet**

Service: Waste Diversion - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	Percentage Attributable to Diversion	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
TRANSFER STATIONS / COMMUNITY RECYCLING CENTRES																	
Contracted (Waste Connections)																	
Transfer Trailers	11%	0.74	0.74	0.74	0.74	0.74	0.74	0.74	0.74	0.74	0.74	0.74	0.74	0.74	1.06	1.06	\$177,700
Transfer Trucks	11%	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.85	0.74	0.74	\$191,900
Roll-off Bins																	
- 20 yard	100%	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	\$11,400
- 30 yard	100%	15	15	15	15	15	15	15	15	15	15	15	15	15	18	18	\$14,200
- 40 yard	100%	28	28	28	28	28	28	28	28	28	28	28	28	28	44	44	\$17,000
Roll-off Trucks	15%	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	\$248,800
Scales																	
- 80' above ground	15%	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	\$139,400
- 80' pit scale	15%	0.30	0.30	0.30	0.30	0.30	0.30	0.30	0.30	0.30	0.30	0.30	0.30	0.30	0.30	0.30	\$86,700
Front End Loaders	15%	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	\$568,600
LEAF & YARD COMPOSTING FACILITY																	
Contracted (Waste Management Canada)																	
Screener	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$355,400
Tub Grinder	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$1,137,200
Excavator	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$355,400
Conveyor	100%	-	-	-	-	-	-	-	-	-	-	-	-	1	1	1	\$136,600
MATERIAL RECYCLING FACILITY																	
City Owned																	
Forklift	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	\$71,100



**City of Hamilton
Service Standard Calculation Sheet**

Service: Waste Diversion - Vehicles & Equipment
Unit Measure: No. of vehicles and equipment

Description	Percentage Attributable to Diversion	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/Vehicle)
Contracted (GFL Environmental Inc.)																	
Forklift	100%	1	1	1	1	1	1	1	1	1	1	1	1	1	3	3	\$71,100
Loaders Volvo L150 or Equivalent	100%	-	-	-	-	-	-	-	-	-	-	-	-	-	2	2	\$476,900
Skidsteer	100%	-	-	-	-	-	-	-	-	-	-	-	-	-	3	3	\$44,800
Transfer Trucks	100%	-	-	-	-	-	-	-	-	-	-	-	-	-	1	1	\$161,000
Transfer Trailers	100%	-	-	-	-	-	-	-	-	-	-	-	-	-	2	2	\$149,000
Total Eligible Portion of Vehicles & Equipment		204.72	206.16	206.64	206.64	206.20	205.24	206.20	207.16	207.16	207.16	207.16	206.16	207.16	236.89	236.89	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004	0.0004

15 Year Average	2008-2022
Quantity Standard	0.0004
Quality Standard	\$258,925
Service Standard	\$104

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$104
Eligible Amount	\$6,435,426



**City of Hamilton
Service Standard Calculation Sheet**

Service: Waste Diversion - Carts & Containers
Unit Measure: No. of items

Description	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023 Value (\$/item)
Blue Boxes	28,000	42,000	75,000	108,000	139,000	183,000	228,000	271,000	319,000	362,000	403,472	416,432	452,720	481,564	523,538	\$9
Blue Carts	300	800	1,600	2,400	3,200	3,600	4,000	4,400	5,800	6,300	6,885	7,479	9,243	10,588	11,572	\$70
Small Green Carts	-	18,000	18,000	18,000	18,000	18,000	18,000	18,000	20,100	23,100	28,482	37,842	42,834	49,928	54,165	\$18
Large Green Carts	149,800	154,800	162,800	169,800	177,300	186,300	198,300	211,300	220,300	229,300	240,068	242,067	247,607	253,671	259,333	\$34
Mini Bins/Kitchen Organics Containers	176,000	182,000	198,000	214,000	230,000	233,000	237,200	244,200	250,200	256,200	262,536	262,536	266,496	271,138	276,185	\$4
Blue Bags	11,000	12,000	24,000	36,000	46,000	50,000	56,000	62,000	68,000	74,000	74,000	74,000	80,000	81,500	83,000	\$1
Gold Boxes	-	-	-	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	3,592	5,149	6,114	\$10
Blue Barrels	50	50	50	50	50	50	50	50	50	50	50	50	50	50	50	\$35
Public Space Litter Container - Jubilees	-	-	-	-	-	-	-	-	200	200	200	200	200	212	231	\$1,068
Public Space Litter Container - Fluted	50	50	50	50	50	50	50	50	50	50	50	50	50	50	50	\$142
Total	365,200	409,700	479,500	549,300	614,600	675,000	742,600	812,000	884,700	952,200	1,016,743	1,041,656	1,102,792	1,153,850	1,214,238	
Percentage attributable to Eligible Portion	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%	100%	
Total Eligible Portion	365,200	409,700	479,500	549,300	614,600	675,000	742,600	812,000	884,700	952,200	1,016,743	1,041,656	1,102,792	1,153,850	1,214,238	

Population	511,412	514,740	515,591	519,949	522,611	526,896	529,744	533,698	536,918	543,294	549,623	555,599	562,453	569,353	578,957
Per Capita Standard	0.71	0.80	0.93	1.06	1.18	1.28	1.40	1.52	1.65	1.75	1.85	1.87	1.96	2.03	2.10

15 Year Average	2008-2022
Quantity Standard	1.4724
Quality Standard	\$14
Service Standard	\$21

D.C. Amount (before deductions)	10 Year
Forecast Population	62,136
\$ per Capita	\$21
Eligible Amount	\$1,301,749



Appendix C

Long-Term Capital and Operating Cost Examination



Appendix C: Long-Term Capital and Operating Cost Examination

City of Hamilton Annual Capital and Operating Cost Impact

As a requirement of the *Development Charges Act, 1997*, as amended, under subsection 10 (2) (c), an analysis must be undertaken to assess the long-term capital and operating cost impacts for the capital infrastructure projects identified within the development charge. As part of this analysis, it was deemed necessary to isolate the incremental operating expenditures directly associated with these capital projects, factor in cost savings attributable to economies of scale or cost sharing where applicable and prorate the cost on a per unit basis (i.e., sq.ft. of building space, per vehicle, etc.). This was undertaken through a review of the City's approved 2022 Financial Information Return.

In addition to the operational impacts, over time the initial capital projects will require replacement. This replacement of capital is often referred to as lifecycle cost. By definition, lifecycle costs are all the costs that are incurred during the life of a physical asset, from the time its acquisition is first considered, to the time it is taken out of service for disposal or redeployment. The method selected for lifecycle costing is the sinking fund method which provides that money will be contributed annually and invested, so that those funds will grow over time to equal the amount required for future replacement. The factors shown in Table C-1 were utilized to calculate the annual replacement cost of the capital projects (annual contribution = factor X capital asset cost) and are based on an annual growth rate of 2% (net of inflation) over the average useful life of the asset.



Table C-1
City of Hamilton
Lifecycle Cost Factors and Average Useful Lives

Asset	Lifecycle Cost Factors	
	Average Useful Life	Factor
Stormwater Facilities, Channels & Drainage	100	0.003203
Stormwater Ponds	40	0.016556
Wastewater Facilities	55	0.010143
Wastewater Collection	100	0.003203
Water Distribution	80	0.005161
Services Related to a Highway	20	0.041157
Vehicles (Excluding Fire, Police & Transit)	10	0.091327
Transit, Police & Fire Vehicles	15	0.057825
Police and Fire Equipment	10	0.091327
Parkland	30	0.024650
Facilities	50	0.011823
Library Materials	7	0.134512

Table C-2 depicts the annual operating impact resulting from the proposed gross capital projects at the time they are all in place. It is important to note that, while City program expenditures will increase with growth in population, the costs associated with the new infrastructure (i.e., facilities) would be delayed until the time these works are in place.



Table C-2
City of Hamilton
Operating and Capital Expenditure Impacts for Future Capital Expenditures

SERVICE/CLASS OF SERVICE	GROSS COST LESS BENEFIT TO EXISTING	ANNUAL LIFECYCLE EXPENDITURES	ANNUAL OPERATING EXPENDITURES	TOTAL ANNUAL EXPENDITURES
	\$	\$	\$	\$
1. Stormwater Drainage and Control Services (Combined Sewer System)				
1.1 Stormwater Facilities	26,259,244	303,210	1,581	304,791
2. Stormwater Drainage and Control Services (Separated Sewer System)				
2.1 Channels and drainage	173,735,092	2,793,339	538,525	3,331,864
2.2 Residential ponds	423,173,587	9,009,621	1,311,708	10,321,329
3. Wastewater Services				
3.1 Wastewater facilities	554,374,201	22,819,401	2,798,740	25,618,141
3.2 Wastewater linear services	316,594,660	7,847,478	4,060,007	11,907,485
4. Water Services				
4.1 Facilities, storage, and distribution systems	279,477,460	8,397,900	7,104,740	15,502,640
5. Services Related to a Highway				
5.1 Roads and Related	1,444,253,315	46,439,192	7,876,974	54,316,166
6. Public Works (Facilities and Fleet)				
6.1 Facilities, vehicles and equipment	46,410,529	2,950,820	262,273	3,213,093
7. Fire Protection Services				
7.1 Fire facilities, vehicles and equipment	71,001,098	2,677,260	12,029,062	14,706,322
8. Policing Services				
8.1 Facilities, vehicles and equipment, small equipment and gear	44,509,008	1,780,619	21,051,918	22,832,537
9. Transit Services				
9.1 Transit facilities, vehicles and other infrastructure	292,378,482	10,558,251	16,589,296	27,147,547
10. Parks and Recreation				
10.1 Park development, amenities, trails, equipment and recreation facilities	372,624,122	15,026,643	13,868,467	28,895,110
11. Library Services				
11.1 Library facilities, materials and vehicles	74,727,956	2,915,071	3,714,253	6,629,324
12. Long-term Care Services				
12.1 Facilities	11,238,243	844,329	7,233,969	8,078,298
13. Child Care and Early Years Programs				
13.1 Facilities	-	-	-	-
14. Public Health Services				
14.1 Facilities, vehicles and equipment	1,175,496	66,828	8,021,326	8,088,154
15. Provincial Offences Act Services including By-Law Enforcement				
15.1 Facilities	1,802,189	-	-	-
16. Ambulance				
16.1 Ambulance facilities, vehicles and equipment	21,042,668	967,480	7,538,684	8,506,164
17. Waste Diversion				
17.1 Waste diversion facilities, vehicles, equipment and other	23,245,811	2,307,763	4,257,367	6,565,130
Total	\$4,178,023,161	\$137,705,205	\$118,258,890	\$255,964,095



Appendix D

D.C. Reserve Fund Policy



Appendix D: D.C. Reserve Fund Policy

D.1 Legislative Requirements

The *Development Charges Act, 1997*, as amended (D.C.A.) requires development charge (D.C.) collections (and associated interest) to be placed in separate reserve funds. Sections 33 through 36 of the D.C.A. provide the following regarding reserve fund establishment and use:

- A municipality shall establish a reserve fund for each service to which the D.C. by-law relates; subsection 7 (1), however, allows services to be grouped into categories of services for reserve fund (and credit) purposes and for classes of services to be established.
- The municipality shall pay each D.C. it collects into a reserve fund or funds to which the charge relates.
- The money in a reserve fund shall be spent only for the “capital costs” determined through the legislated calculation process (as per subsection 5 (1) 2-8).
- Money may be borrowed from the fund but must be paid back with interest (O. Reg. 82/98, subsection 11 (1) defines this as Bank of Canada rate either on the day the by-law(s) come into force or, if specified in the by-law, the first business day of each quarter).
- D.C. reserve funds may not be consolidated with other municipal reserve funds for investment purposes and may only be used as an interim financing source for capital undertakings for which D.C.s may be spent (section 37).

Annually, the Treasurer of the municipality is required to provide Council with a financial statement related to the D.C. by-law(s) and reserve funds. This statement must be made available to the public and may be requested to be forwarded to the Minister of Municipal Affairs and Housing.

Subsection 43 (2) and O. Reg. 82/98 prescribe the information that must be included in the Treasurer’s statement, as follows:

- Opening balance;
- Closing balance;



- Description of each service and/or service category for which the reserve fund was established (including a list of services within a service category);
- Transactions for the year (e.g., collections, draws) including each asset's capital costs to be funded from the D.C. reserve fund and the manner for funding the capital costs not funded under the D.C. by-laws (i.e., non-D.C. recoverable cost share and post-period D.C. recoverable cost share);
- For projects financed by D.C.s, the amount spent on the project from the D.C. reserve fund and the amount and source of any other monies spent on the project;
- Amounts borrowed, purpose of the borrowing, and interest accrued during the previous year;
- Amount and source of money used by the municipality to repay municipal obligations to the D.C. reserve fund;
- A list of credits by service or service category (outstanding at the beginning of the year, given in the year, and outstanding at the end of the year by the holder);
- For credits granted under section 14 of the previous D.C.A., a schedule identifying the value of credits recognized by the municipality, the service to which it applies and the source of funding used to finance the credit; and
- A statement as to compliance with subsection 59 (1) of the D.C.A., whereby the municipality shall not impose, directly or indirectly, a charge related to a development or a requirement to construct a service related to a development, except as permitted by the D.C.A. or another Act.

Recent changes arising from Bill 109 (*More Homes for Everyone Act, 2022*) provide that the Council shall make the statement available to the public by posting the statement on the website or, if there is no such website, in the municipal office. In addition, Bill 109 introduced the following requirements which shall be included in the Treasurer's statement:

- For each service for which a D.C. is collected during the year:
 - i. whether, as of the end of the year, the municipality expects to incur the amount of capital costs that were estimated, in the relevant D.C. background study, to be incurred during the term of the applicable D.C. by-laws, and
 - ii. if the answer to subparagraph i is no, the amount the municipality now expects to incur and a statement as to why this amount is expected;



- For any service for which a D.C. was collected during the year but in respect of which no money from a reserve fund was spent during the year, a statement as to why there was no spending during the year.

Additionally, as per subsection 35 (3) of the D.C.A.:

35 (3) If a service is prescribed for the purposes of this subsection, beginning in the first calendar year that commences after the service is prescribed and in each calendar year thereafter, a municipality shall spend or allocate at least 60 per cent of the monies that are in a reserve fund for the prescribed service at the beginning of the year.

The services currently prescribed are water and wastewater, and services related to a highway. Therefore, as of 2023, a municipality shall spend or allocate at least 60 percent of the monies in the reserve fund at the beginning of the year. There are generally two ways in which a municipality may approach this requirement.

1. Include a schedule as part of the annual Treasurer's statement; or
2. Incorporate the information into the annual budgeting process.

Based upon the above, Figure D-1 and Attachments 1 and 2, set out the format for which annual reporting to Council should be provided. Figure D-4 provides the schedule for allocating reserve fund balances to projects.

D.2 D.C. Reserve Fund Application

Section 35 of the D.C.A. states that:

“The money in a reserve fund established for a service may be spent only for capital costs determined under paragraphs 2 to 7 of subsection 5 (1).”

This provision clearly establishes that reserve funds collected for a specific service are only to be used for that service, or to be used as a source of interim financing of capital undertakings for which a D.C. may be spent.



Figure D-1
City of Hamilton
Annual Treasurer's Statement of Development Charge Reserve Funds

Description	Services to which the Development Charge Relates								
	Services Related to a Highway	Public Works (Facilities and Fleet)	Water Services	Wastewater Facilities	Stormwater - Combined Sewer System	Stormwater - Separated Sewer System	Policing Services	Fire Protection Services	Transit Services
Opening Balance, January 1, _____									
Plus:									
Development Charge Collections									
Accrued Interest									
Repayment of Monies Borrowed from Fund and Associated Interest ¹									
Sub-Total	0	0	0	0	0	0	0	0	0
Less:									
Amount Transferred to Capital (or Other) Funds ²									
Amounts Refunded									
Amounts Loaned to Other D.C. Service Category for Interim Financing Credits ³									
Sub-Total	0	0	0	0	0	0	0	0	0
Closing Balance, December 31, _____	0	0	0	0	0	0	0	0	0

¹ Source of funds used to repay the D.C. reserve fund

² See Attachment 1 for details

³ See Attachment 2 for details

The Municipality is compliant with s.s. 59.1 (1) of the *Development Charges Act*, whereby charges are not directly or indirectly imposed on development nor has a requirement to construct a service related to development been imposed, except as permitted by the *Development Charges Act* or another Act.



Figure D-1 (Cont'd)

Description	Services to which the Development Charge Relates								Total
	Parks and Recreation	Library Services	Long-term Care Services	Child Care and Early Years Programs	Provincial Offences Act including By-Law Enforcement	Public Health Services	Ambulance	Waste Diversion	
Opening Balance, January 1, _____									0
Plus:									
Development Charge Collections									0
Accrued Interest									0
Repayment of Monies Borrowed from Fund and Associated Interest ¹									0
Sub-Total	0	0	0	0	0	0	0	0	0
Less:									
Amount Transferred to Capital (or Other) Funds ²									0
Amounts Refunded									0
Amounts Loaned to Other D.C. Service Category for Interim Financing									0
Credits ³									0
Sub-Total	0	0	0	0	0	0	0	0	0
Closing Balance, December 31, _____	0	0	0	0	0	0	0	0	0

¹ Source of funds used to repay the D.C. reserve fund

² See Attachment 1 for details

³ See Attachment 2 for details

The Municipality is compliant with s.s. 59.1 (1) of the *Development Charges Act*, whereby charges are not directly or indirectly imposed on development nor has a requirement to construct a service related to development been imposed, except as permitted by the *Development Charges Act* or another Act.



Figure D-2a
City of Hamilton
Attachment 1
Annual Treasurer's Statement of Development Charge Reserve Funds
Amount Transferred to Capital (or Other) Funds – Capital Fund Transactions

Capital Fund Transactions	Gross Capital Cost	D.C. Recoverable Cost Share					Non-D.C. Recoverable Cost Share				
		D.C. Forecast Period			Post D.C. Forecast Period		Other Reserve/Reserve Fund Draws	Tax Supported Operating Fund Contributions	Rate Supported Operating Fund Contributions	Debt Financing	Grants, Subsidies Other Contributions
		D.C. Reserve Fund Draw	D.C. Debt Financing	Grants, Subsidies Other Contributions	Post-Period Benefit/ Capacity Interim Financing	Grants, Subsidies Other Contributions					
Services Related to a Highway											
Capital Cost A											
Capital Cost B											
Capital Cost C											
Sub-Total - Services Related to Highways	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Water Services											
Capital Cost D											
Capital Cost E											
Capital Cost F											
Sub-Total - Water	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Wastewater Facilities											
Capital Cost G											
Capital Cost H											
Capital Cost I											
Sub-Total - Wastewater	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0



Figure D-2b
City of Hamilton
Attachment 1
Annual Treasurer's Statement of Development Charge Reserve Funds
Amount Transferred to Capital (or Other) Funds – Operating Fund Transactions

Operating Fund Transactions	Annual Debt Repayment Amount	Amount Transferred to Operating (or Other) Funds - Operating Fund Transactions								
		D.C. Reserve Fund Draw		Post D.C. Forecast Period			Non-D.C. Recoverable Cost Share			
		Principal	Interest	Principal	Interest	Source	Principal	Interest	Source	
<u>Services Related to a Highway</u>										
Capital Cost J										
Capital Cost K										
Capital Cost L										
Sub-Total - Services Related to a Highway	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
<u>Water Services</u>										
Capital Cost M										
Capital Cost N										
Capital Cost O										
Sub-Total - Water	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
<u>Wastewater Facilities</u>										
Capital Cost P										
Capital Cost Q										
Capital Cost R										
Sub-Total - Wastewater	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0



Figure D-3
City of Hamilton
Attachment 2
Annual Treasurer's Statement of Development Charge Reserve Funds
Statement of Credit Holder Transactions

Credit Holder	Applicable D.C. Reserve Fund	Credit Balance Outstanding Beginning of Year _____	Additional Credits Granted During Year	Credits Used by Holder During Year	Credit Balance Outstanding End of Year _____
Credit Holder A					
Credit Holder B					
Credit Holder C					
Credit Holder D					
Credit Holder E					
Credit Holder F					



Figure D-4
City of Hamilton
Annual Treasurer's Statement of Development Charge Reserve Funds
Statement of Reserve Fund Balance Allocations

Service:	Water
Balance in Reserve Fund at Beginning of Year:	
60% of Balance to be Allocated (at a minimum):	

Projects to Which Funds Will be Allocated

Project Description	Project Number	Total Growth-related Capital Cost Remaining to be Funded	Share of Growth-related Cost Allocated to Date	Share of Growth-related Cost Allocated - Current Year
Total		\$0	\$0	\$0

Service:	Wastewater
Balance in Reserve Fund at Beginning of Year:	
60% of Balance to be Allocated (at a minimum):	

Projects to Which Funds Will be Allocated

Project Description	Project Number	Total Growth-related Capital Cost Remaining to be Funded	Share of Growth-related Cost Allocated to Date	Share of Growth-related Cost Allocated - Current Year
Total		\$0	\$0	\$0

Service:	Services Related to a Highway
Balance in Reserve Fund at Beginning of Year:	
60% of Balance to be Allocated (at a minimum):	

Projects to Which Funds Will be Allocated

Project Description	Project Number	Total Growth-related Capital Cost Remaining to be Funded	Share of Growth-related Cost Allocated to Date	Share of Growth-related Cost Allocated - Current Year
Total		\$0	\$0	\$0



Appendix E

Local Service Policy



Appendix E: Local Service Policy

Introduction

Definitions:

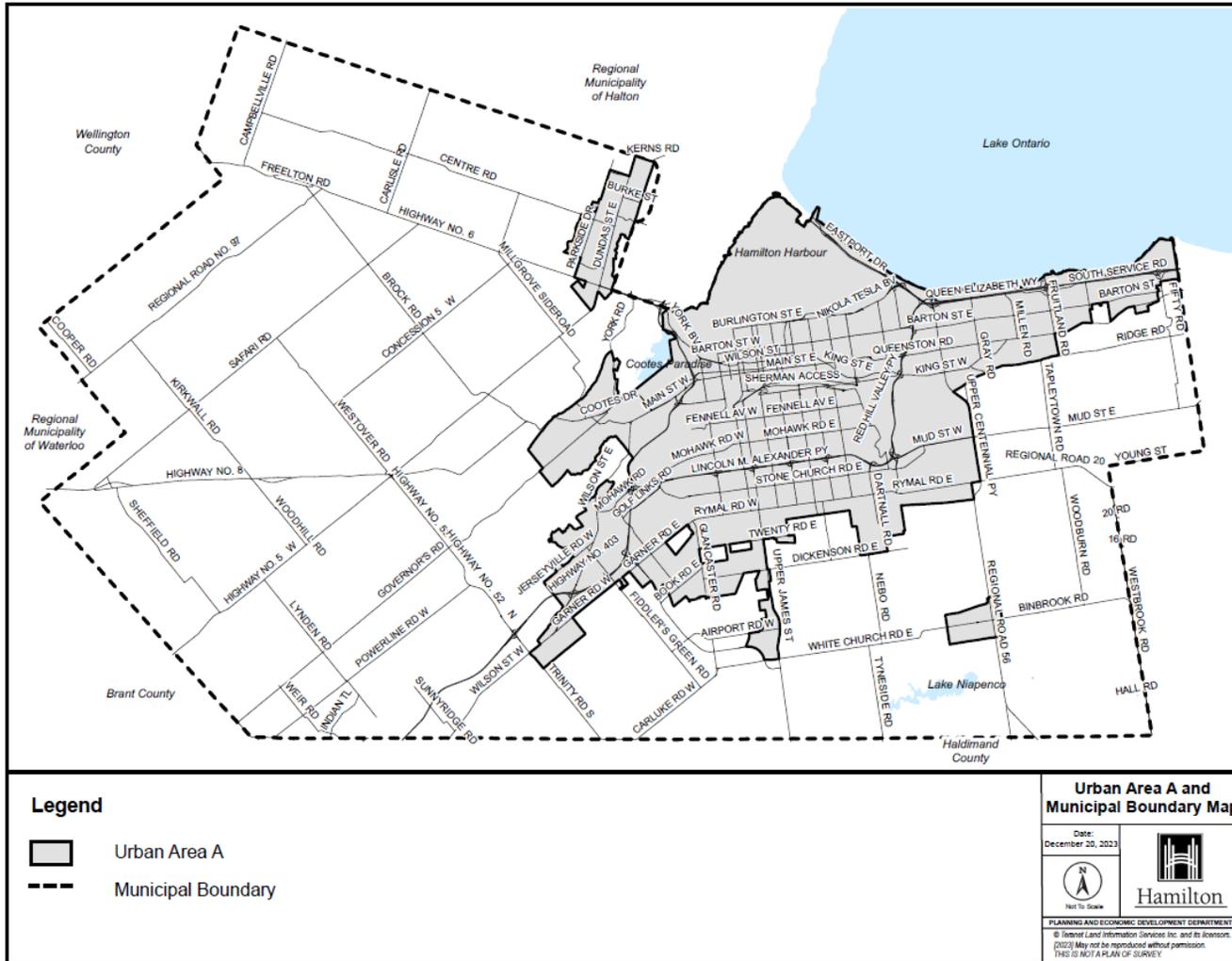
“Urban Area” means the area within the City that is identified as the urban area in Schedule E of the Urban Hamilton Official Plan, as amended.

“Urban Area A” means the lands within the Urban Area, identified in Map E-1 and which are not subject to any expansion resulting from an amendment to the urban boundary in the Urban Hamilton Official Plan.

“Urban Area B” means any lands added to the Urban Area as a result of any amendment to the Urban Hamilton Official Plan expanding the Urban area beyond Urban Area A.



Map E-1 Map of Urban Area A and Municipal Boundary





For development within Urban Area A, the local service policy set out herein would apply.

For development within Urban Area B, the following would be a direct developer responsibility:

- All costs required to service the development and/or to connect the development area with existing infrastructure, including without limitation all water, wastewater, stormwater, transit, transportation works (in accordance with the Complete Street definition), any utility relocation/conversion costs, and land acquisition costs to meet City standards will be a developer responsibility, unless otherwise provided herein.
- In conjunction with the above bullet, the scope to service the development and/or connect the development area would be identified within approval authority accepted studies to support development areas.
- For projects occurring within Urban Area A, with an oversizing component, that are required to service development within Urban Area B, the oversizing component is a direct developer responsibility.
- Downstream and/or upstream water and wastewater infrastructure located within Urban Area A required to support development within Urban Area B would be a direct developer responsibility.
- Section E.3 of the local service policy applies to development within Urban Area B.

Based on the above, and to be clear, developments occurring within Urban Area B will be required to pay the City-wide development charges (D.C.s) for all services except for stormwater, water linear, and wastewater linear.

If the development within Urban Area B will be serviced with municipal water and/or wastewater, the water and/or wastewater treatment D.C. will apply. If the development within Urban Area B will not be serviced with municipal water or wastewater, the water or wastewater treatment D.C. will not apply, as set out in Table E-1.



Table E-1

Service	Inside Urban Area A	Within Urban Area B – Connecting to Municipal Water/Wastewater*	Within Urban Area B – Not Connecting to Municipal Water/Wastewater
Services Related to a Highway	✓	✓	✓
Public Works	✓	✓	✓
Transit Services	✓	✓	✓
Fire Protection Services	✓	✓	✓
Policing Services	✓	✓	✓
Parks and Recreation	✓	✓	✓
Library Services	✓	✓	✓
Long-Term Care Services	✓	✓	✓
Child Care and Early Years Programs	✓	✓	✓
Provincial Offences Act Services including By-law Enforcement	✓	✓	✓
Public Health Services	✓	✓	✓
Ambulance	✓	✓	✓
Waste Diversion	✓	✓	✓
Wastewater Facilities	✓	✓	
Wastewater Linear Services	✓		
Water Supply and Treatment	✓	✓	
Water Linear Services	✓		
Stormwater Services	✓		



* Certain projects may be oversized for developments within Urban Area B and may need to be directly funded by the developer as set out in the local service policy.

E.1 Local Service Policy for Stormwater Drainage Systems

Stormwater runoff “minor” systems are designed and implemented to accommodate drainage to avoid property damage and flooding and to minimize inconvenience to the public from 1-in-5-year rainfall events. Minor systems typically comprise underground piping, maintenance holes, catch basins, and outfall structures in addition to a rural type of drainage system consisting of ditches and culverts.

Stormwater runoff “major” systems are designed and implemented for flood control to avoid loss of life, injuries, and significant damage to property from events greater than a 1-in-5-year return period, producing unusual high-intensity rainfall and/or a large volume of run-off. Major systems can be large diameter underground piping, open channels, road overland flow route, stormwater facilities, natural streams, or any combination thereof, capable of conveying run-off, from events up to and including a 1-in-100-year return period, to the ultimate receiving stream or water body.

In addition to the City’s Major/Minor systems there are also class of works related to source water management and use of natural systems. These have been articulated in the City’s Green Standards and Guidelines (2023). The definitions of these practices per the Green Standards and Guidelines are as follows:

Low Impact Development (LID):

- Stormwater management approach that seeks to manage precipitation at source through better site design and use of LID practices.
- Typically includes a suite of site design strategies to mimic the area’s natural hydrology through stormwater infiltration, evapotranspiration, rainwater harvesting, filtration, and detention.
- LID practices can include those such as bio-swales, permeable pavement, rain gardens, green roofs, and exfiltration systems, etc. LID practices often employ vegetation and soil in their design, however not always, and the specific form may vary considering local conditions and community character.



Green Infrastructure (GI):

- Natural and human-made elements that provide ecological and hydrological functions and processes. GI can include components such as natural heritage features and systems, parklands, stormwater management systems, street trees, urban forests, natural channels, permeable surfaces, and green roofs.

Natural Infrastructure/Assets:

- The term “natural infrastructure” refers to naturally occurring landscape features and/or nature-based solutions that promote, use, restore or emulate natural ecological processes.

In summary, LID practices are human-made measures to off-set the impacts of development, while Natural infrastructure considers the water management services provided by natural features or nature-based solutions. Green Infrastructure considers both concepts and embodies these into a more holistic term.

The following should be read in conjunction with the City's Comprehensive Development Guidelines and Financial Policies and Storm Drainage Policy, as amended.

E.1.1 Storm Sewers

1. The developer is responsible for the full cost of all storm sewer mains up to and including 1,200 mm diameter in size (the local service component).
2. Storm sewers larger than 1,200 mm diameter in size are considered trunk sewers for the purposes of oversizing and are eligible for D.C. contribution-based flat rates outlined in the City's Financial Policies for Development.

Storm sewer sizing to be designed to City standard criteria for minimum velocity (0.8 m/s) and slope (0.2 %), to convey the 5-year event assuming a 5-year downstream boundary water level, without surcharging. Elliptical pipes are to be converted to equivalent circular diameter for oversizing calculation. Oversizing as a result of lower than standard velocity/slope/hydraulic grade line due to site design conditions is the responsibility of the local development and is not D.C.



eligible (excluding industrial lands as per the City's *Comprehensive Development Guidelines and Financial Policies Manual*).

3. Storm sewers conveying an event larger than a 5-year return period (i.e., major system flows) are not eligible for D.C. contributions unless required to do so by the City. In some areas, a storm sewer system may not be viable, and the major overland system may not be able to safely convey the runoff resulting from a 1-in-100-year design storm event. In this case a relief sewer or alternate conveyance mechanism may provide the additional capacity required and be funded through D.C.s.
4. The construction of storm sewers deemed to be temporary are not eligible for D.C. contributions.
5. Installation of private drain connections or private systems is considered a local service component and is the developer's responsibility.
6. The construction of on-site open watercourse and overland flow routes for conveyance internal to a development is considered a local service component and is not eligible for D.C. contributions. The construction of downstream off-site outlets to service more than one development, including open watercourses and/or culverts and storm sewers, identified through the City's Stormwater Master Plan, a Master Plan, a Master Drainage Plan, a Watershed/Subwatershed Study or a Block Plan or Neighbourhood Plan, has been included in the D.C. Background Study and is eligible for D.C. contributions.

E.1.2 Stormwater Management Facilities

1. Stormwater Management Facilities (S.W.M.) in Series: If the stormwater management plan for local development involves two or more S.W.M. facilities in series, conveyance of the controlled 100-year peak flow between facilities in series is not D.C. eligible for oversizing (the connecting works are not considered to be part of the S.W.M. facility and outlet structure and appurtenances). If, however, local five-year flows are added to the storm sewer between the facilities in series, then the potential oversizing (compared to the sewer without any local inflow) is D.C. eligible.



2. Centralized stormwater management facilities (e.g., wet ponds and dry ponds) identified through the City's Stormwater Master Plan, a Master Plan, a Master Drainage Plan, or a Watershed/Subwatershed Study have been included in the D.C. Background Study and are eligible for D.C. contributions.
3. A stormwater management facility not identified in an approved City Stormwater Master Plan, a Master Plan, a Master Drainage Plan, or a Watershed/Subwatershed Study is deemed a local service. Notwithstanding this, an unidentified stormwater management facility may be eligible for D.C. contributions provided it can be demonstrated that it is a centralized public facility servicing a catchment area through an approved neighbourhood stormwater study.
4. Stormwater quality treatment by mechanical means (i.e., oil/grit separators) is not eligible for D.C. contributions.
5. LID practices and GI are not eligible for D.C. contributions.
6. Stormwater management facilities serving only non-residential areas (i.e., industrial, commercial, institutional) are not eligible for D.C. contributions.
7. For stormwater facilities which benefit both residential and non-residential lands, only the residential portion will be eligible for D.C. contributions. The portion servicing the non-residential land uses shall be the financial responsibility of the developer.
8. Where a centralized (communal) facility serves both residential and non-residential parcels, the cost is established based on the ratio of the areas served and factored by the respective runoff coefficients. Note that the non-residential area, if commercial, may also be required to provide lot-level quality controls, depending on location; however, this component (LID and/or GI) would not be eligible for D.C. contributions.
9. The construction of stormwater facilities deemed by the City to be temporary as part of the phasing of development is not eligible for D.C. contributions. Such a facility may be considered for D.C. contribution in the future if it is subsequently



determined to be a permanent municipal facility forming part of the City's centralized system.

10. The developer is responsible to acquire lands for stormwater management facilities External to a Development. The City will not act as a third-party agent in the negotiation and acquisition of lands for stormwater management facilities on behalf of private interest, unless otherwise approved by Council.
11. Oversizing – Downstream Constraints: If local development improves an existing downstream constraint to conveyance, e.g., mitigation or removal of historically observed/recorded surface or subsurface flooding due to inadequate capacity of existing culverts and/or sewers downstream, then a portion of this work may be D.C. eligible subject to a detailed study that the developer shall provide at their cost.
12. 100-Year Control: City policy dictates that the controlled 100-year outlet flow from a stormwater management facility is required to be conveyed in an enclosure to the development outlet, and potentially also beyond the development limit, to the receiving watercourse. This is considered by the City to be part of the outlet works, which are the responsibility of the development. (Note: current City practice is to request the development to enclose the 100-year peak flow between the S.W.M. block and the outlet, and not spill onto City roads). If the S.W.M. facility outlet pipe size exceeds 1,200 mm in diameter to convey the controlled 5-year flow, then there may be a City share in accordance with the oversizing policy.
13. Rural Settlement Areas (R.S.A.): For Rural Settlement Areas, and other areas outside the Urban Boundary, the stormwater management system is deemed a local service component, and stormwater management infrastructure is not eligible for D.C. contributions.
14. Airport Employment Growth District (A.E.G.D.) lands:
 - The neighbourhood dry ponds serving roads with 26 m or greater right-of-way (R.O.W.), are partially D.C. eligible on account of also controlling runoff from subject public roads. The City estimates the share to be 5% of the total area



- of road R.O.W. contributing. Notwithstanding, non-residential stormwater management facilities are currently excluded from the City stormwater D.C.
15. City Standard: Proposed stormwater management facilities not to serve drainage areas exceeding 40 ha (based on limits associated with overland runoff conveyance in road R.O.W.s).
 16. Public Roads/Single Applicants: In the case of a public road draining to a non-centralized facility under single applicant, the developer would construct the stormwater management facility, and the City assumes and maintains the facility; notwithstanding this, it would not be D.C. eligible.
 17. Underground Tanks: Underground storage tanks are not D.C. eligible.
 18. Mixed Use Buildings: In mixed use buildings, where the residential square foot area is equal to or more than the non-residential area, the facility is assigned to the residential section of the D.C.
 19. Commercial Lands: When a commercial parcel or parcels is nested within a predominantly residential area, and serviced by a residential S.W.M. facility, the commercial parcels are required to manage their own runoff (i.e., quality control) and are assigned a zero share of the centralized/communal quantity control volume.

E.1.3 Land for Stormwater Management Facilities

1. Calculation of Land Area: The footprint (area of land) for stormwater management facilities in the D.C. Background Study is the larger of the footprint required by:
 - a. 6% of the drainage area for a wet pond (quality and quantity) facility; or
 - b. 4% of the total contributing drainage area for a dry pond (quantity only) facility or a footprint area determined by a supporting study. An exception to this is lands within the Fruitland-Winona Secondary Plan (i.e., Stoney Creek Urban Boundary Expansion (S.C.U.B.E.)) where 10% of the drainage area was used to establish the footprint.



2. Valuation of Land: The value of land for stormwater management facilities in the D.C. Background Study have been established as follows:
 - a. Land designated in the Official Plan for development in Ancaster and Waterdown – \$1,074,300/acre (\$2,654,600/ha);
 - b. Land designated in the Official Plan for development in Hamilton, Stoney Creek, Dundas, Glanbrook – \$953,900/acre (\$2,357,100/ha);
 - c. Land located outside the Urban Boundary shall be based on Open Space value established by an independent real estate appraisal to be obtained at the cost of the developer.
3. D.C. contributions allocated to land costs for stormwater management facilities shall be limited to lands within an approved block net of any identified setbacks and buffers (e.g., Ministry of Transportation (M.T.O.), the City's Natural Heritage System).
4. Land Footprint Contingency: Land cost will be based on actual stormwater management footprint size at the established land value as outlined in Clause 1.3.2. The Land Footprint Contingency will be used to compensate for facilities with a footprint size larger than identified on the individual project.
5. Engineering fees are not eligible for D.C. contributions for land acquisition costs.
6. Tailwater Impacts on Land: If local downstream grades beyond the development limits create tailwater conditions at a S.W.M. facility outlet (e.g., flat topography), the land area requirements to achieve the required stormwater volumes will be more and, therefore, will increase the cost of the facility above the average cost for a facility using the unitary relationships. Detailed studies are required to identify potential candidate facilities to which this condition applies, in order to be able to include this higher cost in the D.C. In the absence of studies, the City has estimated that S.W.M. facilities for which this is potentially a condition, and for sizing allocated 10% of the contributing drainage area (e.g., S.C.U.B.E. facilities) versus 6% per the current standard size.
7. Land costs are adjusted annually for inflation using the Statistics Canada Quarterly, Non-Residential Construction Price Index (Table 18-10-0135-01) for



the most recent year-over-year period as set out in the *Development Charges Act, 1997* (D.C.A.) and reviewed with every D.C. study.

E.1.4 Capital Costs of Stormwater Management Facilities

1. Capital costs assigned to the individual projects are based on \$112/m³ of total volume for the first 6,500 m³, and \$56/m³ of total volume for the balance of storage volume in excess of 6,500 m³. The costs are adjusted annually for inflation using the Statistics Canada Quarterly, Non-Residential Construction Price Index (Table 18-10-0135-01) for the most recent year-over-year period as set out in the D.C.A. and reviewed with every D.C. study.
2. Bedrock Impacts: If local conditions dictate that part of a facility excavation is required to be in rock, this will increase the cost of the facility above the average cost for a facility. An allowance has been made to increase the unit cost for rock excavation for these facilities, based on actual costs, up to a maximum of \$112/m³.
3. Frontage Calculation: Facility frontage calculation has been updated using historical actual costs. Pond frontage costs will be limited to a maximum of 120 m at \$2,090/m (aboveground and underground works).
4. Capital costs will be paid based on tendered prices in accordance with the City's Financial Policies, to an upset limit established based on the required total storage at the unit cost as outlined in Clause E.1.4.1.
5. Stormwater Management features eligible for D.C. contribution include the following:
 - a. Erosion and Sediment control;
 - b. Excavation (excludes cost to haul surplus material off site and/or placement and compaction of surplus material within subdivision);
 - c. Fine grading;
 - d. Decanting areas;
 - e. Forebay structures, pond liner, cooling trenches, equalization pipes etc.;



- f. Outlet control structures within the facility block excluding the headwall;
 - g. Inlet control structures (e.g., flow splitter maintenance hole and headwall) excluding the inlet conveyance pipe upstream of the forebay headwall and main cell;
 - h. Emergency spillways;
 - i. Maintenance access roads;
 - j. Landscaping and pond signage; and
 - k. Bollards
6. Engineering fees (design engineering and soft costs) to a maximum of 10% and construction costs are included in the capital cost assigned to individual projects in the D.C. Background Study.
 7. Performance monitoring or development impact monitoring of S.W.M. facilities are not eligible for D.C. contributions.
 8. Facility Volume Contingency: Eligible capital cost will be based on the required total storage volume at the established capital cost rate as outlined in Clause E1.4.1. The Facility Volume Contingency will be used to compensate for facilities larger in size than identified on the individual project.
 9. Stormwater management facilities eligible for D.C. contributions must be publicly tendered in accordance with the City's Financial Policies for Development.
 10. D.C. contribution for land value and capital cost are independent.

E.1.5 Culverts and Bridges

1. Culverts and Bridges (as related to road infrastructure): The responsibility for the cost of stormwater conveyance infrastructure associated with road infrastructure, as part of new development or redevelopment, is to be determined as follows:
 - a. The costs of stormwater infrastructure items (excluding land) shall be direct developer responsibilities as a local service for:



- i. all crossings (new or extended or replacement) up to the 20 m local cross-section width for roads that are required to service the development.
- b. The costs of stormwater infrastructure items shall be eligible for inclusion in a stormwater D.C. for:
 - i. new crossings (e.g. culverts/bridges) for roads greater than 20 m, where the D.C.-eligible portion is the fraction calculated by the length in excess of the width of 13.0 m (defined by the standard 8.0 m width of pavement, plus 2 x 0.5 m curbs, and plus 2 x 2.0 m sidewalks required for a local road), divided by the total length (i.e., the City cost share is 13 m divided by the total length of the proposed crossing in m).
 - ii. Extensions to culverts/bridges for road R.O.W.s greater than a 20 m R.O.W., and length of crossings greater than 13 m, 100% D.C. eligible.



Summary of D.C. Eligibility for Culverts/Bridges

Road Type	Road Right-of-Way Width	Culvert/Bridges ^[1]	Oversizing of Storm Sewers and Ditches for Conveyance and/or Treatment (A.E.G.D.) ^[2]	Contributing to Neighbourhood S.W.M. (A.E.G.D.)	Existing Culvert/Bridge Upgrades to meet City Design Standards ^[3]
Urban Local	20 m				
Urban Collector	26 m	Length greater than 13 m is D.C. eligible, costed as a fraction of the total length	In A.E.G.D., a 26 m road is 100% developer responsibility; not D.C. eligible	Not D.C. eligible	A portion is D.C. eligible
Urban Arterial Minor	32 m	Length greater than 13 m is D.C. eligible, costed as a fraction of the total length	Subject to study, oversizing of stormwater conveyance elements greater than 26 m may be D.C. eligible	5% of road R.O.W. assumed to contribute to facility, D.C. eligible	A portion is D.C. eligible
Urban Arterial Major	40 m	Length greater than 13 m is D.C. eligible, costed as a fraction of the total length	Subject to study, oversizing of stormwater conveyance elements greater than 26 m may be D.C. eligible	5% of road R.O.W. assumed to contribute to facility, D.C. eligible	A portion is D.C. eligible



Road Type	Road Right-of-Way Width	Culvert/Bridges ^[1]	Oversizing of Storm Sewers and Ditches for Conveyance and/or Treatment (A.E.G.D.) ^[2]	Contributing to Neighbourhood S.W.M. (A.E.G.D.)	Existing Culvert/Bridge Upgrades to meet City Design Standards ^[3]
Rural Local	20 m	N/A			A portion is D.C. eligible
Rural Collector	20 m	N/A			A portion is D.C. eligible
Road Widening for Development	varies				Extensions to existing culverts bridges beyond the minimum 13 m length are D.C. eligible

Notes:

^[1] slopes on culvert ends are assumed common for urban roads hence the weighting is proposed to use pavement/curb/sidewalk width only.

^[2] For A.E.G.D. only, road-specific Low Impact Development (LID) Best Management Practices will require an update to City Standards. Notwithstanding this, non-residential stormwater management facilities are currently exempted from the City's stormwater D.C.

^[3] Existing culvert/bridge upgrades will be subject to study to determine remaining service life of existing culvert/bridge and D.C. eligible portion.



E.1.6 Watercourses

1. Watercourses: Local development is responsible for any watercourse realignment and/or enclosures within its development limits. Local development is responsible for conveyance of upstream external flows through its development. Watercourse works to accommodate runoff from the development, external to the development, identified in City Master Drainage Plans and/or other related studies are D.C. eligible, proportionate to growth serviced by the watercourse.
2. Watercourse Enclosures: Watercourses enclosed by the development are not subsequently eligible for storm sewer oversizing under the D.C.

E.1.7 Combined Sewer Watershed

1. Current City practice is to control the future land use 100-year peak flow to pre-development land use 2-year levels, and required storage is the responsibility of development and not D.C. eligible. Potential for D.C.-eligible projects has been added as provisional items. Future studies will define locations for these provisional items.
2. New stormwater outlets potentially created through studies will be D.C. eligible where new development may be serviced by new separate storm sewers and a new suitable outlet. Stormwater costs will be shared 50/50 between the City (existing) and new development. The City will identify candidate locations subject to future study.

E.1.8 Miscellaneous

1. Off-site System Monitoring (holistic):
 - Local monitoring of stormwater infrastructure built within the local development is the responsibility of the local developer. In addition, any off-site system monitoring required by a specific development as a condition of Site Plan/Draft Plan Approval is the responsibility of the local developer.
 - Holistic monitoring of more than one development (i.e., typically based on guidance/recommendations in a Secondary Plan or Tertiary Plan Area) is D.C. eligible (included in list of D.C.-eligible studies) and is currently proposed



as a minimum for Greenville, S.C.U.B.E., and the A.E.G.D. lands. Estimated costs for a seven- to 10-year duration of multi-disciplinary monitoring is \$2 M per study area, based on recent similar studies in the Greater Golden Horseshoe area.

E.2 Local Service Policy for Water and Wastewater

Utilizing the City's development assumptions, the water and wastewater infrastructure required to service these areas was identified. To determine if a project is a D.C.-related project, the following two categories were considered:

Category 1 – Projects External to Proposed Development Lands (i.e., on existing road allowance and servicing more than one development)

The following project descriptions fall into Category 1 and will be fully or partially allocated to D.C.s:

- New infrastructure or upgrades to existing City infrastructure required to service more than one potential proposed development and/or development property, whether in a Greenfield area or Intensification area. This includes upgrades to infrastructure that is upstream (water) or downstream (wastewater) of multiple developments.
 - If an upgrade is triggered by growth (single or multiple potential development) and that planned growth is less than or equal to the approved Traffic Survey Zone growth, the upgrade will be all or partially allocated to D.C.s.
 - In the case that a development plans to have more growth than is planned for (by approved Traffic Survey Zones and system capacity) and if the infrastructure upgrade is as a result of growth over and above what is approved, that additional oversizing shall be the responsibility of the developer (direct developer).
 - This may include watermains for transmission, distribution and looping.
- New projects that physically lie outside of a proposed development, but only service a single development, can be considered to be part of **Category 2**. For example, a new sewer on an existing road right of way (external to development)



to service a new building on land not already serviced, with no additional developments potentially draining to the new sewer.

- Local cost recoveries will be made on a site-specific basis based on frontage and/or drainage area.

Category 2 – Projects Within Proposed Development Lands – The following project descriptions fall into Category 2:

- Water and sewer infrastructure that is required to directly service the proposed development lands.
- Water and sewer infrastructure that is required to directly service the proposed development lands *and* potentially “oversized” in consideration (capacity, looping or fire protection) of additional proposed developable lands that are normally serviced via proposed development property.

In regard to Category 2 projects, the developer is required to pay for the full cost of the installation of sanitary sewers and watermains up to and including the sizes listed below. This is described as the Direct Developer Contribution. The minimum sizes are provided from the City’s Development Policies:

Sanitary Sewer 450 mm diameter

Watermain 300 mm diameter

Facilities (Water Pumping Station, Water Reservoir or Elevated Tank, Wastewater Pumping Station)

- No minimum size/capacity.
- Facilities to service single proposed development lands will be Direct Developer Contribution.
- Facilities servicing multiple developments/service areas will be allocated to D.C. categories only (D.C., Benefit to Existing and Post Period Benefit).

Water Treatment/Wastewater Treatment – Treatment upgrades to be included in D.C. categories only (D.C., Benefit to Existing and Post Period Benefit).

Should the size of the local infrastructure be required to be greater than the minimum local servicing sizes (i.e., to support external development), D.C. contributions shall be



made. The City shall contribute, through the D.C. fund, towards the cost to install the infrastructure on a “Flat Rate” basis. “Flat Rate” is defined as the cost difference between the size required for external development and the minimum size, noted above in the City’s Development Policies.

Projects identified are sized based on the City’s engineering guidelines for design and to accommodate the future population and employment demand/flow within the proposed drainage/service areas.

The D.C. capital program identified in this document demonstrates the calculated cost splits on a project-by-project basis.

E.2.1 Funding for Municipal Extensions

In cases where a new watermain or sewer is installed by a developer that benefits and enables a new connection to an existing, unserviced property, a flat rate contribution is made back to the developer. Additional details of this funding methodology related to Direct Developer (or “Developer Initiated”) projects including projects external to the development lands are found in the 2007 City Report:

TOE02005b/FCS02026b/PED07248 - Funding Methodology for Municipal Infrastructure Extensions Review and Update

<http://www2.hamilton.ca/NR/rdonlyres/2913680C-68EA-4B5A-A288-0CAA23F6165A/0/Sep17TOE02005b.pdf>

E.2.2 Capacity Allocation

As growth and re-development progresses over time, the City requires a means to determine the amount of spare capacity within the water distribution and wastewater collection systems that are to be allocated to any potential development application. Additionally, the City must also determine a reasonable period of time in which this allocated capacity is to be made available prior to development.

The capacity will be allocated to projects in the order in which the Construction Plans are approved. In the event that multiple projects are approved at the same time, the identification, selection and prioritization of the project given in the City’s Infrastructure Staging of Development Program will prevail.



This policy is intended to be used as a guide for conveyance only (not treatment) and is subject to review and update by the City moving forward.

E.2.3 Co-ordinated Projects with Transportation Requirements

Water and wastewater projects external to proposed development lands (i.e., on existing road allowances and/or existing roads) that fall into Category 1 and that are initiated as a result of identified transportation requirements are eligible for inclusion in the D.C. at the same D.C.-eligible percentage as the associated road.

Service connections (water and/or wastewater connections – public portion) will be constructed to each land parcel when an existing dwelling unit exists. Property owners that require more than one service connection will be required to pay for the cost of the additional service connections prior to construction. Benefitting property owners shall contribute towards the cost to install the infrastructure on a “flat rate” basis. The “flat rate” will be established by the City at the beginning of each year.

E.3 Local Service Policy for Parkland Development

The developer’s responsibilities related to parkland are generally described in Option 1 (sections 3.3 and 4.3) of the *Park and Open Space Development Guide*, latest version. Whether the developer chooses to develop under Option 1 or 2 of this guide is at the discretion of the developer and the City and requires entering into agreements as detailed in the *Park and Open Space Development Guide*. The direct developer responsibilities are the same regardless of which option is followed; the generality of the guide does not restrict the requirements as detailed in the local service policy below.

All parkland construction must adhere to the City of Hamilton’s *Construction and Material Specifications Manual*, latest edition. This includes but is not limited to all soil testing, soil compaction, asphalt, concrete, and granular requirements.

E.3.1 Recreational Trails

1. Recreational trails (trails, multi-use trails, pathways, sidewalks) that are external to development and that do not form part of the municipality’s active transportation network, and their associated infrastructure (landscaping, bridges, trail surface, etc.), are included in parkland D.C.s.



2. Recreational trails (trails, multi-use trails, pathways, sidewalks) that are internal to development and that do not form part of the municipality's active transportation network, and their associated infrastructure up to base condition, are a direct developer responsibility as a local service provision under section 59 of the D.C.A.
3. Recreational trails outside of road allowances, including granular base and surfacing are a direct developer responsibility as a local service provision under section 59 of the D.C.A. and include the following:
 - a. Recreational trails that are part of the City's Recreational Trails Master Plan which fall in the subdivision area, with materials as indicated in the Plan.
 - b. Recreational trails that are part of the City's Pipeline Trail Master Plan which fall in the subdivision area, with materials as indicated in the Plan.
 - c. Recreational trails around stormwater management ponds that may link to maintenance truck access or other trails/pathways to provide additional recreation opportunities for residents.
 - d. The base condition works for the open space areas that contain trails shall be the same as the works required for parkland in section 2.a).

E.3.2 Parks (City-Wide Parks, Community Parks, Neighbourhood Parks & Parkettes)

1. Park development to base condition is a direct developer responsibility as a local service provision under section 59 of the D.C.A. and includes the following:
 - a. Clearing and grubbing; tree removals as per the subdivision's tree preservation and removals plan.
 - b. Topsoil stripping, screening, and stockpiling.
 - c. Rough grading (pre-grading) to allow for positive drainage of the park, with minimum slopes of 2%. If necessary, this may include some minor drainage tile work and grading as per the overall subdivision grading design, complete with any required swales or catch basins. Runoff from



the development property shall not drain into the park unless approved by the Manager, Environment Services, Public Works.

- d. Spreading of topsoil to a 150 mm depth (import topsoil if existing on-site is insufficient to reach required depth).
 - e. Seeding of site with City-approved seed mix; maintenance of seed until acceptance by City.
 - f. Parks shall be free of any contaminated soil or subsoil.
 - g. Parks shall not be mined for fill.
 - h. Parks shall be conveyed free and clear of all encumbrances.
 - i. 100% of 1.5 m chain link perimeter fencing to the City standards to separate the development lands from the City lands or lands to be dedicated to the City, unless the perimeter fencing is on land that will be dedicated to the City to fulfil the requirement of parkland dedication under the *Planning Act*, in which case the cost shall be shared 50/50.
 - j. When park parcels cannot be developed in a timely manner, they shall be graded to ensure positive drainage and seeded to minimize erosion and dust. These shall be maintained by the developer until construction commences thereon.
 - k. The park block shall not be used for topsoil or other construction material, equipment storage, or sales pavilions.
 - l. Required heritage features within the park, as set out within the Planning approval conditions.
2. Sports facilities, creative play structures/equipment, sun shelters, multi-purpose courts, walkways, plantings, site furnishings, and other amenities (including associated utilities) within parks are included in the parkland D.C.s.
 3. Servicing stubs to parkland are not required under the local service policy for parkland; however, they are included in the transportation D.C.s and local service policy. All park-servicing calculations shall follow the criteria outlined in the City



of Hamilton's *Engineering Guidelines for Servicing Land under Development Applications*, latest edition (<https://d3fpllf1m7bbt3.cloudfront.net/sites/default/files/media/browser/2014-12-18/engineering-guidelines-servicing-land.pdf>).

4. Where parkland ownership is fragmented (one park block owned by multiple developers), only the final developer shall have the option to fully develop the park (i.e., Option 2 in the *Park and Open Space Development Guide* (<https://d3fpllf1m7bbt3.cloudfront.net/sites/default/files/media/browser/2014-12-18/park-open-space-development-guide.pdf>) will not be permitted by the City). All developers, however, will still be required to complete all direct developer responsibilities to base condition (i.e., Option 1 of the *Park and Open Space Development Guide* will be required for the park block fragment that they own).

E.3.3 Open Space (General Open Space & Natural Open Space)

General Open Space

1. General Open Space shall include golf courses, community gardens, picnic areas, beaches, remnant parcels of open space lands, and urban plazas, squares and core spaces. These areas do not function as parks but are used for both active and passive recreational activities.
2. General Open Space to base condition is a direct developer responsibility as a local service provision under section 59 of the D.C.A. and includes the following:
 - a. Clearing and grubbing; tree removals as per the subdivision's tree preservation and removals plan.
 - b. Topsoil stripping, screening, and stockpiling.
 - c. Rough grading (pre-grading) to allow for positive drainage of the General Open Space, with minimum slopes of 2%. If necessary, this may include some minor drainage tile work and grading as per the overall subdivision grading design, complete with any required swales or catch basins. Runoff from the development property shall not drain into the park unless approved by the Manager, Environment Services, Public Works.
 - d. Spreading of topsoil to 150 mm depth (import topsoil if existing on-site is insufficient to reach required depth).



- e. Seeding of site with City-approved seed mix; maintenance of seed until acceptance by City.
 - f. General Open Space shall be free of any contaminated soil or subsoil.
 - g. Parkland shall not be mined for engineering fill and replaced with fill or topsoil.
 - h. General Open Space shall be conveyed free and clear of all encumbrances.
 - i. 100% of 1.5 m chain-link perimeter fencing of General Open Space to the City standard located on the public property side of the property line as required by the City.
 - j. When General Open Space parcels cannot be developed in a timely manner, they shall be graded to ensure positive drainage and seeded to minimize erosion and dust. These shall be maintained by the developer until construction commences thereon.
 - k. The General Open Space block shall not be used for topsoil or other construction material, equipment storage, or sales pavilions.
 - l. Required heritage features within the General Open Space as set out within the Planning approval conditions.
3. Sun shelters, walkways, plantings, site furnishings, and other amenities (including associated utilities) within General Open Space are included in the parkland D.C.s.

Natural Open Space

- 1. Natural Open Space shall include lands with significant natural features and landscapes such as woodlots, hazard lands, forested slopes, creek/ravine corridors, the Niagara Escarpment, environmentally sensitive areas (of natural and scientific interest), and areas of wildlife habitat. These areas perform important biological and ecological functions and provide passive recreational opportunities.



2. Where Natural Open Space is to be left as existing in the plan of subdivision, Natural Open Space to base condition is a direct developer responsibility as a local service provision under section 59 of the D.C.A. and includes the following:
 - a. Ensure that the area is not damaged or removed, and that the space is kept free of construction debris and garbage during construction.
 - b. The Natural Open Space block shall not be used for topsoil or other construction material, equipment storage, or sales pavilions.
 - c. Required heritage features within the Natural Open Space as set out within the Planning approval conditions.
 - d. Where naturalization or restoration works are required, only native plants shall be utilized.
 - e. Where private lots back onto channels, 100% of 1.5 m chain-link perimeter fencing to the City standard shall be located on the public property side of the property line as required by the City.
3. For Natural Heritage Systems, refer to section E.4 of this local service policy.

E.4 Local Service Policy for Natural Heritage System (N.H.S.)

The City contains many natural areas and features that contribute to the municipality's beauty, unique character and quality of life. A systems approach has been used to develop a Natural Heritage System (N.H.S.) within the City, which consists of Core Areas, Linkages, the Greenbelt Plan N.H.S. and the Niagara Escarpment Plan Area (as per the City's Official Plan).

Core Areas are the most important components of the N.H.S. in terms of biodiversity, productivity, and ecological and hydrological functions and comprise key natural heritage features, key hydrologic features and local natural areas, as follows:

- Key hydrologic features:
 - Permanent and intermittent streams
 - Lakes (and their littoral zones)
 - Seepage areas and springs
 - Wetlands



- Key natural heritage features:
 - Significant habitat of endangered and threatened species
 - Fish habitat
 - Wetlands
 - Life Science Areas of Natural and Scientific Interest
 - Significant valley lands
 - Significant wildlife habitat
 - Sand barrens, savannahs, and tallgrass prairies
 - Alvars
- Local Natural Areas
 - Environmentally significant areas
 - Unevaluated wetlands
 - Earth Science Areas of Natural and Scientific Interest.

Linkages are natural areas such as old fields, meadows, thickets, successional habitat, hedgerows, riparian vegetation and woodlands that ecologically connect Core Areas.

Developer responsibility as a local service provision would include but not be limited to:

- a) Planting internal to the development as required by the City as part of the creation of a vegetation protection zone that protects the features and functions of the N.H.S. and achieves the goal of natural, self-sustaining vegetation.
- b) Implementation of mitigation measures as outlined within approved Environmental Impact Statements, Linkage Assessments, other studies (i.e., subwatershed studies, Secondary Plans) or as required by the City, Conservation Authorities or other authorities having jurisdiction (i.e., Niagara Escarpment Commission, Ministry of Natural Resources and Forestry). These measures may be located internal or external to the development and would include but not be limited to plant salvage, habitat restoration and management, plantings, monitoring, invasive species control, stewardship/education, and species at risk requirements.
- c) Fencing internal to the development at the boundary of the approved vegetation protection zone associated with the N.H.S. features. This fencing is to be to the City's standards.



- d) Non-traditional fencing, such as dense plantings and bollards, to delineate the boundaries of the protected areas and prevent encroachment.
- e) Compensation planting requirements for tree removal according to the City's standards.

E.5 Local Service Policy for Services Related to a Highway

E.5.1 Overview

This appendix sets out the municipality's general policy guidelines on D.C.s and local service funding for services related to a highway. The guidelines outline in general terms, the size and nature of the engineered infrastructure that is included in the study as a D.C. project, versus infrastructure that is considered as a local service, to be emplaced separately by landowners, pursuant to a development agreement.

The following policy guidelines are general principles by which staff will be guided in considering development applications. Each application, however, will be considered in the context of these policy guidelines on its own merits and having regard to, among other factors, the context of the surrounding area and the location and type of services required as well as their relationship to the proposed development and to the existing and proposed development in the area as per subsection 59 (2) of the D.C.A.

E.5.2 Services Related to a Highway

A highway and services related to a highway are intended for the transportation of people and goods via many different modes including, but not limited to, passenger automobiles, commercial vehicles, transit vehicles, cycling, and walking. A highway shall consist of all land, services, and infrastructure built to support this movement of people and goods regardless of the mode of transportation in pursuit of a complete street.

The transportation planning paradigm across North America has shifted over the last decade or more. The design and layout, density, and mix of uses within a neighbourhood have become a critical consideration. This new consideration and need to grow the City along regional, sub-regional and community nodes and corridors characterized by denser and more mixed development is supported by highways that accommodate and promote walking, cycling and transit use over auto use and has been



identified by the 2017 City of Hamilton Transportation Master Plan (H.T.M.P.), area specific Transportation Master Plans, and the City of Hamilton Official Plan. The overall vision is to create a City which is highly walkable and in which it is easy and convenient to walk, cycle or take transit. The H.T.M.P. has set clear targets to reduce overall vehicle kilometres, reduce trips made by single occupant vehicles, increase trips made by transit, and encourage cycling and walking.

The City of Hamilton Official Plan and the H.T.M.P. put a heavy emphasis on designing corridors, streets and paths with full consideration given to transit, cyclists and pedestrians. Consequently, the design elements of a highway as well as its role and function must change to embrace all categories of the transportation system users and needs to provide a *complete street*. The concept of complete streets defines a highway as a transportation facility that provides safe and comfortable travel for a wide variety of users, regardless of mode, level of ability, and age. Complete streets allow safe travel for:

- Pedestrians of all ages and levels of ability;
- Cyclists;
- Automobiles;
- Transit vehicles; and
- Delivery vehicles.

The main premise of complete streets is the recognition that the function of a street (or a highway) goes beyond simply moving vehicles. Rather, streets play an important role in moving people, connecting the community, accommodating pedestrians and cyclists, enabling goods movement, providing a space for public interaction and civic engagement, and providing access for local stores and businesses. A complete street concept has been fully embraced by the City of Hamilton and is fundamental to transportation policy in the City identified through the key planning documents mentioned earlier. It also translates to the planned capital projects and therefore the local service policy and the D.C. process.

Under this premise, the design of a street is approached with the objective of optimizing the R.O.W. to balance mobility needs and enhance connectivity for all users. Traffic management is a range of measures and infrastructure that help achieve that balance (e.g., traffic signals, roundabouts). Travel Demand Management on the other hand refers to strategies that attempt to reduce or more efficiently manage the demand for



travel within the existing transportation network and reduce capital expenditure without further expanding the supply of the network. Examples of Travel Demand Management strategies with impact on highway design, role, and function include:

- Carpooling to increase the occupancy of vehicles. High-occupancy vehicle lanes provided within the road platform are needed to promote better utilization of existing assets by increased auto occupancy.
- Active transportation (walking or cycling) to reduce demand for vehicle travel by shifting commuter travel demand to cycling and walking. This measure is supported by on-road and off-road cycling trails, sidewalks, and multi-use pathways.
- Park and ride facilities at transit stations are designed to “capture” auto users at some critical gateway points and divert them to transit or active transportation modes.

The H.T.M.P. includes the identification of rapid transit initiatives and the implementation of Light Rail Transit corridors which will have effects on the design of these highways as either main Light Rail Transit corridors or the so called “feeder” routes. Several transit priority measures will be required to “prepare” a highway for serving transit effectively. These features will include but will not be limited to:

- High-occupancy vehicle or shared lanes for the exclusive or semi-exclusive use of transit vehicles and private automobiles with more than one occupant. They allow high-occupancy vehicles to have faster travel times than general purpose lanes, encouraging transit use and carpooling. Lanes may be designated as shared lanes only during peak periods.
- Provision of dedicated transit lanes along transit priority routes.
- Transit signals and transit priority signals that use real-time information to either extend a green light or shorten a red light when a bus is approaching to help the bus pass through the intersection without stopping, thus giving priority to transit vehicles at intersections.
- Queue jump lanes with signal priority allow buses to bypass queues at intersections. Transit vehicles have an advanced green and can enter the intersection before other vehicles.



- Architecturally distinctive passenger amenities, bus bays, bus stop infrastructures and terminals located within the road allowance and provided to improve safety and comfort for transit users.

The concept of services related to a highway has evolved and expanded to fully embrace the transportation of people and goods via many different modes including, but not limited to, passenger cars, commercial vehicles, transit vehicles, bicycles and pedestrians. The highway therefore consists of all land and associated infrastructure built to support (or service) this movement of people and goods regardless of the classification of the road (i.e., local, collector or arterial) or the mode of transportation employed, thereby meeting their primary role and function of providing transportation “space” and opportunity for all users. The associated infrastructure to achieve this concept shall include, but is not limited to:

- road pavement, sub-structure and curbs;
- new sidewalks, sidewalks to fill in network gaps, sidewalks associated with the urbanization of roads or sidewalk enhancements and widenings;
- roundabouts, traffic calming features, left and right turn lanes, medians, lay-bys, pedestrian cross-overs;
- grade separation/bridge structures (for any vehicles, railways and/or pedestrians and cyclists);
- grading, drainage and retaining wall features;
- culvert structures;
- storm water drainage systems;
- traffic control systems, signals and related technologies;
- active transportation facilities (e.g., sidewalks, bike lanes, multi-use trails, trails, pathways, cycle tracks, bike share facilities and services, other cycling amenities, etc.);
- sustainable mobility programs;
- transit lanes, queue jump lanes, bus bays, stops and amenities;
- curb extensions between queue jump lanes and bus bays;
- roadway illumination systems;
- boulevard and median surfaces (e.g., sod & topsoil, paving, etc.);
- street trees, streetscaping and landscaping;
- parking lanes and driveway entrances;
- noise attenuation systems;



- signage;
- railings, safety barriers;
- related utilities; and
- temporary works to facilitate the implementation of any of the above.

For road classification information, refer to the City of Hamilton Official Plan and the *Comprehensive Development Guidelines and Financial Policies Manual, 2017*, or as may be amended from time to time (<https://www.hamilton.ca/develop-property/policies-guidelines/comprehensive-development-guidelines-and-financial-policies>).

E.5.3 Infrastructure

E.5.3.1 Local and Collector Roads (including land)

1. All local roads are considered to be the developer's financial responsibility.
2. Collector roads, internal to a development, inclusive of approvals, all land and associated infrastructure, including temporary works, are a direct developer responsibility under section 59 of the D.C.A. as the local service component, net of applicable oversizing per the *Financial Policies for Development* and the *Comprehensive Development Guidelines and Financial Policies Manual, 2017*, or as may be amended from time to time (<https://www.hamilton.ca/develop-property/policies-guidelines/financial-policies-development>).

In the Airport Employment Growth District (A.E.G.D.) Transportation Master Plan, certain collector roads internal to the development were listed as Schedule C improvements in the implementation plan. These are listed incorrectly and are a direct developer responsibility as outlined in this local service policy.

3. Collector roads, external to development, inclusive of all land and associated infrastructure, including temporary works, needed to support a specific development or required to link with the area to which the plan relates, are a direct developer responsibility under section 59 of the D.C.A. (local service component) net of applicable oversizing per the *Financial Policies for Development* and the *Comprehensive Development Guidelines and Financial Policies Manual, 2017*, or as may be amended from time to time.



E.5.3.2 Arterial Roads

1. New, widened, extended or upgraded arterial roads, inclusive of all associated infrastructure, including temporary works, is included as part of highway costing funded through D.C.s net of direct developer responsibility (local service component) as per the *Financial Policies for Development* and the *Comprehensive Development Guidelines and Financial Policies Manual, 2017*, or as may be amended from time to time.
2. Land acquisition for arterial roads on existing R.O.W. to achieve a complete street: dedication under *Planning Act* provisions (sections 41, 51 and 53) through development lands per the *Financial Policies for Development* and the *Comprehensive Development Guidelines and Financial Policies Manual, 2017*, or as may be amended from time to time. In areas with limited development, this is included as part of highway costing funded through D.C.s.
3. Land acquisition for arterial roads on new R.O.W. to achieve a complete street: dedication, where possible, under *Planning Act* provisions (sections 51 and 53) through development for lands up to the collector standard per the *Financial Policies for Development* and the *Comprehensive Development Guidelines and Financial Policies Manual, 2017*, or as may be amended from time to time. Land acquisitions for road widenings and/or oversizing beyond the collector standard, or where located in an area with limited development, are included as part of highway costing funded through D.C.s.
4. Land acquisition beyond normal dedication requirements to achieve transportation corridors as services related to highways, including grade separations and infrastructure for the movement of pedestrians, cyclists, public transit and/or railway vehicles, are included as part of highway costing funded through D.C.s.

E.5.3.3 Traffic and Transit Control Systems, Signals and Intersection Improvements on Area Municipal Highways

1. New, widened, extended or upgraded arterial roads, including temporary works, unrelated to a specific development are included as part of highway costing funded through D.C.s net of developer responsibility (local service component) per the *Financial Policies for Development* and the *Comprehensive Development*



Guidelines and Financial Policies Manual, 2017, or as may be amended from time to time.

2. Arterial and non-arterial road improvements related to any private site entrances or entrances to a specific development, including any temporary works, are a direct developer responsibility under section 59 of the D.C.A. (local service component), net of applicable oversizing per the *Financial Policies for Development* and the *Comprehensive Development Guidelines and Financial Policies Manual, 2017*, or as may be amended from time to time.
3. Intersection improvements, new or modified signalization, signal timing and optimization plans, area traffic studies for highways attributed to growth and unrelated to a specific development are included as part of highway costing funded through D.C.s as permitted under subsection 5 (1) of the D.C.A.

E.5.3.4 Streetlights

1. Streetlights on new arterial roads and arterial road improvements are considered part of the complete street and included as part of highway costing funded through D.C.s net of direct developer responsibility (local service component).
2. Streetlights on non-arterial roads external to development needed to support a specific development or required to link with the area to which the plan relates are considered part of the complete street and included as a direct developer responsibility under section 59 of the D.C.A. (local service component).
3. Streetlights on non-arterial roads internal to development are considered part of the complete street and included as a direct developer responsibility under section 59 of the D.C.A. (local service component).

E.5.3.5 Transportation-Related Pedestrian and Cycling Facilities

1. Sidewalks, multi-use trails, trails, pathways, cycle tracks and bike lanes, inclusive of all required land and infrastructure, including related temporary works and grade separations, located within City arterial road and provincial highway corridors are considered part of the complete street and included as part of highway costing funded through D.C.s, net of direct developer responsibility (local service component) per the *Financial Policies for Development* and the



Comprehensive Development Guidelines and Financial Policies Manual, 2017, or as may be amended from time to time.

2. Sidewalks deemed to be temporary are considered direct developer responsibility (local service component).
3. Sidewalks, trails, pathways, multi-use trails, cycle tracks and bike lanes, inclusive of all required land and infrastructure, including related temporary works and grade separations that are located within or linking to non-arterial road corridors internal to development are considered part of the complete street and are a direct developer responsibility under section 59 of the D.C.A. (local service component) per the *Financial Policies for Development* and the *Comprehensive Development Guidelines and Financial Policies Manual, 2017, or as may be amended from time to time.*
4. Other sidewalks, trails, pathways, multi-use trails, cycle tracks and bike lanes, inclusive of all required land and infrastructure, including related temporary works and grade separations, that are located within non-arterial road corridors external to development and needed to support a specific development or required to link with the area to which the plan relates are a direct developer responsibility under section 59 of the D.C.A. (local service component) per the *Financial Policies for Development* and the *Comprehensive Development Guidelines and Financial Policies Manual, 2017, or as may be amended from time to time.*
5. Multi-use trails (not associated with a road), inclusive of all land and required infrastructure and including related temporary works and grade separations, that go beyond the function of a (parkland) recreational trail and form part of the City's active transportation network for cycling and/or walking are included in the D.C. calculations as permitted under subsection 5 (1) of the D.C.A.

E.5.3.6 Sustainable Modes Programs including Transportation Demand Management

1. Bike share expansions within existing service areas and in new service areas; cycling amenities including bike racks, lockers, shelters and fix-it stations; pedestrian amenities (e.g., benches); and sustainable mobility programs (e.g., Smart Commute, Travel Demand Management for higher-density developments) are considered part of the complete street and included as part of highway costing funded through D.C.s net of direct developer responsibility (local service



component) per the *Financial Policies for Development* and the *Comprehensive Development Guidelines and Financial Policies Manual, 2017*, or as may be amended from time to time.

E.5.3.7 Noise Abatement Measures

1. Noise abatement measures external and internal to development where it is related to, or a requirement of a specific development are a direct developer responsibility under section 59 of the D.C.A. (local service component).
2. Noise abatement measures on new arterial roads and arterial road improvements abutting an existing community and unrelated to a specific development are included in the D.C. calculations as permitted under subsection 5 (1) of the D.C.A.

E.5.3.8 Transit Nodes, Terminals, Lanes and Bus Stop Infrastructure

1. Transit node, transit priority measures (e.g., queue jump lanes, transit signal priority) and bus stop infrastructure and amenities (including bus pads and shelters) located within arterial road corridors, and including transit stations or terminals located on lands to serve these road corridors are considered part of the complete street and included in the D.C. calculations as permitted under subsection 5 (1) of the D.C.A., net of direct developer responsibility under section 59 of the D.C.A. (local service component) per the *Financial Policies for Development* and the *Comprehensive Development Guidelines and Financial Policies Manual, 2017*, or as may be amended from time to time.
2. Transit node, transit priority measures (e.g., queue jump lanes, transit signal priority) and bus stop infrastructure and amenities located within non-arterial road corridors internal to development are considered part of the complete street and direct developer responsibility under section 59 of the D.C.A. (local service component).
3. Transit node, transit priority measures (e.g., queue jump lanes, transit signal priority) and bus stop infrastructure and amenities located within non-arterial road corridors external to development and needed to support a specific development or required to link with the area to which the plan relates are a direct developer responsibility under section 59 of the D.C.A. (local service component).



E.5.3.9 Infrastructure Assets Constructed by Developers

1. All infrastructure assets constructed by developers must be designed in accordance with the City's engineering standards and policies.
2. All infrastructure assets shall be conveyed in accordance with the City's engineering standards and policies.



Appendix F

Water and Wastewater Servicing Needs – GM BluePlan Engineering Consultants Limited



Appendix F: Water and Wastewater Servicing Needs – GM BluePlan Engineering Consultants Limited

See separate technical appendix.



Appendix G

Stormwater Management Servicing Needs – WSP Inc. and Scheckenberger & Associates Ltd.



Appendix G: Stormwater Management Servicing Needs – WSP Inc. and Scheckenberger & Associates Ltd.

See separate technical appendix.



Appendix H

Services Related to a Highway and Transit Servicing Needs – Arcadis Canada Inc.



Appendix H: Services Related to a Highway and Transit Servicing Needs – Arcadis Canada Inc.

See separate technical appendix.



Appendix I

Asset Management Plan



Appendix I: Asset Management Plan

The recent changes to the Development Charges Act, 1997, as amended (D.C.A.) (new subsection 10 (2) (c.2)) require that the background study must include an asset management plan (A.M.P.) related to new infrastructure. Section 10 (3) of the D.C.A. provides:

“The asset management plan shall,

- (a) deal with all assets whose capital costs are proposed to be funded under the development charge by-law;
- (b) demonstrate that all the assets mentioned in clause (a) are financially sustainable over their full life cycle;
- (c) contain any other information that is prescribed; and
- (d) be prepared in the prescribed manner.”

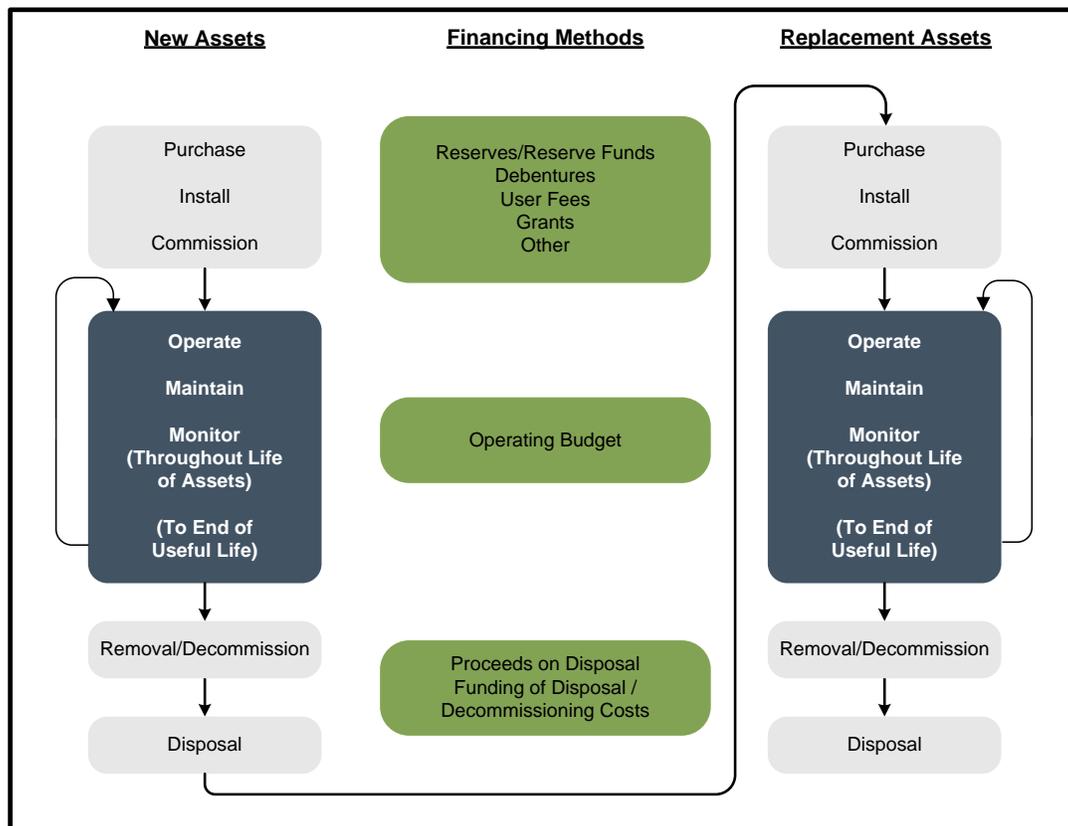
In regard to the above, section 8 of the regulations was amended to include subsections (2), (3), and (4) which set out specific detailed requirements for transit (only). For all services except transit, there are no prescribed requirements at this time, thus requiring the municipality to define the approach to include in the background study.

At a broad level, the A.M.P. provides for the long-term investment in an asset over its entire useful life along with the funding. The schematic below identifies the costs for an asset through its entire life cycle. For growth-related works, most capital costs will be funded by the development charge (D.C.). Non-growth-related expenditures will then be funded from non-D.C. revenues as noted below. During the useful life of the asset, there will be minor maintenance costs to extend the life of the asset along with additional program-related expenditures to provide the full services to the residents. At the end of the life of the asset, it will be replaced by non-D.C. financing sources.

It should be noted that with the recent passing of the *Infrastructure for Jobs and Prosperity Act*, municipalities are now required to complete A.M.P.s, based on certain criteria, which were to be completed by 2022 for core municipal services and 2024 for all other services. The amendments to the D.C.A. do not require municipalities to complete these A.M.P.s (required under *Infrastructure for Jobs and Prosperity Act*) for the D.C. background study, rather the D.C.A. requires that the D.C. background study



include information to show the assets to be funded by the D.C. are sustainable over their full life cycle.



In 2012, the Province developed Building together – Guide for municipal asset management plans, which outlines the key elements for an A.M.P., as follows:

- **State of local infrastructure:** asset types, quantities, age, condition, financial accounting valuation and replacement cost valuation.
- **Desired levels of service:** defines levels of service through performance measures and discusses any external trends or issues that may affect expected levels of service or the municipality's ability to meet them (for example, new accessibility standards, climate change impacts).
- **Asset management strategy:** the asset management strategy is the set of planned actions that will seek to generate the desired levels of service in a sustainable way, while managing risk, at the lowest lifecycle cost.
- **Financing strategy:** having a financial plan is critical for putting an A.M.P. into action. By having a strong financial plan, municipalities can also demonstrate



that they have made a concerted effort to integrate the A.M.P. with financial planning and municipal budgeting and are making full use of all available infrastructure financing tools.

Commensurate with the above, the City prepared an A.M.P. for its existing assets; however, it did not take into account the financial planning for all future growth-related assets. As a result, the asset management requirement for the D.C. must be undertaken in the absence of this information. It is noted that the City has started work on the Long-Term Financial Plan to align financial sustainability with asset management practices. Future D.C. updates will align the growth-related A.M.P. with the City's Long-Term Financial Plan.

In recognition to the schematic above, the following table (presented in 2023 \$) has been developed to provide the annualized expenditures and revenues associated with new growth. Note that the D.C.A. does not require an analysis of the non-D.C. capital needs or their associated operating costs so these are omitted from the table below. In addition, as all capital costs included in the D.C.-eligible capital costs are not included in the City's A.M.P., the present infrastructure gap and associated funding plan have not been considered at this time. Hence, the following does not represent a fiscal impact assessment (including future tax/rate increases) but provides insight into the potential affordability of the new assets:

1. The non-D.C. recoverable portion of the projects that will require financing from municipal financial resources (i.e., taxation, rates, fees, etc.). This amount has been presented on an annual debt charge amount based on 20-year financing.
2. Lifecycle costs for the D.C. capital works have been presented based on a sinking fund basis. The assets have been considered over their estimated useful lives.
3. Incremental operating costs for the D.C. services (only) have been included.
4. The resultant total annualized expenditures are \$425.00 million.
5. Consideration was given to the potential new taxation and user fee revenues which will be generated as a result of new growth. These revenues will be available to finance the expenditures above. The new operating revenues are



\$123.92 million. This amount, totalled with the existing operating revenues of \$2.20 billion, provide annual revenues of \$2.32 billion by the end of the period.

6. In consideration of the above, the capital plan is deemed to be financially sustainable.

City of Hamilton
Asset Management – Future Expenditures and Associated Revenues
2023 \$

Asset Management - Future Expenditures and Associated Revenues	2042 (Total)
Expenditures (Annualized)	
Annual Debt Payment on Non-Growth Related Capital ¹	106,426,828
Annual Debt Payment on Post Period Capital ²	62,611,276
Lifecycle:	
Annual Lifecycle Costs	\$137,705,205
Incremental Operating Costs (for D.C. Services)	
	\$118,258,890
Total Expenditures	
	\$425,002,200
Revenue (Annualized)	
Total Existing Revenue ³	\$2,200,525,250
Incremental Tax and Non-Tax Revenue (User Fees, Fines, Licences, etc.)	\$123,917,846
Total Revenues	\$2,324,443,096

¹ Non-Growth Related component of Projects

² Interim Debt Financing for Post Period Benefit

³ As per Sch. 10 of FIR

Regarding the D.C.A. requirements for asset management for transit services, Ontario Regulation 82/98 (as amended) provides the following:

8 (3) If a council of a municipality proposes to impose a development charge in respect of transit services, the asset management plan referred to in subsection 10 (2) (c.2) of the Act shall include the following in respect of those services:



Table I-2, which follows, and the accompanying information provide the individual items prescribed by subsection 8 (3) of the Regulation (as amended) and provides how these items have been addressed for this D.C. Background Study by the City.



Table I-2
City of Hamilton
Summary of Transit Asset Management Plan Requirements
As per O. Reg. 82/98, as amended

Ontario Regulation 82/98, as amended subsection 8(3) Requirements	Compliance	Link
1. A section that sets out the state of local infrastructure and that sets out:	See State of the Infrastructure Report (S.O.T.I.), chapters 11 (for transit facilities) and 13 (for fleet vehicles and other associated infrastructure)	https://d3fpllf1m7bbt3.cloudfront.net/sites/default/files/media/browser/2017-08-24/pw-soti-report-2016.pdf
i. the types of assets and their quantity or extent,	See S.O.T.I. Table 11.1 & Table 13.1	
ii. the financial accounting valuation and replacement cost valuation for all assets,	The accounting valuation is based on PSAB 3150 reporting requirements for Tangible Capital Assets and is depreciated using a straight-line amortization For the replacement cost valuation, see S.O.T.I. Table 11.2 and 13.2	
iii. the asset age distribution and asset age as a proportion of expected useful life for all assets, and	See S.O.T.I. Table 11.5, 13.5 & 13.6	
iv. the asset condition based on standard engineering practices for all assets.	See S.O.T.I. Table 11.4 & 13.4	
2. A section that sets out the proposed level of service and that:		
i. defines the proposed level of service through timeframes and performance measures,	See Arcadis' Strategic Transportation Network Review Report Appendix D - Transportation Inputs to the 2024 Development Charges Background Study	
ii. discusses any external trends or issues that may affect the proposed level of service or the municipality's ability to meet it, and	See Page 265 of the 2019-2022 Public Works Multi Year Business Plan	https://d3fpllf1m7bbt3.cloudfront.net/sites/default/files/media/browser/2015-07-19/ts-appendix-q-proposed-service-standards.pdf https://d3fpllf1m7bbt3.cloudfront.net/sites/default/files/media/browser/2018-12-06/2019-2022-pw-multi-year-business-plans-12062018.pdf https://www.hamilton.ca/sites/default/files/media/browser/2015-07-19/transit-strategy-report-march-6-2015.pdf
iii. shows current performance relative to the targets set out.	See Page 10 of the Ten Year Local Transit Strategy	



Table I-2 (Cont'd)
City of Hamilton
Summary of Transit Asset Management Plan Requirements
As per O. Reg. 82/98, as amended

Ontario Regulation 82/98, as amended subsection 8(3) Requirements	Compliance	Link
3. An asset management strategy that:		
i. sets out planned actions that will enable the assets to provide the proposed level of service in a sustainable way, while managing risk, at the lowest life cycle cost,	See Table I-3 below	
ii. is based on an assessment of potential options to achieve the proposed level of service, which assessment compares,	See Table I-3 below	
A. life cycle costs,	See pages 147-150 and Page 309 of the City of Hamilton Budget and Multi-Year Outlook (2023-2026).	https://pub-hamilton.escribemeetings.com/filestream.ashx?DocumentId=350254 https://www.hamilton.ca/sites/default/files/2023-09/Budget_2023-Approved-Operating-Capital-Book.pdf
B. all other relevant direct and indirect costs and benefits, and	See pages 147-150 and Page 309 of the City of Hamilton Budget and Multi-Year Outlook (2023-2026).	https://pub-hamilton.escribemeetings.com/filestream.ashx?DocumentId=350254 https://www.hamilton.ca/sites/default/files/2023-09/Budget_2023-Approved-Operating-Capital-Book.pdf
C. the risks associated with the potential options,	The risk of not following this Asset Management Plan may result in: <ul style="list-style-type: none"> • increased lifecycle costs of capital infrastructure and rolling fleet due to unplanned repairs. • increased operating and maintenance costs due to unplanned equipment failure. • risk of violation of Provincial and Federal Regulations including Occupational Health and Safety Act, Ontario Fire Code and Ontario Building Code. • reduced procurement efficiency. • risk of compromised security (vault and fare media). • increased contractual and reputation risks. 	



Table I-2 (Cont'd)
City of Hamilton
Summary of Transit Asset Management Plan Requirements
As per O. Reg. 82/98, as amended

Ontario Regulation 82/98, as amended subsection 8(3) Requirements	Compliance	Link
<p>iii. contains a summary of, in relation to achieving the proposed level of service, (not defined clearly)</p> <p>A. non-infrastructure solutions, B. maintenance activities, C. renewal and rehabilitation activities, D. replacement activities, E. disposal activities, and F. expansion activities,</p>	<p>See pages 147-150 and Page 309 of the City of Hamilton Budget and Multi-Year Outlook (2023-2026).</p>	<p>https://pub-hamilton.escribemeetings.com/filestream.ashx?DocumentId=350254 https://www.hamilton.ca/sites/default/files/2023-09/Budget_2023-Approved-Operating-Capital-Book.pdf</p> <p>https://www.hamilton.ca/sites/default/files/2022-10/22-255-consolidated-oct2022.pdf</p>
<p>iv. discusses the procurement measures that are intended to achieve the proposed level of service, and</p>	<p>See Procurement Policy By-law</p> <p>GOALS AND OBJECTIVES OF THE PROCUREMENT POLICY</p> <ul style="list-style-type: none"> - Procure the necessary quality and quantity of Goods and/or Services in an efficient, timely and cost effective manner, while maintaining the controls necessary for a public agency, in accordance with the Procurement Policy as approved by Council. - Encourage an open and competitive bidding process for the acquisition and disposal of Goods and/or Services, and the objective and equitable treatment of all vendors. - Ensure the best value of an acquisition is obtained. This may include, but not be limited to, the determination of the total cost of performing the intended function over the lifetime of the task, acquisition cost, installation, disposal value, disposal cost, training cost, maintenance cost, quality of performance and environmental impact. - Procure Goods and/or Services with due regard to the preservation of the natural environment and to encourage the use of “environmentally friendly” products and services, as supported by the City’s Strategic Plan. 	<p>https://www.hamilton.ca/sites/default/files/2022-10/22-255-consolidated-oct2022.pdf</p>



Table I-2 (Cont'd)
City of Hamilton
Summary of Transit Asset Management Plan Requirements
As per O. Reg. 82/98, as amended

Ontario Regulation 82/98, as amended subsection 8(3) Requirements	Compliance	Link
<p>v. includes an overview of the risks associated with the strategy and any actions that will be taken in response to those risks.</p>	<p><u>Changing technology</u>: Investment in Transit assets are high cost, long term commitments. With rapidly changing technology such as electric vehicles and autonomous vehicles, the City may be required to quickly modify, remove and/or add fleet and facility assets in order to accommodate emerging trends.</p> <p><u>Funding from Senior Government</u>: Senior levels of Government have recognized gridlock costs Canada's economy billions of dollars in lost productivity and damage to the environment. In recent years, the Government of Canada has provided stimulus money (Canada Infrastructure Program) to improve and expand transit service that provided the City with the necessary funds for fleet and facility maintenance. The Federal and Provincial Governments have indicated future long-term funding announcements can be expected which the City will be reliant on for continued asset management. Cancellation of funding programs will result in budget shortfalls.</p> <p><u>Regional Fare Integration</u>: The Big Move, the Greater Toronto and Hamilton Area (GTHA) regional transportation plan, called for the implementation of an integrated regional fare structure. Determining an optimal fare structure is a critical component of developing the overall structure. As the City of Hamilton has the lowest fare in the GTHA there may be impacts to service delivery not contemplated in this plan.</p> <p><u>Skilled Labour</u>: The Canadian Trucking Alliance has reported the growing shortage of attracting and retaining heavy duty mechanics is near "crisis". The impact of retiring baby boomers and changing educational values that allowed the mechanic occupation to seem an unappealing career choice for parents to encourage children has significantly impacted the availability of qualified mechanics. The inability to acquire skilled staff to meet growing fleet needs may have financial and service impacts.</p>	



Table I-2 (Cont'd)
City of Hamilton
Summary of Transit Asset Management Plan Requirements
As per O. Reg. 82/98, as amended

Ontario Regulation 82/98, as amended subsection 8(3) Requirements	Compliance	Link
<p>4. A financial strategy that:</p> <p>i. shows the yearly expenditure forecasts that are proposed to achieve the proposed level of service, categorized by,</p> <p>A. non-infrastructure solutions, B. maintenance activities, C. renewal and rehabilitation activities, D. replacement activities, E. disposal activities, and F. expansion activities,</p>	<p>Capital Costs - see page 453-463 of 2019 Tax Supported Preliminary Capital Budget Book 2</p> <p>Facilities has annual capital programs through the City's Tax Capital Budget for maintaining and upgrading corporate facilities. While the annual amount is not sufficient to fulfill all needs in a given year, facilities prioritizes based on condition and urgency of works. The trend of declining facility condition has been communicated through the 2016 State of the Infrastructure - SOTI report and other facilities reports (Capital Lifecycle Renewal - Strategic Renewal of Facilities -PW18065; dated July 12, 2018). Grant funding will be sought to mitigate any potential decline of facilities.</p>	<p>https://d3fpllf1m7bbt3.cloudfront.net/sites/default/files/media/browser/2018-11-30/2019-preliminary-tax-capital-budget-book-2-v2.pdf</p> <p>https://www.hamilton.ca/city-initiatives/strategies-actions/asset-management-plan</p> <p>https://pub-hamilton.escribemeetings.com/filestream.ashx?DocumentId=160096</p>
<p>ii. provides actual expenditures in respect of the categories set out in sub-subparagraphs i A to F from the previous two years, if available, for comparison purposes,</p>	<p>See pages 505-526 of the City of Hamilton 2023 Tax Supported Capital Budget</p>	<p>https://pub-hamilton.escribemeetings.com/filestream.ashx?DocumentId=351991</p> <p>https://pub-hamilton.escribemeetings.com/filestream.ashx?DocumentId=350254</p>
<p>iii. gives a breakdown of yearly revenues by source,</p>	<p>See pages 505-526 of the City of Hamilton 2023 Tax Supported Capital Budget</p>	<p>https://pub-hamilton.escribemeetings.com/filestream.ashx?DocumentId=351991</p> <p>https://pub-hamilton.escribemeetings.com/filestream.ashx?DocumentId=350254</p>
<p>iv. discusses key assumptions and alternative scenarios where appropriate, (see associated text) and</p>	<p>Information to be provided following the completion of the updated SOTI and Transit AMP in early 2024.</p>	
<p>v. identifies any funding shortfall relative to financial requirements that cannot be eliminated by revising service levels, asset management or financing strategies, and discusses the impact of the shortfall and how the impact will be managed.</p>	<p>Information to be provided following the completion of the updated SOTI and Transit AMP in early 2024.</p>	



**Table I-3
City of Hamilton
Planned Action Summary – Transit Asset Management Plan**

Planned Action	Current Activity Notes	Opportunity
Non-Infrastructure Solutions	<ul style="list-style-type: none"> - 10 Year Local Transit Strategy - Annual Transit Service Review - City Wide Transportation Master Plan - Automatic Passenger Counters to confirm areas of growth 	<ul style="list-style-type: none"> - Transit network review, (Re)-Envision - review and confirm expansion service areas.
Maintenance Activities	<ul style="list-style-type: none"> - Maintenance completed as per manufacturer guidelines and Ministry of Transportation Motor Vehicle Inspection Station Standards, recommendations of licenced fleet maintenance staff. - Maintenance tracking via Trapeze and Avantis Asset Management software systems. 	<ul style="list-style-type: none"> - Continued tracking of asset maintenance and renewal. - Funding opportunities from senior levels of Government for capital improvements to supplement municipal funding gaps.
Replacement Activities	<ul style="list-style-type: none"> - 12 Year Revenue vehicle replacement cycle 	<ul style="list-style-type: none"> - Review annual cycle based on updated cost benefit and technology improvements.
Renewal/Rehabilitation Activities	<ul style="list-style-type: none"> - Capital rehabilitation occurs as funding from senior levels of Government become available. - Infrastructure renewal plan is contained in Asset Planner software. Identified deficiencies are monitored and addressed through Capital Budget process. 	<ul style="list-style-type: none"> - None identified
Disposal Activities	<ul style="list-style-type: none"> - Vehicles retired at end of 12 year life cycle and condition evaluated. If unit is undamaged and in fair shape it is auctioned. Non-usable units are sold for scrap value. 	<ul style="list-style-type: none"> - None identified
Expansion Activities	<ul style="list-style-type: none"> - Expansion vehicles and new Transit Maintenance and Storage Facility identified in 10 Year Local Transit Strategy. - Incorporation of recommendations of Annual Service Reviews 	<ul style="list-style-type: none"> - Service levels and fleet needs derived from 10 Year Local Transit Strategy and approved during Capital budget process. Continue long range forecasting by adopting a 10 Year rolling transit plan. - Construction of additional Maintenance & Storage Facility in lower city dependent on funding from senior levels of Government.



Appendix J

Proposed D.C. By-laws



Appendix J: Proposed D.C. By-laws

Provided under separate cover.